PRIMA'S OFFICIAL STRATEGY GUIDE

ALSO COVERS

SIMCITY 4
RUSH HOUR
EXPANSION PACK

EA GAMES

E
EVERYONE
PC
CD-ROM

4
SIMCITY

DELUXE EDITION

EA GAMES

MAXIS

Prima
P
GAMES

primagames.com®

Prima is an authorized
Electronic Arts Licensee.

SIMCITY 4

DELUXE EDITION

PRIMA'S OFFICIAL STRATEGY GUIDE

GREG KRAMER

ACKNOWLEDGMENTS

TABLE OF CONTENTS

INTRODUCTION

SimCity just keeps getting bigger and better, doesn't it? Fortunately, so does this book, with a brand-new section dedicated to the copious new features introduced in *Rush Hour*.

The first seven parts of this book are for all *SimCity* players, illustrating the basics and delving in deep to enable anyone to become an expert Mayor. These parts cover all elements of *SimCity 4* and have been enhanced to include changes made in the post-release updates and expanded to cover many of the customization tools that have arisen since its release (see Chapter 30).

For players of *SimCity 4: Deluxe Edition* and *Rush Hour*, however, much information in the first seven parts will be overridden and enhanced by Part 8: *Rush Hour* Expansion Pack. Throughout the first seven parts, notes alert you to many of the elements that have changed with the evolution of *SimCity 4*.

Please enjoy this book in whatever depth you choose. We hope everyone can find much to make their tenure in the Mayor's office a pleasurable and fruitful one. Have fun and happy motoring!

AUTHOR INTRODUCTION

Few games are as deep or detailed as *SimCity*, and few are more satisfying to play or write strategy guides about.

If you're picking up this guide, you're probably in one of two categories.

- You're a newcomer to *SimCity* and want to figure out how to make things work. Got you covered! We summarize the basics in the Beginners section (Part 1). Then, when you've mastered the basics and your curiosity's piqued, you can dive into the rest of the guide to learn more.

- You're an old hand and you love to get under the hood and squeeze every drop out of the simulation, take it apart, and make it work for you. Got you covered in spades! There are 25 chapters of information on every aspect of *SimCity 4*.

A lot of you are probably somewhere in between, but don't be surprised if, when you get a taste of the power information gives you, you want to get inside every nook and cranny.

The information in this book is available nowhere else; if you see it elsewhere, they got it from here. Maxis has been with us every step of the way, explaining how everything works. Chances are, if you want know how something functions, this book'll tell you.

Get comfortable and let your creativity run wild. In *SimCity 4*, you get the chance to be god, mayor, and citizen, so there's a lot to do and to know. You've got a city to build, too. Get to it, Mayor!

CHANGES SINCE *SIMCITY 3000*

The differences between *SimCity 4* and its predecessor are more profound than any other iteration in this series.

It doesn't look radical on the surface, but it's a major strategic shift.

The list of changes is too complex to be outlined here, so look for sidebars ("That Is *So* 3K!") in every chapter explaining what's new, what's gone, and what's different. You may have to learn to think about things in a whole new way.

PART 1: BEGINNER'S GUIDE TO BASIC CITY BUILDING

If you've never played SimCity, or have but didn't understand how it worked, you should begin your journey here.

The details you find here cover much of what's in the rest of this guide, but without the details that are geared toward more experienced players. They'll be there when you're ready, but for now, get ready for the essentials.

- Chapter 1: Shows you how to start a city, select where to put it, and terraform your city's terrain.
- Chapter 2: See how a city can progress though its lifespan. This chapter isn't a step-by-step walkthrough, but it gives you an idea of how the simulation flows.
- Chapter 3: Vital Information is here in easily referenced form to help you learn the concepts without getting mired in the numbers.
- Chapter 4: Quick Tips. A list of tips and tricks to give you a taste of high-level city management.

GETTING STARTED

The hardest part is getting started. In *SimCity 4*, there are so many choices to make, it's easy to feel overwhelmed, but we can help assuage that.

BASIC PHILOSOPHY

Much that you see in *SimCity 4* and this book is geared to make you think locally. In a game about building an entire city, it's easy to take the wide view of things. You can be a good Mayor that way, but there are better ways.

SimCity 4 abounds with tools that let you know what's happening on every tract of land. Success comes from fixing these local problems rather than elevating your citywide average.

There are constant pitfalls for those who don't zoom in to see what's happening on the streets.

Though average Mayor Rating is in the green, this area is in trouble due to a rash of fires. Mayor Rating this low is a riot waiting to happen. A Mayor only knows this if he focuses on his Sims' wants and needs.

For example, riots occur in areas of low Mayor Rating. If you only look at the average Mayor Rating, you'll never see a riot coming or be able to avert it. A Mayor who analyzes his city up close will see the trouble spot forming and know what to do to make its inhabitants happier.

Think and act locally, and global issues will take care of themselves.

NOTE

If you've purchased *SimCity™ 4 Deluxe*, or have installed the *SimCity™ 4: Rush Hour* expansion pack, you may find some elements of the game differ from the advice given here. See the summary of changes in the Introduction to Part 8 and details in the chapters that follow.

THE REGION VIEW, YOUR FIRST STOP

When you enter the simulation, the first thing you encounter is the Region View.

Even if you have experience with *SimCity*, begin with the tutorials in the Region: Maxisland.

After you learn the basic ropes from this lesson, take on your own Region. You can stick with Maxisland, load another pre-terraformed Region, or start a fresh one.
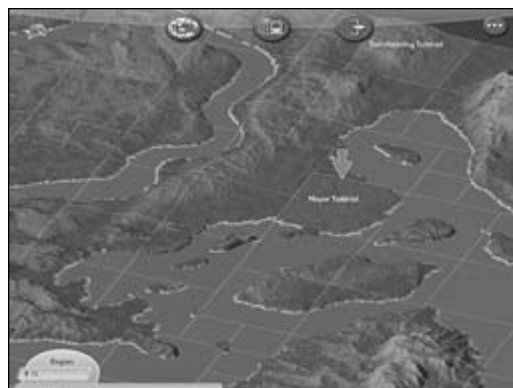
Maxisland is home to the tutorials and interesting terrain for your first city.

TIP

If this is your first city and you don't plan to play with multiple cities (see Chapter 25), choose a medium-sized city tile. Medium gives you space but isn't overwhelming. Later, if you want to work with multiple cities, a medium city isn't too much to handle.

If you want to learn how to expand, start with a small city tile and develop it. When it flourishes, you'll be ready to link it to neighbor cities for social engineering.

PRE-TERRAFORMED REGIONS

Explore the Load Region menu to see what's possible with *SimCity 4*'s Terraform tools.

Learn how to use the tools by studying these landscapes and experimenting to see how it's done.

Look at what Maxis's finest came up with in the ready-made Regions and starter cities.

NOTE

Some built-in Regions contain starter cities that can give you a leg up or show you how it's done. Run some of these cities to get the feel for the simulation before starting your own town.

For most players, it's best to choose one of these Regions and get on with the city building (by entering Mayor Mode). Learning to terraform can come later.

For those interested in becoming proficient at terraforming and Region design, start with either a pre-rendered Region or a flat new one, and read Chapter 6. That chapter details everything you need to know to turn your block of earth into a majestic landscape. You may tinker with fresh terrain or change the pre-made stuff.

BASIC TERRAFORMING

If you don't care what your terrain looks like, jump into a flat new Region and choose a city.

If you'd like to face terrestrial challenges, or want a more interesting and textured landscape, there are a few things you can do:

1. Zoom out and bring up the Hills tool from the Terraform menu under Raise Terrain. Using brief mouse clicks, raise small hills all over the city tile. This gives you some variance of elevation that'll add realism to your city.

A little water in the middle gives your city land-value enhancement, and yourself some insight into how water fits in with your terrain.

2. Using the Shallow Valley tool, point to the city center and left-click until you have a small lake. Now you've got water.

3. For fun, zoom in on an edge of the map and use the same tool to create water off the map's edge.

4. In the same place, bring up the Raise Terrain menu and pick the Mountain option. Carefully so it's not too huge, build a mountain right on the edge of the map.

5. Apply some erosion from the Terrain Effects menu. Because the tools in this menu affect the entire city tile, you can do it all in one (or more for more effect) click. This gives the raw earth some texture and sharpness.

6. Zoom out and activate the Seed Forests tool. Left-click to plant trees. Trees absorb pollution, so plant many, while they're free and easy to place in large quantities. Put some on the top of the mountain, too.

A mountain and a lake off the side of your map will demonstrate how to make terrain features span several city tiles.

Land value is enhanced by proximity to water and high ground. This is your opportunity to make places that will be higher in land value. While it's free, raise hills and a low mesa from which wealthy Sims can look down on the rest of the city.

Now you have a little city tile that'll be interesting to build on. You can do more, but anything you do from the Terrain Effects menu wipes away any trees you've seeded. Plant your trees last.

TIP
To start over, exit to the Region and elect not to save.
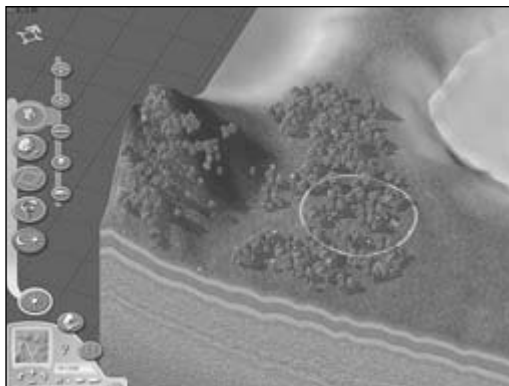
Trees are your last step before establishing your city. Use a lot of greenery during this terraforming phase. It's good for the environment, it looks nice, and it costs you big Simoleons and a lot of work to do it later.

A BIT OF INTERMEDIATE TERRAFORMING

We put a lake and a mountain on the edge to show you something special. Save this city and exit to the Region. Select the city tile adjacent to the lake and mountain you built, and enter it.

The first thing you're asked is if you want to "Reconcile Edges." This automatically raises and lowers terrain of the current city to match that of neighboring cities. Accept the reconciliation and, ta-da, your mountain and lake are automatically completed in this adjacent city.

Save and exit to the Region. In the Region View, you can see the end result: a lake and a small mountain that span two cities.

Making such terrain features is essential if you want to indulge in any high-level Region design. Re-enter your first city.
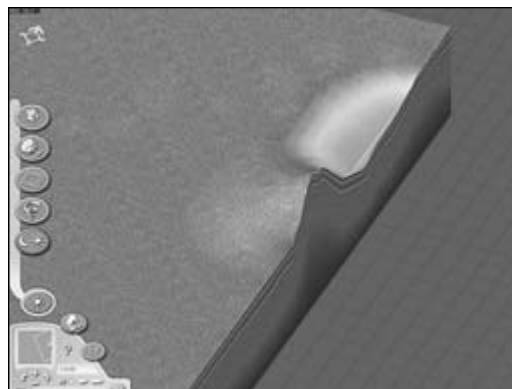
When you reconcile edges on the city next to your original one, the mountain and lake you created along the border are completed here. From Region View, these look like continuous features, not ones built on separate tiles.

CITY ESTABLISHMENT

When your city tile is to your liking, click on the Mayor Mode button (the "top hat" icon) and establish your city. Choose a city and Mayor name and get ready to roll.

NOTE

Those experienced with *SimCity 3000* may notice that there are no skill levels in *SimCity 4*. The game is geared to being played at several skill levels, so everyone gets the same starting money and any terrain they care to make or load. If, on the other hand, you're playing with the *Rush Hour* expansion pack, you will be able to select a skill level. The profound and subtle implications of your choice are discussed in detail in Part 8 of this guide.

MAYOR AND MY SIM MODE

After you start your city, you need to know about the simulation's other two modes. Mayor Mode is where you'll do most of your "mayoring"; much of what you need to know about that is covered in the rest of these beginner's chapters.

My Sim Mode is a terrific way to get inside your city by dropping an individual Sim into your town and hearing his or her every thought any time you care to listen. *SimCity 4* is a game of local action (though you can play it from a more global viewpoint).

CROSS-REFERENCE

To use My Sim Mode as a powerful source of information, see Chapter 12.

GETTING STARTED, SUMMARY

You've chosen a Region, a city in that Region, and names for yourself and your city. Now what? Read on to see what's in store and how to handle it.

LIFE OF A CITY

There are so many ways to play *SimCity 4* that it's impossible to tell you how things will go and what you should do at each juncture. The direction you select may seem like failure to one person and inspiration to another. There are certain "goals" in this simulation, but how you get to them is open to individuality. This open-ended gameplay is what *SimCity* is all about.

Here, then, is a biography of a city that shows you how things might go and introduces you to the concepts you face as your city grows and changes.

Don't take this chapter as a step-by-step guide; so much depends on your city's context and your timing as Mayor that there's no guarantee that doing it precisely this way will even work with the way you play. Use it, instead, as a tour through the heart of the simulation to learn what all the pieces are, if not how they work (that's for the later parts of this book).

> **! WARNING**
>
> Note that the dates and population numbers here are *very* arbitrary and approximate. They are intended to illustrate a general progression of events, not a mandatory time by which you should do something.

- Approx. City Size: Total population
- Approx. Time: Date since city inception
- Actions: Things you should consider doing; if an issue hasn't arisen yet, it might be too early to do it (e.g., Subway development)
- Positive Feedback: Things that tell you you're doing it right
- Limiting Factors: Forces holding you back from taking actions or seeing positive feedback
- Pressures: Negative forces that start to arise, which you'll have to balance
- Rewards: Reward buildings you should see during the phase

PHASE 1: GETTING STARTED

We've already gone over this phase in Chapter 1.

- Approx. City Size: 0
- Approx. Time: Pre-city
- Actions: Select location, terraform terrain, establish and name city
- Positive Feedback: N/A
- Limiting Factors: N/A
- Pressures: N/A
- Rewards: None

PHASE 2: CREATE A TOWN

The beginning of your city is exciting and easy. There's not much you can do wrong here except too quickly expand.

- Approx. City Size: 0–500
- Approx. Time: Years 0–1
- Actions: Start zoning, provide power, create My Sims, make Road connection to one neighbor
- Positive Feedback: Initial growth
- Limiting Factors: Commute length from homes to workplace, terrain, Industrial desirability, power supply
- Pressures: Poverty, crime, and fire
- Rewards: Mayor's House

PHASE 3: ESTABLISH ORDER

Your zones are buzzing, so put down the most rudimentary of services. Everything costs money, so the more intelligently you add and locate city services, the cheaper it is to provide services to your citizens. Try to visualize which directions your city will grow and leave room for expansion.

- Approx. City Size: 500–1,500
- Approx. Time: Year 1–3
- Actions: Build main Roads, establish fire and police, set up garbage disposal system, pass basic ordinances
- Positive Feedback: Growth, Mayor Rating starting to stabilize
- Limiting Factors: Keeping your city small enough to be covered by single police, fire, etc.
- Pressures: Low health, low education, short Life Expectancy
- Rewards: House of Worship/Cemetery, Toxic Waste Dump

PHASE 4: BASIC SERVICES

More Sims are flowing into your city, but it's going to taper off (especially at medium wealth) if you don't think about Sims' needs beyond transportation and work. Set up your educational and healthcare systems with the most basic services. Locate them well and adjust their local funding so they're running barely over capacity—this saves you lots of money. As use of these facilities grows, incrementally raise local funding.

- Approx. City Size: 1,500–4,000

- Approx. Time: Years 3–5

- Actions: First Elementary School and Health Clinic, establish water system, pass ordinances

- Positive Feedback: Continued growth, improving Mayor Rating

- Limiting Factors: Harder to keep city in basic services' coverage radii, low medium-wealth desirability

- Pressures: Public safety stretched thin, pollution becoming a problem

- Rewards: Farmers Market, Missile Testing Range

PHASE 5: EXPANSION

Demand should be strong in low- and medium-wealth sectors, so gradually expand. Keep things low density for a while to come. Build out, not up. Watch the money; if it isn't tight yet, it will be.

- Approx. City Size: 4,000–18,000

- Approx. Time: Years 5–10

- Actions: Tweaking (mostly raising) taxes to control/spur demand, expand transportation connections to neighbors (Road, Rail), add more zones, keep up on civic coverage, Roads, expand water system

- Positive Feedback: More growth, medium-density development, increased tax revenue

- Limiting Factors: Budget straining, original development starting to be replaced, dealing with terrain obstacles

- Pressures: Traffic choking, Mayor Rating fluctuating, demand vs. growth pressure, utility supply problems, public safety straining further, pollution harder to control, Mayor Rating dropping

- Rewards: City Hall, Radio Station, Private School, Tourist Trap

PHASE 6: QUALITY OF LIFE

The tax base could be booming, so provide the more expensive services that make your city great. Go beyond basic coverage to create redundancy and services of a higher order (Local Branch Libraries, City Museums, etc.). Gear your moves toward making your current Sims happy and attracting a sizeable high-wealth Residential and Commercial population.

- Approx. City Size: 18,000–30,000

- Approx. Time: Years 10–20

- Actions: Upgrade services to higher order (libraries, Large Medical Center, amenities, parks and recreation), expand bus system, pass more ordinances, pollution control becoming crucial

- Positive Feedback: More growth, EQ and HQ growth, improving Mayor Rating, add Airports/Seaports

- Limiting Factors: Radius coverage straining, demand starting to cap, cash flow drying up

- Pressures: Growth starting to cap, weakening business demand, civic coverage priorities begin to conflict, traffic and commute times rising, harder to find convenient and desirable locations for Residential zones, harder to expand Industry without seriously impacting existing Residential zones

- Rewards: University, Minor League Stadium, Country Club, Federal Penitentiary, Courthouse

PHASE 7: BUSINESS DEVELOPMENT

If things are really booming, increase tax rates to counteract and control demand. Expansion is no problem, but keep in mind the costs of expanding services. Develop neighbor cities with which to make deals.

- Approx. City Size: 30,000–50,000 (Region: 80,000)

- Approx. Time: Years 20–36

- Actions: Expand city size and rezoning to higher density, upgrade transportation internal networks and connections, modify tax rates, pass more ordinances, neighbor cities emerging, develop and specialize neighbor cities, add more amenities

- Positive Feedback: More growth, expanding chosen sectors (R, C, or I), growing commercial sector, increased Residential wealth, more tax revenue

- Limiting Factors: Cash flow, original development being replaced/bulldozed, terrain limitations causing more problems

- Pressures: Higher density Residential puts stress on civic funding and coverage, utilities aging and maintenance costs rising, traffic snarling, neighborhood inadequacies becoming stark, demand for good land value

- Rewards: Major Art Museum, State Fair, Main Library, Army Base

PHASE 8: DENSITY AND EFFICIENCY

A medium city tile is probably crowded by now. Grow upward by rezoning an area's high density. Your concern with services will be keeping them under capacity, not creating total coverage (which you should have by now). Double up schools and healthcare to serve the thriving population.

Many neighbor cities could be specializing in certain kinds of development (bedroom communities, Industrial parks, downtown Commercial corridors).

- Approx. City Size: 50,000–120,000 (Region: 200,000)

- Approx. Time: Years 36–50

- Actions: Upgrade transportation networks, add more and better mass transit (Subways), rezone high density, more civic services, more parks and amenities, expand dependence on neighbor cities for utilities, expand neighbor cities including commuter efficiency via Highway and Train Stations

- Positive Feedback: Major growth, significant rush hours that clog commutes, higher density development

- Limiting Factors: Legacy development, utility supplies straining, Demand Caps straining

- Pressures: Running out of space, connection traffic clogging connections, weakening business demand

- Rewards: Zoo, Bureau of Bureaucracy, TV Studio, Convention Center, Medical Research Center, Casino

PHASE 9: THE BIG TIME

From here on out, it's about fine tuning and keeping the money flowing. It's also about inexorable growth throughout the Region.

Many players leave their original city behind to cultivate the neighbor cities and expand to fill more of the Regional map. If you want a Manhattan-style business district, grow a substantial region and focus a majority of Co growth in the original city.

- Approx. City Size: 20,000+ (Region: 500,000)

- Approx. Time: Years 50+

- Actions: Play neighbor cities extensively, specialize cities, more and higher capacity connections, optimization of Neighbor Deals, refocus on neighborhoods, especially where My Sims live

- Positive Feedback: Strong cash flow, ability to afford Landmarks, high-wealth high-rise Residential development, metropolitan region, specialized cities

- Limiting Factors: Legacy development, utility supplies straining, Demand Caps straining

- Pressures: Running out of space, connection traffic clogging connections, weakening business demand

- Rewards: Advanced Research Center, Major League Stadium, Stock Exchange, Opera House, Movie Studio

VITAL INFORMATION

Sometimes you can't remember where to find something, or it's not easily accessible. That's why we assembled this quick reference guide for everything you need to play *SimCity 4*. Terminology, prices, effects: They're all here when you need them.

NOTE
If you're playing the *Rush Hour* expansion pack, there will be several buildings and issues not included on the lists in these chapters. Consult Part 8 to compare new structures and features to those mentioned here.

KINDS OF SIMS

Sims come in three kinds. As a group they're often referred to as "RCI":

- Residential
- Commercial
- Industrial

In *SimCity 4*, these are broken down further:

- Residential Low Wealth (R§)
- Residential Medium Wealth (R§§)
- Residential High Wealth (R§§§)
- Commercial Service Low Wealth (Cs§)
- Commercial Service Medium Wealth (Cs§§)
- Commercial Office Medium Wealth (Co§§)
- Commercial Office High Wealth (Co§§§)
- Agricultural Industry (IA)
- Dirty Industry (ID)
- Manufacturing Industry (IM)
- High-Tech Industry (IHT)

NOTE
There is no low-wealth Commercial Office. Also ID, IM, and IHT represent low-, medium-, and high-wealth Industrial (respectively). IA is low wealth, too, but it has different rules governing its role and development.

DESIRABILITY FACTORS

Different Sims are attracted to real estate by different things. This is called desirability, and it's one of the most crucial concepts in *SimCity 4*.

Within each kind of Sim (R, C, I), the degree to which factors are desirable differs. Wealthy Sims may value one thing more than low-wealth Sims, or vice versa.

To gain a firm grasp of it, see Chapter 10. Here's a list of factors as they relate to each type of Sim (Items in parentheses indicate the preferred levels.):

RESIDENTIAL

- Air Pollution (low)
- Crime (low)
- Education (high)
- Garbage (low)
- Healthcare (high)
- Land Value
- Distance to other Residential
- Res. YIMBY/NIMBY Effect
- Radiation (none)
- Commute Time (short)

COMMERCIAL SERVICE

- Air Pollution (low)
- Crime (low)
- Garbage (low)
- Land Value
- Distance to Commercial Office
- Distance to Residential
- Radiation (none)
- Traffic Volume (high)
- Commercial YIMBY/NIMBY Effect

COMMERCIAL OFFICE

- Air Pollution (low)
- Crime (low)
- Garbage (low)
- Intrinsic Land Value
- Distance to Co
- Radiation (none)
- Traffic Volume (high)
- Com. YIMBY/NIMBY Effect

AGRICULTURAL INDUSTRY

- Air Pollution (low)
- Crime (low)
- Garbage (low)
- Land Value (low)
- Traffic Volume (low)
- Freight Trip Length (short, to Neighbor Connection/ Seaport/Airport)
- Slope (flat)

DIRTY INDUSTRIAL

- Crime (low)
- Garbage (low)
- Land Value (low)
- Radiation (none)
- Slope (flat)
- Freight Trip Length (short, to Neighbor Connection/ Seaport/Airport)

MANUFACTURING INDUSTRY

- Air Pollution (medium-low)
- Crime (low)
- Land Value (moderate)
- Garbage (low)
- Radiation (none)
- Slope (flat)
- Trip Length (short, to Neighbor Connection/Seaport/Airport)

HIGH TECH INDUSTRY

- Air Pollution (low)
- Crime (low)
- Land Value (high)
- Trip Length (short, to Neighbor Connection/Seaport/Airport)
- Residential YIMBY/NIMBY Effect
- Slope (flat)

MAYOR MODE COSTS

Almost everything in your Mayor Mode menus costs money. To quickly find what costs what, look at the following tables:

LANDSCAPE TOOLS

Landscape Tools Costs

Tool	Use Cost
Raise Terrain	variable
Lower Terrain	variable
Level Terrain	variable
Plant Flora	§3 per sapling

ZONE TOOLS

Zone Tool Costs

Zone	Cost per Tile
Dezoning Tool	§1
Low-Density Residential	§10
Medium-Density Residential	§20
High-Density Residential	§50
Low-Density Commercial	§10
Medium-Density Commercial	§20
High-Density Commercial	§30
Agricultural	§10
Medium-Density Industrial	§20
High-Density Industrial	§50

TRANSPORTATION TOOLS

Transportation Tool Costs

Element/Structure	Cost	Monthly Cost	Bulldoze Cost
Road	§10	§0.10	§2
Street	§5	§0.05	§1
Bus Stop	§150	§5	§10
Highway	§600	§1	§100
Cloverleaf	§3,000	§26	§100
Overpass Onramp	§1,000	§2	§100
Side Onramp	§1,000	§2	§100
Rail	§8	§0.03	§1
Passenger Train Station	§100	§10	§10
Freight Train Station	§100	§10	§10
Subway Track	§156	§0.30	§50
Subway Station	§500	§20	§50
Small Landing Strip	§20,000	§700	§1,800
Small Municipal Airport	§35,000	§1,225	§4,500
Small International Airport	§50,000	§1,225	§4,500
Medium Landing Strip	§5,700	§900	§1,800
Medium Municipal Airport	§6,400	§1,450	§4,500
Medium International Airport	§6,400	§1,450	§4,500
Large Landing Strip	§5,700	§1,100	§1,800
Large Municipal Airport	§7,200	§1,700	§4,500
Large International Airport	§7,200	§1,700	§4,500
International Port	§10,000	§500	§1,500

UTILITIES TOOLS

Utilities Tool Costs

Element/Structure	Cost	Monthly Cost	Bulldoze Cost
Power Lines	§2	§0.10	§5
Wind Power Plant	§500	§50	§20
Natural Gas Power Plant	§9,000	§400	§410
Coal Power Plant	§10,000	§250	§450
Oil Power Plant	§17,000	§600	§770
Solar Power Plant	§30,000	§1,000	§1,350

Utilities Tool Costs continued

Element/Structure	Cost	Monthly Cost	Bulldoze Cost
Nuclear Power Plant	§40,000	§3,000	§1,800
Hydrogen Power Plant	§100,000	§10,000	§4,500
Pipe	§1	§0.10	§1
Water Pump	§1,400	§350	§100
Water Tower	§150	§50	§10
Water Treatment Plant	§15,000	§350	§1,350
Landfill Zone	§50	§10	§1
Recycling Center	§5,000	§350	§450
Waste to Energy Plant	§25,000	§1,000	§2,250

CIVIC TOOLS

Civic Tool Costs

Element/Structure	Cost	Monthly Cost	Bulldoze Cost
Small Police Station	§250	§125	§20
Large Police Station	§800	§250	§50
City Jail	§2,500	§450	§230
Small Police Station	§250	§125	§20
Large Police Station	§800	§250	§50
Elementary School	§300	§400	§30
Local Branch Library	§1,000	§250	§90
High School	§1,050	§750	§90
City Museum	§1,500	§450	§140
City College	§3,000	§1,000	§270
University	§12,000	§1,500	§1,080
Major Art Museum	§13,000	§90	§1,170
Main Library	§19,000	§130	§750
Medical Clinic	§400	§400	§40
Large Medical Center	§1,100	§1,200	§100
Disease Research Lab	§26,000	§180	§2,340
Open Grass Area	§40	§5	§10
Open Paved Area	§40	§5	§10
Small Park Green	§40	§5	§10
Beach	§70	§5	§10
Community Garden	§70	§5	§10

Civic Tool Costs continued

Element/Structure	Cost	Monthly Cost	Bulldoze Cost
Small Flower Garden	§80	§5	§10
Basketball Court	§90	§10	§10
Gazebo	§90	§10	§10
Playground	§90	§10	§10
Ranger Station	§90	§10	§10
Small Plaza	§90	§10	§10
Tennis Court	§130	§15	§10
Medium Park Green	§160	§15	§20
Medium Flower Garden	§170	§20	§20
Medium Playground	§210	§25	§20
Medium Plaza	§210	§25	§20
Skateboard Park	§210	§25	§20
Large Flower Garden	§310	§35	§30
Large Park Green	§320	§25	§30
Soccer Field	§340	§35	§30
Large Plaza	§400	§35	§40
Softball Field	§400	§35	§40
Farmer's Market	§4,900	§30	§440
Minor League Stadium	§17,000	§120	§1,530
Opera House	§28,000	§200	§2,520
Tourist Trap	§10,000	§210	§2,700
City Zoo	§37,000	§260	§3,330
Major League Stadium	§48,000	§340	§4,320

CROSS-REFERENCE

For costs of items found in the Build Rewards and Business Deals and Build Landmarks menus, see Chapters 23, 26, and 28.

POLLUTION

AIR POLLUTION REDUCERS

1. Country Club
2. Large Flower Garden
3. Large Park Green
4. Cemetery
5. Seoul World Cup Stadium (downloadable from simcity.com)
6. Softball Field
7. Major League Stadium
8. Minor League Stadium
9. Soccer Field
10. Medium Flower Garden
11. Medium Park Green
12. Medium Playground
13. City Zoo
14. Ranger Station
15. Community Garden
16. Open Grass Area
17. Small Flower Garden
18. Small Park Green
19. Gazebo
20. Playground

TOP AIR POLLUTERS

1. Waste to Energy Plant
2. Coal Power Plant
3. Oil Power Plant
4. Natural Gas Power Plant
5. Toxic Waste Dump
6. Industrial Dirty (average per building)
7. International Airports (small, medium, large)
8. Industrial Manufacturing (average per building)
9. Municipal Airport (large)
10. International Port
11. Municipal Airport (medium)

TOP WATER POLLUTERS

1. Waste to Energy Plant
2. Coal Power Plant
3. Oil Power Plant
4. Toxic Waste Dump
5. Natural Gas Power Plant
6. Nuclear Power Plant
7. Industrial Dirty (average per building)
8. International Port
9. Industrial Manufacturing (average per building)
10. Industrial Agriculture (average per building)
11. Living Mall
12. Missle Range

TOP GARBAGE PRODUCERS

1. Seoul World Cup Stadium
2. Missile Range
3. Bureau of Bureaucracy
4. Major League Stadium
5. John Hancock Center
6. Bank of America
7. 63 Building (downloadable from simcity.com)
8. Toxic Waste Dump
9. Casino
10. Coal Power Plant
11. City Jail

YIMBY/NIMBYS

TOP RESIDENTIAL AND HIGH-TECH YIMBYS

1. Mayor's House
2. Colossal Mayor's Statue
3. Large Flower Garden
4. Houses of Worship
5. Beach
6. Farmer's Market
7. Magnificent Mayor's Statue
8. Medium Playground
9. Large Park Green
10. Country Club

TOP RESIDENTIAL AND HIGH-TECH NIMBYS

1. Toxic Waste Dump
2. Missile Range
3. Landfill (per tile)
4. Army Base
5. Federal Prison
6. Casino
7. Advanced Research Center
8. Convention Center
9. Bureau of Bureaucracy
10. Major League Stadium

TOP COMMERCIAL YIMBYS

1. Bank of China Tower
2. Chrysler Building
3. Colossal Mayor's Statue
4. Empire State Building
5. Mayor's House
6. Convention Center
7. Grand Central Station (downloadable from simcity.com)
8. John Hancock Center
9. Seoul City Hall

TOP COMMERCIAL NIMBYS

1. Landfill (per tile)
2. Federal Prison
3. Toxic Waste Dump
4. Missile Range

TOP CRIME EFFECT

NOTE

These buildings reduce the effectiveness of nearby police stations. They do not generate crime; instead, they impede the police ability to fight it.

1. Casino
2. Army Base
3. State Fair
4. Convention Center
5. Federal Prison

TOP FLAMMABILITY

These are your city's biggest fire risks, so make sure they (and all buildings) have water service and a Fire Station nearby.

1. Coal Power Plant
2. Oil Power Plant
3. Natural Gas Power Plant
4. Waste to Energy Plant
5. Nuclear Power Plant
6. Hydrogen Power Plant
7. Toxic Waste Dump
8. Recycling Center
9. International Port
10. Solar Power Plant

MAYOR RATING

TOP MAYOR RATING ENHANCERS

1. Arc de Triomphe
2. Great Pyramid
3. U.S. Capitol Building
4. Chrysler Building
5. Empire State Building
6. Statue of Liberty

TOP MAYOR RATING REDUCERS

1. Toxic Waste Dump
2. Army Base
3. Federal Prison
4. Casino
5. Country Club
6. Missile Range
7. Advanced Research Center
8. Alcatraz

QUICK TIPS

The tips in this chapter will help you to complete your transition from novice to veteran. When you're ready, read the rest of this guide to make the move from veteran to expert.

NOTE

If you've purchased *SimCity™ 4 Deluxe* or have installed the *SimCity™ 4: Rush Hour* expansion pack, you may find some elements of the game differ from the advice given here. See the summary of changes in the Introduction to Part 8 and details in the chapters that follow.

MAYORAL PHILOSOPHY

- Focus on local situations, and be careful about relying on averages such as citywide Mayor Rating or average pollution.

MAYORAL TECHNIQUES

- Keep your eye on the News Flipper. It can alert you to problems that can fester if unnoticed.

- Scan your city for visual clues. A thick layer of yellow smog means air pollution, snarled traffic means a traffic problem, and graffiti on the walls means crime.

- Gauge the wealth level of current building occupants by the props you see around the building.

- Pause the simulation to tinker with your city. Set it to Cheetah speed only if you want to quickly see what effect an action has.

- Run the game at Rhino speed. This is slow enough to allow you to see negative changes and fast enough that you won't get impatient waiting for something to happen.

REGION AND TERRAFORMING

- When selecting which city tile to put your first city on, pick a small or medium one with many neighbors surrounding it.

- Thick forests generate wildlife, so have forest around your city for wild ambiance and vitality.

BUDGETING

- Early on, enact the Legalize Gambling ordinance to bring in extra cash. You will see an increase in crime, but it won't matter on a small scale that's easy to cover with a few Police Stations.

- If you go §100,000 in the red, you'll be impeached.

- For most city sizes, keeping your taxes at nine percent has no effect on demand, though altering it in either direction will; the larger the change, the larger the effect. As the city grows, this "neutral" tax rate will drop to eight percent.

- Civic buildings can be funded via the Query box at each building ("local funding"). Reduce funding to cover current demand and check back for changes. This will save you money.

- Do not fear loans. If your city is in the red and you can't cut expenses, a loan may be your only way through tough times. Also, financing an expensive but beneficial capital improvement project (such as building a Subway) is a good reason for a loan.

- Bulldozing RCI buildings and many Rewards, Landmarks, and Business Deal Buildings costs a fortune! This is meant to encourage the preservation of old development.

DEMAND

- Beware of repealing ordinances that impact demand. Getting rid of them could send demand into the negative.

- When analyzing demand, don't rely on the averaged RCI Demand Meter. Instead, click on it to see RCI broken down by developer type.

ZONING

- Build and zone gradually, especially early on. It can be tempting to go with the demand for space in your city, but resist the temptation; more Sims obligate you to provide more services that cost money every month.

- Building in corners gives you cheap access to two neighbors (after you establish real neighbor cities). Until then, connections go to SimNation.

- Fill the map with low density before laying a tile of medium or high density. As density increases, tax revenue per occupant drops. Therefore, a large city of low density yields more revenue than a geographically smaller city of the same population with high density.

- Don't build medium or dense zones until your city is well-established. They're expensive and their effect on demand can be unpredictable for the inexperienced.

- Map edges are great places for Industrial zones, Landfills, Business Deal buildings, and any structure with a strong negative proximity effect.

- You need a low income Residential population, so after your city begins to grow and wealth-attracting amenities improve, look to expand into areas that population will accept living in. This means you can (and in some instances, should) zone Residential in areas of high pollution or near NIMBYs, areas that only low-wealth Sims find desirable.

POLLUTION

- Keep in mind that Residential and Industrial should be far enough away that air/water pollution doesn't touch your Residential zones, but not so far away that commute times are too long.

- Build Power Plants in corners. Three-fourths of their pollution will drift off your map and out of your global pollution level. Don't worry, it doesn't seep over into neighbor cities.

- To contain pollution, build your polluters on one side of a hilly range and your pollution-sensitive zones on the other. This keeps them linearly close together (linked by a tunnel) while providing a barrier to pollution; the higher the hill, the more pollution it can contain.

CRIME

- You can only reduce crime through greater education. If you raise your Sims' EQ, crime will be impacted.

- The coverage of Police Stations keeps crime under control.

- Crime occurs in random locations, so the problem that led to a crime has nothing to do with where the crime is committed.

TRANSPORTATION

- If traffic builds on your Streets, covert them to higher-capacity, higher-speed Roads. However, the increased traffic volume this creates makes nearby Residential tracts less desirable and increases pollution.

- Add mass transit networks as soon and extensively as possible.

- Pass the Shuttle Ordinance when you can afford it and you have more than a rudimentary mass transit system. The more Sims you can get out of their cars, the better.

- Rails need gradual corners, so carefully lay them out.

- Build a dedicated Road and Rail (and later a Highway) used only by your Industrial zones to get to a nearby Neighbor Connection. The shorter they have to go for their freight trips out of town, the more desirable your zones will be.

- Never reduce road maintenance. The traffic problems the potholes create are never worth the savings.

- Put a one-tile gap between different types of mass transit stations to permit direct transfers from system to system.

- Build Seaports closer to your Industrial zones than the nearest Neighbor Connection or nothing will go to the Seaport.

- Because trip planning is directional, put mass transit stops between your origin and destination zones. For example, if the western part of your city is Residential and the eastern part of it is Industrial/Commercial, put bus stops on the eastern side of your Residential zones and the western side of your Industrial/ Commercial zones. This puts transit stops "on the way" by default and increases the chances of a Sim using mass transit.

- Put bus stops in all three zone types for the system to work. There must be stops for boarding and exiting.

- Provide several routes between your business (Commercial and Industrial) zones and the rest of your city and a mix of different transportation modes.

- When Streets become congested, upgrade them to Roads. This raises their capacity but reduces surrounding Desirablity.

- Intersections slow traffic. Use long, straight roads.

UTILITIES

- Distribute your Water Pumps/Water Towers throughout the city. Thus, if you suffer from rolling blackouts, your water supply won't be down for a month or more.

- Landfills need room to grow away from the rest of your city. Plan ahead.

- A small city with low power needs might be better off striking a Neighbor Deal than adding a Coal Power Plant. Because a small city uses a fraction of the power provided by a plant for a long time, much of what is spent on power is wasted money. If you strike a deal for the minimum amount, it will cost you less in the short term.

- Give your city water service. Not only does this shut up your Advisor, but it reduces the risk of fire. It's also required for the growth of larger and wealthier buildings.

- Water is conveyed from water structures and connected pipes in a six-tile radius.

- Power emanates from juiced Power Lines, buildings, zones, and from Power Plants in a four-tile radius.

- Run pipes only to within six tiles of your city's edges and expand when necessary.

- Make your Landfills isolated. If you want to decommission them in the future, you don't want to have to tear down something important or lose some good strategic land. The trash decays over time. When the Landfill is empty, it can be dezoned.

- Never let a Nuclear Power Plant be consumed by fire or get too old. A meltdown is game-over!

- Farms produce water pollution. Don't put Water Pumps or Water Towers anywhere near them.

CIVIC

- Place civic buildings where they can have the maximum effect on desirability.

- Wait to build Jails until population exceeds 20,000. They're expensive.

- Double-click on a dispatch flag to follow the unit as it races to the scene.

- Do not place Police Stations, Fire Stations, schools, hospitals, or any other building with a positive area of effect, such as Landmarks, near map edges or you'll lose a large portion of their protective effect. Buildings that affect the map (e.g., Universities) can go anywhere.

- Put Power Plants, especially Nuclear Power Plants, within the radii of at least one Fire Station to avoid a costly disaster.

- Civic structures (Police and Fire Stations, schools, etc.) don't have to be on Roads or Streets, but there are good reasons for them to be. Police and fire can't dispatch if not on a Road. Fire stations lose 20 percent of their effectiveness and radius if they're not on a Road. Plus, jobs added by these buildings won't be accessible unless there's Road access.

- Place parks near Residential and High-Tech Industrial zones and Landmarks near Commercial.

BUSINESS DEAL BUILDINGS, REWARDS, AND LANDMARKS

- Don't run water to the Missile Range because it can't catch fire. Aboveground, it's a slab of concrete, so it's fireproof.

- Rewards, Landmarks, and Business Deal buildings don't need water, Roads, or power. Water, however, reduces their flammability (which is high) and Roads allow dispatch if there's a fire.

DISASTERS

- Direct God Mode Disasters by clicking and holding on a location. The length of time you hold down the button dictates the damage done by the Disaster.

- Use Disasters to demolish buildings with expensive bulldoze costs for free.

- After a Disaster, check the Roads leading to the Disaster site. If the Disaster has destroyed them, the fire trucks won't be able to get in.

- Low Mayor Rating causes riots. Keep it high in your city tracts and you'll never get a riot.

- Controlling a riot takes at least three dispatch units unless the riot is on a dead-end street.

- Fire spreads in the wind's direction. Zoom out and watch which way the smoke moves to predict where it will blow.

PART 2: PAVING PARADISE — PREPARING THE WAY FOR YOUR CITY

Before we put on our mayor's top hat and sash, we need to go over a few fundamentals. Don't rush to fiddle with tax rates and lay down roads; there's plenty of time for that.

Get a feel for the general powers available to you by discussing the three over-arching modes of play and the tools within them. Next, learn about playing in the dirt to mold the earth into a host for your city.

MODES

It's always been true in *SimCity* that you serve as both Mayor and god to your Sims. Never, however, has it been as explicit or as powerful as in *SimCity 4*.

SimCity 4 offers a new way to interact with and read your city: My Sim Mode. My Sim Mode lets you choose an individual Sim and drop him/her into a specific house in your city. His or her lifetime success and day-to-day problems and complaints provide you an unprecedented level of insight into how your city is faring. It's like being a citizen of your own city.

Which hat you wear (deity, ruler, or ruled)—and when—is a fundamental part of playing *SimCity 4* successfully and creatively. Here we outline these three modes, and how and when to use each.

GOD MODE

The God Mode button

Enter God Mode by clicking on the "sun" icon (the leftmost of the three mode icons). There are two God Modes, one more powerful than the other.

PRE-CITY GOD MODE

In pre-city God Mode, you have a full slate of tools.

When you enter a raw city from the Region View, you are in the all-powerful god-the-creator mode. In this mode you can shape the earth freely until it's just right.

TERRAFORM

The Terraform menu

The Terraform menu contains tools for molding the earth to your vision.

The Raise Terrain menu

You can raise the terrain to form cliffs, mesas, mountains, steep hills, or small hills.
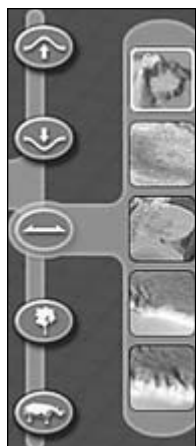
On the flip side, you can lower the terrain to form shallow valleys, craters, deep or shallow canyons, or shallow or steep valleys. Use the tools to dig deeply enough to hit the subterranean water table and make lakes, rivers, and coastlines.

The Lower Terrain menu

The Level Terrain tools enable you to craft plateaus and plains. You can wipe the slate clean with the Quick Level Brush, and make your landscapes look more realistic with the Erosion and Soften tools.

The Level Terrain menu

Creating flora is easy with the Seed Forests tools. You can't choose which variety of tree you'll get; the elevation and character of the terrain dictates that.

CROSS-REFERENCE

For complete information on terraforming a city, see Chapter 6.

Finally, you can populate your city with primordial residents with the Create Fauna tools. Woodland Animals, Horses, or Wild Animals can be spawned in vast herds in your unspoiled landscape.

The Create Fauna menu

TERRAIN EFFECTS

The tools in this set are not precise brushes like those in the Terraform menu. These global controls affect the entire landscape with one click.

The Terrain Effects menu

Erode enacts the erosion effect all over the map to make your land look as though it has been through many centuries of evolution. Erosion is essential for realistic landscapes.

Smoothing has a similar but opposite effect, softening the edges to create a land that looks as though it has been shaped by some prehistoric water, an old flood-plain, or dried-up lake, long since receded.

Raise Terrain Level ups every elevation on the map one level. All raised and lowered portions of the landscape persist, with everything at a higher altitude. This affects the kind of trees that will grow and how far away the water table and sea level are.

Lower Terrain Level has the opposite effect.

RECONCILE EDGES

Reconcile Edges is a vital tool when you're terraforming an entire region. It matches the edges of the current city to the same elevations as the neighboring cities, creating continuous terrain features in Region View.

The Reconcile Edges button

The primary use for this tool is creating terrain features that span two or more cities, like a region-traversing river or a gigantic mountain range.

✕ CROSS-REFERENCE
For full details on Disasters, see Chapter 27.

DISASTERS

Access all your user-created Disasters through the Create Disasters menu in God Mode. This is one of the pre-city God Mode menus that is accessible after you establish your city.

In the pre-city phase, two Disasters in particular (Meteor and Volcano) can give your landscape a great broken-in look. Use them now to add some meteor craters or dormant volcanoes without worrying about the consequences.

The Disasters menu

CONTROL DAY AND NIGHT

Think of these controls as your cosmic "Clapper." Clap on! Clap off!

You can manually switch the lighting to day or night or toggle the automatic cycling of light. This control remains available after city establishment.

The Control Day and Night menu

POST-CITY GOD MODE

When you first switch into Mayor Mode and establish your city, your slate of God Mode tools changes. You give up a bit of your god-like power when you incarnate as mayor. The eons necessary for mountain building and erosion are beyond your control, but you retain power to inflict catastrophic events and even stop the earth from turning.

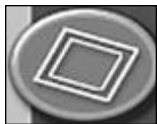The post-city God Mode menu

OBLITERATE CITY

When you want to wipe the slate clean, use the Obliterate City button. With a wave of your hand, all man-made structures and zones evaporate into thin air.

The Obliterate City button

Be careful with Obliterate City; it can't be undone.

RECONCILE EDGES

The Reconcile
Edges button

This control works almost the same as in pre-city God Mode. The only difference is that you have to be careful of any city elements you place in the areas to be leveled. If you've built near the edges and you enact edge reconciliation, anything within the highlighted red band will be destroyed.

CREATE DISASTERS

Disasters work almost the same as in pre-city God Mode. However, you need to comprehend the impact of these Disasters on your structures in this context. For full details, see Chapter 27.

The Create Disasters menu

CONTROL DAY AND NIGHT

The button works the same as in pre-city God Mode. Beyond the cool nighttime lighting effects, it is informative to watch the day pass.

The Control Day and Night menu

N O T E
The clock that controls day and night has nothing to do with simulation speed or calendar. It's totally independent.

Many activities in your city are triggered by the passage of these solar days (rush hours, school attendance, etc.) and knowing when to watch them can tell you a great deal. To keep your thumb on the pulse of your city, leave the day/night cycle on.

T I P
There is a cheat that allows you to access full God Mode controls even after you've established your city. Hold Ctrl + Alt + Shift and click on the God Mode button. Do it correctly to see the pre-city God Mode menu.

This may not seem like a big deal, but it means you can terraform *for free* even after establishing your city. Post-establishment terraforming (via the limited Mayor Mode Landscape tools) is expensive, so this cheat saves you Simoleons and gives you more terraforming flexibility. On the other hand, it empowers you to accidentally decimate your city with one erroneous tap of your finger, so be careful.
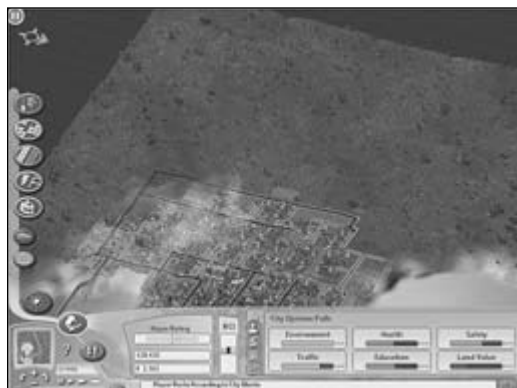
MAYOR MODE

The Mayor Mode button

All the action is in Mayor Mode (accessed via the "top hat" button). The majority of what you need is in this mode of play. All your management, informational, financial, and structural controls are found here.

The Mayor Mode menus and Information Panel

LANDSCAPING TOOLS

The tools available here are more limited versions of the Terraform tools from God Mode. The most crucial difference is that using them in Mayor Mode costs Simoleons.

Use these tools to (in a more limited fashion than in God Mode) raise, lower, and level terrain. We're talking engineering projects here, not divine creation.

The Landscaping Tools menu

Landscaping tools give a level of control over flora placement that you don't get in God Mode. Most simply, you can choose what kind of trees you'd like to place. Want palm trees on your mountaintops? If you've got the money, go ahead.

You also have precise control of placement, so that you can plant decorative groves and rows. But it's difficult for a Mayor to replant old-growth trees—you have to plant saplings that in time will pay off. These trees take anywhere from three to five years to grow from saplings to full-grown trees. In time, the full-grown trees will be replaced by saplings, and the whole cycle starts over again.

The Plant Flora menu

ZONE TOOLS

Various zone types for all three developer groups (Residential, Commercial, and Industrial) can be selected here along with their corresponding Dezone controls.

The Zone Tools menu

TRANSPORTATION TOOLS

All elements necessary to build your transportation networks are here including streets, roads and all mass transit stations and tracks. You select Airports and Seaports here, too.

The Transportation Tools menu

UTILITY TOOLS

Everything you need to set up your power, water, and garbage disposal systems is in this menu. Several Reward power structures will be grayed-out until earned (see Chapter 23).

The Utility Tools menu

CIVIC TOOLS

All of your public buildings are grouped under this menu including:

- Police
- Fire
- Educational
- Health
- Landmarks
- Rewards
- Business Deals
- Parks and Recreation

The Civic Tools menu

BULLDOZE TOOL

The Bulldoze tool is the controlled way to tear down unwanted structures or clear rubble. Demolishing structures costs you Simoleons.

The Bulldoze button

In keeping with *SimCity 4*'s emphasis on the persistence of structures (if not their original conditions), you have to pay fees to demolish buildings. The point is to make you think twice before wantonly tearing down existing structures.

There is a difference between RCI structures and civic buildings. RCIs are more expensive because bulldozing them obligates you to pay fair market value for the destroyed property. As Mayor, you "own" civic buildings, so the demolition cost is considerably less.

N O T E

When you build over structures or trees, the demolition of the existing structure is automatic. So too is the fee, which is added to the cost of the new building.

T I P

There are low-cost ways to tear down even the most demolition-pricey buildings. See Chapters 26 and 27 for some ideas.

EMERGENCY TOOLS

In the event of an emergency, head to the Emergency Tools menu. You can go to the Disaster site (and cycle through all active Disasters) and dispatch fire and police units.

The Emergency Tools menu

INFORMATION TOOLS

Find information about your city along the bottom of your screen while in Mayor Mode.

The Information Panel

T I P

Click on the Mayor Mode button to toggle the information tools on and off.

Here you can see at a glance:

- Overall Mayor Rating
- Funds in your treasury
- Residential population
- Date (every city starts at year 0. Hold your pointer over the date to see the time of day)
- RCI Demand Indicator (single-click to see breakdown by specific developer types)
- News Flipper messages
- City Opinion Polls Panel
- Advisors Panel
- Monthly Budget Panel
- Data Views Panel
- Graphs Panel

Check your Mayor Rating, money in the bank, current Residential population, and RCI Demand Indicator.

These buttons expand your information tools (from top to bottom): City Opinion Polls, Advisors, Monthly Budget, Data Views, and Graphs.

NOTE

If you've purchased *SimCity™ 4 Deluxe* or have installed the *SimCity™ 4: Rush Hour* expansion pack, there will be some additional controls not listed here.

CROSS-REFERENCE

For full details on all information tools, see Chapter 12.

These are not your only sources of hard information and one of your best is in its own all-new mode: My Sim Mode.

MY SIM MODE

The My Sim Mode button

My Sim Mode lets you get inside your city in heretofore impossible ways. It's now possible to know what your citizens living in a precise area think about their city and neighborhood.

Normally, someone of your stature would interact with the populace only selectively, such as when they petition you to do something. These "squeaky wheels" aren't exactly a representative sample of your people.

Now you can get inside their heads and know what they want and what concerns them. It's like having spies in your city or the ability to tap into the subconsciousnesses of your Sims.

However you want to view it, My Sim Mode is where you manage your set of up to five representative citizens.

NOTE

Even when in Mayor or God Mode, you still see My Sim News Ticker messages. Plus, though their houses won't be highlighted with the floating "so-and-so lives here" word bubble, doing a query on a house inhabited by a My Sim shows their portrait.

In My Sim Mode, you can choose or import a Sim and decide where he or she will initially live.

Add or select My Sims in the basic menu bar.

When you establish a My Sim, click on his or her portrait to pinpoint that Sim's location in the city, check his or her Profile, and view a list of his or her most recent News messages. To rid your city of a My Sim, use the Evict This Sim button in Profile Panel's lower-right corner.
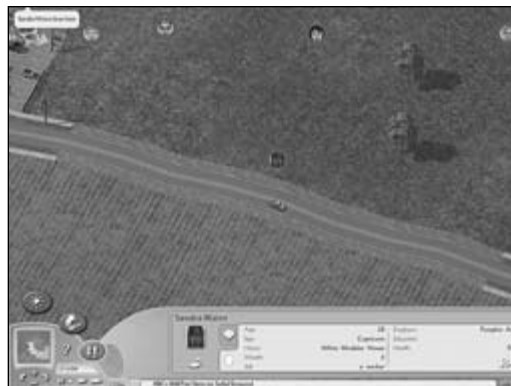
Move in a My Sim by selecting one from the menu or by importing one from *The Sims* or any of the expansion packs.

Each My Sims Panel contain subpanels for News and for the My Sims Profile. The Evict This Sim button is in the Profile Panel's lower-right. Click on the Sim's portrait to zoom to his current location and follow him.

NOTE

There are significant additions to the controls and tools in My Sim Mode if you've purchased *SimCity™ 4 Deluxe* or have installed the *SimCity™ 4: Rush Hour* expansion pack. See Part 8 for details.

To follow a My Sim as she goes through her daily routine, click on her portrait in her Information Panel. Your view follows her wherever she goes.

Every My Sim has a home, though it might not be the one you originally chose. In My Sim Mode, each My Sim's house is highlighted by a word bubble ("Artful Dodger lives here") and the current location of each My Sim (at home, on the road, or at work) is shown by the portrait pointer icon.

The word bubbles show which My Sim lives where, and the portrait bubbles show the Sims' current location.

NOTE

Your My Sims' schedule follows the simulation's day/night time clock, not the calendar, and has no relation to the simulation speed.

PRE-CITY CONSIDERATIONS

The pre-city phase is one of the most rewarding, and overlooked, parts of *SimCity 4.*

When properly enjoyed, this phase can dictate your success in the simulation years ahead. That's what this chapter is all about: how to till the soil so your city will grow to its full potential.

NOTE

You can be successful without spending too much time in the pre-city phase. *SimCity 4* comes with several pre-terraformed regions. You can alter them, but you also could jump into city-building without mucking about in the pre-city phase. The choice is yours.

If you desire to make your city and the cities around it your own, read on.

REGIONS

Cities in *SimCity 4* exist in "Regions." A region is a large square of territory divvied up into city squares of various sizes (small, medium, and large).

You can load up one of the pre-terraformed Regions provided with *SimCity 4*, or begin with a clean slate and create your own.

Beginners should use one of the ready-made Regions. Even experienced *SimCity* players should begin with a premade Region, then alter it to suit their pleasure. Working from a totally clean slate is primarily for dedicated landscape artists.

A Region is a collection of individual city squares. This one approximates the topography of San Francisco.

REGIONAL STRATEGIES

We'll discuss this at more length later in Chapter 25, but Regions are important elements in your city's future growth.

In brief, *SimCity 4* is designed for an unprecedented level of complexity and Regional interdependence. Though you begin with one city, you can build several more within the Region and create connections between them.

Eventually, you can treat them as one large metropolis, cities within a city, and specialize cities to serve specific functions. For example, one city could develop to be your Commercial downtown, home to a forest of skyscrapers, while the one next door could serve as an urban Residential neighborhood with funky, retail shops mixed in. Still another adjacent city could be home to your Industrial base.

The decisions you make, therefore, about your Region are important as time goes on. If you, for example, choose to begin your first city on an isolated island, later Regional expansion becomes more challenging and expensive.

Regional strategy requires considerable foresight or the ability to make decisions that leave open the maximum possible future opportunities. We can help you with both of these.

CHOOSING A CITY SQUARE

Each Region is subdivided into several city squares. The size and location of a city is important to how it will grow.

SIZE

The individual squares in a Region are called "city squares." They come in three sizes:

- Small City Dimensions: 64 x 64 tiles (1,024 x 1,024 meters)

- Medium City Dimensions: 128 x 128 tiles (2,048 x 2,048 meters)

- Large City Dimensions: 256 x 256 tiles (4,096 x 4,096 meters)
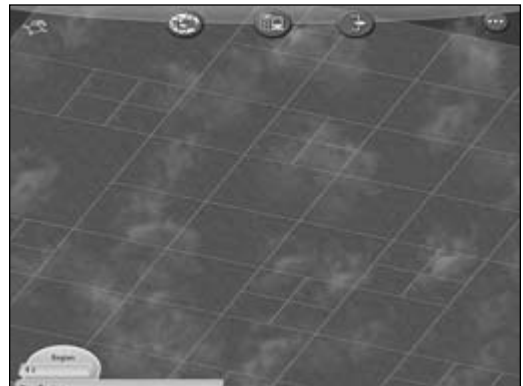
A raw Region contains a random arrangement of small, medium, and large city squares.

N O T E
The tiles you see in cities measure 16 meters by 16 meters.

What size you choose doesn't matter if you plan to make a small city. But, if your goals are grander, use medium and small cities to form discreet districts in your future megalopolis.

LOCATION

The location of a city is important, but not as important as you might think.

Begin your city on a city square that has the maximum available number of adjacent city squares. A medium-sized city square could have as many as eight adjacent small city squares. Such an arrangement gives you eight possible partners for Neighbor Deals. Several adjoining cities are the right size to act as specialized add-ons to your main city (see Chapter 25).
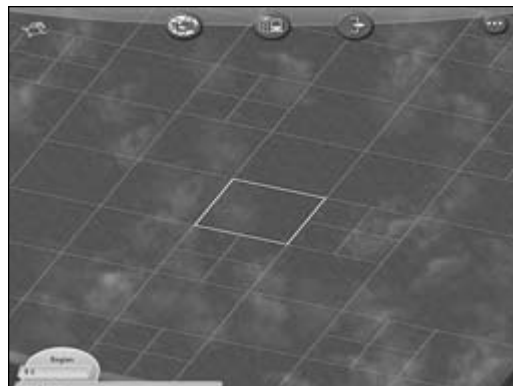
This medium city square is bordered by six neighbors.

This city square is promising with lots of waterfront and three adjacent city squares.

In a ready-made Region, geography plays a role in your choice of location. Choose city squares that offer sufficient buildable ground (not too many mountains or large bodies of water) and as many neighbors as possible.

To enhance land value in your city, find city squares with a fair amount of high ground and numerous tiles adjoining water. A large body of water is also mandatory for building a Seaport—an essential element for a thriving Industrial sector.
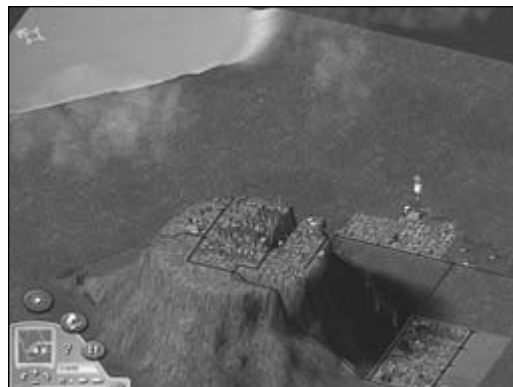
This city has both high ground and waterfront for some potentially high land values.

THAT IS *SO* 3K!

Your water supply system no longer requires open bodies of water; all water supply comes through the subterranean water table. As such, there's no water supply drawback to building on a city square with no visible water.

After you find the most fertile ground for your city, the next step is to groom it to your whims.

TERRAFORMING

Terraforming gives you the power to bend the earth to your will. With one gesture of your hand, you can raise a towering, craggy mountain or punch through the ground to reveal an underground lake. You can smooth the terrain to create a gentle coastline or wish a thick forest of trees into existence.

All this power is yours in God Mode. If you have the imagination and dedication, you can turn your raw earth into a work of art.
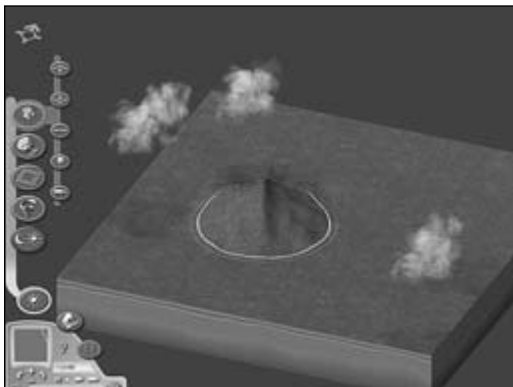
THE TERRAFORM MENU

The Terraforming tools are in the Terraform menu. There are five tool categories:

- Raise Terrain
- Lower Terrain
- Level Terrain
- Seed Forest
- Create Fauna

The Terraform menu

Each Terraform tool is a large circle in which the tool's strongest effect is at the center.

USING THE TERRAFORM TOOLS

Each Terraform tool appears as a circle with the icon of the tool category in the middle. The circle represents the area of terrain affected when you push the left mouse button. The effect created by each tool is strongest near its center and dissipates toward the circle's outer edge.

The larger the circle, the more area will be affected, and the more intense the terraforming effect will be. You can control the size and intensity of this circle in several ways:

1. Zoom: The level of your zoom dictates how much terrain the tool will cover. The closer in you zoom, the more focused and gentle the effect will be. The farther out you zoom, the more expansive and violent the effect. If you want to do delicate work, do it in tight zooms.

2. Shift and Ctrl: Holding Shift in any zoom level makes the tool's circle larger and its effect more dramatic. Conversely, holding Ctrl reduces its size and intensity.

3. Shift + 1 − 0: Pressing Shift plus any number key along the top of your keyboard changes the size and strength of the tool to one of 10 preset sizes/intensities. If you'd like to work in a small area from a long zoom, press Shift + 1. Your level of zoom dictates the relative size of the tool (Shift + 1 affects a larger area in distant zoom than in close up).

4. Shift + F1 − F12: To control the intensity without affecting the tool's size, hold Shift and one of the 12 function keys (F1 − F12).
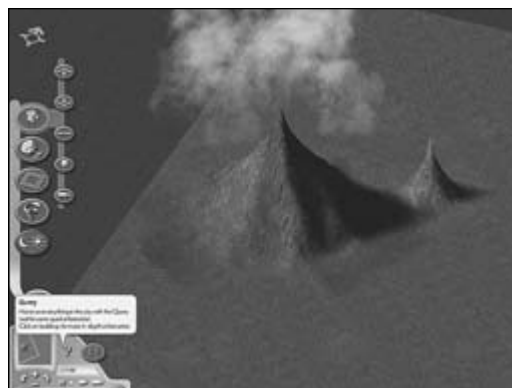
Zoom level dictates the size and intensity of the Terraforming brush. The mountain on the left was made from a far zoom level, the right from in close.
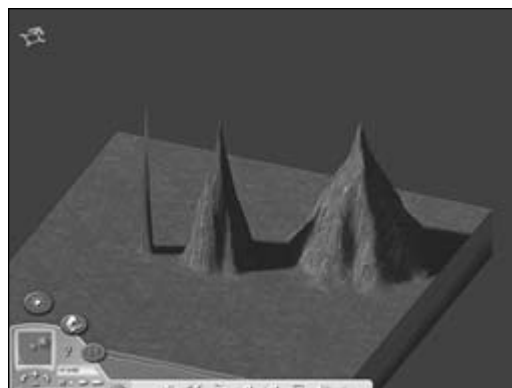
Changing the tool size has an obvious effect. The mountains from left to right are made with the brush set at 1, 5, and 9 (using the number with Shift).

The longer you hold the left-mouse button, the longer the tool's effect lasts. To make a tall mountain, pick a spot and hold the button for a long time. For a tiny hill, tap the left mouse button.

RAISE TERRAIN

To pull the land upward, you need these tools. With them, you can make:

- Cliff: This creates a gradual hill on one side and a sharp, sheer cliff on the other. Really high cliffs develop water at the base. The gradual side of the cliff can be zoned, with houses on the edge seeing enhanced land value. Control which way the cliff faces with the direction you draw the cliff; the sheer face is to the right of the direction in which you draw.

- Mesa: With a wide base and large flat top, a mesa looks striking and serves as an accessible place to develop.

- Mountain: Few things are as beautiful as a cloud-crowned mountain range visible from a kitchen window. You can't build on a mountain, though you may be able to run tunnels through it and roads up it (using switchbacks).

- Steep Hill: Steep hills come to a point with two gradual sides and two sheer ends. They're useful for making small mountain ranges. Even small steep hills are difficult to build on (best to do it with narrow steppes).

- Hill: Even reasonably flat land should have a few small, round hills breaking up the terrain. These hills are easy to build on and around and run transportation over.
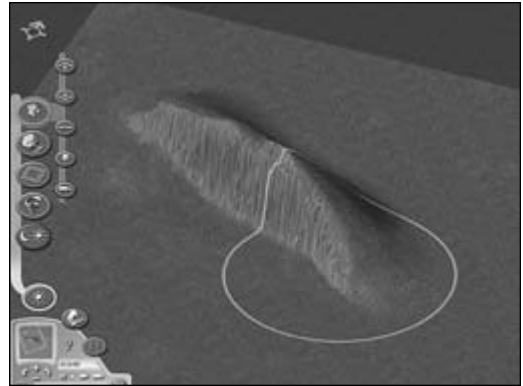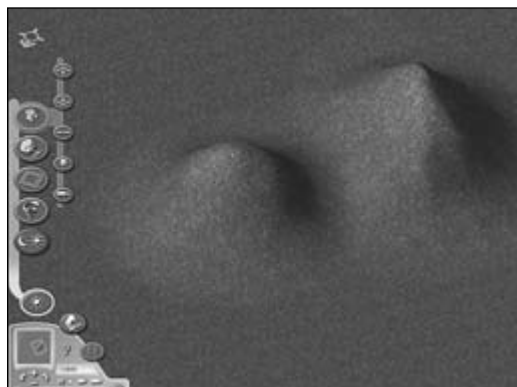

The Cliff tool creates these stunning sheer-faced hills.
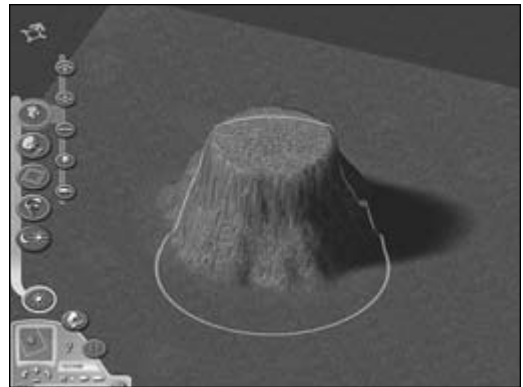
The mesa is a towering and useful terrain feature.
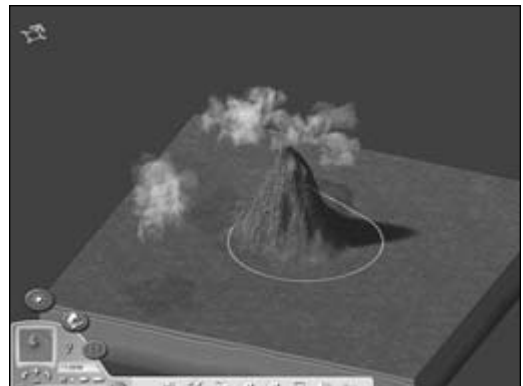
Mountains show what's possible with terraforming. Make them as big as you want and run long ranges of them across the map.

The hill (left) and steep hill (right) differ in their basic shape.

NOTE

Higher-than-average-altitude land is more valuable than land at lower elevations. As such, you can lay the groundwork for high land value/high wealth neighborhoods by zoning on high ground. The high land value is more attractive to high-wealth Residential Sims and, once occupied, generates more tax revenue.

LOWER TERRAIN

Use Lower Terrain tools to make depressions, ravines, gullies, or any other low-elevation feature you'd like to see in your city. You must use them to reveal water—hold them down long enough to hit the water table.

TIP

If you want soft-banked rivers, bring down the citywide terrain level to just above the water table (using the Terrain Effects>Lower Terrain Level tool).
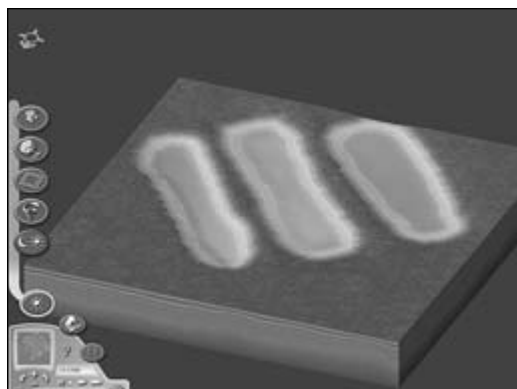
The steep valley on the left is sharper and more V-shaped than the valley in the center or the softer (and wider) shallow valley on the right.

The Crater tool lifts terrain on the outside and drops it in the center.

Lower Terrain to create:

- Shallow Valley: This is the best tool for making rivers you can build next to. The sides of these valleys are gently sloped, though if you dig deeply enough, the sides will become steep.

- Valley: Like a shallow valley, but steeper and wider. Use it for medium sized rivers.
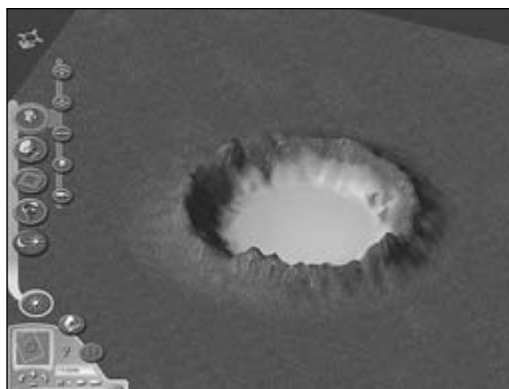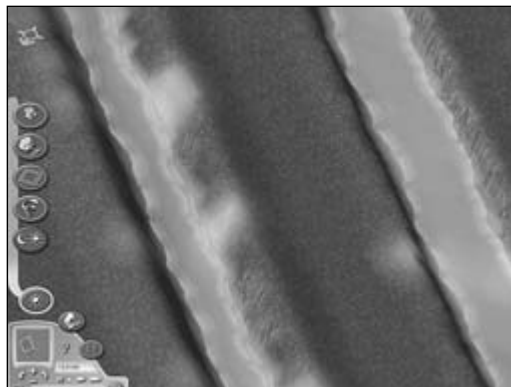
- Steep Valley: Cut a sharper V-shaped valley with this tool. Steep valleys consume less space than shallow ones, but the terrain around the valley is too steep to build on.

Unlike valleys, canyons raise the terrain around their edges. The shallow canyon (left) is narrower with more gradual slopes, while the normal canyon (right) has a wider bottom and steeper sides.

- Crater: Craters lower the terrain in the middle of the circle and raise a ridge around the outer edge. You can zone within them and run roads over their ridges.

- Canyon: Canyons are sheer-sided valleys that can, if cut deeply enough, form rivers.

- Shallow Canyon: Unlike normal canyons, shallow canyon's sides are gradual slopes instead of sheer cliffs. Unlike valleys, shallow canyons raise the terrain around them to form a ridge.

LEVEL TERRAIN

To bring down raised terrain, or pull up lowered terrain, use the Level Terrain tools. Smoother, flatter areas are better for development. Sometimes Terrain tools leave extra lumps that become more obvious as roads and rail roll over them. Smooth and flatten the areas you intend to develop with these tools to insure more smoothly developed cities.

- City Plateau: Either raises or lowers terrain within tool to match the elevation at the center of the circle. The edges of the resulting city plateau are steep.

- Plains: Either raises or lowers terrain within tool to match the elevation at the center of the circle. The edges of the resulting city squares are gentle slopes.

- Quick Level Brush: Here's your eraser! When you want to flatten everything tall and fill in everything low, this is the easiest way. Clicking-and-holding the left mouse button remembers the elevation at the center of the tool and applies that elevation anywhere you drag it.

- Soften: A precision version of the Terrain Effects>Soften tool (which affects the entire city at once), move this brush over surfaces to smooth them with wind erosion. The effect is a blunting of sharp terrain features.

• Erosion: A precision version of the Terrain Effects>Erosion tool (which affects the entire city at once), move this brush over surfaces to sharpen and crag them with water erosion. The effect is a cutting of lines through the terrain to make it look more weathered. It also deposits sediment in low-lying areas, raising them.
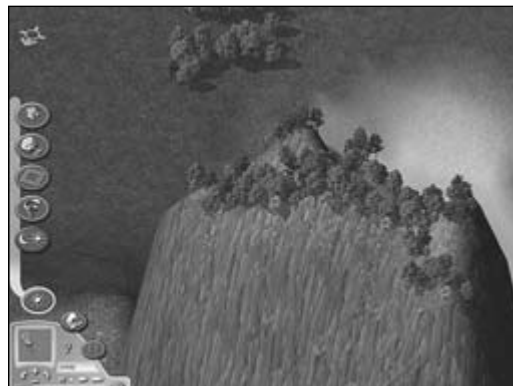
SEED FORESTS

Placing trees is easier than ever. Point to a location and press the Seed Forests button. The longer you hold the button, the thicker and denser the forest will be; or, tap the button for a few isolated trees.

The interesting thing about trees in *SimCity 4* is how they start and how they spread. When placed with the Seed Forest tool, they're lush and mature (unlike the seedlings you must plant in the Mayor Mode's Landscaping tools). Over time, they spread seeds nearby. If the conditions are right, these seeds grow into new trees.

The rate at which trees grow and reproduce, and what kind of trees (deciduous, coniferous, or scrub) you get when you seed a forest depend on the "tree happiness" factor. Happiness is based on two terrain traits:

The trees on this high ground are coniferous pine trees.

• Elevation: An area's elevation above sea level impacts what kind of trees will grow there. High elevations favor scrub, medium elevations lean toward coniferous trees, and low elevations default to deciduous trees. These baseline relationships can be changed by the second factor, the degree of moisture.

• Moisture: The moisture of a given spot is derived from its proximity to water (on the surface and how far above the water table it is), wind direction (if the wind blows over open water, it makes everything in its path moister), and terrain form (hollows and ravines collects rain resulting in a higher degree of moisture).

The happiness of a tree is dictated by a combination of both factors. If a spot of high elevation is moist (due to wind direction and being in a hollow), it may sprout the normally low-elevation deciduous trees. But, if a low altitude area is dry (due to shielding from a large terrain feature), it sprouts coniferous trees. The ideal conditions for each type of tree are:

• Scrub: High elevation, low moisture

• Coniferous: Medium elevation, medium moisture

• Deciduous: Low elevation, high moisture

Some areas are stuck in between the variables of high and low ground and high and low moisture. If an area is marginal for specific tree happiness, a tree may sprout but will likely die. If it hangs on, it will produce few seeds. Isolated trees (rather than ones in large clusters) tolerate marginal conditions best, but won't live long or reproduce much.
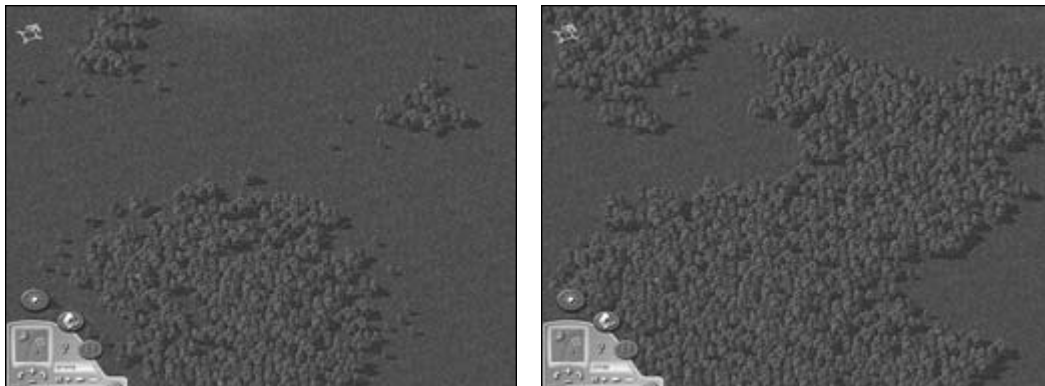
What a difference 35 years makes. This forest has grown considerably.

Once a tree is established, its reproduction is dictated by its happiness, but also other factors. Generally, a happy tree (one that's suited for its moisture and elevation) will grow quickly and propagate many seeds over large distances.

The density of a cluster of trees factors into tree propagation. Isolated or small groups of trees don't live as long or propagate as widely as trees that live in large, dense clusters. Forests thrive, while a grove dies out over time.

NOTE

If you use the God Tools cheat to access your pre-city Terraforming tools, you regain access to the Seed Forest tool. Any trees you place, however, won't grow or propagate; after you establish your city, that behavior can't be restored.

Trees placed with the post-city-establishment Plant Flora tool start out as small saplings and grow over time (though they don't reproduce), but they cost money to plant.

Growth and propagation of trees generated with this tool continues until you establish your city. When you click into Mayor Mode for the first time and name your city, all natural growth seems to stop—tree spread is harder to see when you're not living in deity time. If you desire a lush and naturally grown forest, use the Seed Forest tool, then crank up to full speed for a long time. When the forest has grown to your liking, establish your city.

TIP

Thick forests generate wildlife, so have forest around your city for some wild ambiance and vitality.

CREATE FAUNA

Before you establish your city, you can create your city's first residents: the animals. You have three choices in the kind of animals you can create:

- Wild Animals: Elephants, giraffes, rhinos, and lions

- Woodland Animals: Deer, moose, and birds

- Horses

There is a substantial randomness to creating single beasts and larger herds. You can create larger herds by click-dragging and multiple left-clicks.

Whether or not animals spawn where you choose depends on the elevation. If it's too high, using the tool has no effect. The animals you spawn in this phase don't last long; placing them is just for fun.
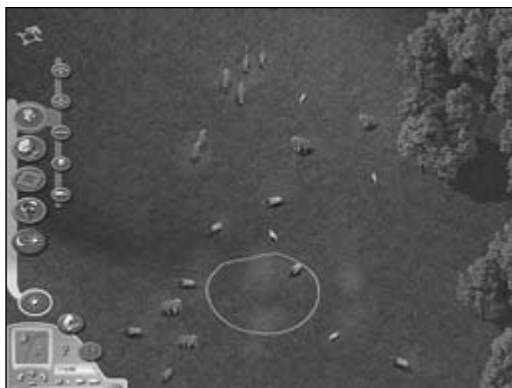
Spawning vast herds of animals is fun, but doesn't last long.

NOTE

Dense clusters of trees spawn wildlife throughout the simulation; so, seed some thick forests while you have the chance (see Seed Forests).

TERRAIN EFFECTS MENU

The tools in this menu aren't "brushes" you apply to specific areas of terrain; they are global effects that work on every inch of the city terrain.

TIP

Use combinations of erode and soften to get the right terrain "texture."
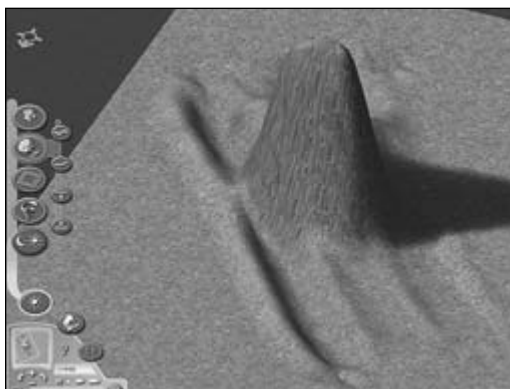
The Terrain Effects menu

- Erosion: Erosion simulates the effect of centuries of water running over the terrain. Water cuts sharp lines in whatever it touches and deposits sediment in low-lying areas (raising the floor of valleys and canyons); that's what using this tool does. On a broader aesthetic level, it makes your terrain look more realistic and "lived in."

- Soften: Soften applies the effect of centuries of wind erosion. Unlike water, wind erosion smoothes and rounds the ground it touches.

- Raise/Lower Terrain Level: These two tools raise or lower every point on the map by one elevation level. This doesn't change the relative elevations of mountains or valleys, but it changes their absolute elevation. Raise or lower the level enough, and tall features will flatten or disappear under water.

! WARNING

Using any of these tools destroys all trees, so don't Seed Forests until you're done with them.
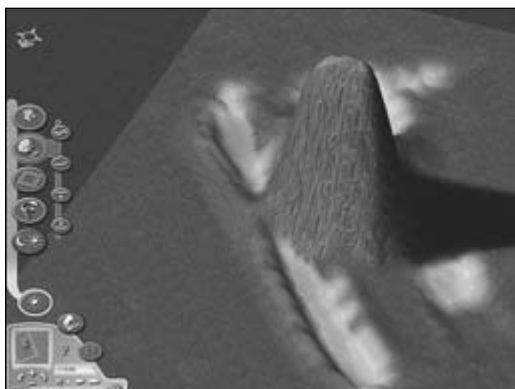
This landscape stays the same when you lower or raise the terrain level via the Terrain Effects, but the elevation of every point increases by one level.

NOTE

The game has a tool for generating an entire region. You can use Ctrl + Alt + Shift + R to load a bitmap (that must be 1025 x 1025 and grayscaled) that can be used as a height map for the entire region. This is an unsupported tool.

RECONCILE EDGES

Reconcile Edges is an important tool for making seamless Region-spanning terrain features such as rivers, oceans, and mountain ranges.

It looks at the edges of surrounding cities and conforms the edges of the current map to match. If the adjoining tile has a deep river running to its western edge, the eastern edge of your city square (once Reconciled) shows the end of that river valley. This indicates the location of the river so you may continue to draw it as it courses across your current city square.
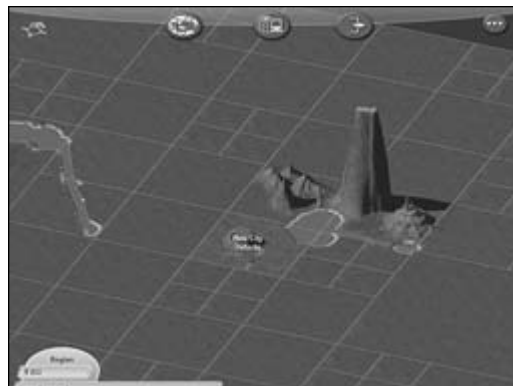
The lakes in this Region span several city squares. This is done using the Reconcile Edges tool.
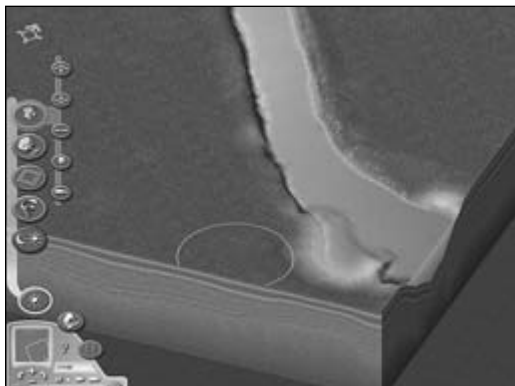
Draw a river up to the edge of a city square. Then save and exit to the Region.
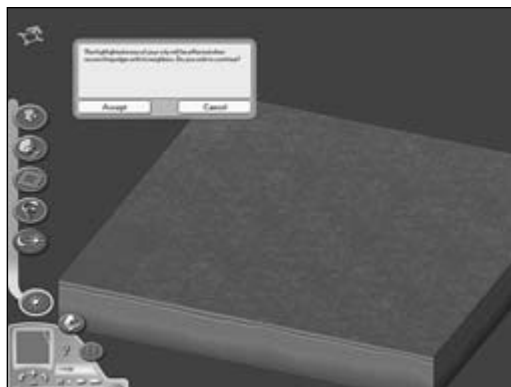
Enter the adjacent Region and accept the Edge Reconciliation. You find the river's end drawn into the adjacent Region.
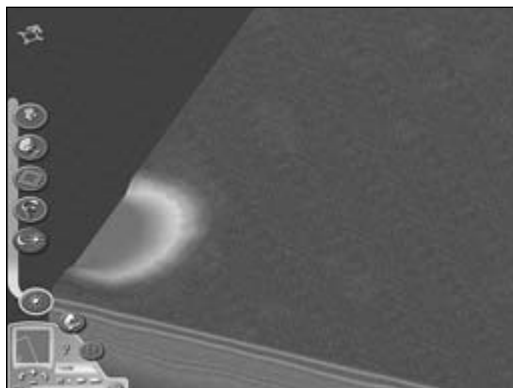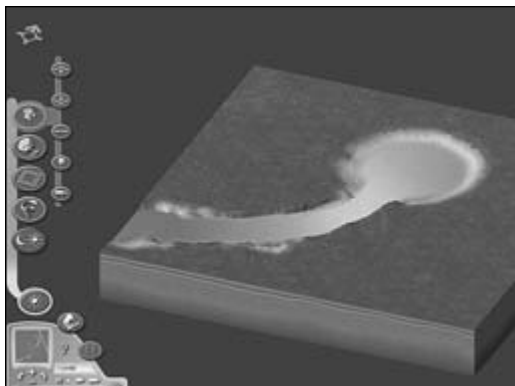
Draw the river across the new city square.
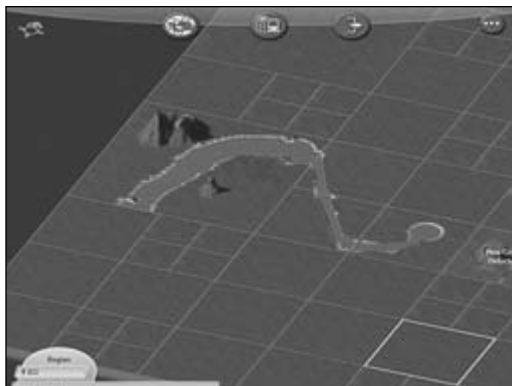
From the Region View, it looks like this.

To see how this system works, check out the prefabricated Regions that come with *SimCity 4*.

DISASTERS
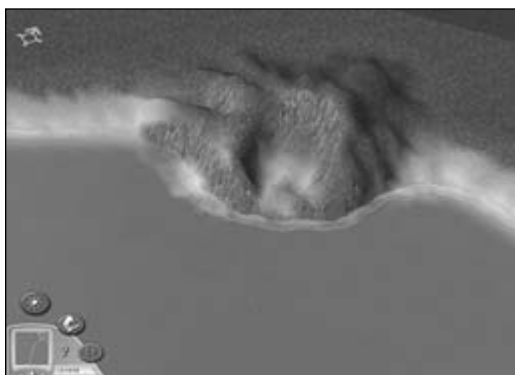
A dormant volcano is a nice bit of geological decoration.

Two of the user-initiated Disasters (Volcano and Meteor) can be used as violent and unpredictable Terraforming tools in this pre-city stage.

The Volcano Disaster leaves a gigantic dormant volcano that can serve as the centerpiece of an interesting city.

The Meteor Disaster punches a gaping, charred hole in the earth. Pockmark your landscape with these meteor craters to give the Sim geologists who move into your city something to ponder.
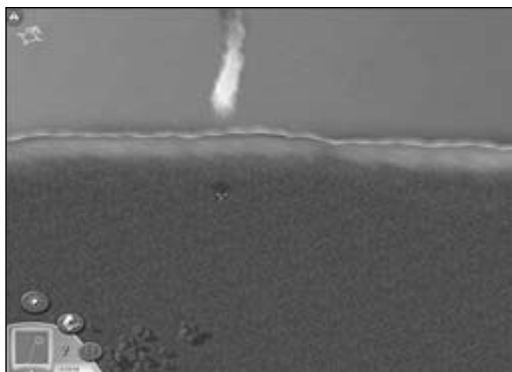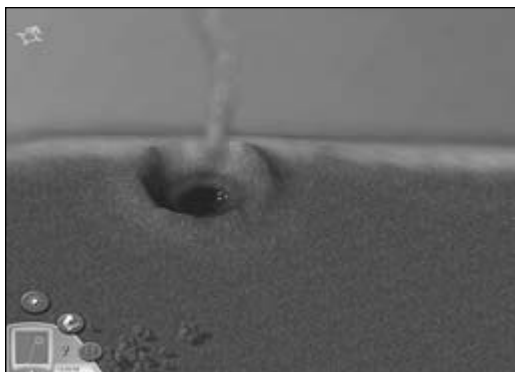
A plummeting meteor leaves an indelible scar on your city.

ESTABLISHING YOUR CITY

When the terrain in your city square (and the Region if you're feeling expansive) is ready, you've reconciled the edges of your cities, and the forests have grown to your satisfaction, proceed to the next step: establishing your city.

Do this by clicking on the Mayor Mode button. At this point, you can name your city and give yourself the perfect Mayoral moniker.

To put all terraforming behind you, click the Mayor Mode button and name your city and yourself. To make further changes to the earth under your city, you'll have to pay.

NOTE

Technically, you can't change your city or Mayor name once you start your city, but there is a secret way. See "Cheats" in Chapter 29.

NOTE

If you're playing *SimCity™ 4 Deluxe* or have installed the *Rush Hour* expansion pack, you'll also have to choose a skill level here. The lower the skill level, the easier it'll be to start and build your city. When in doubt, choose Easy. The number of stars below the mayor name in the city's region view info bubble reflects the skill level you chose.

With your city established, have a blast with tax rates, zones, ordinances, and all those things that make being a Mayor (as opposed to a deity) fun.
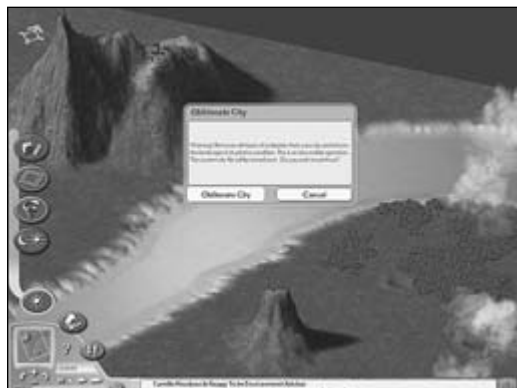
Obliterating wipes the slate clean.

OBLITERATION

No plan is perfect, and things often don't go as predicted. That's why there's the Obliterate City button (in God Mode). With one push of a button (and a confirmation box to make sure you mean it), you evaporate the man-made parts of your city.

After obliteration, you're left with the raw terrain you had when you entered Mayor Mode.

PART 3: RCI EVOLUTION

There's one fundamental dichotomy in *SimCity 4*. There are two kinds of buildings:

- RCI: Residential, Commercial, and Industrial
- Everything Else: Civic, Landmark, Infrastructure, Reward, Recreation

There are many varieties and distinctions to be made beyond that, but this is the big one. Above all, *SimCity 4* is about attracting and fostering Residential, Commercial, and Industrial structures. All other buildings, at their core, serve this purpose.

Understanding *SimCity 4* means understanding the complex and interconnected web of factors that make RCI grow and change.

There is no way to clearly present these topics in a linear way. They are so intertwined and inter-dependent that it's impossible to discuss one without getting into one that hasn't come yet.

To avoid confusion, these topics are presented in the order they occur in the simulation (with a brief stop for some important definitions first). You'll find repetition and overlap as you read these chapters, but it's for the sake of clarity.

In this part, we cover:

- Chapter 7: Developer Types/Occupancy
- Chapter 8: Demand
- Chapter 9: Zoning
- Chapter 10: Desirability
- Chapter 11: Development

DEVELOPER TYPES AND OCCUPANCY

Before we discuss demand and development, it's imperative to understand two concepts in RCI development: *developer types* and *occupancy*.

NOTE
Both of these concepts are new to *SimCity*. *SimCity 3000* veterans and newbies alike should digest this information.

Both these concepts combine to "inhabit" your city, creating both economic classes among your Sims and a street-level indication of the desirability of your city. If you know what to look for, you'll never need more than this visual information to measure a tract's desirability.

It's helpful to grasp both these concepts before moving onto the more complex quagmires of demand, desirability, and development.

DEVELOPER TYPES

Developer types are classifications into which every Sim and Residential, Commercial, or Industrial ("RCI") building are grouped.

As applied to Sims, developer types equate with social or economic classes, dictating a Sim's affinities, aversions, base education, base life expectancy, and tendency toward criminality.

NOTE
The term "Sim" as used in *SimCity 4* and this guide refers not only to Residential Sims walking and driving the streets of your city, but also to the Sims who set up Commercial businesses and Industrial operations.

As applied to buildings, developer types reflect the kind of Sim for which the structure was originally built. Buildings are, therefore, associated with various developer types, but can shift developer types based on changes of occupancy.

NOTE
Structures can downgrade but can't upgrade. You won't ever find a R§§§ Sim living in a R§ house. In this situation, the house would be demolished and redeveloped.

Your developer types desire different things in their real estate. Look to the Desirability Data View to find out who wants to be where.

Every building has a developer type, as shown in its Query box. If a building has downgraded in developer type, any grayed-out "§" signs indicate its original type.

If, for example, conditions change, forcing a R§§§ Sim out of his or her large home, several R§§ Sims may take his or her place. The building (now labeled R§§ with the third "§" grayed-out) then appears more run-down than its original state to reflect its downgraded developer type and new inhabitants.

NOTE
For residential Sims, wealthier Sims take up more space than less wealthy Sims.

There are 12 distinct developer types in *SimCity 4*:

- R§: Residential low-wealth
- R§§: Residential medium-wealth
- R§§§: Residential high-wealth
- Cs§: Commercial Service low-wealth
- Cs§§: Commercial Service medium-wealth
- Cs§§§: Commercial Service high-wealth
- Co§§: Commercial Office medium-wealth
- Co§§§: Commercial Office high-wealth
- ID: Industrial Dirty
- IM: Industrial Manufacturing
- IA: Industrial Agriculture
- IHT: Industrial High Tech

RESIDENTIAL §, §§, §§§

Residential Sims come in three wealth levels: low, medium, and high. The three wealth classes share affinities for various factors (parks, land-value enhancements), but differ in how much they value some factors and how much they'll tolerate things such as pollution, commute time, or crime.

Different Residential wealth levels demand different Commercial and Industrial levels and in different proportions. High-wealth Residential Sims (R§§§), for example, demand a high level of high-wealth Commercial Office (Co§§§) and High-Tech Industry (IHT) for their employment by virtue of their economic standing.

Demand for Co and Industrial are further modified by the Sim's educational level (represented as Educational Quotient or "EQ"). A low-EQ R§ requires employment in Dirty Industry (ID), low-wealth Commercial Service (Cs§), or Agriculture (IA). A medium-high EQ R§, on the other hand, demands more Manufacturing Industry (IM) and some medium-wealth Commercial Office (Co§§).

Residential demand for business needs works similarly, with each type distributing business demand among the available C and I types based on EQ. The business demand profile for R§§ (med-low EQ) would, for example, look like this:

- Cs§: 5 percent
- Cs§§: 20 percent
- Co§§: 30 percent
- Co§§§: 5 percent
- ID: 10 percent
- IM: 30 percent

COMMERCIAL SERVICE (CS§, CS§§, CS§§§) AND COMMERCIAL OFFICE (CO§§, CO§§§)

Commercial Service includes retail and service businesses within your city. These can range in wealth level from the most basic (a greasy spoon or dollar store) to the high end (a swanky boutique).

Commercial Office, on the other hand, comprises your city's white collar and professional establishments. Because these businesses are, by nature, higher on the wealth continuum, there are only two classes: medium-wealth and high-wealth.

Commercial Office buildings serve your Sims employment needs. They come in two wealth levels (§§ and §§§) and several sizes.

Both varieties of the Commercial population create jobs for your Residential Sims. A Commercial building's developer class dictates its employment profile. A low-wealth Commercial Service business will, for example, require low-wealth Residential Sims. A high-wealth Commercial Office business, on the other hand, requires predominantly medium-wealth Residential Sims (professionals), some low-wealth (clerical and support staff), and a smattering of high-wealth (management).

As with Residential buildings, Commercial structures downgrade if their land stops being desirable to their current inhabitants. When the building changes hands, it assumes the developer type of its new occupants. It may look similar (with perhaps a different storefront or more distressed), but everything about it changes when it shifts developer type.

INDUSTRIAL (IA, ID, IM, IHT)

As you'll see, Industrial Sims are different. Industrial developer types aren't broken down in terms of wealth, but in terms of function and pollution level.

Agricultural (AI) is in a class by itself. It is, like ID (below), low-wealth Industry. All jobs offered on a farm are R§, and the buildings never grow with population as they do in other Industry.

Dirty Industry (ID) is traditional heavy smokestack industry and represents the lowest rung on the Industrial scale. They tend to be demanded by low EQ/low-wealth Residential Sims and provide most of their jobs in return. Each also offers a small number of middle-wealth Residential jobs. Their hallmark, however, is the massive amounts of water and air pollution they produce.

Manufacturing Industry (IM) is cleaner than ID and offers a slate of jobs balanced between low- and medium-wealth Sims. A few high-wealth Sims populate the management suites above the production floors.

Finally, High-Tech Industry (IHT) is the pinnacle of modern Industry. It's wealthy, it's clean (minimal pollution), and it employs the cream of the crop: mostly middle-wealth and equally small numbers of high- and low-wealth Residential Sims. High-Tech is demanded only by a population with a large and long-standing Mayoral commitment to education. Because these businesses demand a smart job base, you see this developer type inhabit your previously filthy Industrial zones only after you educate your populace.

High-Tech Industry is easy to spot. It doesn't have pollution belching out of its stacks and you could eat off the walls. More usefully, you could locate one within a short drive of your Residential zones.

While Industrial developer types aren't tied to wealth, they do correspond to the model of low-, medium-, and high-wealth. Dirty Industry represents low-wealth, Manufacturing represents medium-wealth, and High-Tech embodies high-wealth Industry. This is important when setting tax rates—set individually for low-, medium-, and high-wealth.

The detailed RCI Demand Graph breaks down demand by developer type.

DEVELOPER TYPES AND ZONING

Developer types have no direct bearing on zoning. When you lay out your zones, there's no obvious way to tell which developer type you will see.

There are ways, however, to predict and even control developer type when zoning.

When consulting the RCI Demand Meter for current demand, dig deeper into the RCI Demand Graph (by clicking on the RCI Indicator) to see demand for each developer type. If there's high demand for one type and none or negative demand for others, you can be certain about what will grow.

Second, consider the desirability factors of each developer type. If you can pick areas to zone that will appeal to a developer type, the chances of that type locating there increase. Display desirability by activating the Desirability Data View—this view shows developer type desirability of both zoned and unzoned land.

DEVELOPER TYPES AND DEMAND

Demand is differentiated by developer type. Even, therefore, if you have Commercial demand through the roof, you won't get high-wealth Commercial Office if demand for it is flat.

The basic demand relationships between R, C, I, and IA are the same among developer types of the same kind, (i.e., all R, all C, etc.) but the demand profile for each developer type differs. For example, Residential Sims demand Industry to provide their jobs. Which Industrial developer type they demand and in what quantity, however, differs by wealth level. For greater detail on demand, see Chapter 8.

DEVELOPER TYPES AND DESIRABILITY

Developer types are attracted by desirability and desirability of a tract of land is expressed in terms of which development types it is desirable to. If a building ceases to be desirable to a given developer type, the building drops in occupancy and becomes abandoned.

If, after abandonment, the building is desirable to a lower developer type, it becomes reoccupied in direct proportion to amount of desirability to the highest possible developer type. For example, if a house is no longer desirable to R§§§ Sims, it will be abandoned and become reoccupied soon by R§§ Sims. If R§§ desirability is high, the building will be full in terms of occupancy. If desirability is low, but still enough to occupy, occupancy will be low. If desirability is low for all Residential types, the house will stay abandoned. For more on desirability, see Chapter 10.

DEVELOPER TYPES AND DEVELOPMENT

Because every RCI building is associated with one developer type, these classifications play a crucial and intricate role in development of structures in zones. One of the first issues in development is which developer type to choose.

This points out that, even at this most basic level of development, it's not whether the zone is R, C, or I that matters, it's what kind of R, C, or I. If the development simulator is thinking in these terms, so should you.

ANCILLARY EFFECTS OF DEVELOPER TYPE

Several other factors arise out of developer type, particularly Residential developer type.

Residential developer type initially has a profound impact on education and health. When each Sim arrives in your city or is "born," he or she begins with an Education Quotient (EQ) and Health Quotient (HQ) that's dictated by his developer type.

- R§: EQ 20, HQ 20
- R§§: EQ 40, HQ 40
- R§§§: EQ 60, HQ 60

A Residential Sim's wealth level, therefore, controls his or her innate and home-provided education and health. The upshot is that lower-wealth Sims take longer to achieve high EQ and high HQ, and attracting more R§§§ to your city provides a bigger surge to your citywide statistics. A city of low-wealth Sims can achieve as much as high-wealth ones, but they take longer to do it. For more on the mechanics of EQ and HQ, see Chapters 20 and 21.

Crime levels, too, are affected by, among other things, Residential developer type. The percentage of Sims inclined toward criminality is highest among R§. Therefore, the more R§ Sims in your city, the more criminals with whom you have to contend. This effect can be mitigated with higher EQ, and is made worse by unemployment.

TIP

This relationship between criminality and wealth-level is important in providing an incentive to educate your Sims. You could focus economic dollars on the wealthy and increase your city's average EQ faster, but you'll have the downward drag of high crime scaring your R§§§ Sims out of town. Unless you find an alternate way to reduce crime, universal education is your best hope.

GETTING INFORMATION ON DEVELOPER TYPE

There are many ways to get information about developer types.

The easiest way is to query a building. Doing so shows you its development type and its rating in several important desirability factors. For Industrial buildings, developer type is stated in the building's character (Agriculture, Dirty, Manufacturing, or High- Tech) rather than wealth per se.

The list below the line shows how this structure is doing on several crucial desirability factors. When problems arise, check this first.

Pointing at a building with the Query tool active shows you its developer type.

After you know what to look for, you can identify a building's developer type by looking at it. In Industrial zones, the dirtiness of the building speaks to its developer type—Dirty Industry looks dirty, Manufacturing looks cleaner but not immaculate, High-Tech looks sparkling clean, and Agricultural looks like a farm. Don't, however, confuse "dirtiness" with signs of distress and abandonment.

Commercial and Residential buildings show their developer type in the "props" located on their lots. See a swanky car? The property must be R§§§. See a junker with primer-colored panels? It's probably R§ (though the building may have once been of a higher wealth level). Commercial buildings display changeable storefronts; the basic box of the buildings stays the same but the awning and front window reveal the kind of business.

OCCUPANCY

The concept of occupancy is related to developer types and touches on all phases of the RCI cycle.

Occupancy dictates that any given RCI building contains a fixed capacity of Sims, a maximum number that can live/work/shop inside. The physical size of the building dictates the number of Sims assigned to a building.

RESIDENTIAL OCCUPANCY

In regard to Residential buildings, this capacity can change based on the developer type currently residing in the building. For example, if an R§§ house is occupied by its original R§§ inhabitants, it might have a capacity of 12.

If it downgrades due to a shift in desirability, R§ Sims with a capacity of 17 will reoccupy it. In Residential buildings, the less well-off occupying Sims are, the less space they require and the more Sims can occupy a lot.

INDUSTRIAL OCCUPANCY

Industrial buildings follow the standard rule of occupancy: The building dictates total capacity. Because Industrial buildings can't shift between developer types (an ID building can't become an IM building; it must be demolished and redeveloped), their occupancy stays the same.

Where you see the change in an Industrial building is in its actual occupancy: the number of Sims working there. This figure is tied to the building's desirability. If desirability is low, occupancy will be low. If desirability is high, the building will be filled.

The physical state of the building is a direct reflection of its occupancy; in good condition if full, run down and dilapidated if at low occupancy.

There is one further force at work in occupancy; the workforce percentage of the building. As you'll see in the "Demand" section (Chapter 8), every Commercial and Industrial building comes with a certain workforce demand profile. An IHT building, for example, demands 10 percent R§/80 percent R§§/10 percent R§§§. If, therefore, the building has an occupancy of 10, 1 worker will be R§, 8 will be R§§, and 1 will be R§§§.

This IHT building suffers from low occupancy; you can tell by looking at it. The probable reason is the high nearby pollution reducing its desirability.

If, however, your town has regressed and there are few R§§ in town, that building will never be able to fill its R§§ capacity. Thus, the building distresses and is abandoned no matter how big the R§ population and no matter how great the demand for IHT.

In this way, occupancy makes the ebb and flow of *SimCity 4* more complex and responsive. Though it seems more complicated, the insight and control this system provides allows unprecedented ease in diagnosing problems.

COMMERCIAL OCCUPANCY

Commercial occupancy is similar to Industrial occupancy in terms of its reflection of a building's workforce demand profile and desirability.

It, however, resembles Residential demand in the tendency of buildings to downgrade to lower-wealth occupants if circumstances force out the higher-wealth occupants. You see these shifts as changes in storefront.

OCCUPANCY AND DEMAND

Occupancy percentages can have a strong effect on demand. No matter how high demand for Commercial or Industrial is, nothing new develops if new areas have low desirability and existing structures are suffering low occupancy.

REFLECTIONS OF LOW OCCUPANCY

Because occupancy is proportional to desirability, the visual indicators of occupancy are the same. Look for the number of "props" strewn about a building (e.g., cars, decorations, etc.). Sparse props mean no one's home.

ABANDONMENT

Abandonment is zero occupancy. This can happen for myriad reasons, but it always means that either the desirability or demand for this building is so bad that no one can inhabit it.

This can happen, for example, if desirability for the building's wealth level drops and there is no demand for lower wealth levels. It can also happen if the building is denied power, its commute time is long, or the inhabitant can't find a job.

In abandonment, you learn how important occupancy is. Having someone in a building decreases its flammability and brings it into the tax base.

This ID building, like many around it, has been abandoned. All the important stats in the Query box seem OK, so the problem must be deeper. The state of these buildings is what should spur you to investigate.

DEMAND

You've met the players in this drama: the hard-working residents, the industrialists who belch smoke but also offer good jobs at good pay, the merchants and professionals who keep everyone happy (for a price), and the farmers who till the soil. But what drives them?

What motivates everyone in *SimCity 4* is demand. Demand for jobs begets demand for housing begets demand for jobs, etc. It's a big circle.

HOW DEMAND WORKS

Below the surface, *SimCity 4* is a seething web of interrelated demands and circular satisfaction that add up to a living city.

Understanding how these forces play out is critical to riding the wave of demand and keeping your city healthy and thriving. When you understand how demand works, you can control it.

> **THAT IS *SO* 3K!**
>
> **Demand is now based on the desire for structures, not zones. Zoning no longer, in and of itself, satisfies demand.**

DEMAND DEFINED

Whether anything grows in your zones is largely the function of demand. Demand is the need for construction of a specific developer (R, C, or I). Residential demand calls for Residential buildings, Industrial demand calls for Industrial buildings, and Commercial demand calls for Commercial buildings. Your job is to help satisfy this demand by placing zones likely to produce the demanded buildings.

With demand red hot, it won't be long before this zone fills with new Residential buildings.

When a building sprouts in your zones, it satisfies unmet demand and reduces the amount shown in the RCI Demand Meter (or the RCI Demand Data View).

Though the demand for buildings is a crucial part of the equation, it's more important to understand what drives the demand that called for these buildings.

FUELING DEMAND

What creates demand? Well, that depends on what kind of demand you mean.

Residential demand is formed and shaped by Workforce demand, while Commercial and Industrial demand are propelled by Business demand.

WORKFORCE DEMAND

Workforce demand is the need of Industrial and Commercial buildings for workers, and it's the force behind Residential demand.

NOTE

The "workforce" of your city is a fraction of your Residential population presumed to be in the workforce. Though the workforce percentage is flexible (varying with Health Quotient), it is roughly 50%. In other words, half the Residential Sims are available to work. Thus, when a business demands workers, it sends out demand for roughly two Residential Sims for each job.

Every C or I building comes with a fixed number of jobs (usually proportional to the buildings' size). Each job creates demand for roughly two Residential Sim (as dictated by the workforce percentage), a.k.a. "Workforce demand."

Not any Sim will do; each building looks for workers in relation to their wealth level and requires fixed proportions of each. The proportions for all the "employer" developer types (I, Co, and Cs) are listed below:

Workforce Demand

Developer Type	R§	R§§	R§§§
CS§	100%	0%	0%
CS§§	68%	27%	5%
CS§§§	62%	30%	8%
CO§§	40%	50%	10%
CO§§§	20%	65%	15%
IA	100%	0%	0%
ID	100%	0%	0%
IM	50%	45%	5%
IH	10%	80%	10%

For example, a Co§§ buildings with 100 jobs would require 40 R§, 50 R§§, and 10 R§§§ Sims, and would accordingly increase demand for each. If there is an oversupply of each type of resident out there (the unemployed), the demand will be satisfied immediately. If not, the demand meters for unfilled jobs' Residential developer type will rise to show the unmet demand.

To satisfy this demand, zone Residential in a location that's desirable to the wealth level you wish to attract.

This Co§§§ building hasn't filled all its jobs. That may mean there aren't enough R§§ Sims in the city; that's why demand for them is so high.

BUSINESS DEMAND

Business demand is the need by Residential Sims for businesses to provide their employment. It serves as the force behind the various Industrial and Commercial demands.

Whenever a Residential building is constructed, it demands jobs from businesses. Different Residential wealth and educational levels dictate what jobs the occupants of the buildings will demand. If all goes well, a business building will appear that satisfies the demand and brings down the appropriate RCI Demand Meter.

NOTE

Educational Quotient (EQ) is expressed here in four levels: 1–4.

Business Demand—Proportions of Businesses Called for by Residential Sims by Wealth Level

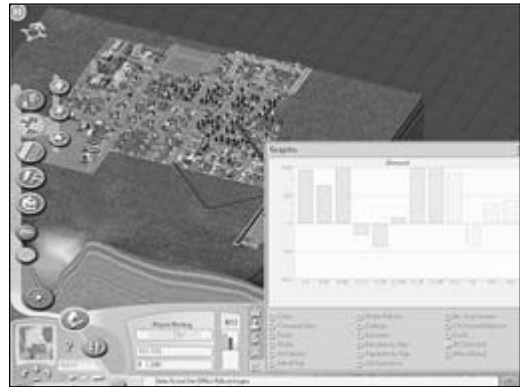| Bus. Dev. Type	R§/EQ1	R§/EQ2	R§/EQ3	R§/EQ4	R§§/EQ1	R§§/EQ2	R§§/EQ3	R§§/EQ4	R§§§/EQ1	R§§§/EQ2	R§§§/EQ3	R§§§/EQ4
CS§	25%	25%	20%	15%	10%	5%	—	—	5%	—	—	—
CS§§	—	—	5%	10%	15%	20%	25%	20%	15%	10%	5%	—
CS§§§	—	—	—	—	—	—	—	5%	5%	15%	20%	25%
CO§§	—	—	15%	45%	20%	30%	15%	10%	40%	40%	20%	—
CO§§§	—	—	—	15%	—	5%	15%	30%	15%	30%	40%	50%
IA	100%	—	—	—	80%	—	—	—	—	—	—	—
ID	75%	50%	25%	—	20%	10%	—	—	10%	—	—	—
IM	—	25%	35%	15%	35%	30%	20%	—	10%	5%	—	—
IH	—	—	—	—	—	—	25%	35%	—	—	15%	25%

For example, a 40-person R§§ household (approximately 50% of whom are in the "work-force") with medium-low education (EQ2) will create demand for 20 jobs: 1 Cs§ job, 4 Cs§§ jobs, 6 Co§§ jobs, 1 Co§§§ jobs, 2 ID jobs, and 6 IM jobs. If there's a glut of jobs in any or all the developer types, all or part of this demand will be satisfied immediately. If not, the RCI Demand Graph bars for each developer type would rise to reflect the unmet demand. To meet unmet demand, you must zone land that will be desirable to the developer type you're trying to satisfy.

READING RCI DEMAND

Your overall view of current demand is the RCI Demand Meter, always visible in the Mayor Mode interface. It is of no use in specifically gauging what your city needs; it's a rough indication of the current state of affairs.

For the real skinny, you have to click on the RCI Demand Meter to get to the RCI Demand Graph (also accessible through the Graphs Panel). This bar graph breaks down demand into its most useful form: by developer type.

The RCI Demand Graph is your peephole into who's demanding what.

Here you can see, on a relative scale of -1,000 to 1,000, how much unsatisfied call there is for each developer type.

NEGATIVE DEMAND

Avoid letting demand for any developer type drop below zero. Negative demand causes mass abandonment and other ugliness.

Negative demand occurs when there's an over-supply of a demanded developer type. Say, for instance, there's high demand for Residential. If you zone to meet this demand and something subsequently changes in your Commercial or Industrial zones that cause Residential demand to drop, you may have more workers than your other developer types can absorb.

Abandonment can be a sign of many things. Negative demand is one of them.

Oversupply causes the simulation to take over and restore equilibrium between supply and demand. Its only tool is mass exodus of population. All of the excess inhabitants abandon their buildings and move out of the city to restore demand to 0.

They're gone but you have to stick around and deal with the cascading consequences of mass abandonment (heightened flammability, wildly swinging demand fluctuations, etc.). It's not a precise process, so bad things are bound to ensue.

Underreact to demand. To see why, consider the concept of overdevelopment.

OVERDEVELOPMENT

Be wary of overdevelopment. If, in moving to satisfy demand, you provide too much of the demanded zones, your Sims may develop too enthusiastically.

Sim developers are inclined toward overdevelopment, so keep them on a tight leash. This is problematic with high-density zoning where one building can contain several thousand occupants (demand satisfaction).

Too much development can become negative demand (see "Negative Demand") and this can lead to abandonment.

As a rule, zone less than you think you need, especially if you're dealing with high-density zones and their potential for high-capacity buildings. You can also increase taxes to temper overdevelopment.

DEMAND AND DESIRABILITY

Desirability plays an important role in demand.

If desirability is low, occupancy will be equally low; they're directly proportional. Low occupancy, in turn, eventually stagnates demand.

If your occupancy numbers are low, don't zone more to meet outstanding demand. Read Chapter 10 to see what you can do to enliven desirability instead.

DEMAND CAPS

Demand Capping is a force working against growth of your city of which you may not be aware. If you fail to tend to it, demand for your city will dry up.

Demand Caps are fixed ceilings beyond which a population cannot grow, overriding actual demand. With every increase in the population, you move one step closer to the cap and the maximum demand pushes down. The closer you get to the cap, the lower the demand maximum drops until, at the cap amount, demand registers as zero no matter what's going on in your city.

The Major League Stadium makes it possible to have larger R§ and R§§ population thanks to the magic of Demand Caps.

Most Developer Types work under a Demand Cap, beginning with an Initial Demand Cap at the start of each city.

NOTE

Demand Caps are city-specific. They don't span a Region nor affect other cities in the Region.

CROSS-REFERENCE

See Chapter 25 for the skinny on Regions.

Initial Demand Caps

Developer Type	Initial Demand Cap
R§	20,000
R§§	2,000
R§§§	1,000
CS§	N/A
CS§§	N/A
CS§§§	N/A
CO§§	3,000
CO§§§	2,000
IA	30,000
ID	14,000
IM	7,000
IHT	4,000

For example, a city has an Initial Demand Cap on its R§ population of 20,000. In other words, population can grow to 20,000 and no further without some relief. At zero R§ population, demand can potentially reach +1,000. At 10,000, it can climb only as high as +500 no matter how high demand actually is. When you get to 20,000, demand can't register above zero.

If you did nothing about Demand Caps, your city would be incapable of growing beyond these points. Fortunately, there's something you can do.

DEMAND CAP RELIEF

Demand Caps are raised by the addition of certain buildings and Neighbor Connections. When a Demand Cap Reliever is introduced into your city, the potential size of the affected population is raised to the Initial Demand Cap plus the amount of Demand Cap Relief offered by the structure/connection.

For example, if R§ is capped at 20,000 and we add a Farmer's Market (with Demand Cap Relief of 20,000), the modified Demand Cap becomes 40,000. Instead of being at 100% of your cap (zero possible demand), you're now at 50% of your new cap (20,000 of 40,000). Demand can rise as high as 500 (50%), but no higher. To permit population to grow beyond 40,000 and demand to rise above 500, add more Demand Cap Relief.

What provides Demand Cap Relief for each developer type population differs, reflecting what each population desires. Without these things, your city is unattractive to newcomers (they expect a city of your size to have certain things).

In general:

- Residential: Desires amenities
- Commercial Office: Desires connections to other cities
- Industrial: Desires connections to other cities

These are the general rules, but there are individual buildings that, though they don't meet the strict criteria listed above, have some Demand Cap Relief effect. These are listed in the tables below.

DESTROYING DEMAND CAP RELIEVERS

Don't destroy a building or connection with Demand Cap Relief after passing the Demand Cap it expanded. If you do, you'll drop to the previous Demand Cap, and your demand sinks to zero until you provide alternative relief.

RESIDENTIAL DEMAND CAP RELIEF

Residential Sims like amenities, primarily parks and recreation. Though most such buildings affect all Residential Sims equally, the effect can vary by wealth level.

Specifically, Demand Cap Relief is provided by:

Structures That Provide Residential Demand Cap Relief

Structure	Demand Cap Relief R§	Demand Cap Relief R§§	Demand Cap Relief R§§§
Basketball Court	1,000	1,000	1,000
Beach	250	250	250
City Zoo	8,000	16,000	0
Community Garden	250	250	250
Country Club	0	0	8,000
Courthouse	0	15	15
Disease Research Lab	0	10,000	10,000

Structures That Provide Residential Demand Cap Relief continued

Structure	Demand Cap Relief R§	Demand Cap Relief R§§	Demand Cap Relief R§§§
Farmer's Market	20,000	150,000	0
Gazebo	1,000	1,000	1,000
Large Flower Garden	7,000	7,000	7,000
Large Medical Center	20	20	20
Large Park Green	2,500	2,500	2,500
Large Plaza	9,000	9,000	9,000
Major Art Museum	0	6,000	6,000
Major League Stadium	300,000	300,000	0
Medical Clinic	20	20	20
Medium Flower Garden	3,000	3,000	3,000
Medium Park Green	1,000	1,000	1,000
Medium Playground	3,000	3,000	3,000
Medium Plaza	4,000	4,000	4,000
Minor League Stadium	200,000	200,000	0
Open Grass Area	250	250	250
Open Paved Area	250	250	250
Opera House	0	0	5,000
Playground	1,000	1,000	1,000
Private School	0	0	6,000
Radio Station	0	9,000	0
Ranger Station	1,000	1,000	1,000
Resort Hotel	0	5,000	5,000
Skateboard Park	4,000	4,000	4,000
Small Flower Garden	750	750	750
Small Park Green	250	250	250
Small Plaza	1,000	1,000	1,000
Soccer Field	5,000	5,000	5,000
Softball Field	6,000	6,000	6,000
Stock Exchange	0	0	125,000
Television Studio	0	3,000	0
Tennis Court	4,000	4,000	4,000
Tourist Trap	100,000	0	0
University	0	15,000	15,000

COMMERCIAL DEMAND CAP RELIEF

NOTE

Commercial Service isn't limited by Demand Caps. It can grow without relief.

Commercial Office interests stop flocking to your city if you provide inadequate outlets for them. A few buildings offer relief as well.
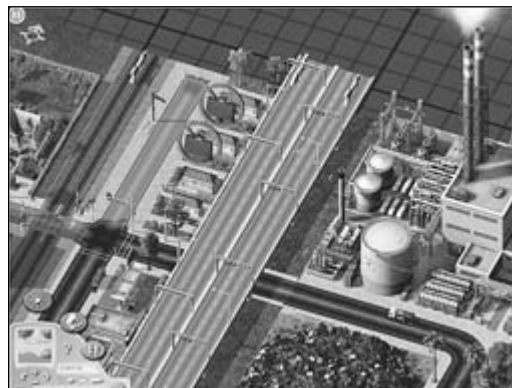
CONNECTIONS

NOTE

Demand Cap Relief comes from making a connection to another city; it doesn't have to be extended into the neighboring city.

For a neighboring city to have a role in Regional Play, you must connect it. That's a subject for Chapter 25.

Connections can come in various forms: Highway, Subway, Road, and Rail. These connect to a specified neighbor.

Demand Cap Relief for Commercial means connections to other cities.

NOTE

When there are no neighbor cities in a direction, making a connection to a border connects you to SimNation. This counts as a connection for Demand Cap Relief, but is useless for all other purposes (Neighbor Deals, Regional play, etc.).

The first connection to each neighbor you make of each type of transportation provides an amount of Demand Cap Relief. First connections to a specific neighbor (or to SimNation) raise your Initial Commercial Office Demand Caps by a fixed amount. Subsequent connections of the same type to the same neighbor yield a diminishing amount of Demand Cap Relief:

Co Demand Cap Relief by Neighbor Connection and Redundant Connections

Connection Type	First Connection to Nbr	Second Connection of same type to same Nbr	Third Connection of same type to same Nbr
Highway	100,000	58,496	41,504
Subway	20,000	11,699	8,301
Road	10,000	5,850	4,150
Rail	10,000	5,850	4,150

After that, each additional connection of the same transportation type to the same neighbor offers a diminishing amount of Demand Cap Relief, worth less each time.

> **NOTE**
>
> Connections provide their full Demand Cap Relief to Co§§ and Co§§§ separately. In other words, one Road connection raises the Co§§ Demand Cap to 13,000 and Co§§§ to 12,000.

Additional connections to different neighbors or to already-connected neighbors via different transportation types snare the full amount of Demand Cap Relief per connection.

Make connections to each possible neighbor by each possible transportation type. Just because a connection doesn't offer its full effect doesn't mean it isn't worth making: Demand Cap Relief is Demand Cap Relief.

AIRPORTS AND SEAPORTS

Commercial Demand Cap Relief also comes from Airports and, to a lesser extent, Seaports.

The amount of Demand Cap Relief offered by an Airport equals the number of Commercial Office structures reachable by Road/Street from the Airport. The larger the Co population that can get to the Airport, the greater Demand Cap Relief you receive. The relief is limited by the kind of Airport.

Airports, even small ones, are a major source of Commercial Cap Relief too.

Maximum Demand Cap Relief by Airport Type and Size

Airport Type	Small	Medium	Large
Landing Strip	10,200	13,100	16,000
Municipal Airport	28,800	34,100	40,000
International Airport	70,000	80,000	90,000

> **TIP**
>
> To get full Demand Cap Relief from Airports, lead the Road that touches the Airport to your Commercial Office zones.

Seaports work differently because their primary concern is Industrial. The Commercial Demand Cap Relief offered by Seaports is a presumed amount of commercial sea traffic based on the current Industrial freight going through the port. It is 10% of the Industrial freight or two times the number of freight trips arriving at the port (see "Industrial Demand Cap Relief"). The more Industrial activity you have at the port, the more Demand Cap Relief you get for Commercial Office.

DEMAND CAP RELIEF STRUCTURES

In addition to connections, a handful of buildings provide Demand Cap Relief to Commercial Office populations. The buildings and their distinct effects on Co§§ and Co§§§ are listed in the table below.

Buildings Providing Commercial Office Demand Cap Relief

Structure	Demand Cap Relief Co§§	Demand Cap Relief Co§§§
Convention Center	100,000	100,000
University	15,000	0
Television Studio	10,000	0

INDUSTRIAL DEMAND CAP RELIEF

Industrial Demand Cap Relief is based on freight trips to the connections. The more trips arrive at the connections, the more Demand Cap Relief is provided.

Several times a month, Industrial buildings send out shipments to connections (the larger your Industrial population, the more trips go out) including Seaports. If the shipment arrives at the connection, 20 is added to the Demand Cap of each Industrial developer type (or 20 x the number of trips). If the trip can't get to the connection (due to, for example, heavy traffic), no Demand Cap Relief is earned.

Place your Industrial zones near the map edges and make a connection by Road to give freight shipments a quick way out of town.

> **TIP**
>
> Querying your Industrial buildings in various locations tells you if they're able to complete their freight trips. Look to the Query item "Freight Trips" to see if the current journey is Short, Medium, or Long. If it's Long, find a method to clear the way.

Have a dedicated Road, Highway, or Rail that connects only to your Industrial zones. That way you don't have Residential traffic clogging up the freight routes.

AGRICULTURE AND DEMAND CAPS

Generally, every job offered by developer type counts against its own Demand Cap. All ID jobs make up the ID population, all Co§§ jobs comprise the Co§§ population, etc. Agriculture is different.

Jobs from all other businesses count against the Agriculture Demand Cap, except Agricultural jobs. The effect of this is that as other businesses grow, Agriculture is forced to stagnate. Connections keep raising the cap, but the influx of non-Agricultural businesses should outpace relief.

At some point in your city's life you have to decide whether you want farms in your city. If so, you must curtail all other business forms and put nearly all of your resources into farming. Only then will Agriculture grow to large scale.

When your city begins to thrive, commence a neighboring city, connect it, and commit it to Agriculture. The Residential population of your main city will feed the demand for Agriculture jobs and the farms' isolation will let them grow unimpeded. Plus you won't have to worry about their water pollution output affecting your Residents.

AIRPORTS AND SEAPORTS

Industrial Demand Caps are relieved by both Seaports and Airports, though in different ways.

As described above, Industry treats Seaports as just another connection, with 20 Demand Cap Relief for each trip that arrives at the port, up to a maximum of 650.

Airports work differently because their primary concern is Commercial. The Industrial Demand Cap Relief offered by Airports is a presumed amount of Industrial air traffic based on the current Co populations that can reach the Airport. It is 10% of the Commercial Office population. The larger the Co population using the Airport, the more Demand Cap Relief you'll get for Industrial.

DEMAND CAP RELIEF STRUCTURES

A smattering of buildings provide Demand Cap Relief to Industrial developer types. This relief is in addition to any offered by connections.

Buildings Providing Industrial Demand Cap Relief

Structure	Demand Cap Relief IM	Demand Cap Relief IHT
Army Base	100,000	0
Radio Station	9,000	0
Advanced Research Center	0	150,000
University	0	100,000

DEMAND AND TAXES

Demand is influenced by tax rates, especially if they're too high. Use this tax sensitivity to increase demand or cool it off. Or, set every developer type to a neutral rate that brings in the cash, but doesn't affect demand. The neutral tax rate depends on population, but doesn't vary much, especially when your city is small. It begins at 9% and drops gradually to 8% after Residential population grows to 2,250,000.

Your budget is where your most powerful demand weapon is hidden. Use your tax rates thoughtfully and nimbly to coax demand where you want it to go.

Neutral Tax Rate by Population

Population	Neutral Tax Rate
0–149,999	9.0%
150,000–299,999	8.9%
300,000–449,999	8.9%
450,000–599,999	8.8%
600,000–749,999	8.7%
750,000–899,999	8.7%
900,000–1,049,999	8.6%
1,050,000–1,199,999	8.5%
1,200,000–1,349,999	8.5%
1,350,000–1,499,999	8.4%
1,500,000–1,599,999	8.3%
1,650,000–1,799,999	8.3%
1,800,000–1,949,999	8.2%
1,950,000–2,099,999	8.1%
2,100,000–2,249,999	8.0%

In *SimCity 4*, you have a remarkable amount of control, possessing the power to changes taxes for individual wealth levels.

Changes to Industrial § affect only Dirty Industry because Agricultural Sims don't pay taxes. On the other hand, in *SimCity 4 Deluxe* or with the *Rush Hour* expansion pack installed, tax rates break down by every developer type. You can, therefore, fine tune your taxes even more precisely.

The basic concept with taxes is getting away with as much as you can for as long as you can. This means keeping them as high as possible while you have the chance (when population is low and the neutral tax rate is high).

If demand is high and you don't wish to expand, raise taxes incrementally to diminish the positive demand without dragging it into negative territory.

The negative effect brought about by raising taxes above neutral persists for several months, even if you change your mind.

See here that the demand effect of changes in tax rate is expressed as a percentage of existing demand. Trying to boost low demand (let's call it 50) by lowering tax rates only gets you 35% of 50 or 17.5. This is not a dramatic change for the potentially large loss of revenue.

> **THAT IS *SO* 3K!**
>
> In *SimCity 4*, the neutral tax rate is barely affected by population, and is therefore not as much a factor as it was in *SimCity 3000*.

The difference between where you set your taxes and the neutral rate dictates how much effect your actions have on demand. The lesson: If you raise taxes, gradually raise them.

Ratio of Current Tax Rate to Neutral Rate
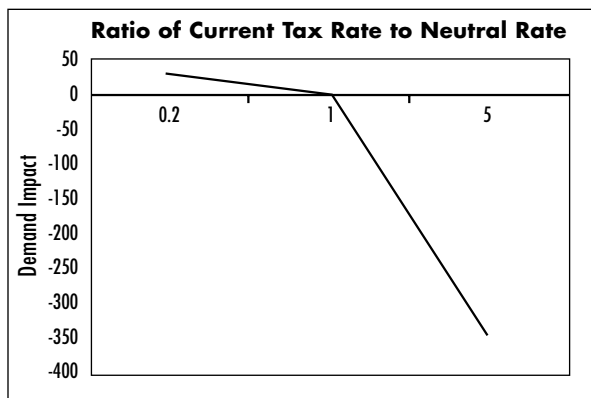
Set tax rates below the neutral rate and demand is amplified to 35%. Raise them higher, and demand can suffer by as much as -350%!

Don't think you can get away with briefly raising the rates to bring in quick cash before demand takes a dive. When you increase rates above the neutral rate and press Accept, the demand depression effect sticks around for as long as you keep rates below neutral and for 90 days thereafter (even if you lower the rate immediately). The tax demand penalty, is defined by the highest tax rate in force during the last 90 days.

DEMAND EFFECTS OF NON-RCI STRUCTURES

RCI structures aren't the only ones that exert demand influences. Many Rewards and civic, transportation, and park buildings contribute as well.

In most cases, the buildings add jobs (potentially creating more Residential demand).

Many also offer Demand Cap Relief for one or more kinds of developers. For example, parks provide Residential Demand Cap Relief while others provide it for Industrial (Military Base) and Commercial (Convention Center).

Many buildings, such as this Large Medical Center, create Residential demand in the form of jobs.

NOTE

My Sims may take jobs at one of your non-RCI buildings.

One exceptional case (the Casino) performs the unusual stunt of increasing Commercial Service demand. The Casino is unique in that its arrival creates the need for more Commercial Service buildings to cater to its customers.

Jobs Provided by Non-RCI Structures

Structure	Jobs R§	Jobs R§§	Jobs R§§§
Large International Airport	170	105	45
Medium International Airport	150	95	40
Small International Airport	130	85	35
Large Municipal Airport	125	80	35
Medium Municipal Airport	105	70	30
Small Municipal Airport	90	60	25
High School	90	10	0
City College	80	120	20
Large Landing Strip	80	55	25
Large Police Station	80	10	0
University	76	116	19
Medium Landing Strip	65	45	20
Small Landing Strip	50	35	15
Army Base	45	0	0
City Jail	40	15	0
Large Medical Center	35	53	11
Federal Prison	35	0	0
Coal Power Plant	30	16	2
Natural Gas Power Plant	28	15	5
Oil Power Plant	28	15	5
Waste to Energy Plant	28	15	5
Nuclear Power Plant	20	20	8
Large Fire Station	20	8	0
Recycling Center	18	0	0

Structure	Jobs R§	Jobs R§§	Jobs R§§§
Convention Center	15	0	0
Elementary School	12	4	0
Hydrogen Power Plant	10	23	15
Private School	10	19	4
Solar Power Plant	10	12	10
Small Police Station	10	12	0
Small Fire Station	7	0	0
Freight Train Station	4	0	0
Passenger Train Station	4	0	0
International Port	95	5	0
City Museum	3	15	7
Local Branch Library	3	7	0
Water Treatment Plant	2	10	4
Bus Stop	2	0	0
Subway Station	2	0	0
Medical Clinic	1	6	1
Bureau of Bureaucracy	0	100	0
Advanced Research Center	0	92	31
Disease Research Lab	0	80	32
Resort Hotel	0	37	0
City Hall	0	30	0
Movie Studio	0	0	34
Stock Exchange	0	0	15

ORDINANCES

Several ordinances apply to demand:

- Clean Air Act
- Paper Waste Reduction Program
- Power Conservation Act
- Tourism Promotion Program
- Water Conservation Program

ZONING

Mayors don't build cities, Sims do! You provide the cityscape, the services, and the vision. The Sims decide whether they like what you've created and what they want to build there. Other than the municipal structures that make your Sims' lives better, other buildings in your town (those in which your Sims live, work, and shop) are chosen and developed by Sim developers.

The first step in this process is zoning. Zoning is the tool by which you tell the Sims what kind of buildings you want, where you want to see them, and in what kind of density you want them.

The Sims can have the last laugh. If you zone contrary to what your Sims can or want to do, they simply won't come.

The power is not out of your hands. If you learn what your Sims like, how they behave, and what they'll tolerate, you can exercise control, molding a chaotic process to your whims and dreams.

A newly placed zone is a clean canvas for your Sims to paint their lives on.

KINDS OF ZONES

There are three general kinds of zones:

- Residential
- Commercial
- Industrial

RESIDENTIAL ZONES

Residential zones are where your Sims live. These grow in response to the number and kind of jobs provided by your Industrial and Commercial zones, and by your municipal, utility, and Reward buildings.

Residential zones can be further broken down into three densities:

- Residential Low Density (§10 per flat tile)
- Residential Medium Density (§20 per flat tile)
- Residential High Density (§50 per flat tile)

Low-density zones cap the size of buildings that can grow on them. Higher density zones allow your Sims to build larger buildings that contain more occupants or smaller houses that hold fewer occupants.

WHERE TO PLACE THEM

Place your Residential zones far from Industrial zones, polluting Power Plants, Agriculture, Landfills, Airports, Seaports, or any other air pollutant. Residential Sims don't care about water pollution (though it impacts your Mayor Rating in places where it's high). Turn on your Air and Water Pollution Data Views to observe the reach of your big polluters.

Don't locate your Residential zones so far away from your Industrial zones that Sims have a long commute to work. Residential Sims hate long commutes as much as pollution.

It helps to place them near parks (and many Rewards), and on land that's higher than average elevation, or near water.

It won't be long before you can eyeball how far apart you need to keep your Residential/Commercial and Industrial Sims.

COMMERCIAL ZONES

Commercial zones are where your Sims work and shop. They provide jobs, goods, and services to your citizenry and to cities beyond your borders. They grow in response to the size, wealth, and education of your Residential population.

CROSS-REFERENCE
The demand system and its impact on zones is discussed in detail in Chapter 8.

Commercial zones can be laid out in three densities:

- Commercial Low Density (§10 per flat tile)
- Commercial Medium Density (§20 per flat tile)
- Commercial High Density (§50 per flat tile)

As with Residential density, higher-density zones allow your Sims the option to build smaller buildings that hold fewer occupants, or larger buildings that contain more occupants.

WHERE TO PLACE THEM?

The basic rule of placement for Residential applies to Commercial zones: Keep them away from air pollution! Water pollution doesn't matter; Commercial zones don't factor water pollution into desirability, and Mayor Rating only has to do with Residential buildings.

Keep Commercial near Residential zones, or mix them into Residential blocks (think strip malls). This is beneficial if the existing Residential area and the Commercial zone appeal to the same wealth type (see Chapter 8).

Commercial Office Sims like to be near busy thoroughfares, so place them in areas with high traffic volume. They also benefit from being near other Commercial Office structures.

Commercial Services Sims like heavy traffic and being close to Commercial Office Sims, so zone Commercial near other Commercial whenever possible.

Set up Commercial near parks and Landmarks.

Mixing Commercial zoning with Residential zoning is good.

CROSS-REFERENCE
See Chapter 10 for lists of which buildings benefit Commercial buildings with their Commercial NIMBY/YIMBY Effect.

INDUSTRIAL ZONES

Industrial zones are where your Sims work, and where goods are produced for city consumption and export outside your city. To develop, Industrial zones need a Residential population to comprise its workforce and a convenient connection to the outside world.

Industrial zones are subdivided differently:

- Agricultural (§10 per flat tile, minimum size 4 x 4)
- Medium Density Industrial (§20 per flat tile)
- High Density Industrial (§50 per flat tile)

Keep Industrial zones near map edges to shorten trips to connections.

As with other zones, the difference between high and medium density is a matter of cost and space. It costs more to zone high density, but the possible large buildings provide greater population per tile. On the other hand, when we're talking about Industry, high density means more pollution.

NOTE

Due to a concept called stage limits (see Chapter 11), there is no point in zoning high-density Industrial until an Industrial population (a.k.a. "jobs") reaches 2,447.

THAT IS *SO* 3K!

Agricultural zones are now their own zone type, so regular Industry won't pop up in the middle of your farms.

AGRICULTURAL ZONES

Agricultural zones are a special breed of Industrial zone that permits you to build farms around your city. Each tile of Agriculture costs §10, but you must lay out a minimum area of 4 x 4 (§160).

There's no requirement to lay out these zones, but doing so brings benefits…and problems.

Farms are a specialized kind of Industrial zone.

NOTE

Agricultural zones have several odd features. Agricultural buildings pay no taxes. Because Agriculture is not driven by business demand (see Chapter 8), it offers "free" jobs, feeding Residential demand while being fed by Residential population.

WHERE TO PLACE THEM

Due to the pollution they produce, locate medium- and high-density Industrial zones in areas of already high air and water pollution (near Landfills, Seaports, Airports, or Power Plants).

Keep Industrial zones away from sloped ground (they'll build on zoned sloped land, but it isn't high on the desirability scale) and away from areas of high inherent land value (on above-average elevation or near water).

Keep Industrial zones near Neighbor Connections and Seaports. If the freight trip length is too long, the areas won't be desirable. Especially early in the game, locate your Industrial zones near the map edges and make a Road Neighbor Connection.

Agricultural zones share many of these considerations but can't abide air pollution or high traffic volume.

PLACEMENT OF HIGH TECH

High-Tech Industrial Sims (which won't develop until after several years) like to be near the same YIMBYs as Residential Sims and despise air pollution—this becomes a zoning consideration when you get a preponderance of High-Tech demand. See Chapter 10 for more detail on this point.

When conditions are right for High-Tech, zone Industrial near your Residential areas. Because pollution will be low, the only Industrial development you'll see will be High-Tech.

TIP

There's a built-in, labor-saving device for zoning. It's called "flood fill" and it's activated when you select a zone tool, point to a tile, and hold your mouse button. In a few seconds, a large block of that zone type fills the immediate area, making all appropriate Road and Street connections. Release the button to accept this layout. Flood Fill can be used in conjunction with the [Shift] (auto-streets off) or land [Alt] keys (auto-orientation off).

This is an important tool for zoning in oddly shaped areas. Click-and-hold with such an area (like a diamond-shaped Road configuration), then release.

ZONE DENSITY

In each kind of zone, you can zone in different densities: low, medium, or high (Industry has only medium and high). The higher the density, the more it costs to zone.

The higher the density, the larger the possible buildings and the more Sims per tile your city can hold.

Avoid zoning medium or high density until your city is well-established.

TIP

Zone low density for as long as you can. As buildings get larger, the building value per Sim declines. This means less tax revenue per Sim. Use zoning to maximize income by zoning an entire map low density, then amassing a large treasury surplus before zoning your first medium- or high-density zone.

ZONE BALANCING

Your total number of Residential-zoned tiles should equal the sum of your Commercial and Industrial zone squares or, in the equation:

$$R = C + I$$

Strict maintenance of this balance is impossible.

TILE COUNTING NOT REQUIRED

You are not expected to count every zoned square to make sure your zones are balanced.

This is unnecessary and pointless; it doesn't tell you anything or give you an advantage.

If you must do it, however, it is helpful to zoom out and turn on the Zones Data View. As long as you understand the limitations of the information you're receiving, it can tell you if you're doing this right.

DENSITY AND BALANCE

The varying densities of zones mean that there isn't a one-to-one ratio between any two given tiles. A tile of low-density Residential is not equivalent to a tile of high-density Commercial. It's not obvious how any density of Residential zoning equates with a block of either heavy or light Industrial.

You should worry about the simulator's tendency to overdevelop and send demand into negative territory. But you'll learn that with practice.

BALANCING IN *SIMCITY 4*

Maintaining RCI balance is impossible because the basic equation is no longer true. *SimCity 4* introduces the concept of "occupancy"—each building in *SimCity 4* has a certain capacity of "occupants." The number of occupants is determined by the building's function and wealth level (known as its "developer type"). The capacity of these buildings is balanced by a dynamic Residential profile reflecting both Residential wealth level and education.

THAT IS *SO* 3K!

Not only is the R = C + I equation no longer useful, the concept of evolving Commercial to Industrial ratio is history.

The idea was that a small city needed more Industrial zones while a large city needed more Commercial. This functioned as a ratio that changed with population and dictated the balance of the C + I portion of the equation.

For example, a new city could only support one amount of Commercial zoning for every five amounts of Industrial zoning. This ratio would be fixed until population reached 33,000. When gradually your city grew to 1.5 million, the ratio would be reversed: four parts Commercial to one part Industrial.

This ratio and its link to population helped you decide how much to zone in the game's various stages. This ratio is now dictated based on your Sims' wealth and education rather than population.

THE CURRENT STATE OF ZONE BALANCING

How does a *SimCity 4* player balance his Residential zones with Commercial and Industrial zones?

The answer is simple: Watch your RCI Demand Meter for your current demand profile. If the indicator shows a lot of Residential demand, gradually zone lots of Residential. If it shows a small amount of Commercial demand, put down a small area of Commercial. Zone less than you think you need.

As you learn more, you'll gain more insight from the RCI Demand Graph. When you learn how demand and desirability work, you'll zone based on where your city is in terms of wealth and education. An RCI balance comes from a true understanding of your city, not some arbitrary ratio.

LAYING OUT ZONES

Laying out zones has never been easier. While the requirements for each zone type are complicated, they're simplified by several automatic features.

AUTOMATIC STREETS

SimCity 4 introduces a new kind of transportation network called "Streets." These are low-volume, low-speed (and low-cost) thoroughfares that are suited to travel within large blocks of zones.

When you lay out a zone, the Streets are automatically drawn and connected to any adjacent Roads or other Streets.

The no-road-access zot indicates there's no Road access. This can happen even with automatically drawn Streets.

> **NOTE**
> You can lay out zones without automatically drawn streets if you hold down the ⟨Shift⟩ key while zoning. You could get lots (possibly several) with no transportation access.

The cost of laying out these Streets is added to the zoning cost.

The location of Streets is important because every parcel within a zone must have "frontage" on a Road or Street on at least one edge. This means that at least one of the four sides of a parcel must touch a Road or Street. The resulting building subsequently develops facing that Road or Street. Frontage is indicated by a dark arrow on each parcel.

> **NOTE**
> If you want to change the automatically chosen orientation of laid out zones, hold down the ⟨Alt⟩ key while dragging your zone. Holding down the ⟨Shift⟩ and ⟨Alt⟩ keys together turns off both auto-streets and auto-orientation.

Automatic Street drawing assures that this requirement is met for all new zones, sparing you the task of juggling both thoroughfares and zones as you plop down your zones.

> **NOTE**
> In limited situations, a parcel will not touch a Road. If this happens, the parcel will not develop (a no-road-access zot appears above it). These situations require you to manually draw Streets or Roads to provide the necessary access.

A distinction needs to be made for Industrial zones. As with all other zones types, they need to front onto a Road, but it's enough that one side of the block touches a Road or Street. Industrial zones need fewer automatically drawn Streets within them. You can zone up to 8 x 8 without a Street being drawn.

NOTE

Don't worry if there's open space in your Industrial zones despite high demand. Often these gaps are due to the configuration of the buildings that developed there, leaving irregular spaces between them. These gaps fill in as the zone redevelops.

Industrial zones are big because the essential buildings construct along the Road while supporting buildings (that don't need Road access) build off the Road.

HOW ZONES ARE LAID OUT—PARCELIZATION

When you stretch out a zone on the map, the tiles combine into larger "parcels" of various shapes and sizes, outlined by darker lines. Some may be only one tile in size, but that's rare.

NOTE

The size of parcels does not relate to the size of the buildings that will sprout on them. Often, the building appears on part of the tile and props display on the rest. Props tell you something about the Sims inhabiting that house. For example, a beautifully tended Zen garden tells you that the inhabitants are high-wealth, while a washer/dryer on the lawn indicates a low-wealth occupant.

The dark lines indicate "parcels" drawn onto the zoned tiles.

How these parcels are laid out depends on the terrain, the ability of the system to draw the necessary Streets, and a concept called *desirability*. In this context, desirability parcels the land to predict what kind of buildings could be constructed in the immediate future. If a piece of land is highly desirable to high-wealth Commercial Office Sims, the parcel will be larger than if it's desirable to high-wealth Commercial Service occupants (usually small boutiques).

As you'll see in our discussion of development (Chapter 11), parcelization can shift as desirability changes. If desirability shifts before construction begins on a zoned tile, the size and shape of the parcel will change to reflect it.

NOTE

Industrial zones don't parcelize. This allows the large blocks of zoning that Industrial Sims love. You'll see that Industrial buildings develop near Roads, and later develop outbuildings to expand their occupancy and fill the zone.

DESIRABILITY AND ZONING

An important zoning skill is using desirability to shape your city.

By zoning based on desirability, you can control and predict what will grow in a zone.

Let's say that you see heavy demand for low-wealth Residential (R§) and that's what you want to develop. The way to guarantee you'll get that developer type is to zone in an area that's desirable to R§.

For that information, bring up your Desirability Data View and select R§. This shows you which areas are intensely desirable to R§. Next, inspect desirability for the two other Residential wealth levels. You need to find locations desirable to R§ and undesirable to R§§ and R§§§. Zone there when demand is high and you'll most likely get R§.

You can use this too between developers (Residential, Commercial, or Industrial). When trying to decide where to put one developer over another, consult desirability to see which locations are "prime real estate" for which developer type.

DESIRABILITY

Desirability is a relative term. What's desirable to you may not be desirable to me. We may like certain things in common, but our adoration of some things and aversion to others may diverge.

Desirability is the driving force in *SimCity 4*, focusing you on the needs and desires of your citizenry, rather than on increasing your tax base via land value.

When you learn to harness the force of desirability, you can exert control over your city. You also have to stay atop the challenges of maintaining the services and conditions that make for high desirability.

DESIRABILITY DEFINED

In the real world, desirability differences in taste are attributed to myriad forces of personality, upbringing, chance, economics, and caprice.

In *SimCity 4*, it comes down to economics. A Sim's wealth level dictates what he or she wants and what appeals to her. Sims' tastes in real estate are a reflection of their wealth levels.

> **THAT IS *SO* 3K!**
>
> **Land value is no longer the end-all, be-all holy grail of city building. Now it's a minor factor under desirability.**
>
> **Desirability is a new concept in the *SimCity* franchise. While it supplants the previously omnipresent issue of land value, it behaves quite differently.**
>
> **Land value still plays a part in the game. Land value factors into desirability: Being near water and on above-average elevation (so-called "inherent land value") raises desirability for certain Residential developer types. R§§§ loves high land value, R§§ likes medium land value, and R§ likes low land value.**

This basic structure holds true for business (Commercial and Industrial) Sims as well. Desirability, balanced with demand, dictates which developer types break ground in your Commercial and Industrial zones.

Make a bit of land desirable to a given developer type and (if there's sufficient demand) that developer type will swoop in.

So that's desirability in principle, how does it work in practice?

DESIRABILITY AND DEMAND

Just because a hunk of land is desirable to Sims of a certain developer type doesn't mean they'll automatically move in. With desirability, there must be demand for the right developer type.

Tracts can be desirable to more than one developer type. Which one takes hold of the tract is a function of, among other things, demand.

The RCI Demand Meter at the screen's bottom displays overall RCI, but that's not helpful information for those looking to fine-tune their city. Look instead to your RCI Demand Graph to see demand broken down by developer type.

The RCI Demand Graph gives you the real lowdown on demand in your city.

GETTING INFORMATION ABOUT DESIRABILITY

To determine if a tract of land is desirable and to whom, click on the Data Views button in the Mayor Mode control panel. Expand the detail view to see the entire map.

Click on the developer type for which you'd like to see desirability. Any areas attractive to the selected developer type are highlighted in green. Undesirable areas appear in red.
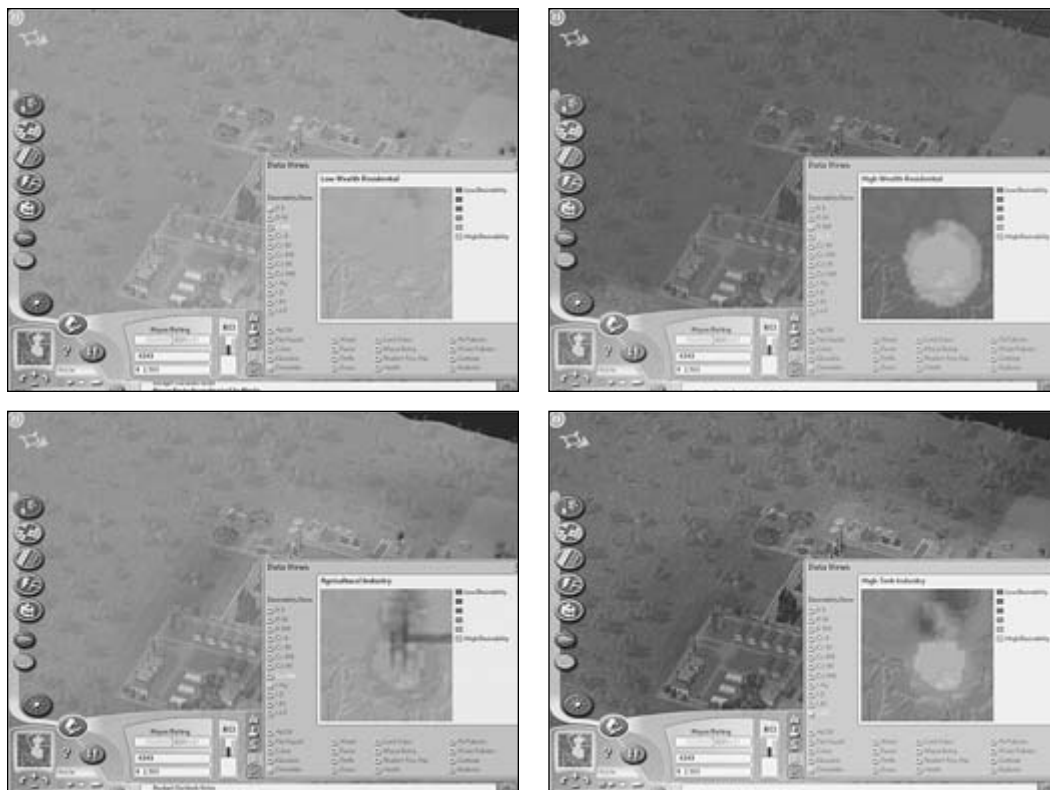
The city as viewed through the lens of desirability for R§, R§§§, IA, and IHT.

NOTE

Desirability is also shown for unzoned land. This helps you place new zones to attract a certain developer type. It may not work out, but at least you can create the best possible conditions at this earliest stage.

The next step is to determine what kinds of demand exist at the moment by consulting the RCI Demand Graph.

When buildings sprout, you can get their developer type by querying them. After you play for a while, you'll gain an eye for spotting developer type by the building's condition, its landscaping, and its props.

Query boxes show a structure's wealth level and how it scores in various desirability factors.

INITIAL DESIRABILITY

At the start of a new city, every tract of unzoned land contains defined baseline desirability. Because you won't have any of the usual desirability factors in place yet (except the natural topographical draw of inherent land value), nothing would develop without this little fudge factor.

Initial desirability is:

- R§, Co§, Cs§, IA, ID: Very high
- R§§, Co§§, Cs§§, IM: Enough to develop, but not to last if you do nothing
- R§§§, Co§§§, Cs§§§, IHT: None

DESIRABILITY FACTORS

Desirability epitomizes *SimCity 4*'s focus on the local character of your city. All these effects are local in that they affect tracts of land within a fixed radius.

This focus makes desirability a matter of intimately getting to know your neighborhoods and making small clusters of Sims happy, rather than trying to boost your overall land value. Because things such as crime, pollution, and traffic affect each Sim differently, placement of important buildings is a matter of strategy.

GETTING INFORMATION

Information on each of these factors is available in various forms: Query boxes, Data Views, and Graphs. You can also use divine insight by looking at your city (for example, air pollution is obvious if you zoom out).

Consult the corresponding chapters to find out how to get information on each factor.

The local factors that enter into desirability are various and subtle. Though harnessing their power requires an understanding of several complicated mechanisms, it's simple to improve desirability by acting locally. Take care of the Sims, and desirability will improve.

Several factors dictate desirability.

AIR POLLUTION

The amount of filth in the air is a major issue for most of your Sims. This is reflected in desirability for every developer type except ID (which ignores it completely). Manufacturing buildings don't care much about air pollution, but they do care.

Keeping pollution low earns a tract desirability points. The closer the amount is to zero, the greater the desirability boost.

Air pollution doesn't matter to Dirty Industrial Sims.

The desirability of a Residential or Commercial tract suffers if you let pollution run out of control. When it passes a certain tolerability threshold (different for each developer type), the desirability effect turns negative.

Sims tolerate air pollution more or less depending on developer type. In general, the lower the wealth level, the more tolerant a group of Sims will be of high pollution and the less the potential positive effect.

CRIME

Sims understand urban life and know that living in a city requires living with a bit of crime. But, you have to bear in mind what they consider is too much crime.

Low crime rates increase desirability, but high rates tear it to shreds. R, C, and I look at crime in the same way to differing degrees. In each case, tolerance for crime (the point at which the effect turns negative) varies with wealth level. So too does the maximum and minimum possible effect; it's far higher for high-wealth and IHT.

GARBAGE

Garbage pollution occurs only if you max out your garbage disposal options. At this point, garbage piles up on the location of each garbage producer. The pollution effect of this pile-up is a desirability killer in proportion to the amount of dumped garbage.

All developer types care about garbage, though Dirty and Manufacturing Industry hardly notice a little extra stench.

You can have a bit of garbage pollution without suffering a negative pull on desirability. At what point the Sims in a developer type get fed up and its desirability effect turns negative depends on wealth level. The lower the wealth level, the more tolerant of garbage pollution.

HEALTHCARE

Healthcare is so important to Residential Sims that desirability is based on the amount of healthcare coverage.

What determines the quality of healthcare as it relates to desirability is a combination of coverage and effectiveness. For coverage to be "optimal," a tract of land must be within the radii of one kind of fully funded healthcare building. A tract must be within the radii of one of these:

Good healthcare means providing full coverage and a good grade.

- Medical Clinic
- Large Medical Center
- Disease Research Lab (Reward)

NOTE

Being within the range of two identical healthcare buildings doesn't impact desirability. Their effects are averaged, so it's as if there were only one.

Every Residential developer type suffers negative desirability if it's not within the reach of a healthcare building. The amount of this reduction is proportional to wealth level. R§§§ has the lowest tolerance for incomplete healthcare but appreciates full coverage the most.

As healthcare improves in coverage and effectiveness, the negative desirability effect diminishes and becomes a positive boost. The point at which this changes (the tolerance of subpar healthcare), depends on developer type. So too does the maximum benefit.

LAND VALUE

Land value encompasses the natural enhancers of land value: proximity to water and placement on higher than average elevation.

Looking at your map, it's easy to locate water (assuming there is some). Any amount of water imparts a land value boost (up to +50) that diminishes with distance (10 tiles). If your city map doesn't contain water, make a few inland puddles before incorporating your city.

Elevation is trickier to gauge. Simply being on a hill, for example, is not enough. To receive heightened land value, a tract must be on ground higher than the average elevation of all zoned land. The higher above average the land is, the greater the land value up to a point. At very high altitude, the land is less valuable because it's too high.

Land value has a small desirability effect for all developer types, but not necessarily high land value.

High ground and waterfront property are the factors behind increased land value.

- Low-wealth: Low land value has a positive effect, high land value has 0 effect.

- Medium-wealth: Low and high land value have 0 effect, while medium value has a positive boost.

- High-wealth: High land value has a positive effect, low land value has 0 effect.

NOTE

Agricultural values low land value most highly.

COMMERCIAL NIMBY/YIMBY AND RESIDENTIAL NIMBY/YIMBY EFFECTS

YIMBYs (Yes in my back yard) and NIMBYs (Not in my back yard) are things you do and don't want located near your building. Proximity to YIMBYs and NIMBYs can have positive or negative effects depending on whose back yard we're talking about.

There are two NIMBY/YIMBY Effects: one that affects all Commercial structures (Co and Cs) and one that affects all Residential (and High-Tech Industrial) structures. Throughout this book, they're referred to as "Com. NIMBY/YIMBY Effect" and "Res. NIMBY/YIMBY Effect."

Any structure can have either or both of these effects. Res. NIMBY/YIMBY comes mostly from parks, Rewards, and Business Deal buildings. Com. NIMBY/YIMBY emits mostly from Landmarks, Rewards, Business Deal buildings, and recreational structures.

Each such building has an area of effect, though there's no way to see it in the game. To visualize these rings of desirability effect, consult the list below.

NIMBY/YIMBY Effects (Items with a * are downloadable from simcity.com.)

Structure	Com. NIMBY/ YIMBY Effect	Com. NIMBY/ YIMBY Effect Radius	Res. NIMBY/ YIMBY Effect	Res. NIMBY/ YIMBY Effect Radius
Advanced Research Center	50	22	-50	22
Air Force Base*	20	9	-90	36
Alamo	40	20	0	0
Alcatraz	10	24	0	0
Amalienborg	30	18	0	0
Arc de Triomphe*	30	18	0	0
Army Base	25	9	-90	30
Bank of America	80	28	0	0
Bank of China Tower	100	48	0	0
Basketball Court	0	0	30	30
Beach	50	10	80	10
Big Ben	40	20	0	0
Brandenburg Gate*	40	20	0	0
Bureau of Bureaucracy	25	17	-50	22
California Plaza	30	18	0	0
Capitol Records*	30	18	30	60
Casino	50	22	-65	25
Cemeteries	0	0	40	20
Chrysler Building	100	48	0	0
City Hall	50	22	0	0
City Zoo	50	14	25	17
CN Tower	80	28	0	0
Coit Tower	30	18	0	0
Colossal Mayor's Statue	100	48	100	48
Community Garden	0	0	40	35
Convention Center	100	32	-50	22
Country Club	0	0	75	27
Courthouse	70	26	0	0
Disease Research Lab	40	20	0	0
Empire State Building	100	48	0	0
Faneuil Hall	20	16	0	0
Farmer's Market	50	22	75	27
Federal Prison	-70	26	-90	30
Fernsehturm	50	22	0	0

NIMBY/YIMBY Effects continued

Structure	Com. NIMBY/ YIMBY Effect	Com. NIMBY/ YIMBY Effect Radius	Res. NIMBY/ YIMBY Effect	Res. NIMBY/ YIMBY Effect Radius
Gateway Arch	50	22	0	0
Gazebo	20	10	40	40
Globe Arena*	45	25	0	0
Grand Central Station*	90	40	0	0
Great Pyramid	70	26	0	0
Guggenheim Museum	70	26	0	0
Hagia Sofia	40	20	0	0
Hollywood Sign	20	16	0	0
Houses of Worship	0	0	80	28
Impressive Mayor's Statue	50	14	50	22
Independence Hall	30	18	0	0
Jefferson Memorial	50	22	0	0
John Hancock Center	90	30	0	0
Landfill	-100	32	-100	32
Large Flower Garden	35	10	85	45
Large Park Green	30	15	75	45
Large Plaza	80	15	35	30
Lincoln Memorial	50	22	0	0
Living Mall	80	20	0	0
Magnificent Mayor's Statue	75	27	75	27
Main Library	50	22	50	22
Major Art Museum	70	26	50	22
Major League Stadium	75	27	-50	20
Mayor's House	100	48	100	48
Mayor's Statue	25	17	25	17
Medium Flower Garden	20	10	70	30
Medium Park Green	20	15	60	30
Medium Playground	0	0	75	25
Medium Plaza	60	15	25	25
Minor League Stadium	50	22	-20	16
Missile Range	-50	22	-100	48

NIMBY/YIMBY Effects continued

Structure	Com. NIMBY/ YIMBY Effect	Com. NIMBY/ YIMBY Effect Radius	Res. NIMBY/ YIMBY Effect	Res. NIMBY/ YIMBY Effect Radius
Movie Studio	50	14	0	0
Open Grass Area	20	10	30	15
Open Paved Area	30	10	10	10
Opera House	50	22	0	0
Palace of Fine Arts	30	18	0	0
Palacio Real	30	18	0	0
Parthenon*	40	20	0	0
Playground	0	0	60	15
Private School	0	0	60	24
Radio Station	25	17	0	0
Ranger Station	0	0	20	80
Resort Hotel	25	17	0	0
Rotes Rathaus	30	18	0	0
Seoul City Hall*	90	30	0	0
Seoul World Cup Stadium*	40	20	0	0
Skateboard Park	0	0	30	60
Small Flower Garden	20	10	60	15
Small Park Green	30	15	50	15
Small Plaza	50	15	25	15
Smith Tower	40	20	0	0
Soccer Field	20	5	30	50
Softball Field	20	5	30	50
Sphinx	20	16	0	0
St. Basil's	60	24	0	0
State Fair	50	14	-25	17
Statue of Liberty	60	24	0	0
Stock Exchange	70	26	0	0
Sungyre-mun*	30	18	0	0
Taj Mahal	60	24	0	0
Television Studio	50	22	-25	17
Temple Expiatoiori de la Sagrada Familia*	30	18	0	0
Tennis Court	0	0	30	30
Tokyo Tower	80	28	0	0
Tourist Trap	50	36	-25	17

NIMBY/YIMBY Effects continued

Structure	Com. NIMBY/ YIMBY Effect	Com. NIMBY/ YIMBY Effect Radius	Res. NIMBY/ YIMBY Effect	Res. NIMBY/ YIMBY Effect Radius
Tower of London	30	18	0	0
Toxic Waste Dump	-60	24	-100	48
U.S. Capitol Building	80	28	0	0
University	50	22	50	22
Washington Monument	40	20	0	0
White House	40	20	0	0
63 Building*	80	28	0	0

NOTE

NIMBY/YIMBY Effects work like pollution in that the effects diminish with distance and are cumulative. The effects of these buildings are strongest near the structure and near zero at the edge of the radius. Clustering these kinds of buildings have the cumulative effect of spreading their effect toward the outer limits of the radii. At maximum saturation, a radius would affect every tile within it at full effect.

How an RCI structure is affected by either/both of these effects depends on its wealth level. The higher the wealth level (in any of the affected developer types), the more dramatic the reaction to NIMBY/YIMBY Effects. High-wealth (including IHT), for example, gains the maximum benefit from a high positive NIMBY/YIMBY Effect, while it suffers more from a negative one.

DISTANCE TO COMMERCIAL OFFICE

Commercial Office and Commercial Service Sims like to cluster in districts with Commercial Office Sims of the same wealth level. The distance between a tract and the closest Commercial Office buildings affects its desirability. The farther away the existing development, the greater the negative effect.

NOTE

This effect is strongest with Co§§§. Land far away from other Co§§§ takes the greatest hit to desirability.

Distance to Co is a negative effect; any distance from Co is too much.

DISTANCE TO RESIDENTIAL

Distance to Residential zones is important to Commercial Service Sims and between the three Residential wealth types.

Commercial Service buildings want to be near their customers (Residential of the same wealth level), so there's a desirability penalty that gets worse with distance. A Commercial zone next to a Residential zone will see zero effect from this factor, while one far away will see a substantial reduction in desirability. The effect is tied to common wealth level, measuring only a given Cs wealth level's distance from the nearest R structures of the same level.

Keep your shops near your shoppers for maximum desirability.

Among Residential Sims, the effect is different and can be a positive factor. Sims like to live near similar Sims. Hence, the desirability of Residential zoned land is increased for a wealth level if there are existing Sims of the same wealth level nearby. Conversely, being close to homes of a different wealth level has a negative desirability effect.

RADIATION

Radiation is a destroyer of desirability. The presence of any radiation reduces desirability of any developer types to 0 for hundreds of thousands of years. Game over.

EDUCATION

Education is important to you, as Mayor, and your Sims.

A combination of coverage and effectiveness determines the quality of education as it relates to desirability. For coverage to be optimal, a tract of land must be within the radii of one fully funded educational building, namely, one of these:

- Elementary School
- Local Branch Library
- High School
- City Museum
- City College
- University
- Major Art Museum
- Main Library

An elaborate school system is required to squeeze out the full desirability enhancement.

NOTE

Being within the range of two identical educational buildings doesn't have any impact on desirability. Their effects are averaged, so it's as if there were only one. Overlapping can be beneficial in high density areas where the number of students is too high for one school.

Every Residential developer type suffers negative desirability if it's not within the reach of an educational building. The amount of this reduction is proportional to wealth level (R§§§ penalize the most).

As educational coverage improves in coverage and effectiveness, the negative desirability effect diminishes and becomes a positive boost. The point at which this changes (the tolerance to subpar education) depends on developer type. So too does the maximum benefit. R§§§ has the lowest tolerance for incomplete education, but appreciates full coverage the most.

SLOPE

For logistical reasons, Industrial buildings dislike being built on slopes. You can zone on slopes (and buildings will develop) but the desirability is decreased. For most Industry, flat is good!

NOTE

Slope is a diminishing positive effect. Desirability to Industry is enhanced if the land is flat, moderately enhanced if it has a medium slope, and is unaffected if it's a steep hill.

TRAFFIC VOLUME

Traffic volume is expressed as the number of trips passing over a given tile of transportation near a zone. This factor doesn't have to be negative.

Commercial Service and Commercial Office receive a positive desirability effect from being near high-traffic Road/Street tiles. More local traffic means more business. The higher traffic is, the bigger the boost (especially for Cs§§§).

Agricultural buildings despise high traffic near them. Local congestion makes it difficult for Agricultural Sims to move their goods around and out of the city. On the upside, IA gets a massive desirability boost if traffic is kept low.

Crowded streets in a Commercial district means business is booming.

Residential Sims don't like it, but not to the degree of their farming kin. Nor do they get excited if the traffic is low; it increases desirability, but not by much.

LONG COMMUTE (TO I OR C)

Residents are concerned with the length of their commutes (known in technical jargon as "trip length"). Commutes are, by definition, from Residential zones to either Industrial or Commercial zones—ordinary Sims driving to work.

If a Sim's route to work is too long because of distance or traffic, he or she will become so frustrated that he or she moves out of your city (see Chapter 19). Short of that, the commute time and Sims' levels of frustration with their commutes affect the desirability of their tracts of land.

The effect of commute length can be positive if it's short to medium, but it becomes more negative as time in the car increases. All Residential wealth levels view commute time equally.

FREIGHT TRIPS (TO NEIGHBOR CONNECTION OR PORT)

Industrial Sims care about the amount of time it takes to ship their goods to a Neighbor Connection, a Seaport, or (to a smaller extent) an Airport.

A short to medium journey increases desirability but a long one lessens it. Delivery time impacts all Industrial types equally.

Keep your Industrial zones near a map edge and run off some road to make a Neighbor Connection to SimNation or (if you've made one) a neighboring city. To complete their trip, Sims need only get to the nearby connection.

DESIRABILITY BY DEVELOPER TYPE

Each developer type has a different desirability profile reflecting the concerns of Sims in that developer type. There's considerable overlap between these categories; managing these gray areas is one of the keys to successful city-building.

RESIDENTIAL DESIRABILITY

Residential Sims like quality of life stuff: schools, low pollution, good healthcare, short commutes, etc. The affinity or aversion to each factor is dictated by wealth level.

Residential desirability is based on:

- Air Pollution (low)
- Crime (low)
- Education (high)
- Garbage (low)
- Healthcare (high)
- Land Value
- Distance to Other Residential
- Res. NIMBY/YIMBY Effect
- Radiation (none)
- Commute Time (short)

COMMERCIAL DESIRABILITY

Commercial Sims like to have lots of customers and be near to them, and dislike pollution (though less so than Residential Sims). The factors for Commercial desirability are based on the kind of Commercial business, and tolerance/value of certain factors is further based on wealth.

COMMERCIAL SERVICE

Because Cs Sims are driven by the number of Residential Sims that walk through their front doors, they are more concerned with being near Residential zones than being among other Commercial zones. Factors that impact their desirability are:

- Air Pollution (low)
- Crime (low)
- Garbage (low)
- Land Value
- Distance to Commercial Office
- Distance to Residential
- Radiation (none)
- Traffic Volume (high)
- Com. NIMBY/YIMBY Effect

COMMERCIAL OFFICE

Co Sims have most of the same concerns as their Cs counterparts, but depend less on customers entering their places of business. They are concerned with being near other Co Sims with whom they do their business. Desirability factors for Co Sims are:

• Air Pollution (low)

• Crime (low)

• Garbage (low)

• Land Value

• Distance to Co

• Radiation (none)

• Traffic Volume (high)

• Com. NIMBY/YIMBY Effect

INDUSTRIAL

Industrial Sims have more idiosyncratic tastes that relate to shipping their products and reducing their business costs. While they generally don't mind pollution (because they create so much of it), certain types are as averse to it as Commercial Sims. For Industrial, it's important to know with what kind of Industry you're dealing.

AGRICULTURE

Agricultural Industry is the most fickle about desirability; your farms will not be drawn to land that doesn't meet their long list of needs. Their tastes revolve around clean air and doing their business without interference from traffic. Desirability factors for farmers include:

• Air Pollution (low)

• Crime (low)

• Garbage (low)

• Land Value (low)

• Traffic Volume (low)

• Freight Trip Length (short, to Neighbor Connection/Seaport/Airport)

• Slope (flat)

DIRTY INDUSTRY

Dirty Industry is dirty. It doesn't care about air pollution or garbage. It does care about getting its goods to where they need to go and cheap building expenses.

- Crime (low)
- Garbage (low)
- Land Value (low)
- Radiation (none)
- Slope (flat)
- Freight Trip Length (short, to Neighbor Connection/Seaport/Airport)

MANUFACTURING INDUSTRY

Manufacturing Industry buildings are cleaner than Dirty Industry, and have more of an aversion to pollution. Only two things really concern them, though: cheap construction (slope) and getting their goods out of town. Their desirability factors reflect this focus:

- Air Pollution (medium-low)
- Crime (low)
- Land Value (moderate)
- Garbage (low)
- Radiation (none)
- Slope (flat)
- Trip Length (short, to Neighbor Connection/Seaport/Airport)

HIGH-TECH INDUSTRY

High-Tech's clean running character and heightened similarity to Commercial Office is reflected in what it finds attractive. Unlike other Industrial Sims, High-Tech Sims hate pollution and like nice views from their windows. Factors that draw them are:

- Air Pollution (low)
- Crime (low)
- Land Value (high)
- Trip Length (short, to Neighbor Connection/Seaport/Airport)
- Res. NIMBY/YIMBY Effect
- Slope (flat)

Desirability Factors (Max/Min Effect) by Developer Type

Factor	R§	R§§	R§§§	Co§§	Co§§§	CS§	Cs§§	Cs§§§	IA	ID	IM	IHT
Air Pollution	25/-25	50/-50	50/-50	25/-25	40/-40	12/-12	25/-25	40/-40	50/-50	0	5/-5	50/-50
CO§§ Proximity	0	0	0	0/-10	0	0	0/-10	0	0	0	0	0
CO§§§ Proximity	0	0	0	0	0/-10	0	0	0/-20	0	0	0	0
Com. NIMBY/YIMBY	0	0	0	20/-20	30/-30	10/-10	20/-20	30/-30	0	0	0	0
Crime	25/-25	50/-50	50/-50	50/-50	50/-50	25/-25	50/-50	50/-50	10/-10	10/-10	25/-25	50/-50
Garbage	25/-25	50/-50	50/-50	50/-50	50/-50	25/-25	50/-50	50/-50	50/-50	5/-5	5/-5	50/-50
Health	5/-5	8/-8	10/-10	0	0	0	0	0	0	0	0	0
Land Value	10/0	10/0	10/0	10/0	10/0	10/0	10/0	10/0	10/0	10/0	10/0	10/0
R§ Proximity	5/0	0/-5	0/-5	0	0	0/-15	0	0	0	0	0	0
R§§ Proximity	0/-5	5/0	0/-5	0	0	0	0/-20	0	0	0	0	0
R§§§ Proximity	0/-5	0/-5	5/0	0	0	0	0	0/-40	0	0	0	0
Radiation	0/-2000	0/-2000	0/-2000	0/-2000	0/-2000	0/-2000	0/-2000	0/-2000	0/-2000	0/-2000	0/-2000	0/-2000
Res. NIMBY/YIMBY	10/-10	24/-24	30/-30	0	0	0	0	0	0	0	0	30/-30
School	10/-10	20/-20	25/-25	0	0	0	0	0	0	0	0	0
Slope	0	0	0	0	0	0	0	0	10/0	10/0	10/0	10/0
Traffic	2/-2	5/-5	10/-10	20/-20	24/-24	20/-20	24/-24	40/-40	50/-50	0	0	0
Trip	10/-10	10/-10	10/-10	0	0	0	0	0	15/-15	15/-15	15/-15	15/-15

DEVELOPMENT

You've analyzed and manipulated demand and selected where you want your zones. Your next task is to look at what develops. To guide this independent process and diagnose problems when zones don't develop, you must understand how Sims decide whether and what to build.

This chapter also discusses how and why structures upgrade, downgrade, and become abandoned.

DEVELOPMENT DEFINED

Development is the process by which *SimCity 4* looks at your zones and decides whether and what to build in them. The process is a complex evaluation that accounts for not only demand, but also desirability and myriad other factors.

TRACTS AND LOTS

Though you'll never see the term used in the game, and never have to deal with them directly, it's important to understand what a "tract" is and how the simulation uses them.

A tract is a chunk of land used by the simulator to evaluate a location. The dimensions of these tracts depend on the purpose for which the simulation is using them.

For development purposes, the simulator breaks down the city map by the simulator into larger blocks of tiles. Tracts are not the same as lots or parcels.

NOTE

A tract can touch more than one lot and a lot can be on more than one tract. You need only worry about lots when playing the game. The discussion of tracts is here to provide hardcore players with the maximum insight.

LOTS ("PARCELIZATION")

Lots (also known as "parcels") are the amalgamations of tiles automatically created within zones. These are the dark-outlined divisions you see in undeveloped zones.

The shape and dimensions of these lots depends on several factors, including zone size, desirability, and potential building size. When you lay out your zones, the simulator examines the desirability of the tract to determine what developer type is likely to build on it. It then looks at the current building stage (discussed later) to see how big a building can be constructed. Finally, it "parcelizes" within the zone to accommodate likely development.

The actual size of the lot is drawn to accommodate likely buildings and the open space and props that come with them. Wealthy Residential Sims require large lots even for small homes, because they need large yards for pools and other luxuries. In Commercial zones, the same is true for large retail stores; they need plenty of parking lot space beyond the actual store building.

Industrial zones don't parcelize per se; they have a maximum size beyond which Streets must be added to permit access to transportation. These structure configurations can change over time without re-parcelization.

The dark-outlined area in the undeveloped zone is a "parcel" or "lot." The size covers several tiles and is based on a prediction about what will develop here.

STAGE LIMITS

The size of buildings that can grow in a city is limited by population or jobs. You can't have a massive skyscraper in a town of only a few thousand people, no matter how desirable it is to Co§§§.

NOTE

The population counts for stage limits are Regional and not limited to one city. This allows you to build several Regional cities, start a new one, and have it develop high stage buildings if the stage limit thresholds have been collectively reached.

For far more detail on this, see Chapter 25.

What prevents this overbuilding is called a "stage limit." Stage limits are population/job thresholds that must be reached before a stage of construction is possible. Until you reach that figure, you're limited to building sizes of your current stage.

STAGE LIMITS AND DENSITY

Density doesn't play a role in *SimCity 4*, though you still zone for both type and density. Much of what veteran *SimCity* players think of as density has now been absorbed into stage limits. Zoning density corresponds to stage limits thus:

- Low: Stages 1–3
- Medium: Stages 4–6
- High: Stages 7–8

Dirty, Manufacturing, and High-Tech Industry, by contrast, have only three stage levels and two densities (medium and high):

- Medium: Stages 1–2
- High: Stage 3

TIP

It takes a while to reach the stage limit for Industry. You won't get any Stage 3 buildings for a long time, so there's no point in zoning High Density for several years.

NOTE

If you've purchased *SimCity 4 Deluxe* or have installed the *Rush Hour* expansion pack, there is a slight change in Stage Limits. The tables below will continue to apply to all developer types except R§, Cs§, and ID, allowing these low wealth types to develop the largest (Stage 8) buildings much earlier. See Part 8 for full details.

Every developer type has a slate of buildings that are divided into stages by size (eight stages for Commercial Office and Residential, eight stages for Commercial Service, and three stages for Industrial). When you reach a stage, Sims can construct buildings of any size up to and including the maximum stage (limited by a fixed distribution shown in the tables here).

The population thresholds we're discussing are specific to each developer type. In other words, you can have a massive Residential population but you won't build swanky high-rise apartment buildings until your R§§§ population grows.

You see buildings like these only if your Residential populations are *very high*.

For each developer type population, the tables below display the population thresholds and the stage limit percentages at each threshold. For example, if you have R§ population of 1,200, no building can grow above Stage 4.

Buildings for that developer type are limited to the specified percentages and the developer simulation works to maintain the balance. For instance, when you cross the R§ 857 population threshold, your Stage 1 percentage should be 45—too high for the new threshold. Until that drops to 30 percent, no more Stage 1 buildings will be constructed. Until the requisite balance (30/45/25) is established, only Stage 2 and 3 buildings will be constructed.

Residential/Commercial Office Stage Limits

Stage	0	300	390	507	659	857	1,114	1,448	1,882	2,447	3,181	4,135	5,376
1	100%	95%	80%	60%	45%	30%	27%	24%	21%	17%	14%	12%	10%
2	—	5%	20%	35%	40%	45%	40%	36%	33%	30%	26%	23%	20%
3	—	—	—	5%	15%	25%	28%	30%	32%	35%	33%	31%	28%
4	—	—	—	—	—	—	5%	10%	14%	18%	23%	27%	32%
5	—	—	—	—	—	—	—	—	—	—	4%	7%	10%
6	—	—	—	—	—	—	—	—	—	—	—	—	—
7	—	—	—	—	—	—	—	—	—	—	—	—	—
8	—	—	—	—	—	—	—	—	—	—	—	—	—

Commercial Service Stage Limits

Stage	0	300	390	507	659	857	1,114	1,448	1,882	2,447	3,181	4,135	5,376
1	100%	95%	92%	89%	86%	83%	80%	77%	74%	71%	68%	66%	64%
2	—	5%	8%	10%	12%	14%	16%	17%	18%	19%	20%	20%	20%
3	—	—	—	1%	2%	3%	3%	4%	4%	5%	5%	6%	6%
4	—	—	—	—	—	—	1%	2%	3%	3%	4%	4%	5%
5	—	—	—	—	—	—	—	—	1%	2%	3%	4%	4%
6	—	—	—	—	—	—	—	—	—	—	—	—	1%
7	—	—	—	—	—	—	—	—	—	—	—	—	—
8	—	—	—	—	—	—	—	—	—	—	—	—	—

Industrial Stage Limits

Stage	0	300	390	507	659	857	1,114	1,448	1,882	2,447	3,181	4,135	5,376
1	100%	99%	98%	97%	96%	94%	91%	89%	86%	83%	79%	75%	71%
2	—	1%	2%	3%	4%	6%	9%	11%	14%	16%	19%	21%	22%
3	—		—		—		—		1%	2%	4%	7%

NOTE

You can find developer type–specific population in the Jobs and Pop Graph.

6,989	9,086	11,812	15,356	19,963	25,952	33,738	43,859	57,017	74,122	96,359	125,267
9%	8%	7%	6%	5%	4%	3%	2%	2%	1%	1%	1%
17%	15%	13%	11%	9%	8%	7%	5%	4%	3%	2%	2%
25%	21%	18%	15%	12%	10%	8%	7%	6%	5%	5%	5%
36%	39%	37%	34%	32%	28%	26%	22%	19%	16%	13%	10%
13%	14%	19%	24%	27%	30%	27%	24%	22%	19%	17%	15%
—	3%	6%	10%	15%	18%	24%	27%	25%	24%	21%	18%
—	—	—	—	—	2%	5%	11%	16%	21%	25%	29%
—	—	—	—	—	—	—	2%	6%	11%	16%	20%

6,989	9,086	11,812	15,356	19,963	25,952	33,738	43,859	57,017	74,122	96,359	125,267
62%	60%	58%	56%	54%	52%	50%	48%	46%	44%	42%	40%
19%	19%	18%	18%	17%	16%	16%	17%	14%	14%	14%	15%
7%	7%	8%	8%	8%	9%	9%	9%	10%	10%	10%	10%
5%	6%	6%	7%	7%	8%	8%	8%	9%	9%	9%	9%
5%	5%	6%	6%	7%	7%	7%	7%	8%	8%	8%	8%
2%	3%	4%	4%	5%	5%	6%	6%	6%	7%	7%	7%
—	—	—	1%	2%	3%	4%	4%	5%	5%	6%	6%
—	—	—	—	—	—	—	1%	2%	3%	4%	5%

6,989	9,086	11,812	15,356	19,963	25,952	33,738	43,859	57,017	74,122	96,359	125,267
66%	61%	56%	50%	44%	37%	31%	23%	16%	8%	7%	7%
23%	24%	25%	26%	27%	29%	29%	32%	33%	35%	29%	23%
11%	15%	19%	24%	29%	34%	40%	45%	51%	57%	64%	70%

How is this useful to you in the game? Tall buildings are handy so you can have a larger population in the same space (higher density), allowing you to grow without providing new municipal structures.

TIP

If all your new development is small buildings, you haven't passed the next stage limit that allows for larger structures. The remedy: zone more to build population. In other words, build out to build up!

What if you have plenty of buildings and demand is high but you're not seeing higher-stage structures? Chances are the occupancy of those buildings is low (due to declining desirability). To increase your population without new zoning, increase the desirability of your existing structures.

STAGE CAPS

Stage caps are limitations that prevent advancement to a new building stage even if population is otherwise sufficient.

WATER SUPPLY

Development can occur without a water supply system because small low- and medium-wealth buildings can use well water. Beyond these levels, nothing grows without a water infrastructure.

NOTE

Agricultural buildings never need water because theirs is provided by self-built irrigation systems.

Water supply is a stage cap. Each developer type has a stage beyond which it can't go without water supply.

- R§: Stage 3
- R§§: Stage 3
- R§§§: No Development
- Cs§: Stage 3
- Cs§§: Stage 3
- Cs§§§: No Development
- Co§§: Stage 3
- Co§§§: No Development
- IA: Stage 3
- ID: Stage 1
- IM: Stage 1
- IHT: No Development

An unwatered zone sprouts only these small buildings. If you have bigger ambitions, run some pipes to them.

TIP

Though lack of water supply isn't a block to low-level development, it increases flammability of any unwatered structures.

When a building has city-supplied water and it grows beyond the water supply stage cap, it reacts to a cut-off of water with eventual abandonment.

To determine if a building is watered, look for a no-water zot, call up its Query box, or consult the Water Data View.

POWER SUPPLY

Power supply is a stage cap too, but unlike water it's a total block to development. No building of any developer type can develop without a power supply.

In *SimCity 4*, there must be at least one source of power within five tiles of a tract. Power sources include:

1. A Power Plant

2. A Power Line

3. A powered building or utility structure (e.g., Water Pump)

4. A powered zone

To see if a zone is powered, consult the Power Data View. If a structure loses its power, it displays a no-power zot and is abandoned in six months.

Power doesn't have to be conveyed by a Power Line. It can come to a civic building, such as this Fire Station, or from a neighboring zone via their underground power networks.

ROAD ACCESS

Though not literally a stage cap, lack of Road or Street access is a block to development: No building will develop on a zone without immediate Road/Street access.

To qualify for development, at least one side of lot must touch either a Road or Street. Additionally, for Residential, the Road/Street in question must lead to a job (Commercial, Industrial, or civic). If the Road goes nowhere or only touches other Residential zones, it does not qualify.

When zoning, Streets are drawn automatically to give each lot transportation access. This auto-drawing should make transportation a non-issue,

A landlocked lot will never develop unless you provide vehicular access.

but it occasionally leaves isolated lots without access. In this case, you must manually draw the Street out to the disconnected lot.

The seeming exception to the transportation rule is Industrial zones. Buildings develop within blocks of Industrial zoning, even if the building does not touch a Road/Street. This is because Industrial lots are much larger than Residential or Commercial ones. As such, buildings on the inside of these large parcels find access to nearby Roads/Streets from within (via service Roads between adjoining buildings). Also, many of the buildings you see in Industrial zones are outbuildings of the main structures.

SLOPE

The slope of land can act as a gradual stage cap; the steeper land is, the less likely something large will develop on it. Though the land may not be too steep to zone, there is no guarantee that all stages of the developer type will be able to construct something.

Though you can zone it, there's no guarantee that that slope will permit any available building.

DEVELOPMENT ORDER OF OPERATIONS

On any given day, the simulation follows a series of steps to determine where and what to develop. Understanding this progression gives you valuable insight into how to guide this process with your choices.

STEP 1: CHOOSE DEVELOPER TYPE

The simulation begins by choosing a developer type. The process is not random, as developer types with high demand are more likely to be chosen. To be eligible for selection, the developer type must have positive demand.

STEP 2: RANK BY DESIRABILITY

The simulation ranks appropriately zoned tracts (R, C, or I) in order of desirability to the chosen developer type. If the chosen developer type was Cs§§, all C-zoned tracts would be ranked by their desirability to Cs§§.

To qualify, a tract must have a desirability of at least 50.

STEP 3: TRY TO BUILD

When a tract is chosen, several issues arise, any of which could cause the simulator to give up on the chosen tract and try the next one on its list. These include:

ZONE COMPATIBILITY

You can't build a Residential building on a Commercial lot, but a chosen tract could have among its 16 tiles more than one zone type. If nothing can be built on the tiles of the correct zone type, the tract is not developed.

DISPLACEMENT OF CURRENT RESIDENTS

In *SimCity 4*, the development system is geared around maximizing usage of existing structures. This can mean looking to move the chosen developer type into already inhabited buildings on the selected tract before building new ones.

If a chosen tract contains an occupant of a given wealth level, the current occupants can be supplanted only if the chosen developer type is wealthier.

- R§§ can displace R§
- R§§§ can displace R§§ or R§
- Cs§§ can displace Cs§
- Cs§§§ can displace Cs§§, Cs§, or Co§§
- Co§§ can displace Cs§
- Co§§§ can displace Co§§, Cs§§, or Cs§
- IM can displace ID
- IHT can displace IM or ID

ROAD AND JOB ACCESS

As discussed previously, every lot must have access to a Road or Street before it can be developed.

Residential Sims have an additional requirement, they must be able to use those Roads to get to a job. This means two things:

- The Road must connect to at least one Commercial or Industrial zone.
- The Road must connect to available jobs. This means that the Sim must be able to find a job within a tolerable distance traveling from the selected tract. If there are no open jobs, the tract will be passed by.

REOCCUPY VACATED BUILDINGS

The simulator tries to re-inhabit abandoned buildings rather than demolishing them and building something new or starting fresh in an empty lot.

CHOOSE AN APPROPRIATELY SIZED LOT

Within a tract, the simulator chooses the best lot for the chosen developer type. If necessary, it will redraw the dimensions of the lot to be larger (aggregation) or smaller (subdivision).

In some cases, a superceded house (or houses) will be demolished to make way for larger or smaller lots.

CHOOSE THE BUILDING SIZE — STAGE LIMITS

In this phase stage limits come into play.

The current population dictates which building stage will be constructed. The simulator selects the largest size permitted under the stage limit. This choice is guided by the stage proportions, as the correct balance between sizes must be maintained. For example, if there are already the maximum percentage of Stage 3 houses and not enough Stage 2, a Stage 2 building will be developed.

In the case of redevelopment, an existing structure won't be demolished unless it can be replaced by a higher stage building. You cannot change a building to another building of the same stage. There is one exception, however: If the new building is to be a wealthier developer type, then demolition can occur.

STAGE CAPS

We have a location selected and we have a building. The only thing standing between us and development are the stage caps. If one of them trumps the selected building, a lower stage alternative must be found or the tract will be rejected.

Slope issues and the water and power supply are considered at this point. If the tract is permitted by the stage caps to build at the chosen stage, construction can begin.

If for example, the chosen building is a Stage 4 Residential building, the tract must have water service. If any of the applicable stage caps prevent development, the simulator moves on to the next tract on its list and we begin again.

ABANDONMENT

If things go south for a building, it becomes abandoned. Several things can cause this—some preventable, some not.

If you see large-scale abandonment, pause the city and look for the cause. Abandonment is ugly, dangerous, and expensive:

An abandoned building is black and screams "eyesore."

• Abandoned properties don't pay taxes, no matter how valuable they are.

• Abandoned properties have 50 percent higher flammability, raising their potential for fire.

NO WATER

If a structure above the applicable stage cap has its water cut off, it will be abandoned in *six months* if you don't restore it.

There are several ways to know if this has occurred. First, your advisors inform you that part of your city is without water. Unfortunately, they do this even if the dry portions are inhabited by structures that don't care about water service.

More helpful is the appearance of no-water zots above aggrieved buildings. If you see these indicators, you know the clock is ticking on that Sim's tenure in your town.

If you have trouble finding where water problems are, check the Water Data View.

NO POWER

If power is cut off to any RCI building, it will be abandoned in *six months* if power is not restored.

Power outages can be caused when you demolish a building's source or conveyor of power. If a zone is powered by proximity to a municipal building and you demolish it, the zone is left without power. Wait too long and the residents will depart.

Power sources can also be removed other ways. They can be destroyed unintentionally by unextinguished fire. Power Plants explode when they reach their maximum lifespan; plan ahead to avoid massive blackouts.

Finally, if your Power Plant is running over capacity, it institutes rolling blackouts to stay under its maximum. This means that parts of your city will be intentionally shut off for periods of time. If these blackouts are too pervasive, abandonment can result.

Your advisors will inform you if part of your city goes dark. To locate the precise affected areas, consult your Power Data map.

You can also look for no-power zots above affected buildings. When these appear, you have six months to restore power before abandonment.

NO ROAD ACCESS

Without Road/Street access, a lot can't develop. After it develops, it must keep that connection to survive. If you remove the Road or isolate it so that it leads nowhere, the lot will be in danger of abandonment.

When this situation occurs, a no-road-access zot appears over the affected lot. When it appears, you have two months to restore the Road before the occupants abandon the lot.

NO JOB

If a Residential Sim can't find an open job, he gets fed up with your city's economy. If there is no open job in the city or in neighboring cities, the Sim returns home in defeat.

When this happens, a no-job zot appears above affected houses, informing you that the Sim will abandon in *six months* if the economy isn't improved.

Job shortages can occur if Industrial/Commercial buildings abandon for some reason (removing jobs from the supply completely) or if there is high demand for Industrial and Commercial but you don't create any new zones.

The no-job zot is your alert to a problem. It could be a matter of traffic, or it could be a sign of serious economic problems.

A more subtle cause of job shortages occurs if desirability among your Industrial and Commercial drops, causing occupancy to drop. Lower occupancy means fewer jobs although the buildings for those jobs exist.

> **NOTE**
> Whatever the cause, keeping your Sims employed is crucial to success. Joblessness not only causes abandonment, but it also increases crime. See Chapter 15 for more information.

NEGATIVE DEMAND

Negative demand is the silent killer. You may not know why it's happening (especially if only one of your developer types goes negative while the others are high enough to keep the overall rating above zero), but your zones will be abandoned and dark.

Keep a close eye on demand, especially in the detailed RCI Demand Graph, to catch these problems before they start.

PART 4: CITY MANAGEMENT 101

Two things are absolutely, inarguably essential to your success as a leader of your city: information and money. Your ability to find both and extract them from unconventional places will serve you well and speed your progress toward glory.

This section focuses on those two crucial elements, describing how it all works and what you can do to make it work for you.

In this section, we'll cover:

- Chapter 12: Getting Information
- Chapter 13: Budget and Finance

Chapter 12 also includes a section on the new My Sims Mode that tells you exactly what your citizens are thinking.

GETTING INFORMATION

A Mayor is only as good as the information available to him or her. Actually, what matters even more is for the Mayor to know what to do with that information. This chapter tells you where to find all the information you need and what it all means.

NOTE

SimCity 4 Deluxe and the *Rush Hour* expansion pack offer many new information sources, revised and expanded graphs and data views, and a bevy of new abilities for My Sims. Consult Part 8 to get the lowdown.

VISUAL CLUES (TAKING IT TO THE STREET)

You'll often read how important it is to think locally in *SimCity 4*. It's so important that you could conceivably use your eyes and ears to provide most of the information you get from the other information sources outlined here.

A good Mayor, therefore, doesn't just sit in her office looking at graphs; she ventures out to check out her neighborhoods and look at how things are going. When you spot something out of the ordinary and know what it means, you can then check out your graphs or Data Views to get to the bottom of the problem.

It's easy to see that this neighborhood's a playground of the rich.

Here is a brief list of the kind of things you can tell just by looking around at close zoom. This list is far from inclusive, as we could write an entire book about the various visual clues available.

- For Sale Sign: if you see one of these on a front lawn, it means the occupants are prepared to move unless you change something. It's often a good idea to query or drop a My Sim into such a house to learn what the precise problem is.

- Blackened Appearance: If a structure looks blackened, it's referred to as "distressed." If it's *pitch black* it means the building's been abandoned. Abandonment can be a sign of many things, but the most common is that Desirability for this structure's developer type has dried up. Landmarks and Rewards can also appear distressed due to reduced funding. Abandoned buildings have heightened flammability and are ripe targets for arsonists.

- Strikers: Strikers outside a civic building mean, not surprisingly, that the applicable department is on strike (thanks to excessive Mayoral belt-tightening). Restore full funding to end the strike.

- Garbage: Piles of garbage or cardboard boxes amassing in your city indicates that your garbage collection facilities are full. Expand capacity or make a Neighbor Deal to provide somewhere to put all the trash.

- The "dirtiness" of Industrial buildings: This tells you what industries are popular in your city. Dirty Industry structures look dirty. Manufacturing buildings have fewer and smaller smokestacks and are better scrubbed, though hardly gleaming. High-Tech buildings look clean enough to eat off of.

- Crime Evidence: If you see a chalk body outline on a lot, it means crime is high in that area. It doesn't mean someone was killed, just stunned. Other indicators of high crime rate include stripped cars and graffiti.

- Traffic Congestion: If the streets look crowded, they are. You can confirm your observations by checking for congested areas in the Traffic Data View.

- Sparking Power Lines or Distressed Pipes: If you've reduced utility department funding enough, these network elements will begin to look worse for wear. Let them stay this way and you'll have a mini-Disaster on your hands.

- Distressed Power Plant: A blackened plant is near the end of its life. Replace it soon (or reduce usage of it) or risk an explosion.

- Yellow Smog: A cloud of yellow smog visible from high zoom levels indicates high air pollution.

- Sidewalk: The sidewalk outside a property reflects its wealth level. Palm trees, for example, signal high wealth.

- Crowds: Look at transportation stations for the amount of human traffic around them. If people are standing in line, the station may be too heavily used.

- Lot Size: Especially in low-density Residential areas, lot size is a reflection of wealth level.

- Landscaping: The "quality" of a structure's landscaping reflects wealth level.

LOT PROPS

Look at any RCI building in your city and you'll see two things: a building and an array of things placed on the lot and sometimes on the building. These things are called "props," and they help to communicate the wealth level of the occupants.

A Residential neighborhood may start out as middle class or wealthy, but changing times may force the original occupants out and poorer ones in. The current wealth can be reflected by the car in the driveway or the amenities in the back yard (such as swimming pool, trampoline, cars on the lawn, etc.). Many are just for decoration, but some are clues to see what's going on "inside" the homes. For example, if a large, expensive-looking house has a junker car in the driveway, it means that lower wealth residents have moved in.

In Commercial zones, many shops are just shells that can be inhabited by businesses of any wealth level. This wealth level (and the nature of the business) is reflected in the storefront; the nicer it looks, the more high-end the business. The quality of this shell reflects the ambitions and wealth of the original occupant. Look to the storefronts and distressed texture to understand the current state of local affairs.

The props in Industrial zones reflect the kind of Industry going on. Chemical tanks and smokestacks are, for instance, clear signs of Dirty Industry. Nice landscaping is surely a sign of High-Tech Industry.

The car in the driveway is a good clue as to how wealthy the owners are.

If things change, this same store structure could be a pawnshop or become a pricey boutique.

ZOTS

Zots are icons that hover over houses when there's a serious problem. Once these appear, you have only a few months to fix the inhabitants' problem before they pack up and move to another city.

You'll see several zots:

- Water Drop: Property lacks water service. This zot appears only over structures that *require* water service.

- Lightning Bolt: Structure lacks power. If rolling blackouts are instituted, large blocks of these zots shift around your city.

The zots call your attention to problems and identify the general cause. Resolve these quickly before Sims start to abandon their buildings.

- Briefcase: Occupant can't find a job. This can be due to shortages of jobs in Commercial or Industrial zones or can be a reflection of excessive traffic (there are jobs but Sim can't get to any of them in a tolerable time).

- Car: Property has no Road connection.

POP-UPS

Merely pointing at a building (or almost anything else in your city) with the Query tool turned on will, after a brief pause, bring up a pop-up bubble showing (at the very least) what the thing is.

For RCI, civic, utility, Landmarks, Rewards, transportation, or other important buildings, the pop-up is more detailed (though not as detailed as the Query box).

What the heck is that? Oh, that's what that is.

QUERY TOOL

The Query tool is your most productive source of accurate and precise information. Simply activate it and click on anything you want to know about; if it generates a Query box, you'll see a long slate of facts that can be very illuminating.

What you see when you apply the Query tool to a building depends on what kind of building it is.

RCI BUILDINGS

Residential, Commercial, and Industrial buildings each have different entries in their Query tools but the kinds of information are the same.

Each RCI query has two parts: vital factors (above the line) and desirability factors (below the line).

The query for RCI buildings gives you an open window on the property's desirability.

VITAL FACTORS

The items that appear above the line that divides the Query tool are the properties' vital statistics, factors that allow them to function.

These are:

- Current Jobs (Industrial and Commercial)/Current Occupancy (Residential): Reflection of citywide demand. If Job/Occupancy numbers are low compared to their full capacity, then the property is suffering from low desirability. If the actual occupancy number (to the left of the "/") is below 30 percent, the building has been abandoned.

- Wealth: Indicates the developer type of the structure (see Chapter 7) and is represented by a number of § signs (§=low, §§=medium, §§§=high). For Residential and Commercial structures, if the wealth indicator contains any grayed-out § signs, it means that the structure is of one wealth level but (due to a downturn in circumstances) its current inhabitants are of a lower level. In the case of most Industry, buildings don't change wealth levels (§=ID, §§=IM, §§§=IHT).

- Mayor Approval (Residential Only): Indicates the property's current Mayor Rating.

- Powered: Indicates whether the property has power.

- Watered: Indicates whether the property has water.

DESIRABILITY FACTORS

The factors listed here are some (but not all) of the factors that enter into a lot's desirability.

CROSS-REFERENCE
Find a full discussion of all desirability factors, including those not listed in the Query box, in Chapter 10.

This information can help you diagnose and pinpoint problems with your city and find ways to improve desirability of underperforming areas. The factors include:

- Commute (Res.): Trip time for Residential Sims to reach open jobs. The longer the commute, the less desirable the lot.

- Crime (All): The number of crimes committed in vicinity of the lot. The higher the crime, the less desirable the lot.

- Customers (Com.): A reflection of the volume of traffic that passes the lot. The higher the rating, the more desirable the lot.

- Freight Trips (Ind.): Trip time for Industrial Sims to reach a connection to a neighbor city (or SimNation) including Road, Rail, or Highway connections or a Seaport. The longer the trip, the less desirable the lot.

- Garbage (All): The amount of uncollected garbage piled on the property. This should occur only if there's a shortage in garbage collection capacity. The greater the amount of piled garbage, the less desirable the lot.

- Hospital Grade (Res.): The collective grades of all healthcare buildings that include the lot in their radii. The higher the grade, the more desirable the lot.

- Pollution (All): Total air pollution for the lot. The higher the number, the less desirable the lot (except for Dirty Industrial structures, which don't care about pollution).

- School Grade (Res.): The collective grades of all educational buildings that include the lot in their radii. The higher the grade, the more desirable the lot.

- Traffic Noise (Res.): A reflection of the volume of traffic that passes the lot. The higher the volume, the less desirable the lot.

CIVIC BUILDINGS

Civic buildings show several common elements in their Query boxes. These help you read the status and quality of the services you provide your Sims.

Civic buildings can be examined quite closely in their Query boxes and you can even adjust their local funding.

- Condition (Jail): Ratio of inmates to cells.

- Effectiveness (Fire, Police): A reflection of local funding as it compares to optimum (100 percent) funding. The lower the level of funding, the lower the efficiency.

- Grade (Education, Health): Grade is a representation of an educational or health structure's efficiency. In all cases, this is a ratio of the structure's usage to its capacity. In the case of schools, for example, this is the ratio of students to capacity. For healthcare, it's the ratio of patients to patient capacity. For libraries, it's the ratio of books checked out to books in collection.

- Inmates: Prisoners in a Jail facility.

- Local Bus/Ambulance Funding: Money that's currently being expended to expand or contract the radius of a school or healthcare facility. Changing this slider dynamically changes both the information in the Query box and the radius of the structure being altered.

- Monthly Maintenance Cost: Cost to run the structure monthly.

- Number of Arrests: Reflection of the relative effectiveness of police coverage within a Police Station's area of effect. The greater the protection level (enhanced by overlapping precincts) the higher the ratio of arrests to crimes.

- Number of Books Checked Out (Library): Number of Sims in schools from the library's applicable ages.

- Number of Books in Collection (Library): Capacity of a library. Can be raised by increasing funding.

- Number of Crimes: Dictated by the number of crimes that occur within a Police Station's area of protection.

- Number of Cells: Prisoner capacity.

- Number of Doctors (Health): Proportional to Local Funding level.

- Number of Exhibit Tickets Available (Museum): Capacity of a museum. Can be raised by increasing funding.

- Number of Exhibits (Museums): Proportional to Local Funding level.

- Number of Patrol Cars/Engines (Police, Fire): The number of dispatches from the station.

- Number of Teachers/Professors: Proportional to Local Funding level.

- Number of Visitors (Museum): Number of Sims citywide in applicable age group.

UTILITY BUILDINGS

Power, water, and trash collection structures have several Query categories that allow you to see what kind of stress your utilities are under so you can adjust their funding appropriately.

- Actual Capacity: The amount of available capacity based on funding and building condition.

- Capacity Used: Ratio of Power/Water Used to Actual Capacity. The higher this is, the faster the building will age and the lower its efficiency.

- Citywide Trash Recycled: Intake of a Recycling Center.

Querying utilities gives you an idea of how much power, water, or garbage collection help your city needs and how long your current system can handle it.

- Cost per Megawatt Hour/Cubic Meter: Cost to produce one unit of power or water. The lower the efficiency, the higher the cost per unit.

- Efficiency: Reflects funding level and Plant Condition.

- Local Funding: Monthly cost of running the structure. For many structures, this can be adjusted individually or departmentally. Reducing funding reduces building's Actual Capacity (and therefore raises its Capacity Used percentage).

- Max Capacity: The maximum power or water supply or garbage intake a building can provide. This is inherent to the structure.

- Monthly Service Cost: Monthly budget amount for Landfills. Can be altered only by department-wide funding adjustments.

- Net Trash This Month: Amount of trash intake for Landfill.

- Plant Condition: Related to the building's age. Condition can be reduced faster by running the building over capacity. Expressed as a percentage of useful life; 100 percent is brand new, 1 percent is about to die.

- Power/Water Used: The building's share of citywide demand for its product. Factors into Capacity Used.

- Powered: Water and garbage structures (though not Landfills) require power. If they don't have power, they don't supply water.

- Trash Incinerated: Amount of trash intake for a Waste to Energy Plant.

- Water Pollution: Reflects water pollution near a water supply structure. Excessive pollution can completely shut down a Water Pump or Tower.

TRANSPORTATION BUILDINGS

One of the best ways to take your transportation infrastructure's temperature is to Query buildings associated with it.

TIP

Small transit stations can be hard to find. Activate the Traffic Data map and all transportation buildings will be illuminated in bright green.

Check each station periodically to see what kind of load it's bearing. If it's too heavy, you'll have to add new structures.

- Actual Usage: Number of passengers actually using the structure to access transportation.

- Air/Water Pollution Produced: Fixed amount of pollution produced by the structure regardless of usage.

- Capacity Used: Ratio of Actual Usage (passengers) to Max Capacity.

- Global Funding: Funding level of entire Mass Transit budget.

- Max Capacity: Number of monthly passengers the structure can accommodate.

- Monthly Maintenance Cost: Operation cost inherent to building but adjustable by changes to mass transit budget.

- Service Quality: Reflects Capacity Used. The closer to full capacity a building is, the lower its Service Quality.

NOTE

Many buildings, especially Rewards, have humorous items in their Query boxes. These are, by and large, a reflection of local Mayor Rating. There are more precise ways to determine that, so these stats don't really tell you much; they do offer more than a few giggles though.

DATA VIEWS

Queries give you a view of how things are going on a very localized level. As you'll see, graphs are your main resource for citywide trends. Very often, however, it's imperative that you have a way to see local effects as they relate to your entire city. That's what the 17 Data Views are for: combining the big and little pictures.

Each Data View does three things. First, it superimposes color-coding schemes onto your city that reflect various localized statistics. Second, it displays (where applicable) the location and radii of effect for various civic buildings (fire, hospitals, schools, etc.). Third, it provides a smaller color-coded map (accessible by clicking on the Expand button in the top right corner of the Data Views menu) that provides color-coding legend and even greater detail and a complete city-wide perspective.

NOTE

Most Data Views update in real time, so you can crank up the speed and watch things change. If you're paused, however, changes won't show until you resume the simulation.

Right-clicking on a Data View map toggles the underlying map of your city, leaving only the color-coded overlay.

Data Views show how every part of your city is doing in each category. This view helps you spy trouble spots and lets you step back and see the whole picture.
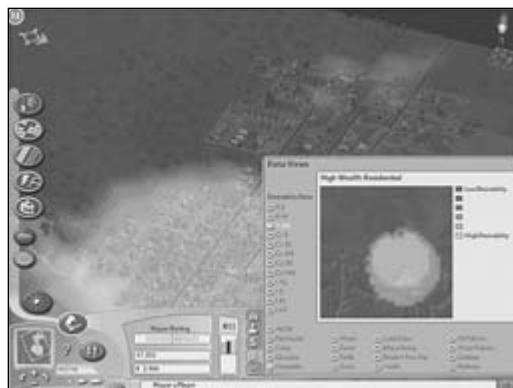
The Detail map for each Data View shows both a summary view of your entire city and the legend detailing what each color means.

THE DATA VIEWS

• Fire Hazard: Displays flammability on a scale of low to high. It also shows the location and area of effect of every Fire Station.

• Crime: Shows Police Station coverage areas, areas of historical crime activity (ranging from yellow to red to indicate the frequency and severity of recent crime activity), and the location and kind of all crimes being committed at the moment. The more crimes you see and the more serious they are (petty crimes are at the top of the list, heinous crimes at the bottom), the worse your crime is.

The Crime Data View shows crimes in progress. Click on their location to see them happen.

WATCHING CRIMES: BE AN INNOCENT BYSTANDER

To see an actual crime in progress:

1. Zoom in as close as you can.

2. Open the Crime Data View and the Detail map.

3. Make sure the simulation is running and watch the map until the crimes change.

4. When the new month's crimes are posted, quickly pick one and click on it. This takes you to the scene.

5. Turn off the Data Views so you can see the action without the color overlay.

6. Watch the sidewalks.

• Education: Shows educational building coverage areas and the levels of Educational Quotient (from low to high) in all your Residential zones.

• Desirability: Displays desirability for each of the 12 developer types (see Chapter 10) everywhere in your city, both zoned areas and unzoned terrain. For the selected developer type, areas of high desirability are intense green and low desirability areas are bright red.

• Water: Shows water "coverage" (water radiated from pipes and water structures), structures with and without water service, and your network of pipes. Check periodically, especially after a disaster.

- Power: Shows location of Power Plants and powered or unpowered buildings. Bring this up while laying Power Lines.

- Traffic: Easily find areas of high traffic congestion with this color-coded view of your Road, Rail, and Highway networks.

- Zones: Temporarily collapse all your RCI buildings and see how areas are zoned. It can be hard to tell any other way, unless you are pretty familiar with the various buildings types.

- Land Value: Specifies land with high land value (typically high-elevation or shore-line). This is important only because land value contributes to desirability (though not necessarily *high* land value. See Chapter 10 for more detail).

- Mayor Rating: Find where you're loved the most in all of your city's Residential neighborhoods. Pay attention to large red areas; these are riots waiting to happen.

- Resident Average Age: Highlights the average ages of Sims in your Residential zones. This is important information for effective placement and funding of schools. Every school has an age profile that indicates which age groups benefit most from its effects, so place schools where they can do the most good. Running an Elementary School at full capacity in an intensely blue (old) area on the map, for example, would be a waste of resources.

- Health: Displays location of healthcare buildings and their area of effect and the Health Quotient level in all of your Residential neighborhoods.

- Air Pollution: Shows the reach and intensity of air pollution. Keep your pollution-sensitive zones away from any areas that come up on this map.

- Water Pollution: Shows the reach and intensity of water pollution. Keep your pollution-sensitive zones and water supply buildings away from any areas that come up on this map.

- Garbage: Displays the location of Landfills and other Garbage Collection buildings. If your garbage system is over capacity, the view also shows where and how much the garbage is piling up.

- Radiation: If anything in your city is emitting radiation, this view shows its location and area of effect. You'll see something on this map only if you have the Toxic Waste Dump or suffer a Nuclear Power Plant explosion.

NOTE

The biggest change in the data views and graphs in the *Rush Hour* expansion pack are not surprisingly in the area of traffic and transportation. The Traffic Data View has several new features, showing both congestion and volume (by traffic type). The Traffic Volume Graph is a new feature providing even greater insight than the existing Commute Time Graph.

GRAPHS

When it's the big picture you want to see, dig deep into your graphs.

The graphs are the best source for seeing the big trends. Learn to read them and they'll all provide valuable insight.

TIP
Take the averaged graph categories here with a grain of salt. In *SimCity 4*, spending time worrying about averages can blind you to vastly more important localized problems.

Most of these are line graphs displaying trends over time. The time scale can be changed from as short as one year to as vast as 500 years.

- Crime: Plots the number of crimes and the number of arrests. The height of the crime line shows how bad your crime problem is and the height of the arrest line shows how effective your police coverage is. If the lines are together, it means that your crime problem is totally under control.

- Commute Time: The average commute time for all of your Residential Sims or average citywide traffic condition.

- Power (Capacity vs. Usage): Plots capacity versus usage. When the lines converge, you're about to have a problem that only a new Power Plant, an increase in plant funding, or a Neighbor Deal can fix.

- Water (Capacity vs. Usage): Plots capacity versus usage. When the lines converge, you're about to have a problem that only new water supply buildings (or a Neighbor Deal) can fix.

- Air Pollution: Displays the level of air pollution citywide. As long as it's locally contained, the global amount doesn't really matter.

- Jobs and Population: Displays the number of Residential Sims in each of the three wealth levels and the number of jobs in each of the Commercial and Industrial developer types. Beware downward trending in jobs; it spells trouble.

- Water Pollution: Displays the level of water pollution citywide. As long as it's locally contained, the global amount doesn't really matter.

- Garbage (Capacity vs. Usage): Plots garbage disposal capacity against total garbage produced in the city. When the lines converge, you need to do something about the trash.

- Education (EQ): Average EQ level of your entire Residential population.

- Education by Age: A bar graph showing *current* EQ of specific 10-year age groups. This helps you interpret how effectively your schools are doing their job.

- Population by Age: A bar graph showing how old your population is (by 10-year groups). This can help in evaluating your educational system—whether you should devote more resources to libraries and museums for your older populace, or more for Elementary and High Schools for a younger populace.

- Life Expectancy (LE): Average LE for your entire Residential population.

- Res. Avg. Income: Average wealth level of your entire Residential population.

- City Income/Expenses: Plots income versus expenses of the city budget. If, after several years, the red line (outlays) is higher than the green line (revenue), you could soon be in trouble.

- Funds: Shows how much money you have in the treasury over time (in thousands of §).

- RCI Demand: A bar graph showing demand broken down by developer type. This is far more useful than the summarized RCI Indicator. In fact, you can access this graph directly by clicking on the summarized RCI Demand Meter.

- Mayor Rating: Average Mayor Rating of your entire Residential Population. Because Mayor Rating is, above all, a local concern, this information is only useful to show trends over time.

The RCI Demand Graph is one of the most important things you can look at. Consult it frequently. If you're playing the simulation well, you'll use this information rather than the summarized RCI Indicator.

POLLS

Graphs give you a long view of trends in your city, but for a truly up-to-the second view of which way your city is trending, do what all politicians do: Look at the polls!

- Environment: Air pollution citywide

- Health: Hospital coverage and grade citywide

- Safety: Police and Fire coverage citywide

- Traffic: Commute time citywide (Res. only)

- Education: School coverage and grade citywide

- Land Value: Total land value citywide

Polls show which direction things are heading right now. Any time you drop in a new civic building, look at what popular opinion has to say about it.

ADVISORS

Your seven Advisors are your eyes and ears on the city. It's their job to watch their respective departments and call problems and accomplishments to your attention.

Advisors have many ways of getting your attention. A good way to play involves keeping the Advisors panel open by default. This way, you can see when they gesture or flash for your attention. You can read their advice on the News Flipper.

- City Planner (Neil Fairbanks): General game strategy and mechanics, Mayor Rating, Rewards

- Finance Advisor (Monique Diamond): Budget, Business Deals

- Utilities Advisor (Jonas Sparks): Water, power, and garbage

- Public Safety (Sam Armstrong): Police and fire

- Health and Education (Bettina Dean): EQ and HQ

- Transportation (Jamil Herd): All transportation elements

- Environmental (Camille Meadows): Pollution, radiation, and parks

NOTE

The City Planner is your only Advisor with a balanced opinion; his advice can be taken at face value. All other Advisors are advocates for their departments and so should be heeded with a grain of salt.

Consult Advisors by clicking on the Advisors Panel. Any Advisors who have important messages flash and appear extremely animated with colored backgrounds to show what kind of news they have (green is good, red is bad).

Also get your Advisors' messages by clicking on the News Flipper. Any Advisor messages appear there periodically. As with other news items, positive messages appear in green, neutral in gray, and urgent in red. Use the hyperlinks as shortcuts to relevant tools and Data Views.

THE NEWS FLIPPER AND NEWS WINDOW

You'll notice a constant scroll of headlines at the bottom of your screen. This is your News Flipper, and it's one of your most important information sources. It compiles messages from many sources: from the news (not from anyone in particular), from an Advisor, or from a My Sim (see My Sims below).

Because a Mayor can't watch everything at once, the News Flipper's job is prioritize important message and make you aware of items that need your attention. It's up to you whether you read them or not; though you're well advised to keep up on the news.

News Flipper items come in three varieties:

- Neutral: Gray
- Positive: Green
- Urgent: Red

Ignore the News Flipper at your own peril. It contains vital information that you might not otherwise know about. Use the hyperlinks as shortcuts to relevant tools.

When you see a headline you wish to read, click on the News Flipper to bring up the News window. Click on the headline to read its full text. Colored and underlined hyperlinks act like links on a web page; click on them to be taken to a tool, a data panel, or the relevant part of your city.

MY SIMS

My Sims are your newest and possibly most detailed source of information. They are one part Advisor and one part spy, providing much the same insight as your paid Advisors but on a far more local and specific level. A My Sim's opinion and needs are sufficiently specific that he or she can reveal problems too subtle to appear in any of the other information sources.

USING MY SIMS

Begin by entering My Sim Mode and creating up to five My Sims.

Select from the slate of representative Sims or import your own from any *The Sims* games. Note that you can import any adult or child Sim or even a pet Sim from *The Sims Unleashed* but you can't use Sims from *The Sims Online*.

Each Sim, either built-in or imported, comes with a default astrological sign, but this can be changed.

You can, of course, change a My Sim's name to whatever you like. When everything is ready, find a place for him to live.

My Sims communicate with you via messages that appear in both the My Sim News panel and their News Flipper. Just as with other Advisor messages, you can click on hyperlinks to see what your My Sim is talking about.

Messages from your My Sims appear in their My Sim News panel or as Advisor messages in the News Flipper.

SELECTING A HOME

A My Sim takes on the attributes of the first house you place her in. If a house is R§, low EQ, low HQ, the My Sim's own attributes reflect that and change in conjunction with the structure. For example, if you move a My Sim into a house with a poor health rating, the My Sim will have poor health. If you increase the healthcare in the area in which the My Sim lives, you'll see the result in improvements in her health.

When placing a My Sim, you see each house's fundamental characteristics.

NOTE

It may be jarring for *The Sims* players to have so little control over their My Sim. In *SimCity 4*, though, you can only interact with your My Sim indirectly. Think of it as getting inside her head.

The key to selecting a home is determining what you want the My Sim to tell you. If you want to get a better read on what your R§§ Sims in a particular area want and are thinking, place a My Sim in an R§§ house in that area. There's no guarantee she'll stay there forever, but you can start her in a specific place.

A My Sim stays in the home you put him in until one of these things happens:

- If a My Sim's home is destroyed (chosen for redevelopment, stricken with a disaster, or bulldozed by a cruel Mayor), he will search for another available house of the same wealth level in the city. If he's unable to find one within two months, he'll move out of your city. This should tip you off to trouble; if your My Sim moves out of town, he's probably not alone.

Oooops. Thank heaven he made it out OK. Now, where's the next meteor going to hit?

- A My Sim at medium or high wealth level is sensitive to the desirability of her house. If decreases in desirability cause the structure to drop to a lower wealth level, your My Sim will move rather than slum.

- If negative demand for the My Sim's wealth type causes the house to be "abandoned," the My Sim will do just that: leave.

- If his house becomes uninhabitable due to a loss of water or power service (if the house requires it, see Chapter 11).

- If a My Sim achieves a higher wealth level, she will move to house befitting her new status. If none are available, she'll move out of town; another sign of trouble.

- If the house in which the My Sim lives increases to a higher wealth level than the My Sim, he'll be "priced out" of the house and have to move into a new place more suited to his station. This highlights a stark reminder: When improving desirability to attract rich folk, make sure there's plenty of housing available for the lower wealth Sims (your economy needs them).

When it's time to move, the My Sim has two choices. If he can find a place in the city, he will move to the closest available near his current home. If nothing's available, he'll move out of your city altogether; you'll never see him again unless you select him anew from the My Sim menu.

FINDING A JOB

When a My Sim moves to town, the first thing he does is find a job. A job is selected based on the My Sim's wealth level and proximity (the closest open job of the correct wealth level).

The My Sim will keep this job until:

- He can't find a route to work for two months.

- The workplace is destroyed or redeveloped.

- He changes wealth level.

Follow a My Sim to work by double-clicking on her portrait.

If there's an intercity Neighbor Connection (not just to SimNation) close to a My Sim, she may take a job in the neighboring city. However, she'd prefer a job in the same city in which she lives.

NOTE

My Sims can also take jobs at civic and park buildings.

When your My Sim is at work, he reports on conditions at that workplace as well. This gives you insight into both the Sim's Residential neighborhood and whatever Industrial or Commercial area he works in.

If a My Sim loses a job, he'll find a new job. If none is available, you'll be informed of his unemployment via a news item. If he can't find a job within two months, he'll pack up and move out of your city. This should give you a warning that the area the My Sim was living has some kind of problem (traffic or job related).

MOVIN' ON UP

A My Sim can increase in wealth level but can never drop.

Promotion is triggered by rising EQ. If the My Sim becomes smart enough, she gets promoted. If there's strong demand for the next wealth level, and there's a job at that wealth level, the My Sim starts her new high-status life.

AGING, DEATH, AND INHERITANCE

My Sims age with the simulation calendar.

NOTE

The age of the My Sim isn't relevant to the question of age-appropriate school facilities (see Chapter 20). It's still the average age of the entire area covered by the school that matters.

Once she retires, she ceases going to work and spends all of her time at home and traveling to things in her neighborhood. In other words, she'll spend all day telling *you* what she thinks of her neighborhood.

If you do your job properly, most of your My Sims should live to old age (whatever Life Expectancy is at that time). Other things can kill a My Sim prematurely:

- If his house or workplace is struck by a Disaster, there is a chance he won't make it out alive.

- If he lives in a high crime neighborhood, there's a chance he'll be killed in a robbery. Hint: Keep crime down!

- Excessive pollution in his neighborhood can have very serious effects. The chance of environmentally caused death is reduced (but not eliminated) if he lives within a Hospital zone.

If your My Sims snuff unnaturally, they simply disappear from the game. You can, of course, place them again, but they start back at square one.

TIP

Keep an eye out for your My Sim's departed soul as it lofts heavenward.

If, on the other hand, a My Sim lives to old age, something magical happens. When a My Sim reaches maximum LE, you'll receive a message informing you of the unfortunate passing from the My Sim's offspring! Frank N. Furter the Second assumes ownership of the house at the "birth age" dictated by his father's wealth level (see Chapter 20). That and the house are, however, the only things he inherits; everything else (EQ, LE, car, etc.) is dictated by the neighborhood average (specifically the tract on which the My Sim lives).

If a My Sim dies prematurely, there will be no offspring.

When five and then 10 generations of a My Sim family have survived in your city, you'll receive a message commemorating the milestones.

WHAT DOES MY SIM WANT TO TALK ABOUT?

Not all My Sims have the same interests. What they choose to talk about is determined by what they're geared to react to in their neighborhood. A My Sim reacts to a greater or lesser degree to the nearby presence of Rewards, Landmarks, civic structures, parks, and certain Commercial Service buildings (Drive-in Theater, Dinner Theater, etc.).

Topics of conversation are dictated by age, wealth, EQ, and HQ.

Examples of Interests by Various My Sim Characteristics

Structure	Age	Wealth	EQ	HQ
Disease Research Lab	Old	R§	Low	Low
Medical Clinic	Middle Aged	R§§	Medium	Low
Large Medical Center	Old	R§§§	High	Low
Drive-In Theater	Young	R§§	Med	Med
Multiplex	Middle Aged	R§§§	Low	Med
Dinner Theater	Old	R§§§	High	High

BUDGET AND FINANCE

Simoleons make the world go round. Without them, there can be no transportation, pipes, zones, schools, etc. and, if the treasury gets empty enough, there'll be no more Mayor! Managing the piles of dough is, therefore, one of your primary concerns.

With several changes to the "money game" in *SimCity 4*, you need to act with great skill and thought to avoid building yourself a money pit of a city. Even late in a city's life, when many seasoned Mayors are accustomed to going on financial autopilot, the money game generates a constant challenge to stay ahead of monthly expenses and find new ways of enhancing income.

THAT IS *SO* 3K!

The money game is one of the biggest changes in *SimCity*. First of all, you set taxes in nine different categories (by type and wealth level), and taxes are no longer based on land value. Second, a lot more things, such as Power Plants, Landmarks, Rewards, and parks, cost money now, both to purchase and to maintain monthly. Third, loans are now amortized, resulting in higher monthly payments but also less confusion.

THE BUDGET PANE

Your current treasury balance is visible in the Mayor Mode interface (below Mayor Rating). To get behind this number, call up your Budget pane.

The Budget pane puts your city's financial transactions in one easy-to-read place. Let that layout be your guide.

The Budget pane is your window to the city's financial health.

MONTHLY INCOME

N O T E

Clicking on any line item in either the income or expense areas brings up both income and expenses for the chosen item. This helps keep things in perspective and relieves you from having to swap back and forth between detail ledgers.

Income is the money you have coming in on a monthly basis. Increasing these amounts is harder than increasing expenses; there's the challenge.

TAXES

Taxes are your primary form of income, and no city is successful without a skillful tax strategy.

NOTE

Players of *SimCity™ Deluxe* and the *Rush Hour* expansion pack will see differences in the tax rate interface. Consult Part 8 for help.

TIP

The best per-Sim tax revenue comes from a city with lots of low-capacity buildings and, among them, lots with high building value.

In other words, keep things zoned low density and attract as much high wealth development as your city can bear.

Your city taxes are based on several factors:

- Tax rate
- Building value
- Occupancy

TAX RATE

NOTE

Low-wealth Industrial refers to Dirty Industrial, medium-wealth Industrial is Manufacturing, and high-wealth Industrial is High-Tech. Technically Agriculture is low wealth too, but Agriculture doesn't pay taxes—it just takes up space, provides jobs, and doesn't offer revenue.

The tax rate is set by you for each of the 12 developer types. Commercial Office and Commercial Service are set collectively as "Commercial." This wealth type breakdown lets you use your tax rates with fine precision to attract or deter the kind of developer you want.

The tax rate has some side effects of which you must be aware.

The degree of change you make affects Mayor Rating. Lower taxes to improve your Mayor Rating on every property of the changed wealth level. Raise them, and you'll make yourself unpopular.

Mayor Rating Effect of Tax Rate Changes

Change in Applicable Tax Rate	MR Effect
-20%	25
-10%	20
-5%	10
-2%	7
-1%	5
+1%	-5
+5%	-10
+10%	-20
+20%	-25

Changing tax rates has an effect on demand (see Chapter 8 for full details). There is, however, always a tax rate (initially 9%) that has no effect on demand, but this "neutral rate" declines slightly (to about 8%) as population increases.

Lowering a tax rate from this neutral rate stimulates demand while raising it above neutral dampens demand. The ratio of the rate you select vs. the neutral rate dictates the amount of the demand boost/penalty; the more you vary from the neutral rate, the more dramatic the effect.

! **WARNING**
Tax increases above neutral remain in effect for 90 days regardless of subsequent rate reductions.

BUILDING VALUE

RCI buildings in the game have inherent building values.

This value is changed only if the property downgrades to a lower wealth type (i.e., an R§§§ building becomes inhabited by R§§). A change of one wealth level drops the building value by 25%. A two-level drop decreases building value by 50%.

Waning Wealth Effect on Building Value

Wealth Level Drop	Building Value Change
R§§§ to R§§	-25%
R§§§ to R§	-50%
R§§ to R§	-25%

TIP

As building size increases, tax revenue per Sim decreases. To get the most out of your Sims, keep things low density, filling the map before creating any higher density zones.

CITY ORDINANCES

The only income-producing ordinance is Legalize Gambling. If you pass it, you'll receive a guaranteed §100 per month. On the downside, you'll see increased crime.

The Legalize Gambling ordinance also gets you the chance to build the Casino on your city. Do yourself a favor and keep it away from the respectable parts of town.

CROSS-REFERENCE

For complete details on the Legalize Gambling ordinance, see Chapter 24.

NEIGHBOR DEALS

The spoils of incoming Neighbor Deals (garbage import or power/water export) appear on this line while the deal is in effect.

Click on the line item to see both incoming and outgoing deals and opportunities.

Because only income and expenses on the ledger on the month's last day factor into the actual (rather than projected) budget, enact incoming deals late in the month.

Neighbor Deals are handy, so have neighbors with whom to deal.

CROSS-REFERENCE

See Chapter 25 for more details on Neighbor Deals.

BUSINESS DEALS

If you accept any Business Deals by plopping any of the five dreaded buildings in your city, the income amounts from each appear on this line item.

The Toxic Waste Dump earns you Simoleons, but at what cost?

Business Deals

Structure	Monthly Income	Negative Effects
Army Base	§350	Reduces Res. desirability, increases crime, lowers Mayor Rating
Casino	§300	Reduces Res. desirability, increases crime, consumes lots of power and water, decreases Mayor Rating
Federal Prison	§250	Reduces Com. and Res. desirability, increases crime, decreases Mayor Rating
Missile Range	§450	Reduces Com. and Res. desirability, increases air and water pollution, decreases Mayor Rating, allows Missile Misfire Disaster
Toxic Waste Dump	§400	Reduces Com. and Res. desirability, massive air and water pollution, local radiation pollution, reduces Mayor Rating.

CROSS-REFERENCE
For full details on Business Deals, see Chapter 26.

TRANSPORTATION DEPARTMENT

All fares from your mass transit system appear on this line. It hardly offsets the cost of the system, but that's not the point of mass transit.

NOTE
You earn §0.001 per tile for each trip that travels by bus. See Chapter 19.

EXPENSES

Everything you provide to your Sims in *SimCity 4* costs money on a monthly basis. You can alter some of these budgets.

Many of these items can be funded locally (at individual buildings) or centrally through the budget. If budgets have been set locally, the slider in the Budget pane reflects the average funding of all applicable buildings. Moving the slider resets every building to the same funding level.

Many buildings can be locally funded from their Query boxes.

TRANSPORTATION DEPARTMENT

The Transportation Department contains monthly costs for all your transit stations, Airports, Seaports, and transportation networks.

TIP
Never reduce your Road Maintenance budget; it ends up costing you more money in the long run and causing more problems than it solves.

CROSS-REFERENCE
Consult Chapter 19 for more about the Road Maintenance budget.

- Seaports: Can be over- or underfunded
- Airports: Can be over- or underfunded
- Road Maintenance (Roads, Streets, and Highways): Can be over- or underfunded collectively, not individually
- Mass Transit (Building Maintenance, Rail Maintenance, Subway Maintenance): Can be over- or underfunded collectively, not individually

PUBLIC SAFETY DEPARTMENT

Public Safety encompasses Fire, Police, and Corrections (Jails) Departments.

Funding of police and fire reflects in their coverage area and their effectiveness.

CROSS-REFERENCE
See Chapter 18 for full details on the Public Safety Department.

- Fire Dept.: Fire Stations are funded individually (via Query box of each station) or collectively.

- Police Dept.: Police Stations are funded individually (via Query box of each station) or collectively.

- Dept. of Corrections: Jails can only be funded collectively through the Budget ledger.

HEALTH AND EDUCATION

Health and education systems are funded locally, but you can collectively control them from here.

An underfunded health and education structure can operate at top grade if the demand for the facility is less than its capacity (i.e., has more student capacity than students). Strikes occur regardless of funding level based on overcapacity use.

CROSS-REFERENCE
Consult Chapters 20–21 for more detail on health and education.

- Health: All can be funded locally or collectively.

- Education: All can be funded locally or collectively.

UTILITIES DEPARTMENT

This area covers all of your utility infrastructure including power, water, and garbage. See Chapter 17 for more detail.

- Sanitation Department (Maintenance, Pickup, Delivery, Landfill): Can be funded only collectively.

- Power (Power Line Maintenance, Power Plants): Power Plants can be funded locally at each plant, or collectively here, but Power Lines can be funded only collectively.

- Water Department (Pipes, Water Pump, Water Tower): No water elements are individually funded; all funding is done through here. Capacity of Water Towers and Pumps can be altered by funding.

CROSS-REFERENCE
See Chapter 17 for more on utilities.

CITY ORDINANCES

All city ordinances are enacted through this budget entry. Some don't appear in the list until you meet certain prerequisites.

> **TIP**
> Save money by repealing costly ordinances; their brand of social tinkering is a luxury you can do without. You can always reenact them when things improve. Watch ones that boost demand. Repealing these likely will diminish your tax base.

> **CROSS-REFERENCE**
> Consult Chapter 24 for details on ordinances.

NEIGHBOR DEALS

The costs of all outgoing Neighbor Deals (garbage export or power/water import) appear on this line as long as the deal is in effect.

Click on the line item to see and make both incoming and outgoing deals and opportunities.

Only income and expenses on the ledger on the month's last day factor into the actual (rather than projected) budget, so enact outgoing Neighbor Deals early in the month.

> **CROSS-REFERENCE**
> See Chapter 25 for more details on Neighbor Deals.

CITY BEAUTIFICATION

City Beautification includes things that beautify your city. They include:

- Parks and Recreation: All parks and recreation structures, including several Rewards, are funded through the collective Parks and Recreation funding slider.

- Landmarks: All Landmarks are included in one line item, and funding is controlled collectively in the budget.

> **CROSS-REFERENCE**
> See Chapters 22, 23, and 28 for the complete story on Landmarks.

GOVERNMENT BUDGET

If you have any governmental Rewards (e.g., Mayor Statues, City Hall, Bureau of Bureaucracy, etc.) they're funded collectively here.

✖ CROSS-REFERENCE
See Chapter 23 for the specifics on government budget.

TAKE OUT A LOAN

When times are tough and you need cash, take out a loan. It's not always advisable, but you can do it.

You can borrow up to §200,000 for each loan, and carry §2,000,000 in total outstanding debt or 10 loans at any time. Money can be loaned in §5,000 increments over a period of 10 years at 8.5 percent.

Payment amounts are amortized; every payment includes a portion of principal and a portion of interest.

Take out loans for big expenses, but only if you can make the payments.

Loan Amounts and Monthly Payments

Loan Amount	Monthly Payment	Loan Amount	Monthly Payment
§5,000	§61	§65,000	§805
§10,000	§123	§70,000	§867
§15,000	§185	§75,000	§929
§20,000	§247	§80,000	§991
§25,000	§309	§85,000	§1,053
§30,000	§371	§90,000	§1,115
§35,000	§433	§95,000	§1,177
§40,000	§495	§100,000	§1,239
§45,000	§557	§105,000	§1,301
§50,000	§619	§110,000	§1,363
§55,000	§681	§115,000	§1,425
§60,000	§743	§120,000	§1,487

Loan Amounts and Monthly Payments continued

Loan Amount	Monthly Payment	Loan Amount	Monthly Payment
§125,000	§1,549	§165,000	§2,045
§130,000	§1,611	§170,000	§2,107
§135,000	§1,673	§175,000	§2,169
§140,000	§1,735	§180,000	§2,231
§145,000	§1,797	§185,000	§2,293
§150,000	§1,859	§190,000	§2,355
§155,000	§1,921	§195,000	§2,417
§160,000	§1,983	§200,000	§2,479

Only take out loans when you anticipate increasing revenue in the near future. This can be for any reason, but usually involves what you're spending the loan proceeds on (mass transit, zoning, etc.).

If you're already operating at a deficit, a monthly loan payment increases that deficit. Unless you can increase revenue or reduce expenses to cover your existing expenses plus the monthly payment, the loan only delays your dive toward impeachment.

When you're operating at a profit or need to make a large capital investment that will (directly or indirectly) increase revenue enough to cover the loan, a loan is a good idea.

For example, traffic in your city is terrible and you need a good public transportation system. A loan may get things moving. If you think loosening your traffic problem will affect your tax collections (Sims returning to their abandoned homes and back into the tax base), then take out a loan to build a subway system. This is good city management.

Taking out a loan to buy a Landmark or stop the bleeding of a deficit budget, on the other hand, is not good management.

OVERFUNDING AND UNDERFUNDING

The funding sliders are great weapons in the war of the bottom line. They can save money or buy you time. On the other hand, they can undercut and sabotage your city if not used properly, costing you more in the long run than leaving everything at full funding.

OVERFUNDING

Funding above 100 percent can get you nice benefits, but also can be a waste of money. What effect it has depends on the department.

For many buildings, such as Fire Stations and Police Stations, funding is tied to efficiency. Raising funding above 100 percent provides moderate increases in efficiency (+10 percent efficiency at 120 percent funding); not worth the extra money.

Other kinds of buildings, such as schools and healthcare buildings, link funding to grade (capacity vs. usage). In these cases, overfunding beyond 100 percent expands capacity (though less so than changes between 0 and 100 percent). Such a building is considered "under-funded" only if the set funding level causes it to be overcapacity.

Overfunding Effects

Structures	Overfunding
Airports	Increases capacity
Seaports	Increases capacity
Road Maintenance	Speeds repair of potholed tiles
Mass Transit	No effect
Fire	Increases effectiveness/coverage area
Police	Increases effectiveness/coverage area
Jails	Increases capacity
Health	Increases capacity
Education	Increases capacity
School Buses/Ambulances	Increases coverage area
Sanitation	Increases the capacity of your city's garbage collection, increases capacity of Waste to Energy Plants, slightly increases capacity of Recycling Center
Power Lines	Increases rate of repair
Power Plants	Increases lifespan
Water Department	Speeds repair of rusty (distressed) pipes
City Beautification	Can't overfund
Government	Can't overfund

UNDERFUNDING

Underfunding is an attractive way to save money and, if you do it selectively, it is effective. It also can be costly and disastrous.

The effect of underfunding differs by building.

Underfunding Effects

Structures	Underfunding
Airports	Decreases capacity. No harm as long as usage doesn't exceed capacity.
Seaports	Decreases capacity. No harm as long as usage doesn't exceed capacity.
Road Maintenance	Potholes occur in Roads/Streets/Highway tiles in proportion to amount of underfunding.
Mass Transit	Travel time to transfer to mass transit increases.
Fire	Decreases effectiveness and radius. Chance of strike increases as funding declines.
Police	Decreases effectiveness and radius. Chance of strike increases as funding declines.
Jails	Decreases capacity. Increases chance of jailbreak.
Health	Decreases capacity. No harm as long as patients don't exceed patient capacity. The lower funding is relative to the funding necessary to serve current usage, the higher the chance of a healthcare strike.
Education	Decreases capacity. No harm as long as students don't exceed student capacity. The lower funding is relative to the funding necessary to serve current usage, the higher the chance of an education strike.
School Buses/Ambulances	Coverage area decreases.
Sanitation	Decreases the capacity of your city's garbage collection, decreases max capacity of Waste to Energy Plant, decreases Recycling Center capacity. Increases age degradation of all garbage structures.
Power Lines	Below 50 percent, Power Lines degrade to the point of sparking, causing fires.
Power Plants	Decreases lifespan.
Water Department	Below 50 percent, pipes degrade to the point of bursting, causing water outages. Efficiency is reduced.
City Beautification	YIMBY Effects reduced proportionally to funding decrease. Below 60 percent funding, Landmarks look distressed.
Government	YIMBY Effects reduced proportionally to funding decrease. Below 60 percent funding, buildings look distressed.

STRIKES

Underfunding can be dangerous business, especially in important departments. You may get away with it for a while, but the longer you do it, the longer you risk a strike.

Strikes occur in some departments if funding or grade fall below certain levels. When a department is on strike, its effectiveness drops to 20 percent for the duration of the strike.

Strike conditions vary by department.

Picketing teachers are not a pretty sight. Get them to class by raising funding over capacity.

- Health: Chance of strike increases linearly as building grade drops below optimal (five doctors).
- Education: Chance of strike increases linearly as building grade drops below optimal (five apples).
- Police: Chance of strike increases as funding drops below 100 percent.
- Fire: Chance of strike increases as funding drops below 100 percent.

Strikes can be ended several ways:

- Restore funding to 90% of optimal. For grade-driven departments, bring the grade up to at least four-out-of-five.
- Wait it out. Strikes end by themselves after a (long) while. For school, hospital, fire, and police, the wait is more than 18 months. For utility strikes, it's one year.
- Strike Bust: Destroy every building in the department and build anew.

PART 5: EFFECTS

Some effects profoundly shape your city, your role in the simulation, and the choices you're forced to make. Frequently, you'll find it impossible to serve all of these effects at once because they are often in direct conflict.

The most important of the many effects of this kind are:

- Pollution
- Crime
- Mayor Rating

What makes these big three unusual is that their effects span departments and all other categorizations. The effect is exerted by buildings and events. What makes them special is their importance; keep them in mind at all times and do everything to keep their negative sides from running your city.

POLLUTION AND ENVIRONMENT

Pollution is unavoidable. At some level, you'll always have pollution mucking up your city. What you do about it is what makes a great Mayor.

The name of the pollution game is containment and minimization. If you do both those things, you'll give your city what it needs (Power Plants, an Industrial base, etc.) and still allow it to grow. As your city strengthens, you can eliminate most of the major sources of pollution, but only if you do a good job.

Pollution has the following direct effects:

- Reduces Commercial, Residential, Agricultural, Manufacturing, and High-Tech Desirability

- Affects local Mayor Rating

- Reduces Health Quotient (HQ)

- Water pollution can shut down Water Pumps and Water Towers

- Can prematurely kill a My Sim

WHERE DOES POLLUTION COME FROM?

Pollution of all sorts is generated primarily by buildings. Most buildings (RCI, Civic, Reward, Landmark, Utility, etc.) produce air and water pollution, and a fixed output of garbage. To have the building in your city, you must accept the pollution production that comes with it. For most buildings, this is a favorable trade-off. With big polluters, consider if the filth is worth the benefit.

Pollution is a localized phenomena, so analyze it based on its local impact. The global pollution amount is available, but it doesn't tell you much; very high global pollution won't matter much if your polluters are well-contained.

Query a property to see what kind of pollution it's contending with.

HOW POLLUTION WORKS

The various types of pollution affect their surroundings differently.

AIR AND WATER POLLUTION

A building emits air and water pollution every month. The pollution is emitted at full strength over the footprint of the building, then outward in a fixed radius from the edges of the lot; the strength of the pollution dissipates linearly as it reaches the outer edge of the radius. A building with a pollution rating of 5 and a radius of 5 would affect its surroundings thusly:

A single building emits pollution in a fixed radius. The highest pollution is on the building itself, gradually dwindling to 0 at the circle's outer edge.

- Over the entire lot under the building: 5

- 1 tile away: 4–4.99

- 2 tiles away: 3–3.99

- 3 tiles away: 2–2.99

- 4 tiles away: 1–1.99

- 5 tiles away: 0–0.99

- 6 tiles away: 0

This is what happens with a single building, but when you put polluting buildings together in a small area, things get more complex. If you put two polluters next to each other, their effects are added together on every square affected by both of them. Add more polluters into the same area, and their effects are added to the rating for each tile as well.

You may think that the higher pollution gets, the more it spreads, but this isn't true. No matter how great the pollution, it can't drift beyond the radius of the farthest reaching building. If you cluster enough buildings together, the tiles within the various radii become saturated with pollution, eventually topping off at maximum pollution. Instead of a circle of pollution with central high intensity and gradual dissipation, you'll see a solid circle of the highest possible pollution.

A bunch of Coal Power Plants has an enormous radius, but the dark area (high pollution) extends almost to the outer edge of the circle. This entire area of effect is nearing maximum air pollution density.

AIR POLLUTION FROM TRAFFIC

Air pollution caused by traffic affects the areas bordering the thoroughfare. The amount of pollution is related to the number of trips traveling over a tile or how busy the tile is. The pollution contributed by traffic is a powerful reason to develop mass transit.

GARBAGE POLLUTION

For pollution effect purposes (à la water and air pollution) garbage in itself has no effect on buildings around it. It decreases desirability, lowers local HQ, has a punishing Com. NIMBY and Res. NIMBY effect (-100, 32 tile radius), and pulls down Mayor Rating where trash piles up.

When your Sims pile garbage around their houses, add another Landfill.

NOTE

Garbage piles have little desirability impact on Dirty Industrial or Manufacturing developers. With all the other filth around them, they cannot be troubled by trash.

Garbage is only a problem if and where it piles up. If you export your garbage, there won't be garbage pollution in your city.

If you dump your city's garbage in a Landfill, that'll be the only place you'll have garbage pollution. And you won't want to zone anywhere near it with anything but ID or IM.

Excess garbage piles up on lots throughout your city when all of your garbage disposal facilities are at full capacity. It piles up on the curb and gets worse from there.

NOTE

If garbage output exceeds capacity (facilities plus any garbage export deals), garbage piles up. It first attempts to pile at its source (on the curb, then around the building that produced it). If there's no room there, it's randomly placed somewhere else.

Garbage is the easiest form of pollution to combat. Start by building Landfills far away from your Residential, Commercial, and Industrial High-Tech areas. Then, if garbage begins to pile, expand your garbage capacity (by adding Landfill tiles or a polluting Waste to Energy Plant, or by striking a garbage export deal). Over time, all piled garbage will be collected and the effects of the piled garbage will dissipate.

You may also ease the load on your Landfills by adding a Recycling Center, which reduces your garbage output by 20 percent. Several ordinances have the same effect.

RADIATION

Radiation pollution is the worst kind. Fortunately, it's rare. Unlike air and water pollution, radiation pollution affects surrounding tiles equally over a fixed radius. No matter where a structure is within its radius, it's receiving full radiation pollution.

Radiation pollution destroys desirability within its radius for all developer types. It also pounds your Mayor Rating.

There are only two sources of radiation pollution:

- Toxic Waste Dump
- Melted-Down Nuclear Power Plant

The aftermath of this nuclear meltdown shows the effect of the radiation contamination. Nothing within that circle is habitable, and it won't be for a while.
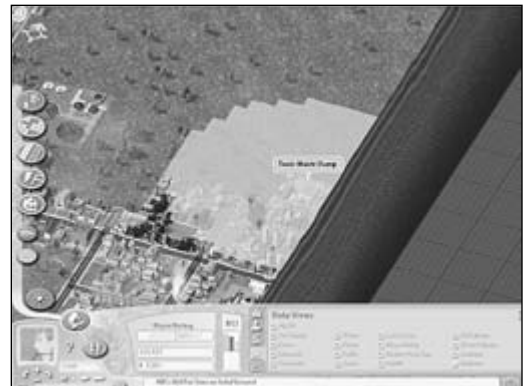
The Toxic Waste Dump leaks radiation even when it's in perfect condition. Don't put it near anything.

NOTE

A properly functioning Nuclear Power Plant does not emit radiation. It's only in the event of a meltdown (due to Disaster or the end of its life) that any surrounding tiles will be afflicted with radiation pollution.

There is no realistic way to combat radiation pollution from a meltdown; it dissipates in 10,000 years! Radiation from the Toxic Waste Dump disappears in a few months, but that's no reason to risk it.

Never let your Nuclear Plants explode, and place the Toxic Waste Dump (if you must place it at all) far away from anything you value.

NOTE

Pollution numbers for buildings introduced in the *Rush Hour* expansion pack are listed in Part 8.

NOTE

When you look at the average water pollution numbers per tile of Agriculture (WP: 4, radius: 6) you wouldn't think that your farms are your biggest water polluters. But because they are for an individual tile, the effect emits from every tile on the farm. Consider this on the scale of a medium-sized farm (let's say 20 x 20) and imagine four hundred tiles each emitting a sizeable amount of water pollution. The radius won't be that big, but the saturation will be stifling. Farms may seem innocent, but put a water pump near one and you'll feel their hidden sting.

Pollution Effect by Structure
(Structures with a * are downloadable from simcity.com.)

Structure	Air Pollution	AP Radius	Water Pollution	WP Radius	Garbage	Radiation	Radiation Radius
Advanced Research Center	3	2	4	3	15	0	0
Alamo	0	0	1	2	2	0	0
Alcatraz	1	1	1	1	2	0	0
Amalienborg	1	2	1	3	5	0	0
Arc de Triomphe*	1	1	1	2	5	0	0
Army Base	4	4	5	5	13	0	0
Bank of America	5	6	5	7	39	0	0
Bank of China Tower	4	4	4	5	15	0	0
Basketball Court	0	0	0	0	1	0	0
Beach	0	0	0	0	0	0	0
Big Ben	1	1	1	2	2	0	0
Brandenburg Gate*	1	1	1	2	5	0	0

Pollution Effect by Structure continued

Structure	Air Pollution	AP Radius	Water Pollution	WP Radius	Garbage	Radiation	Radiation Radius
Bureau of Bureaucracy	2	3	2	4	50	0	0
Bus Stop	1	1	1	1	1	0	0
California Plaza	2	2	2	3	10	0	0
Capitol Records Building*	3	4	4	5	11	0	0
Casino	3	4	3	5	30	0	0
Cemeteries	-15	3	4	3	1	0	0
Chrysler Building	3	4	4	5	12	0	0
City College	2	2	1	3	20	0	0
City Hall	1	2	1	3	10	0	0
City Jail	7	2	5	3	25	0	0
City Museum	2	3	1	4	19	0	0
City Zoo	-5	3	5	4	20	0	0
CN Tower	0	0	1	2	4	0	0
Coal Power Plant	200	16	150	14	25	0	0
Coit Tower	0	0	1	2	3	0	0
Colossal Mayor's Statue	0	0	0	0	1	0	0
Community Garden	-2	3	1	1	0	0	0
Convention Center	3	4	2	5	23	0	0
Country Club	-22	4	8	3	5	0	0
Courthouse	2	2	1	3	11	0	0
Disease Research Lab	3	3	2	4	10	0	0
Elementary School	1	2	1	3	6	0	0
Empire State Building	5	5	6	6	20	0	0
Faneuil Hall	1	2	1	3	9	0	0
Farmer's Market	1	1	1	2	9	0	0
Federal Prison	4	4	4	5	17	0	0
Fernsehturm	1	1	1	1	5	0	0
Freight Train Station	1	1	4	2	4	0	0

Pollution Effect by Structure continued

Structure	Air Pollution	AP Radius	Water Pollution	WP Radius	Garbage	Radiation	Radiation Radius
Gateway Arch	0	0	0	0	2	0	0
Gazebo	-1	2	1	2	1	0	0
Globe Arena*	2	2	3	2	15	0	0
Grand Central Station*	3	4	4	5	11	0	0
Great Pyramid	0	0	0	0	2	0	0
Guggenheim Museum	1	1	1	2	9	0	0
Hagia Sofia	1	1	1	2	3	0	0
High School	1	2	1	3	9	0	0
Hollywood Sign	0	0	0	0	0	0	0
Houses of Worship	1	2	1	3	6	0	0
Hydrogen Power Plant	10	3	8	4	11	0	0
Impressive Mayor's Statue	0	0	0	0	1	0	0
Independence Hall	1	1	1	2	3	0	0
International Port	14	6	25	7	13	0	0
Jefferson Memorial	0	0	0	0	3	0	0
John Hancock Center	6	6	5	7	43	0	0
Large Fire Station	1	2	1	3	6	0	0
Large Flower Garden	-15	6	3	3	0	0	0
Large International Airport	25	7	8	6	22	0	0
Large Landing Strip	9	4	4	3	7	0	0
Large Medical Center	2	3	2	4	21	0	0
Large Municipal Airport	15	6	6	5	13	0	0
Large Park Green	-15	6	4	3	0	0	0
Large Plaza	0	0	0	0	1	0	0
Large Police Station	1	2	1	3	10	0	0
Lincoln Memorial	0	0	0	0	3	0	0
Living Mall	10	4	12	5	11	0	0
Local Branch Library	1	2	1	3	2	0	0

Pollution Effect by Structure continued

Structure	Air Pollution	AP Radius	Water Pollution	WP Radius	Garbage	Radiation	Radiation Radius
Magnificent Mayor's Statue	0	0	0	0	1	0	0
Main Library	1	2	1	3	9	0	0
Major Art Museum	1	2	1	3	8	0	0
Major League Stadium	-10	4	7	5	50	0	0
Mayor's House	1	2	1	3	4	0	0
Mayor's Statue	0	0	0	0	1	0	0
Medical Clinic	1	2	1	3	9	0	0
Medium Flower Garden	-7	4	2	2	0	0	0
Medium International Airport	22	7	7	6	18	0	0
Medium Landing Strip	7	4	3	2	6	0	0
Medium Municipal Airport	12	6	5	4	10	0	0
Medium Park Green	-7	4	2	2	0	0	0
Medium Playground	-5	4	2	1	1	0	0
Medium Plaza	0	0	1	0	0	0	0
Minor League Stadium	-10	4	5	5	9	0	0
Missile Range	9	6	10	7	50	0	0
Movie Studio	4	4	3	5	15	0	0
Natural Gas Power Plant	60	12	65	12	20	0	0
Nuclear Power Plant	10	4	45	5	15	0	0
Oil Power Plant	150	14	80	14	22	0	0
Open Grass Area	-2	2	1	1	0	0	0
Open Paved Area	0	0	0	0	1	0	0
Opera House	1	2	1	15	15	0	0
Palace of Fine Arts	1	1	1	2	4	0	0
Palacio Real	1	2	1	3	4	0	0
Parthenon*	0	1	1	2	2	0	0
Passenger Train Station	1	1	1	2	6	0	0
Playground	-1	2	1	1	0	0	0

Pollution Effect by Structure continued

Structure	Air Pollution	AP Radius	Water Pollution	WP Radius	Garbage	Radiation	Radiation Radius
Private School	1	2	1	3	6	0	0
Radio Station	4	3	3	4	11	0	0
Ranger Station	-3	2	1	1	1	0	0
Recycling Center	4	3	5	4	0	0	0
Resort Hotel	2	3	3	4	21	0	0
Rotes Rathaus	2	2	2	3	9	0	0
Seoul City Hall*	4	2	3	3	9	0	0
Seoul World Cup Stadium*	-11	4	10	6	65	0	0
Skateboard Park	0	0	0	0	0	0	0
Small Fire Station	1	2	1	3	3	0	0
Small Flower Garden	-2	2	1	1	0	0	0
Small International Airport	20	6	6	5	15	0	0
Small Landing Strip	5	3	2	2	5	0	0
Small Municipal Airport	10	5	4	3	8	0	0
Small Park Green	-2	3	1	1	0	0	0
Small Plaza	0	0	0	0	1	0	0
Small Police Station	1	2	1	3	5	0	0
Smith Tower	3	4	4	5	11	0	0
Soccer Field	-8	5	4	3	7	0	0
Softball Field	-10	5	4	4	6	0	0
Solar Power Plant	5	3	5	3	11	0	0
Sphinx	0	0	0	0	2	0	0
St. Basil's	1	1	1	2	3	0	0
State Fair	2	2	2	3	23	0	0
Statue of Liberty	0	0	1	2	3	0	0
Stock Exchange	2	3	2	4	19	0	0
Subway Station	1	1	1	1	2	0	0
Sungyre-mun*	0	0	2	2	4	0	0

Pollution Effect by Structure continued

Structure	Air Pollution	AP Radius	Water Pollution	WP Radius	Garbage	Radiation	Radiation Radius
Taj Mahal	0	0	2	2	4	0	0
Television Studio	6	3	4	4	19	0	0
Temple Expiatoiori de la Sagrada Familia*	1	2	1	3	5	0	0
Tennis Court	0	0	0	0	1	0	0
Tokyo Tower	1	1	1	2	8	0	0
Tourist Trap	1	2	1	2	11	0	0
Tower of London	1	2	2	3	5	0	0
Toxic Waste Dump	44	8	75	10	35	10	5
U.S. Capitol Building	1	2	2	3	13	0	0
University	2	2	1	3	15	0	0
Washington Monument	0	0	0	0	3	0	0
Waste to Energy Plant	250	20	200	19	0	0	0
Water Pump	1	1	0	0	0	0	0
Water Tower	0	0	0	0	0	0	0
Water Treatment Plant	1	3	-300	48	12	0	0
White House	1	1	1	2	15	0	0
Wind Power Plant	0	0	0	0	0	0	0
63 Building*	5	6	5	7	39	0	0

POLLUTION CONSEQUENCES

Pollution has several profound direct effects. Each operates independently of the other, but they are affected by the same things.

REDUCES DESIRABILITY

The desirability of land to all developer types is impacted by the amount of pollution, but not all kinds.

NOTE

Water pollution, though unhealthy, doesn't enter into the desirability determinations of any developer type.

Air pollution is a concern for all developer types except Industrial Dirty (it has no impact on them). All other types account for air pollution to a greater or lesser degree in their desirability decisions.

Residential, High Tech, and Agricultural Sims are most affected and most intolerant of even moderate pollution levels. Manufacturing and low-wealth Residential are impacted by air pollution, but not much even at the highest levels.

Similarly, garbage pollution seriously affects all developer types except Dirty Industrial and Manufacturing (who suffer only a minor effect). The desirability of each tract is determined based on the amount of trash allowed to pile on it (rather than an area of effect).

Air pollution is choking this Residential area. Soon, this area will be undesirable to medium- and high-wealth Sims.

Radiation is simple. When it exists, it equally affects every tile of any developer type in its area of effect to -2000 desirability, a total reduction. No amount of positive influences can counteract a hit like that. Pollution's bad when Dirty Industrial Sims think an area is uninhabitable.

AFFECTS MAYOR RATING

Mayor Rating is negatively affected by all types of pollution. The amount of each on a tract causes a reduction in Mayor Rating.

Air, water, and garbage pollution can be positive boosts to Mayor Rating if you keep them low. If they rise too high the effect becomes increasingly negative.

Any amount of radiation takes down an affected tract by -50 Mayor Rating points.

REDUCES HEALTH QUOTIENT

An important effect of high pollution is the toll it takes on your Sims' health. Pollution level on a tract acts as a negative force on the tract's HQ rating, reducing or counteracting any positive effects imparted by nearby healthcare facilities.

NOTE

The higher the HQ, the longer your Sims live (Life Expectancy or "LE"). The longer they live, the more learning they absorb (raising Educational Quotient). The more EQ Sims amass over their lifetimes, the faster the progress toward the development of (low-polluting) High-Tech Industry.

Lowering pollution now makes it easier to keep it low later.

WATER SUPPLY STRUCTURE SHUT DOWN

Excessive water pollution (greater than 512) near a Water Pump or Water Tower shuts off the structure. The sudden drop in water supply can cause massive water shortages, abandonment, and an increase in flammability of affected structures.

To bring a shut-down structure back online, reduce the surrounding water pollution. The most direct method is to install a Water Treatment Plant.

This pump is too close to the farm, a big water pollution source. It won't pump another drop unless you clean up the surrounding pollution.

COMBATING POLLUTION

Until your city is teeming with High-Tech Industry, you're stuck with heavy pollution. What can you do about it? Plenty.

LOCALIZATION

The easiest way to contain air and water pollution is by localizing it.

Use the Air Pollution Data View to determine how close to your big polluters you can safely zone.

In your city's early days, you're dependent on environmentally hostile power sources and an industrial base composed of the dirtiest of ID. In other words, lots of pollution.

To handle this, cluster your Power Plant, Landfill, and Industrial zones far from where you plan to place your Commercial, Industrial, and Agricultural (if any) zones.

Don't put your Residential zones too far from your Industrial zones. Those same high-polluting Industrial zones provide most of your city's jobs, and your Residential Sims need to be close enough to get to work in a reasonable time. Place Industrial zones too far from Residential zones, and the commute will be so long that your Sims leave.

TIP

Throughout the simulation, one of the most fundamental strategic balances you need to keep is between pollution and job access (a.k.a. commute or trip time).

How far is too far? It's hard to say from the Residential side. Because trip time is affected by many things other than raw distance (traffic, for example), you can't measure it visually. You can gauge the distance from the Industrial point of view. Turn on your Air and Water Pollution Data Views and look at how far the pollution extends; zone Residential outside the pollution's area of effect.

Another trick is to place your huge polluters (especially the Power Plant) in the map's corner or its edge. All of the pollution that goes "off the map" (one half to three quarters) won't be your city's concern. This reduces your global pollution figure (not very important) and shrinks the size necessary for your pollution ghetto.
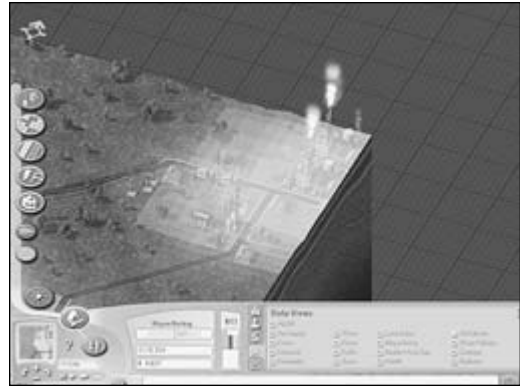
Build in the corner to minimize the global pollution impact of an Industrial zone. The benefits aren't as dramatic as in previous *SimCity* games, but it can't hurt.

NOTE

Building polluters on the border seems un-neighborly, but it isn't. Pollution that goes off your map does not bleed into neighbor cities. It just disappears.

ORDINANCES

Several ordinances reduce global pollution output, making the tracts of your city less dirty.

There is a trade-off with any ordinance, be it money or some other drawback.

Below are all the ordinances that can help you in your fight against filth:

- Automobile Emission Reduction Act: Reduces global air pollution
- Carpool Incentive Program: Reduces traffic volume which reduces air pollution near Roads
- Clean Air Act: Reduces global air pollution
- Commuter Shuttle Service: Reduces global air pollution and traffic volume
- Landfill Gas Recovery Program: Reduces air pollution generated by Landfills
- Paper Waste Reduction Program: Reduces global garbage output
- Tire Recycling Program: Reduces global garbage output

AIR POLLUTION REDUCERS

You can put in several things that reduce local air pollution. They're no match for a Coal Power Plant, but they make a difference if you strategically use them.

Nineteen structures have this environmental power:

Air Pollution Reducers

Structure	Air Pollution Effect	Air Pollution Radius
Country Club	-22	4
Large Flower Garden	-15	6
Large Park Green	-15	6
Cemeteries	-15	3
Seoul World Cup Stadium	-11	4
Major League Stadium	-10	4
Minor League Stadium	-10	4
Softball Field	-10	5
Soccer Field	-8	5
Medium Flower Garden	-7	4
Medium Park Green	-7	4
City Zoo	-5	3
Medium Playground	-5	4
Ranger Station	-3	2
Community Garden	-2	3
Open Grass Area	-2	2
Small Flower Garden	-2	2
Small Park Green	-2	3
Gazebo	-1	2
Playground	-1	2

In addition to these buildings, something in nature has the same effect: trees. All of the trees that came with your terrain and all the ones you add with the Mayor Mode's Landscape Tools reduce local air pollution (-2 per individual sapling and up to -7 for clumps of trees). Whenever possible, leave green space near your pollution-sensitive zones and add trees if necessary.

WATER TREATMENT PLANT

Water pollution is easy, but expensive to fight. Place the required number of Water Treatment Plants in your city (they don't need to be connected to the pipe system) and give them power.

In a couple of months, each plant will reduce water pollution by -300 (diminishing with distance to -250 at the outer edge) in a radius of 48 tiles.

If you put enough plants in the system and place them appropriately, you can bring citywide water pollution down to zero.

Such environmental action costs a tremendous amount of money (each plant costs §15,000 to place and §350 per month to operate). Weigh the cost of a total water pollution eradication against the negative effects of your water pollution problem. You may find that more effective containment is a far less expensive option.

The Water Treatment Plant is the magic bullet for water pollution problems, but it's expensive.

RECYCLING CENTER

The Recycling Center is an effective way of dealing with out-of-control trash production. For a population of up to 25,000, a Recycling Center reduces citywide garbage output by 20 percent. When residential population reaches 25,000, add another center to continue the full 20 percent reduction.

A Recycling Center is the most environmentally sound trash solution. By diverting trash from your Landfills, you won't need to create as many. The land they consume is better used under RCI buildings that pay taxes anyway.

LET'S MAKE A (NEIGHBOR) DEAL

To rid yourself of pollution headaches, ship out your garbage or import your power from a neighbor.

This relieves you of the responsibility of maintaining the pollution-intensive power and garbage collection systems, but costs you more to provide for your city. Cleanliness comes with a cost.

Leaving aside the issue of the contract price, you'll need appropriate Neighbor Connections to get one of these deals. These are free.

Connections Necessary for Neighbor Deals

Connection	Deals Enabled
Road	Garbage
Highway	Garbage
Power Line	Power

CROSS-REFERENCE
For more on Neighbor Deals, see Chapter 25.

SPECIALIZE

Another way to get pollution away from your delicate zone types is to play regionally. It can take a while to establish, but you could set up two adjacent cities, one of which holds all your Industrial zones.

You may also create a small adjacent city whose sole purpose is to house Power Plants. Imported power is expensive.

There are several things to consider to make this complex arrangement work (especially early in the simulation), not the least of which is monetary.

CROSS-REFERENCE
To understand the steps and implications of this daring strategy, see Chapter 25.

GETTING INFORMATION ABOUT POLLUTION

There are many ways to get information about your city's pollution situation.

VISUAL INFORMATION

The easiest way to check out pollution is to use your eyes.

If your rivers look dark and cloudy, there's something near them generating water pollution.

Zoom out to at least zoom level 3 and it becomes obvious where your air pollution problems are; the hovering yellow cloud (which gets thicker as pollution worsens) is a dead giveaway.

Trash piles are easy to spot when they pop up in Sims' lush front yards. If you missed your Utilities Advisor's warnings about your trash capacity, this is a clue that your Landfills are full.

Radiation is best viewed at nighttime. The contaminated area glistens and glows.

DATA AND ADVICE

You can get deeper and broader information about your city's pollution in several ways:

- Query individual RCI structures to find out the relative severity of their pollution problem
- Check which way your city is trending at the moment with the Environmental City Opinion Poll
- Consult with your Environmental and Utilities Advisors
- Switch on the Air Pollution, Water Pollution, Garbage, and Radiation Data maps
- The Air Pollution and Water Pollution Graphs give you some historical perspective and provide the current global pollution average. The Garbage Graph helps prevent pile-ups by displaying how close your city's garbage output is to its capacity
- Check in with My Sims in various neighborhoods to see what they think of the state of their air, water, and garbage collection

CRIME

The evil that men do is alive and well in *SimCity*, and it's up to you to keep the bad guys from taking over your town.

No one, except those guys who hang out at the Casino, wants to live in a crime-infested city. Sims accept that some lawlessness is inevitable, but they make you pay if it gets out of hand. This chapter demonstrates how crime works and shows you how to effectively combat it.

Crime has several prominent effects:

- Reduces desirability for all developer types
- Reduces Mayor Rating
- Arsonists can cause fires

THAT IS *SO* 3K!

To get a grip on the crime system in *SimCity 4*, forget everything you learned about crime in previous *SimCity* games. None of it applies anymore.

The new crime model is more complex, but more realistic and challenging to control. You have to strategize to keep the peace in this new *SimCity*.

N O T E

New public safety buildings introduced in the *Rush Hour* expansion pack are discussed in Part 8.

HOW CRIME IS GENERATED

Crime begins in Sim nature. Everybody has the potential for lawlessness; it's just a matter of how many let it out. The first step is to find out how much potential there is for wrongdoing in your Residential population.

Three things affect the number of crimes in your town: wealth level, education, and unemployment.

FIGURING BASE CRIMINALITY

The raw percentage of lawless Sims (though not necessarily actual criminals) in your population is called "base criminality." It is dictated by the average EQ among each of the three Residential wealth levels.

As shown on the chart below, each wealth level comes with a basic percentage of criminality. The lower the wealth level, the higher the percentage of scofflaws.

The percentage of the lawless in each population varies by the average Educational Quotient (EQ) of the wealth level. The higher it is, the fewer criminals will emerge from that wealth level.

Base Criminality by EQ
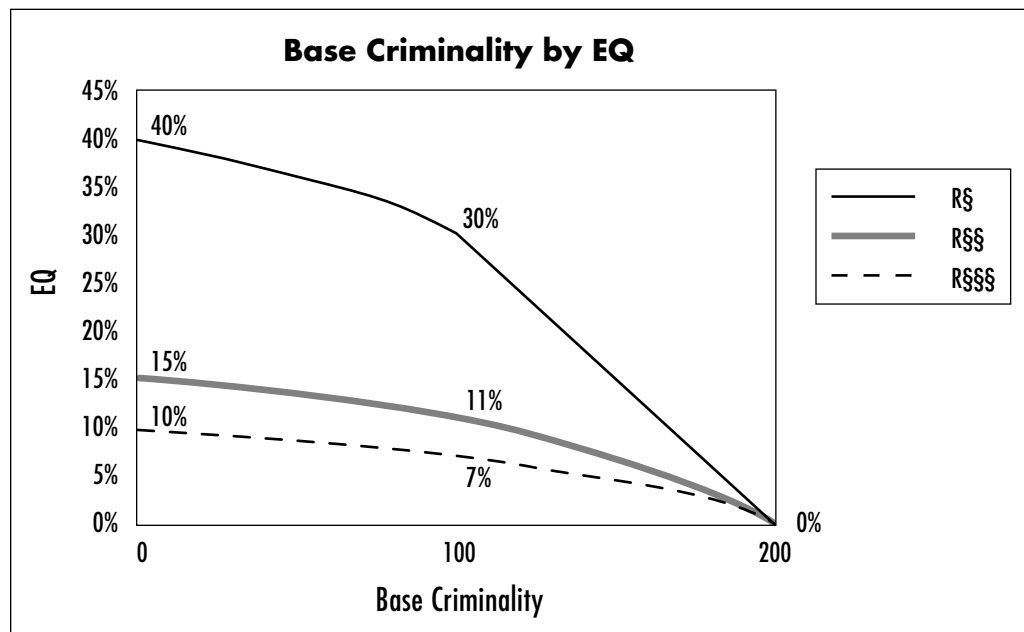
The percentage that corresponds to the EQ on each curve is the base criminality for that wealth level. For example, if the average EQ among R§§ Sims is 100, 11 percent of them will contribute to criminality.

NOTE

Unfortunately, there isn't a way for you to determine EQ by wealth level in the game. This discussion is meant to open the hood on the crime engine to expose some very important root causes. You never can calculate your own criminality ahead of time (not that it would help if you could) but you'll have much greater insight into how to bring it down.

ACCOUNTING FOR ECONOMIC CONDITIONS—JOBLESSNESS

Your city suffers economic ebbs and flows like a real city. You can measure the economic prosperity and success of your city based on the joblessness rate.

If your city has full employment, the base criminality percentage is reduced in each of the three populations. Working Sims have less time to commit crimes than unemployed ones.

As the employment level drops, however, this reduction in criminality dwindles and stops. As economic conditions dive lower, the percentage of your population given over to crime increases (by as much as 10 percent extra added to base criminality).

There isn't a graph to show you unemployment, but you can tell when things aren't going well by looking around.

Returning to our example (11 percent of R§§), if economic conditions are sufficiently bad for R§§, an extra 5 percent gets tacked onto base criminality. Current total R§§: 16 percent.

At the end of this process, you have three modified percentages (base criminality plus the unemployment modifier), one for each wealth level.

DETERMINING NUMBER OF CRIMES

The number of criminals, in turn, dictates the number of crimes.

Each wealth level's population is multiplied by its final criminality percentage, and the resulting three population counts are added together. This is your city's "criminality."

This figure yields the final number in this process: the number of crimes that will be committed in one month.

Go to our example. R§§ consists of 16 percent scofflaws. This percentage is multiplied against the total R§§ population (let's say 20,000) to get the level of criminality (3,200). Assume that the other totals are R§: 5,000 and R§§§: 1,800 for a total of 10,000 criminals. Now we can get our final number.

A city with 10,000 criminals suffers 10 crimes each month. If and where these crimes happen are the next steps in the crime system.

WHAT KIND OF CRIME?

Now that we know how many, we need to discover what kinds of crimes will happen. This is a matter of probability.

There are 13 possible crimes, each assigned a relative chance of occurrence. The higher the chance, the more frequent the crime.

- Arson (1.3%)
- Bank Robbery (5.5%)
- Assault (5.5%)
- Stick Up (5.5%)
- Drugs (5.5%)
- Car Theft (8.2%)
- Fighting (8.2%)
- Purse Snatching (8.2%)
- Solicitation (8.2%)
- Flashing (10.9%)
- Pie Throwing (10.9%)
- Graffiti (10.9%)
- TPing (10.9%)

You need to know what to look for, but the signs of crimes committed are everywhere. This tree covered in toilet paper may not look like a harbinger of doom, but everyone knows that TPing is a gateway crime!

LOCUS OF CRIME

Crime doesn't necessarily occur where the criminals are. Sometimes the criminals travel.

Monthly crimes are, therefore, distributed randomly in places where they're appropriate. For example, having a bank robbery in a Residential area wouldn't make sense.

As such, each crime has limitations on where it can occur. A few crimes are limited as to which wealth level and lot type they target.

NOTE

"Other" includes Landmarks, Business Deals, and civic, utility, and transportation buildings.

Crime Locations

Crime	Wealth Type	Lot Type	Other	Res.	Svs.	Office	Tourism	Dirty Ind.	Manuf.	High-Tech	Agriculture
Arson	Medium/Low	Abandoned	X	X	X	X	X	X	X	X	—
Bank Robbery	All	All	—	—	X	X	—	—	—	—	—
Assault	All	All	X	X	X	X	X	X	X	X	—
Stick Up	All	All	—	—	X	X	—	—	—	—	—
Drugs	All	All	—	—	X	X	X	—	—	—	—
Car Theft	All	All	X	X	X	X	X	X	X	X	—
Fighting	All	All	X	X	X	X	X	X	X	X	X
Purse Snatching	All	All	—	—	X	—	X	—	—	—	—
Solicitation	All	All	—	—	X	X	X	—	—	—	—
Flashing	All	All	X	X	X	X	X	X	X	X	—
Pie Throwing	All	All	X	X	X	X	X	X	X	X	—
Graffiti	All	All	X	X	X	X	X	X	X	X	—
TPing	High/Medium	All	—	X	—	—	—	—	—	—	—

The map shows you what kind of crimes are occurring this month and where they are. Zoom in to have a look.

NOTE

After the simulation selects crimes and places them on the map, you can see them occur. Call up your Crime Data View and pop open the detail map. Click on the location of the map and zoom in for a closer look.

In the case of arson crimes, you have a chance to stop the crime from occurring if you can find the arsonist and get a Police Dispatch to him. Find details on this mini-Disaster in Chapter 27.

AUTO-SUPPRESSION OF CRIMES

With the number and locations of crimes determined, they can now be committed. This is where your police protection comes into play (see Chapter 18 for complete detail).

Police Stations radiate a circle of protection that's strongest in the center, weakening to nothing at the edges.

When a crime falls within an area of police protection, there's a percentage chance that the crime won't be committed by virtue of the amount of police protection. The closer to the station, the greater the odds (up to 50 percent) that the criminal will change his mind. It is a deterrent effect.

You can increase the coverage percentages near your stations' outer limits by overlapping station precincts (the protection effects are additive). Such redundancy of protection can be very expensive.

Having a Police Station prevents some crimes from being committed within its area of protection.

Overlapping police protection radii boosts crime suppression around the edges.

CRIME COMMISSION AND ARREST

Any crimes not suppressed are committed in their selected location. Whether that criminal is then arrested is a function of police protection.

If the crime is committed in the inner 20 percent of a Police Station's protection radius or anywhere near a dispatch unit's coverage radius, the police will arrest the perpetrator. Crimes committed outside a radius will be successful unless you intervene with a dispatch unit.

TIP
If you see a crime being committed, you might be able to capture the crook if you send in a dispatch unit.

Maximizing arrests is a matter of total coverage; the intensity of coverage doesn't matter as much.

The number of criminals caught dictates in part how many crimes you'll see in the next month.

CARRY-OVER CRIMINALS

Some evildoers who the police do not arrest return to commit crimes the next month (added to the number of criminals). Failing, therefore, to provide adequate police coverage guarantees that crime will grow each month.

Not all unapprehended criminals return, however. Thanks to personal rehabilitation and retirement, only 66 percent of them get added into the mix for the next month.

Also added into your criminal population are arrested criminals who've been paroled thanks to Jail overcrowding. If your Police Stations and (if you have them) Jails are overcapacity, they have no choice but to release any inmates they can't hold. These citizens return the next month to thumb their noses at the law.

All prisoners who can't be housed in the holding cells of the station that nabbed them or the Jail (if you have one) are put on the street to be a part of next month's crime spree.

CRIME EFFECT BUILDINGS

Some buildings have a Crime Effect of a given intensity and radius. The Crime Effect counteracts police suppression anywhere it overlaps with a police protection radius.

NOTE

The Crime Effect number doesn't mean much, but it demonstrates the power of each of these structures.

Crime Effect Buildings

Structure	Crime Effect	Radius
Federal Prison	15	128
Convention Center	20	10
State Fair	20	20
Army Base	30	64
Casino	50	128

Reduced suppression results if more crimes are committed, which means a higher crime rate and more criminals returning the next month.

TIP

Note that the Casino, Federal Prison, and the Army Base have large effect radii. Keep them far out of town. In a small city, it's impossible to shield your Police Stations from their effect.

For this reason, keep Crime Effect buildings away from the heart of your city. Adding more Police Stations within the Crime Effect building's area of effect helps, but it's not an efficient use of resources. Investing in education is a better expenditure of Simoleons.

LEGALIZED GAMBLING ORDINANCE

The Legalized Gambling ordinances affect your crime level by adding 20 percent to the number of crimes for every month the ordinance is in effect.

Not all of these crimes will be committed (due to suppression) but you will see a big net increase.

COMBATING CRIME

There's no way to stop all crimes from being committed. Even with great police coverage, you'll suppress no more than 50 percent of crimes.

The remaining crimes that occur generate what your Sims see as their "crime rate." It's this crime rate that factors into desirability and Mayor Rating. Whether you caught the perps is, therefore, irrelevant to your Sims' feeling of safety.

To bring down the crime rate and make your Sims feel safe, keep the number of crimes committed low.

You can do four things to bring down crime: Build more Police Stations, prevent joblessness, pass ordinances, and improve education.

ADDING POLICE COVERAGE

Police protection prevents crimes from occurring, but only up to 50 percent and only if you have a tight network of overlapping Police Stations.

What makes such blanket coverage difficult, if not impossible, is money. It costs money to build and maintain stations. Plus, any land these stations consume is removed from your tax base, costing you more money.

Until you can get at the root causes of crime, increasing your police protection is your only weapon.

REDUCE UNEMPLOYMENT

Keeping your Sims employed reduces the number of crimes each month. This means keeping your economy healthy and providing accessible places where Sims can work.

This isn't a long-term solution; it just keeps things from getting worse.

PASS ORDINANCES

Two ordinances can reduce the crime rate by reducing the number of monthly crimes. You'll pay for them in Simoleons and Mayor Rating, but these ordinances can have a major effect after your population becomes large.

- Junior Sports: -5%
- Youth Curfew Act: -5%
- Neighborhood Watch: -5%

Repealing the Legalized Gambling ordinance (if you passed it) also has a heavy positive impact.

IMPROVE EQ

To get at the germ of crime, change its most fundamental cause: low EQ. The lower a Sim's education, the more likely he or she is to commit a crime. This is true among all wealth levels, but most dramatically so in the lowest (R§).

Improving EQ for all wealth levels reduces crime by lowering base criminality.

Simple, right? No. Difficult and long term. It takes many years, hard choices, and lots of money to improve the education of your populace.

The payoff (in many areas of the simulation) is, however, worth it. By investing in education in the short term, you're guaranteeing that you can spend less on law enforcement in the future.

This school is your number-one crime fighter.

GETTING INFORMATION ABOUT CRIME

Stay on top of your crime problem with this array of resources:

- The signs of crime are everywhere, so zoom in and look around. Check out graffiti on the walls, toilet paper in the trees, chalk outlines in back yards, stripped cars in driveways. Concentrations of these signs indicate areas where crime is becoming a problem.

- Consult the Safety City Opinion Poll. It isn't precise, and it includes fire safety, but it confirms whether things are going badly or well.

- Chat with your Public Safety Advisor.

- Tinker with your Public Safety and Education budgets.

- Learn about your city's current education level and the location of schools in the Education Data View.

- Explore the Crime Data View to get a grip on where crimes are happening, where they have happened in recent months, and where your police coverage is.

- Look into history with the Crime, Education, and Education by Age Graphs.

- See what your My Sims think of crime in their neighborhoods.

MAYOR RATING

What your Sims think of you matters, on every street corner and in every home.

Mayor Rating gives you another factor to balance as you mold your city. It's another competing demand that can either limit your choices (or make your favored ones more costly) or expand them (forcing you to favor one group over another).

To master public approval, know what factors into it, what you can get away with doing, what you should never do, and what it gets you. Mayor Rating has several repercussions:

- It acts as a Reward trigger
- Low levels cause riots

WHAT IS MAYOR RATING?

Mayor Rating is a local effect that reflects your performance in areas Sims deem vital and within your control.

It can be either a simulation effect (e.g., quality of local schools) or a building effect (e.g., from Landmarks).

For every Residential tract of land in your city, all Mayor Rating building effects and simulation categories that affect the tract are summed up to determine the *local* Mayor Rating. These are averaged to yield the global Mayor Rating.

For Mayor Rating, both the local and global manifestations of an effect are important. Global Mayor Rating dictates (in part) the acquisition of Rewards, while local Mayor Rating can inspire a riot. Keep both extremes in view at all times and you'll do well.
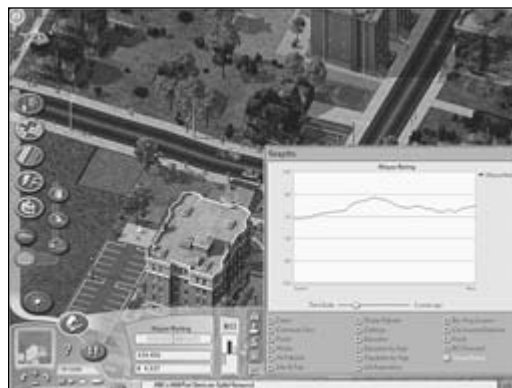
Uncover your Global Mayor Rating by reading the Mayor Rating Graph.

NOTE

The Mayor Rating effects of buildings introduced in the *Rush Hour* expansion pack are discussed in Part 8.

MAYOR RATING FACTORS

There are three kinds of Mayor Rating factors: short-term, long-term, and building (Rewards). Each feed into your Mayor Rating in a distinct way.

SHORT-TERM MAYOR RATING FACTORS

Short-term factors arise out of transient events that attract your Sims' attention. These events can send spikes of positive or negative opinion into your local Mayor Rating, suddenly (albeit temporarily) trashing your good reputation or making people forget their long commute and mediocre schools. One in particular can unexpectedly drop you into possible riot territory.

Over time, the impact of these effects diminishes. Every month, short-term effects decay by about 25 percent.

Short-term factors are:

FIRE

- Effect: -20
- Radius: 128

A fire in a neighborhood makes everyone feel insecure even if you immediately put it out. A sudden outbreak of fires in a given area can be enough for riots to breakout in a borderline neighborhood.

Fires cause Mayor Rating to plummet during the fire and in the immediate aftermath. This drop can make some areas prime for a riot and more fires.

Minimize this by making sure such medium-to-low Mayor Rating areas are well watered and free of abandoned buildings.

FLORA ADDED

- Effect: 3
- Radius: 32

Placing trees with the Landscape Tool lets your Sims know you care and you're watching over them. Planting a tree throws good vibes into the mix.

CIVIC BUILDINGS ADDED

- Effect: 25
- Radius: 128

Placing a civic building (High School, Police Station, etc.) in a neighborhood fills everyone with happy feelings toward their Mayor, for a while at least.

Dropping civic buildings, such as a new school, temporarily boosts Mayor Rating as the locals get caught up in the moment.

To spur an area that looks like a potential riot hotspot, drop in a needed civic service. A bit of Mayoral attention goes a long way.

LONG-TERM MAYOR RATING FACTORS

Longer-term Mayor Rating Effects represent ongoing conditions and events in your city. Their impact shows as citizens notice the changes.

CRIME

Range: +10 to -50

The level of crime on a given tract (number of crimes committed there) can affect the Mayor Rating of those who live there.

You don't need to eradicate crime to get some positive Mayor Rating from this factor; you just need to keep it low. Depending on the actual crime level, you can earn 0–10 positive Mayor Rating points for keeping crime down.

Let crime go too high, and the landscape changes. Once in negative territory, the effect of crime drags your Mayor Rating at a constant rate until crime crosses the threshold to "out of control." When crime becomes rampant, your Mayor Rating plummets toward -50.

AIR POLLUTION

Range: +10 to -35

The air a Sim breathes when he or she walks out the door reflects on what he or she thinks of the job you're doing.

Total eradication of pollution is impossible, so you won't ever see the full 10-point boost for 0 pollution. Keep it low (less than 400) to get 0–10 points for your effort.

Let it go lower, and you could face a Mayor Rating reduction of as much as -35.

WATER POLLUTION

Range: +10 to -35

Brown water makes Sims think of you. If it's coming out of the tap a bit thick, there's no one to blame but the Mayor.

You won't get as much credit for keeping the water clean (0–10 points for keeping it above 400), but you'll take a severe hit for letting it go lower (down to -35).

GARBAGE

Range: +10 to -35

The presence of garbage piles on a tract makes everyone point the finger at you.

If things are normal (garbage going into a Landfill, Recycling Center, Waste to Energy Plant, or out via a Neighbor Deal), you get the full Mayor Rating boost for picking up the garbage: 10 points.

As garbage piles up, the positive effect decreases and turns negative. When the trash mounds up, the effect drops toward its basement of -35 Mayor Rating.

RADIATION

Range: 0 to -50

A glimmer of radiation on a tract tacks on -50 Mayor Rating. Keep this in mind when deciding whether to enjoy the benefits of the Toxic Waste Dump; you get a Mayor Rating reduction for having it, plus every tile around it gets an automatic -50 penalty. This can wreak havoc with your global Mayor Rating.

RESIDENTIAL NIMBY/YIMBY EFFECT

Range: 0 to +3

Many buildings (primarily recreational structures such as parks) have an area effect that impacts desirability of Residential land. This is known as the Residential NIMBY/YIMBY Effect.

Building parks enhances your Mayor Rating.

If a Residential tract falls within the Residential NIMBY/YIMBY Effect radius of a building, it receives a certain number of points toward Desirability. Some buildings give positive points (YIMBYs), some (NIMBYs such as the Casino) give negative points.

The sum of all Residential NIMBY/YIMBY Effect points that touch a tract translate into a boost to Mayor Rating. If the score is greater than 0, a tract can earn Mayor Rating points for this factor; a cumulative Residential NIMBY/YIMBY score of 100 earns 3 points.

There is no negative Mayor Rating effect from this factor. If a tract's total NIMBY/YIMBY Rating is negative, it gets 0 points toward Mayor Rating.

SCHOOL COVERAGE

Range: +7 to -7

The amount of school coverage is important to Sims of all income levels, and you get all of the credit and blame if things come up short.

Any tract with no school coverage takes a -7 penalty to Mayor Rating. As long as a tract is within the coverage area of one age appropriate educational building, it receives +7 Mayor Rating.

The age appropriateness of a school building is important. Each educational building has an impact on defined generations: the Elementary School benefits only young Sims while the Opera House exclusively benefits older Sims. Anyone outside of an educational building's effective ages gets no educational benefit.

TIP
Given its even educational benefits to all age groups, the Local Branch Library is a great investment in improving Mayor Rating.

Likewise, a property with an average age not benefitted by a nearby educational building would not get any Mayor Rating benefit from it.

For Mayor Rating, the amount of EQ boost a generation gets is irrelevant; the Mayor Rating effect is the same. If a tract is within the radius of an age appropriate educational building, it gets the full Mayor Rating boost of 7 points.

NOTE
Don't think about the school ages as being the ages of the students attending them. For educational purposes, what matters is the average age of the *household* not the students within it.

Age Ranges for Educational Structures

Structure	Age Range
City College	30–79
City Museum	30–100
Elementary School	20–49
High School	30–59
Local Branch Library	20–79
Main Library	20–100
Major Art Museum	30–100
Opera House	50–100
Private School	20–59
University	20–100

HOSPITAL

Range: +7 to -7

The public views healthcare as being within your power to provide.

If a tract is within the radius of a healthcare building, it gets a full Mayor Rating boost of 7. If it's outside the radius of any healthcare building, it gets -7 points.

COMMUTE TIME

Range: +7 to -7

Mayor Rating is another place where your success at building a transit system is measured. Keep ways to work flowing, invest heavily in mass transit, and keep the jobs close to net as much as 7 points. Let things back up and the blame could cost you up to -7 points.

A no-job zot means this Sim's commute is too long. Your Mayor Rating is suffering here.

TRAFFIC NOISE

Range: +7 to -7

The amount of traffic passing near a tract can make a Sim grumpy or equally gushy. If a Sim can't sleep for all the cars rushing by, it costs you -7 points. Keep passing traffic spare and the noise level down and you'll get credit up to 7 positive points.

TAX CHANGE

Range: +25 to -25

Changing tax rates should be deliberate and thoughtful (unless you need a quick boost to Mayor Rating).

Decreasing taxes boosts Mayor Rating. Doing it gives your Mayor Rating a boost.

Likewise, raising taxes makes you unpopular. Raising them suddenly makes you not just unpopular but (at least for a while) reviled.

⊗ **CROSS-REFERENCE**
Changing tax rates can affect demand, but that's a separate issue from the effect on Mayor Rating. For more information on that effect, see Chapter 8.

Mayor Rating Effect of Tax Rate Changes

Change in Applicable Tax Rate	MR Effect
-20%	+25
-10%	+20
-5%	+10
-2%	+7
-1%	+5
+1%	-5
+5%	-10
+10%	-20
+20%	-25

If your current tax rate for your R§§ Sims is 10%, lowering it to 9% will get you a Mayor Rating boost on all R§§ tiles of +5. Jacking it up to 15% will get you pounded by -10 Mayor Rating points on all R§§ tracts.

VALUE TO WEALTH RATIO

Ratio: +5 to -5

The wealth level of a house is not necessarily connected to the value of the land on which it sits. But it's difficult for a low-wealth Sim to live on high-value land due to the extra expenses involved (e.g., property taxes).

NOTE
There are no property taxes per se in *SimCity 4*, but it is mentioned here to explain the fiction behind this effect.

Likewise, a R§§§ Sim living on low-land-value property is happy because expenses are so low.

Both the low-wealth and high-wealth Sims in these examples feel they have you to blame/thank. Living on land that matches wealth level yields no Mayor Rating effect. The higher the differential between wealth vs. land value, the greater the Mayor Rating Effect. Thus:

Land Value to Wealth Mayor Rating Effect

	Low LV	*Med LV*	*High LV*
Low Wealth	0	3	5
Med Wealth	-3	0	3
High Wealth	-5	-3	0

BUILDING EFFECTS

Building Effects come from select Rewards and Business Deal buildings. These structures exert a fixed Mayor Rating effect on every building within their radius for as long as the building exits. This effect is spread over the radius.

For Rewards and Landmarks, the effect reductions in funding for the Reward can reduce or negate.

NOTE
Note the large radii (440) on many of these structures. No matter where you put them, they'll affect Mayor Rating in every tract, even in a large city.
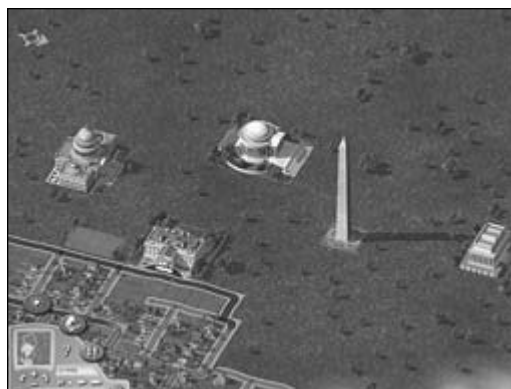
Some buildings, such as these Landmarks, add to Mayor Rating all around them.

Mayor Rating Effects of Reward/Landmark/Business Deal Buildings
(Items with a * can be downloaded from simcity.com.)

Structure	Mayor Rating Effect	Mayor Rating Effect Radius
Advanced Research Center	-3	220
Alamo	7	256
Alcatraz	-2	256
Amalienborg	5	256
Arc de Triomphe*	15	256
Army Base	-7	440
Bank of America	6	256
Bank of China Tower	5	256
Big Ben	7	256
Brandenburg Gate*	7	256
Capitol Records Building*	3	256
Casino	-7	440
Cemeteries	2	220
Chrysler Building	9	256
City Zoo	5	440
CN Tower	7	256
Coit Tower	5	256
Colossal Mayor's Statue	3	440
Country Club	-5	220
Disease Research Lab	2	440
Empire State Building	9	256
Faneuil Hall	5	256
Federal Prison	-7	440
Fernsehturm	5	256
Gateway Arch	8	256
Globe Arena*	5	256
Grand Central Station*	8	256
Great Pyramid	10	256
Guggenheim Museum	8	256
Hagia Sofia	7	256
Hollywood Sign	2	256
Houses of Worship	4	110
Impressive Mayor's Statue	3	220
Independence Hall	7	256
Jefferson Memorial	8	256

Mayor Rating Effects of Reward/Landmark/Business Deal Buildings continued

Structure	Mayor Rating Effect	Mayor Rating Effect Radius
John Hancock Center	8	256
Lincoln Memorial	8	256
Living Mall	5	256
Magnificent Mayor's Statue	3	330
Major Art Museum	5	440
Major League Stadium	5	440
Mayor's House	2	220
Mayor's Statue	3	110
Minor League Stadium	3	440
Missile Range	-5	440
Palace of Fine Arts	6	256
Palacio Real	6	256
Parthenon*	7	256
Radio Station	2	440
Resort Hotel	4	440
Rotes Rathaus	5	256
Seoul City Hall*	5	256
Seoul World Cup Stadium*	5	256
Smith Tower	5	256
Sphinx	7	256
St. Basil's	7	256
State Fair	5	440
Statue of Liberty	9	256
Sungyre-mun*	8	256
Taj Mahal	8	256
Temple Expiatoiori de la Sagrada Familia*	5	256
Tokyo Tower	7	256
Tower of London	6	256
Toxic Waste Dump	-10	440
U.S. Capitol Building	9	256
Washington Monument	7	256
White House	6	256
63 Building*	8	256

ORDINANCES

Ordinances can influence Mayor Rating. Some have positive effects, some negative. These effects last as long as the ordinance is in effect.

- Automobile Emission Reduction Act (-5)
- Nuclear Free Zone (+5)
- Power Conservation Act (-10)
- Youth Curfew Act (-10)

MAYOR RATING EFFECTS

The point of keeping a good Mayor Rating may not be as viscerally compelling as enhancing desirability or as rewarding as raising your city's EQ, but it does have great payoffs (most of which can help with the game's other goals), especially for those into instant gratification. They also provide a dire "failure state" for anyone that ignores Mayor Rating: the dreaded riot!

REWARD TRIGGERS

The primary thing a high Mayor Rating gets you is Reward Buildings. In addition to the sense of accomplishment they impart, they improve your city in myriad other ways (enhancing desirability, boosting EQ or HQ, further increasing Mayor Rating, to name a few).

When you reach a Reward milestone, the reward is announced by your City Planner. You can thank (in part) Mayor Rating for your new reward.

Rewards triggered (at least in part) by Mayor Rating (including their MR requirements) include:

- Advanced Research Center: 54 MR
- The Bureau of Bureaucracy: 30 MR
- Cemetery: 42/46/50 MR
- City Hall: 20 MR
- City Zoo: 68 MR
- Convention Center: 40 MR
- Country Club: 55 MR
- Courthouse: 33 MR
- Disease Research Lab: 45 MR
- Farmer's Market: 34 MR
- House of Worship: 40/44/48/52 MR
- Main Library: 37 MR
- Major Art Museum: 45 MR
- Major League Stadium: 30 MR
- Mayor's House: 20 MR
- Minor League Stadium: 20 MR
- Movie Studio: 52 MR
- Opera House: 52 MR
- Radio Station: 30 MR
- Resort Hotel: 52 MR
- State Fair: 48 MR
- Statues: 60 MR
- Stock Exchange: 45 MR
- Television Studio: 50 MR
- University: 42 MR

RIOT TRIGGER

The primary trigger of the Riot Disaster is low Mayor Rating. Any time a tract's Mayor Rating drops below -50, there's a probability of a riot occurring.

Where the real trouble occurs is in riot "hotspots." These clusters of bad Mayor Rating create a heightened probability of rioting. Anywhere you find three tiles of -50 Mayor Rating within a four-tile radius, there's a riot hotspot.

Neighborhoods such as this are the breeding ground for riots.

With Mayor Ratings like this place had, this riot was inevitable.

The size of the hotspot dictates the probability of a riot occurring. For example, five low-Mayor Rating tiles (within at least a four-tile radius) hold a 10% probability of a riot. Twenty low Mayor Rating tiles clustered together guarantee a riot (100% probability).

⊗ CROSS-REFERENCE

For more on riots, see Disasters, Chapter 25.

GETTING INFORMATION ABOUT MAYOR RATING

There are several ways to read Mayor Rating:

- Check the Mayor Rating indicator in Mayor Mode to see how you're doing citywide.
- Query individual Residential structures to see what their particular Mayor Rating is. If it's low, look at some of the other listed factors (traffic noise, commute, crime, pollution, etc.) to see if any of them tell you why.
- Consult with your City Planner Advisor and keep an eye on messages from him in the News Flipper.
- Make sure all Rewards and Landmarks are fully funded in the Budget tool.
- Apply the Mayor Rating Data View to see where you're liked and disliked. If any areas are low, turn on the Crime, Education, Traffic, Health, Air Pollution, Water Pollution, Garbage, or Radiation Data Views to gain some insight.
- Call up the Mayor Rating Graph. If you're trying to diagnose problems, look to the Crime, Commute Time, Air Pollution, Water Pollution, Garbage, or Education Graphs.
- Check what your My Sims are saying about you in My Sim Mode.

PART 6: DEPARTMENTS AND FORCES

Up until now, we've stuck to the big topics and the underlying concepts. When you master those, the next step is to understand how to use what you have in your toolbox to run a city.

The topics described in this part cover all of the nitty-gritty things you need to know to manage your city on a day-to-day basis.

- Chapter 17: Utilities
- Chapter 18: Public Safety
- Chapter 19: Transportation
- Chapter 20: Education
- Chapter 21: Health
- Chapter 22: Recreation

- Chapter 23: Rewards
- Chapter 24: Ordinances
- Chapter 25: Neighbors/Regional Play
- Chapter 26: Business Deals
- Chapter 27: Disasters
- Chapter 28: Landmarks

UTILITIES

No city can survive long without the three essential utility services:

- Power
- Water
- Garbage disposal

THAT IS *SO* 3K!

Now Power Plants, Water Pumps, Power Lines, Landfills, etc. feature monthly maintenance fees.

On the upside, Power Plants can no longer spontaneously explode if run over capacity.

Water is now drawn from underground sources, so Water Pumps, etc. need not be near open water, and aren't affected by salt water.

Water radiates only six tiles from pipes and water generating structures.

Gone are the Incinerators, Desalinization Plants, and Microwave Power Plant.

One of the crucial challenges in *SimCity 4* is providing the networks to keep these services available, while keeping the costs of providing them under control. A deeper understanding of the utility mechanisms will permit you to meet this challenge.

UTILITY COSTS

Utilities cost money both in the initial capital outlay and in subsequent monthly maintenance costs.

The monthly maintenance cost can be adjusted by tinkering with the local funding level of an individual Power Plant or through department-wide funding.

Utility buildings cost money on a monthly basis. Manage those costs by keeping capacity running ahead of usage.

> **NOTE**
> A utility's age is not simply a measure of the number of years since it came online. It's, more accurately, a percentage of its age altered by usage and funding.

The point is, a 25-year building may reach 90 percent of its lifespan in 15 years if it's been heavily used.

This cost varies over time based on another factor: the building's age. As utility structures age, the cost of maintaining them increases. The older a building gets, the more it costs to operate, culminating in a rise in expense after 90 percent lifespan.

Impact of Age on Maintenance Cost—Power

Lifespan Percentage	Percentage of Original Maint. Cost
0%	100%
40%	103%
50%	105%
65%	115%
75%	130%
85%	155%
90%	185%
100%	300%

Impact of Age on Maintenance Cost—Water and Garbage

Lifespan Percentage	Percentage of Original Maint. Cost
0%	100%
50%	103%
65%	110%
75%	120%
90%	150%
100%	175%
110%	220%

The final cost increase acts as an incentive to decommission and replace your old plants before they near their end of life. Keeping old plants online is expensive (and in the case of Power Plants, explosive).

NOTE

You can extend the life of your utility buildings (a bit) by overfunding them.

UTILITY DECAY

All types of utility buildings have a theoretical lifespan: the number of years it can run at full funding and at 100 percent capacity. Because neither of those factors is constant over the life of a building, the actual lifespan will differ.

Actual lifespan is the inherent lifespan modified by two things:

- Funding: the level of funding (0–120 percent)
- Usage: the amount of capacity (0–120 percent)

FUNDING AND UTILITY BUILDING DECAY

A utility building's level of funding can increase or decrease the rate of aging, shortening or lengthening (respectively) the lifespan of the building.

Funding Level vs. Decay Rate of Utility Buildings

Funding Level	Decay Rate
0%	110%
100%	100%
120%	90%

Decay rate at 0 funding is 10 percent faster than at optimal (100 percent) funding. Increasing funding level to maximum (120 percent), slows aging by 10 percent and extends the building's life.

USAGE AND UTILITY DECAY

The amount of usage a building gets alters its inherent lifespan, slowing or speeding aging and decay.

Usage vs. Decay Rate of Utility Buildings

Capacity Used	Decay Rate	Capacity Used	Decay Rate
0%	10%	90%	125%
25%	20%	100%	155%
50%	45%	110%	200%
75%	85%		

DECAY SUMMARY

The speed with which your utility buildings need to be replaced is traceable to how well they're funded and how heavily they're used. If you underfund your plants and run them near, at, or over maximum capacity, you'll need a new Power Plant a lot sooner.
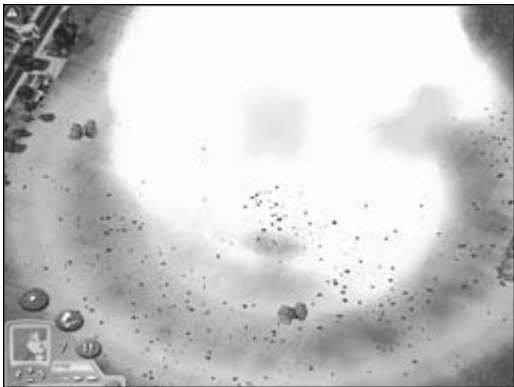
Let a Power Plant live out its full life, and it'll thank you like this. Put it to sleep (especially a Nuclear Power Plant) before this happens.

OUTPUT LEVELS AND PLANT AGE

The older a plant gets, the less of its maximum output it produces. Where it stands on its potential lifespan impacts how efficiently it works and whether it's worth what you pay for it.

Impact of Age on Utility Output—Power

Lifespan Percentage	Maximum Percentage of Capacity
0%	100%
40%	95%
50%	92%
60%	86%
70%	77%
80%	60%
90%	35%
100%	0%

Impact of Age on Utility Output—Water and Garbage

Lifespan Percentage	Maximum Percentage of Capacity
0%	100%
50%	95%
65%	90%
75%	80%
90%	55%
100%	30%
110%	0%

This factor provides another incentive to rotate your city's utility buildings before they reach the end of their life. On a per-unit basis, the cost of power produced by an aged plant is high, due to both low output and increased maintenance cost (see the previous table).

POWER

Your power system is the thing without which nothing can develop. So essential is power that no RCI building will develop. Power cut-offs cause existing RCI buildings to become abandoned in short order.

NOTE

Non-RCI buildings (hospitals, schools, Landmarks, etc.) work without power, but still display a no-power zot if denied it. Only police and fire stations are truly self-generating.
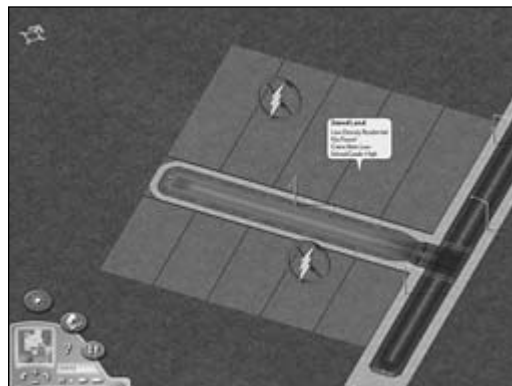
No power, no growth.

Your job as Mayor is to supply and maintain power to your city, keep up with rising and changing demand, and do it all for as little money as possible.

POWER EFFECTS

Lack of power has many effects:

- An undeveloped zone with no power will not develop.
- A developed RCI building will distress and be abandoned if power isn't restored within six months.
- A non-RCI building (except for Fire and Police Stations, which are self-powered) will display a no-power zot until power is restored.

POWER GENERATION

Power is generated by Power Plants either in a city or in a neighboring city with which your city has a deal to import power.

Every Power Plant has a different cost, monthly maintenance cost, capacity, and age limit. You must decide which plants you can afford in the short term and which, though initially more expensive, will save you money over time.

To get this power into your city's power grid, find a way to convey it.

POWER CONVEYANCE

Power radiates for *four tiles* from:

1. A Power Plant

2. A Power Line

3. A powered building or utility structure, such as a Water Pump

4. A powered zone

TIP

Power is not conveyed by unzoned tiles and transportation elements.

The ability to receive power extends four tiles from any building or zone.
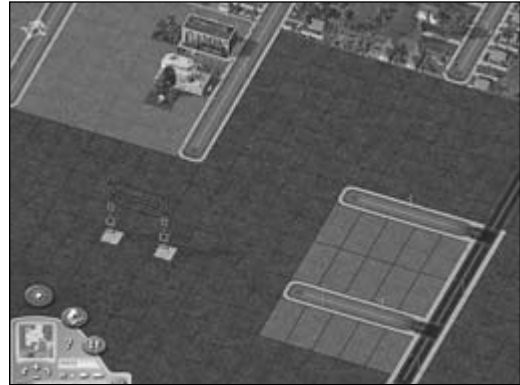
These Power Lines are the minimum for this situation: four tiles from the Industrial zone to the north and four tiles to the isolated Residential zone.

TIP

You can cut down on Power Lines if you keep this transmission distance in mind. Rather than running Power Lines from the edge of one thing to the edge of another, stop four tiles short and you still get the power where it needs to go. This saves in construction costs and monthly maintenance.

It also minimizes damage from any future Sparking Power Line Disasters (see Chapter 27) by keeping poles away from flammable buildings and your total Power Line countdown (another factor in the occurrence of the Power Line Sparking Disaster).

The effective result is this: Anywhere you'd want to transmit power, two things can have no more than four tiles between them.

IS IT POWERED?

There are many ways to determine if your city has the power it needs.

Anything without power displays a no-power (lightning bolt) zot. If the thing is an inhabited RCI building, you have less than six months to restore power or the building will be abandoned.

Power status is also shown in a building's Query box and often in its pop-up label.

To diagnose power issues, turn on the Power Data View. This displays the layout of your power and also how far it's conveying power.
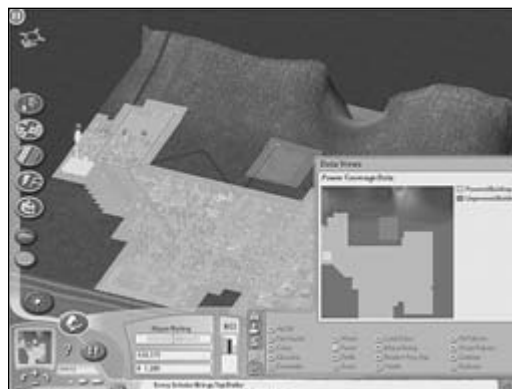
The Power Data View gets to the crux of power problems. It updates in real time so you can turn it on while zoning or laying out lines to help get the spacing right.

POWER LINES

Power Lines are cheap to build (§2 per tile) and maintain (§0.10 per tile, per month), but they cause problems.

Some find them unsightly and want to use them only when necessary. You only have to have Power Lines for as long as you need them. If you zone over them, the lines disappear and the zone takes over their power conveyance function.

Power funding below 50 percent causes Power Lines to degrade to the point of sparking. This causes fires. The more Power Lines you have citywide, the greater the chance of sparking.

CROSS-REFERENCE

For details on dealing with the Sparking Power Lines Disaster, see Chapter 27.

NOTE

Running power lines over water doesn't cost extra Simoleons.

POWER PLANTS

All power is created by Power Plants, and you have eight (five standard and three Reward) to choose from. At the outset, you can select between:

- Coal Power Plant: High air and water pollution, cheap to run.

- Natural Gas Power Plant: Lowest pollution of the "dirty" plants, generates less power than coal for more money.

- Oil Power Plant: High air and water pollution, expensive for the power it produces.

- Waste to Energy Plant: High air and water pollution. Low output (considering pollution and cost). Consumes garbage. Power capacity is proportional to the amount of garbage it incinerates (up to 500 tons). No garbage, no power.

- Wind Power Plant: No pollution. Low cost, but low output.

As you meet certain conditions (see Chapter 23), Reward power plants become available. These are cleaner, but more expensive and harder to obtain:

- Hydrogen Power Plant: Expensive, clean, short inherent lifespan, massive power output.

- Nuclear Power Plant: Low pollution (unless it explodes and melts down), short inherent lifespan, large power output, expensive.

- Solar Power Plant: Expensive relative to output, minimal pollution, long lifespan, low output.

POWERING YOUR CITY

A power system must produce enough power to supply the needs of the grid to which it's connected and meet its obligations to any Neighbor Deals. To view current usage vs. current capacity, consult the Power Graph. If the lines converge, you'll see power shortages.

The Power Graph shows where capacity vs. usage stand.

When power capacity can't meet usage, your city will experience "rolling blackouts." In a rolling blackout, a section of your city large enough to bring usage under capacity will have its power cut for a month. If the situation isn't rectified by the next month, a different section of the city is selected and cut off. The problems this causes are obvious: possible abandonment, lack of new development, etc.

> **! WARNING**
>
> If a blacked-out section of your city contains your water supply structures, and losing them is enough to cause water shortages, your city also may face water cutoffs. Because the blackout lasts a month, and it takes another month to update the water system, large portions of your city could be dry for two months!

To avoid this situation, don't risk blackouts by running near capacity. If that's unavoidable, have more Water Pumps and Towers than you need, and scatter them so they won't all be unpowered during a rolling blackout.

POWER AND POLLUTION

The great balancing act with power supply revolves around pollution; they produce a lot of both water and air pollution, and the ones that don't are either expensive or low output.

Place polluting Power Plants in areas of already-high pollution and/or along edges of maps; don't place them near Water Pumps and Towers.

POWER PLANT BUILDING DIRECTORY

Power Plant Buildings

Structure	Power Generated	Plant Life Expect.	Air Pollution	AP Radius	Water Pollution	WP Radius	Cost	Monthly Cost	Bulldoze Cost
Coal Power Plant	6,000	75	200	16	150	14	§10,000	§250	§450
Hydrogen Power Plant	50,000	50	10	3	8	4	§100,000	§10,000	§4,500
Natural Gas Power Plant	3,000	75	60	12	65	12	§9,000	§400	§410
Nuclear Power Plant	16,000	60	10	4	45	5	§40,000	§3,000	§1,800
Oil Power Plant	7,000	75	150	14	80	14	§17,000	§600	§770
Solar Power Plant	5,000	100	5	3	5	3	§30,000	§1,000	§1,350
Waste to Energy Plant	5,000	80	250	20	200	19	§25,000	§1,000	§2,250
Wind Power Plant	200	100	0	0	0	0	§500	§50	§20

COAL POWER PLANT

- Size: 4x4
- Cost: §10,000
- Monthly Cost: §250

HYDROGEN POWER PLANT (REWARD)
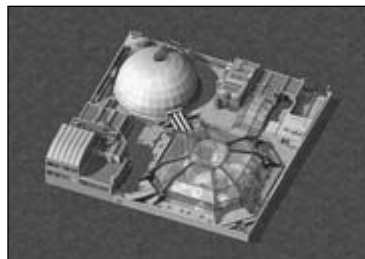
- Size: 5x5
- Cost: §100,000
- Monthly Cost: §10,000

NATURAL GAS POWER PLANT
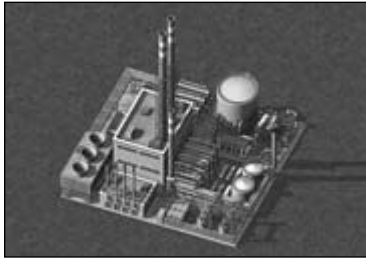
- Size: 4x4
- Cost: §9,000
- Monthly Cost: §400

OIL POWER PLANT
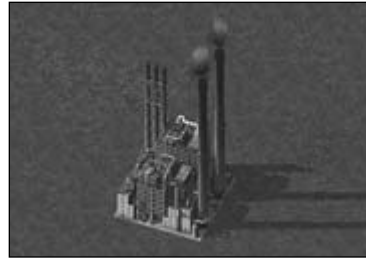
- Size: 4x4
- Cost: §17,000
- Monthly Cost: §600

NUCLEAR POWER PLANT (REWARD)

- Size: 4x4
- Cost: §40,000
- Monthly Cost: §3,000

SOLAR POWER PLANT (REWARD)

- Size: 6x6
- Cost: §30,000
- Monthly Cost: §1,000

WASTE TO ENERGY PLANT

- Size: 4x4
- Cost: §25,000
- Monthly Cost: §1,000

WIND POWER PLANT

- Size: 2x1
- Cost: §500
- Monthly Cost: §50

NOTE

Wind power is clean, but to supply power in a respectable volume, expensive. To create the same output as a Coal Power Plant, you'd need 30 Wind Power Plants. That would consume 60 tiles and cost §15,000, plus §1,500 a month.

WATER

Water isn't as essential to life as power, but it's close.

WATER EFFECTS

Development will occur in low- and medium-wealth developer types without water supply but only to a limited extent; each developer type only develops up to the maximum stage listed below:

- R§: Stage 3
- R§§: Stage 3
- R§§§: No Development
- Cs§: Stage 3
- Cs§§: Stage 3
- Cs§§§: No Development
- Co§§: Stage 3
- Co§§§: No Development
- IA: Stage 3
- ID: Stage 1
- IM: Stage 1
- IHT: No Development

Beyond these stage limits, any buildings that depend on water will become abandoned in six months if water is cut off.

The other repercussion from a lack of water supply is subtle. An unwatered building is more flammable. This increases the frequency of fires and raises the chance that they'll grow too quickly to control.

If you see the no-water zot, go underground and find out why the water's not flowing.

WATER PRODUCTION

Water is drawn from underground aquifers (never open water) by either Water Pumps or Water Towers. The difference between them is one of capacity and expense.

WATER CONVEYANCE

Water is conveyed from Pumps and Towers to your city via Water Pipes.

Somewhat like Power Lines, water structures and connected pipes radiate water for six tiles in every direction.

Nothing else (zones, buildings, etc.) conveys water. To bring water, you must use pipes.

There is one concession to efficiency in water conveyance: If water touches the outer edge of a building, it will water the entire building.

To water that last bit, the pipe and its six-tile radius need to extend four more tiles west.

IS IT WATERED?

Anything that requires water to function and isn't watered will have a no-water zot (water drop) hanging over it.

If, however, it's a building or zone that doesn't require water, no zot appears. Instead, dig deeper with the building's Query box or its pop-up.

View water network and range by calling up the Water Data View.

PIPES

Pipes are the roadways of your water supply system, bringing water from its source to your hungry zones. They cost §11 per segment, and §0.10 each month.

Normally, at full funding, pipes are maintained and replaced automatically as they age. If you drop funding below 50 percent, the pipes will not be repaired, becoming distressed. Distressed pipes can burst.

CROSS-REFERENCE
See Chapter 27 for details on dealing with this crisis.

WATER SUPPLY STRUCTURES

Water is supplied by two structures:

- Water Tower: Low cost, low capacity, long inherent lifespan.
- Water Pump: Expensive, high capacity, shorter lifespan.

For these structures to do their job, they must be connected to pipes that will convey the water to the rest of your city.

TIP
Though it costs extra Simoleons, it pays to make redundant connections in your pipe network and have several Water Pumps feeding into the same water network. Keep your city on the same water network, and not isolated on disconnected mini-grids. This ensures against water shortages and pipe destruction due to bursts or other Disasters.

NOTE
The new Large Water Pump introduced in the *Rush Hour* expansion pack is discussed in Part 8.

WATERING YOUR CITY

The collective capacity of citywide Water Pumps and Water Towers must be able to supply your city's water needs and the demands of any outgoing Neighbor Deals. If it's unable to do so, usage exceeds capacity and water shortages occur.

Shortages begin with the buildings farthest away from the water source and can only be remedied by adding Water Pumps or Towers, or striking an incoming Neighbor Deal.

WATER AND POLLUTION

Unlike Power Plants, Water Pumps and Water Towers generate only minimal pollution, so put them anywhere.

TIP
You don't want Water Pumps in high wealth-level desirability neighborhoods because they consume otherwise valuable real estate.

Water Pumps and Towers are affected by pollution. If water pollution around it is too high (above 512), a Water Pump and Water Tower will shut down.

Don't put a Water Pump here! That pollution would shut it down.

TIP
You can see pollution near a Water Pump or Tower if it's near open water. The open water appears black and cloudy.

You have a weapon in the battle against water pollution: the Water Treatment Plant. This structure acts as a negative water pollution producer over a wide radius. You can theoretically eradicate water pollution in your city by placing enough Water Treatment Plants. Put them in areas of high water pollution concentration and near Water Pumps/Towers.

NOTE
Water Treatment Plants need not be connected to the water system by pipes. They can sit anywhere.

WATER BUILDING DIRECTORY

Water Buildings

Structure	Water Produced	Life Expectancy	Air Pollution	AP Radius	Water Pollution	WP Radius	Cost	Monthly Cost	Bulldoze Cost
Water Pump	20,000	75	1	1	0	0	§1,400	§350	§100
Water Tower	2,400	100	0	0	0	0	§150	§50	§10
Water Treatment Plant	0	75	1	3	-300	48	§15,000	§350	§1,350

WATER PUMP

- Size: 1x1
- Cost: §1,400
- Monthly Cost: §350

WATER TOWER

- Size: 1x1
- Cost: §150
- Monthly Cost: §50

WATER TREATMENT PLANT
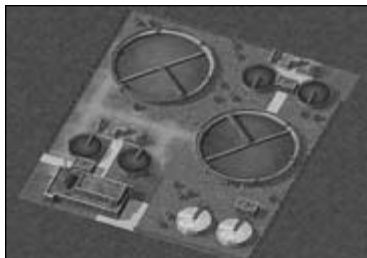
- Size: 7x6
- Cost: §15,000
- Monthly Cost: §350

GARBAGE COLLECTION

Most buildings produce garbage. All a building's waste is put into the garbage collection system and, under normal circumstances, is picked up without problems.

NOTE

Every unit of garbage picked up in your city costs §0.005 per unit in your Utilities budget (Sanitation Dept., Pickup and Delivery).

There's no problem if the garbage has somewhere to go. If not, it causes trouble. With no place to dump it (Landfill, Waste to Energy Plant, Recycling Center, or outgoing Neighbor Deal), Sims let garbage pile up on their curbs and in their lawns. Uncollected garbage negatively affects your Sims' HQ.

To rid your city of improperly dumped garbage, you need a solid garbage disposal system. This can consist of any of these four elements:

- Landfill
- Recycling Center
- Waste to Energy Plant
- Neighbor Deal

LANDFILLS

Landfills are the most basic and inexpensive trash disposal solution. Lay down single tiles (like zones) of at least 2x2 groups, connect them to your city via Road, and the trash rolls in.

Garbage comes to the Landfill and gets dumped on a tile. Each tile holds up to 300 tons of garbage. When one is full, the trash collectors look for another tile to fill. This goes on and on, hopefully without incident.

Landfills belong in already-polluted areas. Dirty Industrial cares little for their filthiness.

It takes a while to get rid of a Landfill. You have to decommission the Landfill by demolishing all Road access to it (no Roads or Streets can touch it). Then you have to wait for all the garbage deposited in it to decompose (at a rate of about seven percent per month up to 15 tons).

TIP

Put your Landfills where they have room to expand and where you could cut off the Roads without injuring any nearby developers. All this argues for putting Landfills in the middle of nowhere.

When the trash in a Landfill is decayed, you can dezone the Landfill tiles and turn them into something else.

WASTE TO ENERGY PLANT

For more extreme garbage disposal solutions, look to the Waste to Energy Plant. This garbage incinerator/Power Plant serves two functions, but does both in a filthy way.

If you want this mega-polluter in your city, it is a good garbage disposal solution—huge capacity (500 tons per month) and is easier to get rid of than a Landfill.

RECYCLING CENTER

The Recycling Center doesn't dispose of your city's garbage. Instead, it reduces the amount of garbage sent into the system by recycling it.

One Recycling Center reduces garbage output by 25 percent for every 25,000 Residents. When population exceeds 25,000, you need a second Recycling Center to maintain the full 25 percent reduction.

Also, adding a Recycling Center triggers the Trash Presort ordinance, enactment of which reduces your trash output even further.

GARBAGE STRUCTURE DIRECTORY

Garbage Structure Directory

Structure	Garbage Capacity (monthly)	Life Expectancy	Air Pollution	AP Radius	Water Pollution	WP Radius	Cost	Monthly Cost	Bulldoze Cost
Landfill (per tile)	300	N/A	0	0	0	0	§50	§10	§0
Recycling Center	N/A	75	4	3	5	4	§5,000	§350	§450
Waste to Energy Plant	500	80	250	20	200	19	§25,000	§1,000	§2,250

RECYCLING CENTER
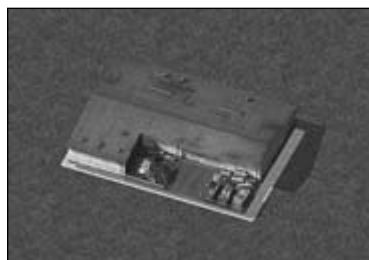
- Size: 3x2
- Cost: §5,000
- Monthly Cost: §350

WASTE TO ENERGY PLANT

See Power Plant Directory.

GETTING INFO ABOUT UTILITIES

You can learn about your city's utility issues in several ways:

- Look for flocks of seagulls; this helps you find your Landfills.

- Zots for no-power and no-water are self-explanatory.

- Query boxes and pop-ups tell you if a tile has garbage on it, is powered, or is watered.

- When output exceeds capacity, garbage piling on curbs is visible at the closest zoom level.

- Check with your Utilities and Environmental Advisors.

- Dig into your Utility budget.

- Switch on the Power, Water, Water Pollution, Air Pollution, Garbage Data Views.

- Consult the Power, Water, Air Pollution, Water Pollution, and Garbage Graphs.

UTILITY ORDINANCES

The following ordinances impact utilities:

- Landfill Gas Recovery Program

- Nuclear Free Zone

- Paper Waste Reduction Program

- Trash Presort Requirement

- Power Conservation Act

- Tire Recycling Program

- Water Conservation Program

NON-RCI BUILDING UTILITY USE TABLE

Structure	Power Consumed	Water Consumed	Garbage
Advanced Research Center	65	150	15
Alamo	2	5	2
Alcatraz	1	5	2
Amalienborg	15	65	5
Arc de Triomphe*	1	1	5
Army Base	135	250	13
Bank of America	600	1,300	39

NOTE

Utility usage for structures introduced in the *Rush Hour* expansion pack is outlined in Part 8.

Non-RCI Building Utility Use Table continued

Structure	Power Consumed	Water Consumed	Garbage
Bank of China Tower	250	1,350	15
Basketball Court	1	0	1
Big Ben	20	25	2
Brandenburg Gate*	2	3	5
Bureau of Bureaucracy	100	200	50
Bus Stop	1	0	1
California Plaza	125	350	10
Capitol Records Building*	215	900	11
Casino	300	550	30
Cemeteries	1	100	1
Chrysler Building	250	1,300	12
City College	48	90	20
City Hall	25	60	10
City Jail	75	100	25
City Museum	23	35	19
City Zoo	55	190	20
CN Tower	20	25	4
Coal Power Plant	0	50	25
Coit Tower	1	7	3
Colossal Mayor's Statue	1	0	1
Community Garden	0	15	0
Convention Center	125	175	23
Country Club	17	750	5
Courthouse	38	70	11
Disease Research Lab	55	110	10
Elementary School	2	5	6
Empire State Building	375	1,100	20
Faneuil Hall	50	200	9
Farmer's Market	3	10	9
Federal Prison	125	300	17
Fernsehturm	15	60	5
Freight Train Station	3	5	4

Non-RCI Building Utility Use Table continued

Structure	Power Consumed	Water Consumed	Garbage
Gateway Arch	1	0	2
Gazebo	0	5	1
Globe Arena*	10	100	15
Grand Central Station*	200	200	11
Great Pyramid	1	0	2
Guggenheim Museum	90	450	9
Hagia Sofia	8	20	3
High School	5	15	9
Hollywood Sign	1	0	0
Houses of Worship	5	5	6
Hydrogen Power Plant	0	1,300	11
Impressive Mayor's Statue	1	0	1
Independence Hall	3	7	3
International Port	13	50	5
Jefferson Memorial	1	0	3
John Hancock Center	650	1,500	43
Large Fire Station	3	10	6
Large Flower Garden	0	15	0
Large Medical Center	63	175	21
Large Park Green	0	15	0
Large Plaza	0	0	1
Large Police Station	3	5	10
Lincoln Memorial	1	0	3
Living Mall	800	850	11
Local Branch Library	1	2	2
Magnificent Mayor's Statue	1	0	1
Main Library	18	30	9
Major Art Museum	60	100	8
Major League Stadium	50	85	50
Mayor's House	5	7	4
Mayor's Statue	1	0	1
Medical Clinic	4	10	9

Non-RCI Building Utility Use Table continued

Structure	Power Consumed	Water Consumed	Garbage
Medium Flower Garden	0	10	0
Medium Park Green	0	10	0
Medium Playground	0	2	1
Minor League Stadium	20	70	9
Missile Range	0	0	50
Movie Studio	150	200	15
Natural Gas Power Plant	0	20	20
Nuclear Power Plant	0	900	15
Oil Power Plant	0	25	22
Open Grass Area	0	5	0
Open Paved Area	0	0	1
Opera House	25	60	15
Palace of Fine Arts	20	150	4
Palacio Real	25	60	4
Parthenon*	2	5	2
Passenger Train Station	5	5	6
Playground	0	1	0
Private School	8	25	6
Radio Station	150	90	11
Ranger Station	0	10	1
Recycling Center	9	150	0
Resort Hotel	70	100	21
Rotes Rathaus	50	250	9
Seoul City Hall*	200	200	9
Seoul World Cup Stadium*	90	100	65
Small Fire Station	2	5	3
Small Flower Garden	0	5	0
Small Park Green	0	5	0
Small Plaza	0	0	1
Small Police Station	2	2	5
Smith Tower	215	900	11

Non-RCI Building Utility Use Table continued

Structure	Power Consumed	Water Consumed	Garbage
Soccer Field	0	80	7
Softball Field	0	90	6
Solar Power Plant	0	5	11
Sphinx	0	0	2
St. Basil's	10	9	3
State Fair	50	180	23
Statue of Liberty	5	5	3
Stock Exchange	55	90	19
Subway Station	3	5	2
Sungyre-mun*	10	10	4
Taj Mahal	10	10	4
Television Studio	175	250	19
Temple Expiatoiori de la Sagrada Familia*	0	0	5
Tennis Court	0	0	1
Tokyo Tower	25	45	8
Tourist Trap	2	4	11
Tower of London	15	65	5
Toxic Waste Dump	80	200	35
U.S. Capitol Building	90	450	13
University	150	200	15
Washington Monument	1	0	3
Waste to Energy Plant	0	1,000	0
Water Pump	3	0	0
Water Tower	1	0	0
Water Treatment Plant	50	100	12
White House	60	300	15
63 Building*	600	1,300	39

PUBLIC SAFETY

The public safety in *SimCity 4* is entrusted to the Fire and Police Departments. Utilize them correctly, and every Simoleon you spend on them will pay off.

NOTE
There are several new public safety structures and dispatches introduced by the *Rush Hour* expansion pack. See Part 8 for full details.

Still, neither department can solve the problems they combat. Only you are capable of that.

CROSS-REFERENCE
See "Flammability" in this chapter and Chapter 15 for how to reduce crime.

FIRE PROTECTION

Being Mayor means being ready for anything. In many cases, "anything" means fire. Your city could catch on fire at any moment; whether it ignites, spreads, or goes out of control is a matter of what you do with your fire protection resources.

To understand what your fire crews can do, you must first understand Flammability.

A Stage 5 fire is a sight to behold, but it's not easily extinguished. Get the fire crews there fast and don't let it spread.

FLAMMABILITY

Everything in *SimCity 4* has a flammability factor, how likely it would be to burn if set ablaze. The higher the flammability, the greater the chance of a fire igniting.

Buildings are assigned a maximum fire stage that dictates how large a fire can grow if not extinguished. The greater the fire stage, the larger the possible fire.

NOTE
The random chance a fire will ignite each month is five percent.

Base flammability can be increased by two main factors (both of which are within your control): water supply and abandonment.

WATER SUPPLY

A building without water supply is 25 percent more likely to catch fire than an otherwise identical structure. Eliminate this risk by running pipes everywhere in your city.

ABANDONMENT

An abandoned building is the most flammable of all, increasing flammability by 50 percent.

NOTE

An abandoned building with no water service has its base flammability heightened by 87.5 percent.

FLAMMABILITY "HOTSPOT"

A hotspot is a location of clustered high-flammability tiles, so tightly grouped that they create a modified and heightened probability of fire. This probability is in addition to the standard fire probabilities that rule outside of hotspots.

When there are at least 40 tiles within an eight tile radius with flammability of 54 or higher, you've got a hotspot.

The more qualifying tiles there are within the radius, the greater the heightened probability:

Abandoned buildings are your most flammable. Cut down on flammability by being a good Mayor.
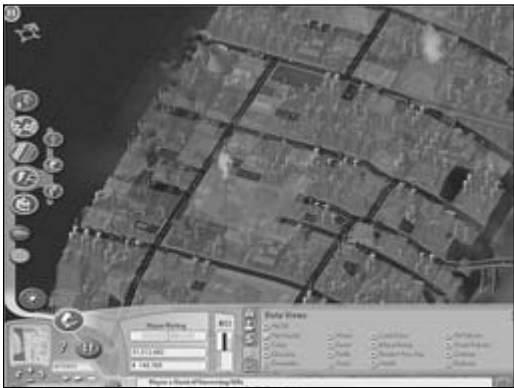
Hotspots are easy to find; look for orange in the Fire Hazard Data View.

Hotspot Concentration and Fire Probability

# of High-Flam. Tiles	Fire Probability
40	5%
50	25%
70	40%
100	50%

CROSS-REFERENCE

Find information on how fires work and spread in Chapter 27.

FIRE STATIONS

When fire catches, how you extinguish it is a factor of fire coverage. Fire coverage is a function of Fire Stations.

PROTECTION RADIUS

Each Fire Station (large and small) exerts its influence on every tile within its protection radius. The effect is strongest near the station ("Center Strength") and diminishes with distance ("Exterior Strength").
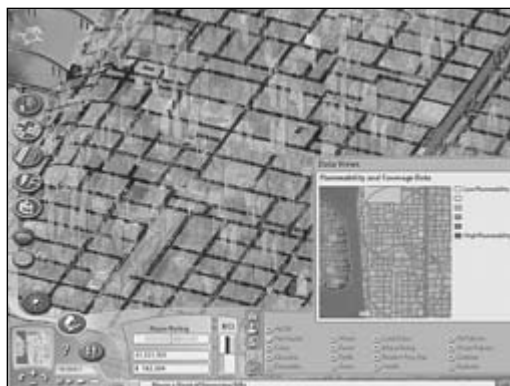
Your goal with fire coverage is to have as few gaps as possible. That means some necessary overlap.

Fire Station Protection Radii

Station	Radius	Center Strength	Exterior Strength
Small Fire Station	24	200	50
Large Fire Station	37	200	50

The size of this area of protection is altered by changing individual stations' local funding. Raising funding above 100 percent increases the area, but only as much as 10 percent.

Lowering funding shrinks the radius and diminishes its effectiveness. Making a smaller radius is useful for minimizing overlap of stations, but there's a danger in underfunding: the possibility of a strike. The probability's small if funding reductions are minor.

Even at full funding, the size of a station's area of protection is limited if you don't have a Road touching the station. Because your firefighters will be forced to do everything on foot, the protection radius and its effectiveness will be reduced by 20 percent.

Move the Fire Station's Local Funding slider to see the effects on the station's area of effect.

Fire Stations do three things:

- Reduce probability of fire.
- Provide fire suppression.
- Provide fire dispatch.

REDUCES FIRE PROBABILITY

Just by being there, a Fire Station lowers the fire probability on every square within its radius. Having a fire marshal around to inspect all protected buildings eliminates fire hazards before they spark.

Putting stations near hotspots counteracts the heightened probability of fire (though it doesn't solve the underlying flammability problem).

If you cover your city with adequately funded Fire Stations, the chance of a fire is low. If you can't afford blanket coverage, concentrate on the areas of highest flammability (ID and IM dense areas).

FIRE SUPPRESSION

By virtue of its coverage, a Fire Station causes small blazes to go out before you even see them. With the free fire extinguishers provided to the Sims by every station within their area, the Sims can handle their own small fires without calling for help.

FIRE DISPATCH

If a fire goes beyond ignition, dispatch fire crews to put out the blaze or bulldoze the buildings around the inferno so the fire won't spread. See "Dispatch" for details and mechanics.

NOTE
You can't bulldoze a building that's actively on fire.

Fire Dispatch crews work like small Fire Stations with their own radius of effect when they're out on dispatch.

- Center Strength: 96
- Exterior Strength: 32
- Radius of Protection: 8

When on dispatch, crews put out any fires they encounter within their area of protection. To be extinguished the fire must be within eight tiles of a Road or Street; the fire hoses can't spray farther than that.

Reduced funding to a station affects the efficiency of dispatch units. Below 85 percent local funding, the cutting shows in the firefighters' work. Watch their sad antics on dispatch and you'll see what we mean. They can't control their hoses, and the spray effect they use to put out fires doesn't work to full effect.

STRIKES

Lowered funding shrinks fire protection radii, and creates a probability of a firefighter's strike. The lower the funding, the greater the probability.

When firefighters strike, fire coverage for both radius and effectiveness is reduced to 20 percent until the strike ends.

Firefighter strikes can last more than 18 months. Restore funding over 90 percent and the fire-fighters will return to work.

Striking firefighters are bad news in emergencies.

FIRE BUILDING DIRECTORY

Structure	Fire, Center Str.	Fire, Ext. Str.	Fire, Radius	# of Dispatch	Fire Dispatch Center Str.	Fire Dispatch Ext. Str.	Fire Dispatch Radius	Cost	Monthly Cost	Bulldoze Cost
Small Fire Station	200	50	24	1	96	32	8	$250	$125	$20
Large Fire Station	200	50	36.5	2	96	32	8	$800	$250	$50

SMALL FIRE STATION

- Size: 1x2
- Cost: §250
- Monthly Cost: §125

LARGE FIRE STATION

- Size: 3x2
- Cost: §800
- Monthly Cost: §250

POLICE

Police Stations are charged with counteracting the effects of crime in your city. They can prevent crime, but most of their activity revolves around catching criminals after they strike. To what extent they can do this depends on their protection radius.

PROTECTION RADIUS

Each Police Station has a protection radius, within which it exerts its influence. The size and strength of the radius differs by the station's size:

Police Station Protection Radii

Station	Radius	Center Strength	Exterior Strength
Small Police Station	24	200	0
Large Police Station	36.5	300	0

To know if an area is under police protection, watch the roads for squad cars.

Each station's effect is highest near the station ("Center Strength"), dissipating to zero at the outer edge ("Exterior Strength").

Stations' radii can overlap and enhance the coverage of an area (the effects are additive).

Local funding of each Police Station affects the station's protection radius. Lowering funding shrinks it, and raising funding expands it. Funding greater than 100 percent expands the radius only up to 10 percent.

Lowering funding is dangerous. The lower it goes, the greater the chance of strike. Police stations affect their precincts in three ways:

With police coverage, overlap is necessary to provide total coverage.

- Suppression of crime before it happens.

- Criminal apprehension.

- Police Dispatch.

CRIME SUPPRESSION

Within a Police Station's radius, there's up to a 50 percent chance (depending on distance to the station) that any crime designated to occur there won't, due to the deterrent effect of Police Stations and cops on the beat.

CRIMINAL APPREHENSION

Whether criminals are caught or not depends on the level of police coverage. If the crime protection value on a tile is above 20 (usually within the inner 80 percent of a police radius), an arrest will happen.

Beyond that, it's dicier, with dispatching providing your best bet for catching crooks.

Apprehension ability can be increased by overlapping station radii. Because crime protection effects are additive, overlapping increases police protection in outer areas.

POLICE DISPATCH

If you see a crime occurring (see Chapter 15 for how to spot crimes in progress), dispatch a unit to the area to get an arrest.

Also use dispatches in riots. The only way to stop a riot is with several fully funded Police Dispatch units. Underfunded dispatch units aren't as good at riot containment as fully funded ones.

When on a call, Police Dispatches work like mini-Police Stations, enhancing coverage within their radii (suppressing crimes and arresting criminals).

Police on dispatch will catch any offending criminals in the area.

- Center Strength: 200
- Exterior Strength: 20
- Radius of Protection: 3

Reduced funding to a station affects the efficiency of dispatch units. Below 60 percent local funding, the cost cutting shows in the officers' work; zoom in during dispatch to see the inadequacy in the form of dropped guns and other incompetence.

BUILDING CRIME EFFECT

Certain buildings have an effect on police protection within their area of effect. These include:

- Army Base
- Casino
- Convention Center
- Federal Prison
- State Fair

Buildings such as the Convention Center lower local police ability to suppress crimes and arrest criminals.

Each building works as a counterbalance to any police protection that overlaps the crime effect radius. The closer you get to the crime effect buildings, the greater the police counteracting effect. Lowered police protection means more crimes occur (if suppression is suppressed) and fewer criminals are caught.

STRIKES

Lowered funding shrinks police protection radii and creates a probability of a police strike. The lower the funding, the greater the probability.

When police strike, police coverage is reduced to 20 percent until the strike ends. Police strikes can last 18 months. Restore funding over 90 percent and force the police back to work.

JAILS

Jails are the repository of all apprehended criminals. Each Police Station has its own cell block that can hold:

- Small Police Station: 25 inmates
- Large Police Station: 50 inmates

Inmates who don't fit in existing cells return to the street the next month, so add a Jail when the number of inmates exceeds what your Police Station lock-ups can hold.

NOTE

You won't need a Jail until city size exceeds 20,000. Your local stations can house all the criminals when population is below 20,000.

The Jail is a higher capacity (1,000) holding facility, though it's expensive. One Jail will suffice until your city or your crime problem (or both) grow to push it over capacity. Then it's time to add a new one.

> **NOTE**
>
> There's a visual clue to tell you when a Jail is getting full: the jailbreak. If overcrowding occurs, there's rising probability of a jailbreak. When it happens, 10–50 percent of a Jail's inmates fly the coop until capacity reaches 80 percent.

This occurs most often due to decreases in funding. This event doesn't have any effect on the next month's crime, it just lets you know you have a problem.

Funding for all freestanding Jails is done through the central Public Safety/Department of Corrections budget. The lower you reduce funding, the lower the Jail's capacity.

Reduced capacity is OK as long as the Jail doesn't get overcrowded (inmates exceed capacity). At that point, any criminals who can't fit in the penal system are paroled into society to become part of next month's crime numbers.

> **NOTE**
>
> The Business Deal building, the Federal Prison, works as a super Jail. With a capacity of 3,000 prisoners, it can solve all of your criminal housing problems—but at a cost.

The Federal Prison can't become overcrowded. If it goes over capacity, you're charged §10 per overcapacity inmate per month. This adds up, but is cheaper than another Jail.

The Federal Prison's main drawback is that it has a large crime effect. Keep it away from the rest of your city or it'll reduce the effect of any police protection that it touches.

> **TIP**
>
> Rather than spending all your money housing criminals, work on education to reduce crime at its source.

POLICE BUILDING DIRECTORY

Structure	Police, Center Str.	Police, Ext. Str.	Police, Radius	# of Dispatch	Police Dispatch Center Str.	Police Dispatch Ext. Str.	Police Dispatch Radius	Inmate Capacity	Inmate Overcapacity Cost	Cost	Monthly Cost	Bulldoze Cost
Small Police Station	200	0	24	2	200	20	3	25	$0	$250	$125	$20
Large Police Station	300	0	37	4	200	20	3	50	$0	$800	$250	$50
City Jail	0	0	0	0	0	0	0	1,000	$0	$2,500	$450	$230
Federal Prison	0	0	0	0	0	0	0	3,000	$10	$0	$250	$12,500

SMALL POLICE STATION

- Size: 3x2
- Cost: §250
- Monthly Cost: §125

LARGE POLICE STATION

- Size: 3x3
- Cost: §800
- Monthly Cost: §250

CITY JAIL

- Size: 3x3
- Cost: §2,500
- Monthly Cost: §450

FEDERAL PRISON
(BUSINESS DEAL BUILDING)

- Size: 4x4
- Cost: §0
- Monthly Cost: §0

DISPATCH IN GENERAL

A dispatch lets you tell a fire or police crew where in the city to go. This is handy in places not covered by stations or when the situation is dire enough to bring in more than the default coverage.

TIP

Double-click on a dispatch flag to follow the unit to the scene.

WHAT IS A DISPATCH?

A dispatch works like a mini Fire or Police Station. Its area of protection while at a dispatch scene is strongest near the pylon and dissipates with distance.

While on site, the dispatch will quell fires and crimes within their area of effect at the same time they're doing their appointed task.

The number of dispatches available to you is proportional to the number and kind of fire or police buildings in your city. Each building has a fixed number of dispatches depending on size:

- Small: Fire (one dispatch)/Police (two dispatches)
- Large: Fire (two dispatches)/Police (four dispatches)

To illustrate, a city with two large and three small Police Stations will have 14 police dispatches.

Dispatch Numbers and Strength

Structure	# of Dispatch	Dispatch Center Str.	Dispatch Ext. Str.	Dispatch Radius
Small Fire Station	1	96	20	8
Large Fire Station	2	96	20	8
Small Police Station	2	200	80	3
Large Police Station	4	200	80	3

How fast they arrive depends on how far away they are. Because crews move through your city from their home base to the site of the dispatch, they must navigate your city streets to arrive at their destination. This raises two issues:

1. When considering whether to leave an area uncovered by a station, make sure it's close enough to a station to allow timely dispatch. For example, a fire truck can't arrive in time to put out a fire more than halfway across a medium-sized map.

2. Structures dependent on fire dispatches for protection must be close (within eight tiles) to a Road or Street. Otherwise, fire crews can't get their hoses close enough.

Which station is dispatched in what order depends on distance. The closest station sends the first dispatches, followed by the next closest, and so on.

TIP

You can locally set funding of public safety buildings such as Fire and Police Stations (i.e., all Fire Stations may operate at full funding, but one may be individually underfunded). This is important when dispatching.

If the closest dispatch building to an out-of-range area is one that's underfunded, your first dispatch crews will be ineffective. Underfunded crews are incompetent.

If you opt to leave an area outside the protection area of a Fire Station, make sure the closest Fire Station operates at full funding.

NOTE

Don't worry about your dispatched units having to wrestle with thick traffic snarls. When dispatches hit the road, all other traffic pulls off to the side.

DISPATCH MECHANICS

After selecting the Dispatch tool, click on a location to place one dispatch. Clicking on a different location tells the next closest unit where to go.

After you place your available dispatch units, clicking in other locations does not move previously placed dispatches. To move an already summoned dispatch to a new location, left-click on an existing dispatch flag, drag it to a new location, and left-click to release it.

A dispatch appears as a high pylon anchored to your chosen destination. The symbol on it indicates the kind of dispatch and which dispatch unit it represents.

TIP

When placing dispatch pylons, units arrive in the order you place the pylons. One dispatch can block the path of another if it clogs the only route to the second unit's pylon. The pylon will change to a flashing one with a "Not" slash across it.

For example, there's a fire in a building accessible via only one Road. This Road connects to the city on only one end (the west). If you place pylon 2 to the east of pylon 1, pylon 2 blocks the second dispatched unit from its pylon. Juggle the pylons to fix this situation.

FUNDING AND COMPETENCE

The effectiveness of a dispatch is a function of its funding level; as funding drops below 100 percent, effectiveness of underfunded stations and their dispatches drops.

If a station is underfunded below 85 percent, its dispatch units will arrive, though you may wish they hadn't. On the scene, they are less effective at their duties (less effect within the same radius of effect).

Zoom in to watch underfunded squads' pathetic flailings. In the case of fire dispatches, their powerful water spray effect becomes less effective after funding drops below 85 percent.

Underfunded firemen can't hold their hoses straight. This increases the time it takes to snuff a fire and the chance that the fire will grow.

GETTING INFO ABOUT PUBLIC SAFETY

There are many ways to size up your public safety situation:

- Zoom in and look for abandoned buildings; they're highly flammable.
- The Safety City Opinion Poll shows what the citizens think of your ability to protect them.
- Talk with your Public Safety Advisor.
- Make global changes with the Public Safety Department Budget.
- The Crime Data View shows you the location and radius of your Police Stations.
- The Fire Hazard Data View shows the degree of flammability throughout your city and the location and radius of your Fire Stations. Watch for hotspots by looking for clusters of orange-colored highlighted lots!
- The Water Data View lets you see if there are any unwatered (thus heightened flammability) areas of your city.
- Observe your success over time with the Crime Graph.

ORDINANCES

The following ordinances affect your public safety department:

- Junior Sports Programs
- Legalize Gambling
- Neighborhood Watch
- Smoke Detector Program
- Youth Curfew Act

CROSS-REFERENCE
See Chapter 24 for more information on ordinances.

TRANSPORTATION AND TRAFFIC

Where do your Sims want to go today? That is a crucial question, along with how they're going to go and how long it will take them. That is the crux of transportation and traffic. Getting your Sims from here to there is a challenging aspect of the game.

TRANSPORTATION NETWORKS

In *SimCity 4*, there are five kinds of transportation networks:

- Streets
- Roads
- Highways
- Rails
- Subway

> **THAT IS *SO* 3K!**
>
> **Transportation has changed. The basic transportation network system is the same, but has been simplified.**
>
> **The travel system is radically new: simpler, more powerful, and more comprehensible. Travel is no longer based on distance and travel steps; it's about commute times and planning the best route. Read this section to learn to control your traffic.**
>
> **On a more detailed level, several other things are new. Neighbor Connections are now free. It's easy to build bridges, tunnels, and onramps. Buses must have stops at points of disembarkation (in your business zones). There are no more Subway-to-Rail Connections or herding behavior along proven traffic routes; and you can't build boulevards.**

STREETS

- Traffic Capacity: 100
- Used by: Pedestrian, Car, Bus, Freight Truck
- Max Speed: 31 kph

Streets are a new addition to *SimCity 4*. Low-speed, low-capacity (half that of a Road), low-cost Streets are best used within your zone blocks.

Streets look like Roads, but they're lighter in color and narrower. Don't use them as major thoroughfares.

NOTE

When you lay down a transportation network element, it doesn't burst into existence. For the first few moments, the stretch is grayed-out as a Sim construction crew builds it from one end to another. This interval takes time.

Streets lay out when you spread out your zones. You can put Streets anywhere you like, but don't use them for main thoroughfares because of their low speed and capacity. They can't accommodate onramps, and you can't use them for Neighbor Connections.

One thing Streets do that Roads don't is automatically connect to adjacent Roads and Streets. The assumption is that you'll want these connected.

NOTE

You can see vehicles change speeds as they change between Roads, Streets, and Highways.

ROADS

- Traffic Capacity: 1,000
- Used by: Pedestrian, Car, Bus, Freight Trucks
- Max Speed: 46 kph

Roads are the meat and potatoes of your asphalt transportation network, comprising the majority of your transportation tiles.

TIP

To make drawing curves in your transportation networks easier, hold Shift, then click where you want the network to start. Drag to where you want it to end up and the game will insert curves instead of trying to draw a straight line. This makes your networks look more realistic and simplifies drawing in complex areas. The Shift+Drag is especially useful for drawing Rail networks which cannot sharply turn.

Roads have 10 times the capacity as Streets, higher top speed, and the ability to connect to Highways. They don't auto connect to adjacent Roads. You can connect the Roads by hand. Roads automatically make intersections when they cross over another Road or a Street, and they give you the option of building onramps when they cross Highways.

HIGHWAYS

- Traffic Capacity: 4,000
- Used by: Car, Bus, Freight Truck
- Max Speed: 100 kph

Highways have the highest speed of any of the non-rail networks, but such speed comes at a cost of both practicality and money. Practicality is an issue for Highways because they take up two tiles per piece, can only transfer to Roads (at right angles or to parallel Roads), and can't accommodate mass transit stations.

NOTE

For most purposes, Cloverleaves and Side or Overpass Onramps are a kind of Highway tile. It's in their purchase and maintenance costs that they differ:

- **Cloverleaf: §3,000/§26 per month**
- **Side Onramp: §1,000/§2 per month**
- **Overpass Onramp: §1,000/§2 per month**

Don't build a town of nothing but Highways. Use Highways to cover long distances between Residential areas and businesses (especially those separated by necessity because of pollution) and to distant Neighbor Connections.

NOTE

You can use Cloverleaves only when two Highways intersect. If you don't use one (they are expensive), one Highway will pass under the other.

When laying Highways, you need onramps on both sides of the Highway to get Sims on and off. Choose carefully where you put your Highways so you have enough room on either side of the intersection for onramps; if there isn't enough, whatever's in the way will be demolished.

Use Cloverleaves when two Highways meet if you want traffic to switch between them.

Onramps can go on crossing Roads or Roads running parallel to the Highway (with one tile in between). Put them on both sides.

RAILS

- Traffic Capacity: 3,000
- Used by: Passenger Train, Freight Train
- Max Speed: 150 kph

Rails are among your fastest transportation networks, matched only by Subways. Trips too long to take by any asphalt network can be done with ease by Rails. There are drawbacks.

Rail is only accessible (for both entrance and egress) via Rail Stations. These come in two varieties: Passenger Rail and Freight Rail. Only Residential Sims can use the former and only Industrial Sims can use the latter. To lend your Rails to both populations, build both kinds of stations, placing the stations adjacent to a Road or Street.

TIP
There are benefits to building separate Rail networks for passengers and freight. Keeping them unattached prevents volume on one from interfering with the other.

The other limitation of Rails is spatial. Rails cannot turn sharp corners like Roads. They must gradually curve. The downside is that they take up more space than Roads.

Rails can't make sharp turns, so coax them into gradual curves.

TIP
Rails, with their gradual corners, are difficult to lay out, so do so with care if you value your Simoleons.

SUBWAY

- Traffic Capacity: 3,000
- Used by: Subway
- Max Speed: 150 kph

The crown jewel of any transit system is the Subway. It's fast and takes up almost no real estate (the stations are 1x1). The drawback is money; they cost a lot to build, even on a small scale.

All Subway Tracks are built in an aboveground view; all buildings are removed and only the zone colors and surface transportation networks are visible. This makes it easier to place stations and tracks in the arrangement you desire.
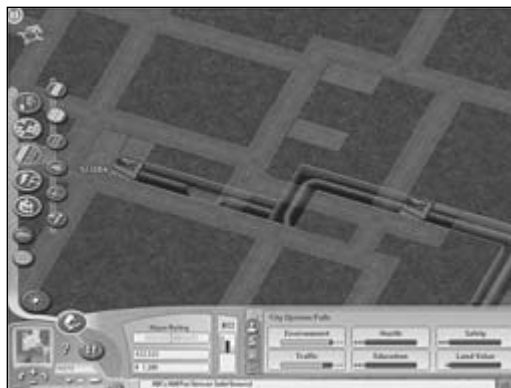
Laying out Subways involves putting things above and below ground. Do it carefully because it's expensive.

TRANSPORTATION COMPONENTS

Transportation systems are made up of both buildings and network elements. Each one costs money to build and maintain.

Transportation Element Costs

	Road	Rail	Highway	Street	Subway
Initial Cost	§10	§8	§600	§5	§156
Monthly (Per Tile)	§0.10	§0.03	§0.50	§0.05	§0.30
Monthly (Per 1k Tiles)	§100	§30	§500	§50	§300

Transportation Building Costs

Station	Initial Cost	Monthly Cost
Bus	§150	§5
Passenger Rail	§100	§10
Freight Rail	§100	§10
Subway	§500	§20
Cloverleaf	§3,000	§26
Side Onramp	§1,000	§2
Overpass Onramp	§1,000	§2

TUNNELS AND BRIDGES

Some networks can go through mountains or over gorges and water thanks to tunnels and bridges. Building them is easy—a drag of the mouse and it's done for you.

Bridges and tunnels are triggered by slopes, downward for bridges and upward (greater than 45 degrees) for tunnels.

When dragging a network over a gorge or mountain range, it turns red. Drag beyond the terrain feature to see if you can build there.

NOTE

With the *Rush Hour* expansion pack, the creation and choice of bridges have been radically changed. If you've purchased *SimCity 4 Deluxe* or *Rush Hour*, see Part 8 for full details.

To build them, drag from one side of the terrain feature you want to traverse to the other side. If the tunnel or bridge can be built, the proposed length changes from red. Release the mouse button and it's done. Run your network element several tiles away from the terrain feature, and drag several tiles beyond it. If, after doing that, the line remains red, you can't traverse the feature (either because the slopes are too steep or there's a structure that relies on the surrounding terrain staying in place).

NOTE

Because part of the building process involves knowing if the job can be completed on the other side, you can't build bridges and tunnels to neighbor cities.

BRIDGES

Bridges can be built for Road, Rail, or Highway over land or water.

Depending on the network type and distance of the run, you'll get one of five bridge types:

The Highway Suspension Bridge is a sight to behold but only occurs over large bodies of water.

- Rail Trestle: Any length
- Road Bridge, Straight: Any length
- Road Bridge, Raised: Any length, over water only and if height above water isn't too great
- Highway Bridge, Straight: Any length
- Highway Suspension Bridge: If more than 25 tiles, and if height above water isn't too great

TUNNELS

Tunnels can be built for Road, Rail, or Highway. The type of opening you get depends on the kind of network with which you're blasting through.

NOTE
Pedestrians can't enter tunnels.

MODES OF TRANSPORTATION

Traveling on those networks are seven different modes of transportation:

- Walking
- Car
- Freight Truck
- Bus
- Passenger Rail
- Freight Rail
- Subway

WALKING

- Available on: Streets, Roads
- Transfer from: Residential origin, Bus, Passenger Rail, Subway
- Transfer to: Bus, Passenger Rail, Subway, Business Destination
- Creates Traffic: No
- Affected by Traffic: No

Sometimes the best way to go is on your feet. Sims walk if the way is short and between various kinds of transportation. This is because, with the exception of Rail, you can't switch from Car travel to any other form of mass transit (no parking lots).

TIP

To change transportation modes, there must be at least one tile of Road between the stations.

Walking, because it takes place on the sidewalk, is not slowed by congestion.

CAR

- Available on: Streets, Roads, Highway
- Transfer from: Residential origin
- Transfer to: Streets, Roads, Passenger Rail, Highway, Business Destination
- Creates Traffic: Yes
- Affected by Traffic: Yes

Car trips originate only from a Residential zone and can switch only to Rail or another kind of asphalt network. You can't transfer to Bus or Subway because those stations lack parking. When a Residential Sim plans a trip, he or she must commit to going the entire way by Car, or changing to a Passenger Rail and finishing on foot.

Traffic congestion and Road damage can slow Cars, and contribute to traffic volume.

FREIGHT TRUCK

- Available on: Streets, Roads, Highway
- Transfer from: Industrial origin
- Transfer to: Fright Rail, Seaport, Airport
- Creates Traffic: Yes
- Affected by Traffic: Yes

Freight Truck trips can originate only in Industrial zones, and can only travel on other asphalt networks. They can switch to other asphalt networks or a Freight Train Station.

They can be slowed by congestion and Road damage, and themselves add to the volume of traffic.

BUS

- Available on: Streets, Roads, Highways
- Transfer From: Walk
- Transfer to: Walk
- Creates Traffic: No
- Affected by Traffic: Yes

Bus is the cheapest form of mass transit, but it isn't the fastest or most efficient. Buses, like Cars, are dependent on the asphalt network for their routing and are slowed by congestion and Road damage.

Buses are cheap and faster than Cars, plus they use an existing network: asphalt. As an unexpected bonus, they don't contribute to the volume of traffic. This means several things:

A Bus system may not be as glamorous as a Subway, but for a young, cash-strapped, traffic-clogged city, it does the trick.

- Getting your Sims onto Buses means a real reduction in traffic volume. This is visible in concentrated areas of R§ and R§§.
- The reduction in traffic volume raises Residential desirability and Mayor Rating.
- It also means a reduction in pollution generated on your roadways; Buses produce no air pollution and are the perfect environmentally friendly transportation.

PASSENGER RAIL

- Available on: Rail
- Transfer from: Car, Walk
- Transfer to: Walk
- Creates Traffic: Yes
- Affected by Traffic: Yes

Passenger Rail is a fast and efficient form of mass transit, is great for long distances and inter-city trips, but it's expensive. It is the only form of mass transit you can access by Car. It consumes more surface land than other mass transit due to its large stations (with parking lots) and mandatory wide curves.

Passenger Rail creates and contributes to traffic on the rails.

FREIGHT RAIL

- Available on: Freight Rail

- Transfer from: Freight Truck

- Transfer to: N/A

- Creates Traffic: No

- Affected by Traffic: Yes

Freight Stations are conduits of trips beginning in Industrial zones and only accept trips from Freight Trucks. Their reason for existence is to transport freight out of your city, so make their Rails lead to a Neighbor or SimNation Connection or a Seaport.

Nothing transfers from Freight Train Stations; freight "arriving" at a Freight Station by Rail is imaginary. We just assume it gets from the destination Rail Station in a neighbor city to its recipient when trucks dropping off at that station load up and return to the city. None of this actually occurs in the simulation.

Freight Train Stations are easy to distinguish from Passenger Stations thanks to their large stacks of shipping containers.

Freight Rail traffic is slowed by and contributes to rail traffic volume.

SUBWAY

- Available on: Subway

- Transfer from: Walk

- Transfer to: Walk

- Creates (Subway) Traffic: Yes

- Affected by Traffic: Yes

Subways are fast, efficient, and expensive to build and maintain. As the fastest form of passenger transportation, they're also the best way to get from here to there, especially if "there" is in a neighboring city.

Unlike Rail, Subway Stations consume only one tile, but they only accept transfers from Walking. They produce no air pollution.

Subways contribute to and are affected by Subway traffic.

AIRPORTS AND SEAPORTS

Two transportation buildings don't behave like the others: Airports and Seaports.

These buildings serve two functions:

1. Provide Demand Cap Relief to Commercial and Industrial populations (see Chapter 8).

2. Create a "connection" destination for Commercial and Industrial (factors into desirability, see Chapter 10).

How they do this differs.

AIRPORTS

Airports primarily serve Commercial zones, but some Industrial as well.

There are three kinds of Airports: Landing Strip, Municipal Airport, and International Airport. Each kind can serve a progressively larger Commercial Office (and Industrial) population. When it reaches that ceiling, you can upgrade to a larger version of the same kind. There are nine Airports each with a different capacity.

Airport Capacity (Trips)

Airport Type	Small	Medium	Large
Landing Strip	10,200	13,100	16,000
Municipal	28,800	34,100	40,000
International	70,000	80,000	90,000

The larger the capacity of your city's Airport(s), the more potential your Commercial Office population has to grow.

TIP

To best utilize your Airports, give them an access Road that connects to your Commercial Office population. This keeps the traffic around them from clogging up your other routes. Connect the Road an Airport is on to your traffic network.

SEAPORTS

Seaports work similarly to Airports, but are concerned with Industry.

Unlike Airports, Seaports have only one size: the International Port.

Each Seaport acts like an additional connection for Industrial freight trips. It has the capacity to offer 650 points in Demand Cap Relief, one for each freight truck or freight train trip completed to the port.

> **TIP**
> Make sure the Seaport is closer to your Industrial zones than any Neighbor Connection, or no freight will go to it.

When a Seaport reaches capacity, add more capacity by establishing another Seaport.

TRAFFIC

The new traffic system in *SimCity 4* is about time. In real life, we think in terms of how long it takes to get someplace, not in distance or steps, but in minutes and hours. Now Sims do, too.

WHAT IS A TRIP?

A trip is a journey originating in one zone type and going to a particular destination. Where trips go is a function of where they originate:

- Residential: Jobs in Commercial and Industrial zones and in transportation, utility, and civic buildings
- Commercial: No trips (though should have easy access to Airport)
- Industrial: Freight trips to Connections (to SimNation), neighbor cities, Seaports

What a trip means also arises out of its source zone:

- Residential: Commute to the closest open job of the same wealth level
- Industrial: Freight shipment to the closest connection or Seaport

> **NOTE**
> Industrial doesn't send trips to Airports even though it ships out of them for other simulation purposes. This "shipping" is done on a theoretical basis.

The same is true of Commercial trips to Seaports. There are no actual trips being conducted, just estimated theoretical ones.

TRIP TIME

It's essential that inhabitants of your city be able to complete trips to their designated destinations in a reasonable amount of time. If they can't, many dire consequences ensue (see "Trip Consequences").

The maximum time for a trip is 2.5 hours.

ROUTE PLANNING

Before departing, a Sim plans a trip to the closest possible (as the crow files) destination. If, while searching for a route to the closest destination, the Sim finds another destination along the way to the chosen one, he'll select that one instead (although it is linearly farther away from his starting point).

NOTE

Trips are planned in advance, so there's no backtracking when a trip encounters potholes or excessive congestion.

Next, he plans a route in the general direction of the found destination. To do this, he must compute how much time the trip will take.

If Residential Sims need to travel west to east to get to jobs, put a transit station east of your Residential zones. Likewise, put transit stations to the west of business zones. This makes it easier for Sims to use mass transit without going out of their way.

TIP

Because trip planning is done directionally, put mass transit stops between your origin and destination zones. For example, if the western part of your city is Residential and the eastern part of it is Industrial/Commercial, put Bus Stops on the eastern side of your Residential zones and the western side of your Industrial/Commercial zones.

This puts transit stops "on the way" by default and increases the chances of Sims using mass transit.

TIME TO CROSS

The first factor in trip time is the time to cross each kind of transportation tile. Because all tiles are the same length, this is a matter of the time it takes to cover each tile by any given transportation mode.

Time to Cross (Minutes per Tile)

Mode	Road	Rail	Highway	Street	Subway
Bus	0.02	—	0.01	0.03	—
Freight Train	—	0.01	—	—	—
Passenger Train	—	0.01	—	—	—
Freight Truck	0.03	—	0.01	0.05	—
Car	0.03	—	0.01	0.05	—
Subway	—	—	—	—	0.01
Walk	0.27	—	—	0.27	—

Some modes are more efficient than others because they cross tiles faster.

Time to cross a given tile can lengthen by three factors:

- Congestion
- Intersections
- Potholes

CONGESTION

The amount of traffic traveling over a tile and how it relates to the tile's capacity dictates whether a tile is congested. Each transportation network has its own capacity:

- Street: 100
- Road: 1,000
- Rail: 3,000
- Highway: 4,000
- Subway: 3,000

Below full capacity, traffic travels across a tile at its default rate. When traffic rises above 100% capacity, the time to cross increases.

Congestion vs. Speed

Percentage of Tile Capacity	Speed Reduction
0–100%	0
101–200%	-1 – -35%
200% and up	-36 – -70%

Use the Traffic Data View to find areas of high congestion; they increase trip times. Provide alternate routes or forms of transportation to relieve congestion.

Nothing in traffic analysis is more useful than the Traffic Data View.

INTERSECTIONS

Intersections slow down traffic because vehicles decrease speed to turn or wait for lights to change. It takes some distance to return to full speed. Therefore, the intersection's slowing extends to the next two tiles, gradually returning to full speed:

- Intersection tile: -30%
- One tile before and beyond the intersection: -20%
- Two tiles before and beyond the intersection: -10%

Speed up trips by having few intersections on major routes.

POTHOLES

At full funding, Streets, Roads, and Highways are properly maintained and repaired automatically so you never see any damage.

If you reduce funding, potholes appear. The frequency and number of potholes is tied to the level of underfunding; the lower the funding, the more potholes there will be.

Potholes decrease speed over a tile because vehicles have to slow down to avoid dropping their transmissions. The cost for this slowdown is an increase in travel time of 0.1 minute.

Let Road Maintenance funding slide and potholes will be your punishment. These snarl traffic and increase commute times as drivers have to slow down to cross damaged roadways.

TRANSPORTATION MODE

When planning a route, a Sim won't stick to one type of transportation; he or she will choose the combination of modes that produces the fastest trip. Sometimes, however, it isn't about speed, it's about wealth.

In the case of Residential trips, which mode of transportation Sims prefer is dictated by their wealth level.

There are three different "travel strategies," each with a different bias:

- Car Strategy: Sim takes Car only

- Transit Strategy: Sim favors mass transit over Car

- Fastest Strategy: Sim favors the fastest means available

Different wealth levels feature different odds of choosing a transit strategy on a given trip. As in the table below, a R§§§ will select the Car strategy 80 percent of the time and the other two 10 percent each. In other words, 8 out of 10 trips from an R§§§ building will be by Car.

> **NOTE**
>
> The Commuter Shuttle Service ordinance alters these odds toward more mass transit riding.

Travel Strategy Selection Odds by Wealth Type

Wealth	Mass Transit	Car	Fastest
R§	80	20	0
R§§	30	0	70
R§§§	10	80	10

These strategies skew the choices a Sim makes, often taking a longer route based on this strategy even if it means the trip can't be accomplished in time. If the means they crave are not available, a Sim will take a less-preferred means.

TRANSIT SWITCHING

A final factor to be taken into consideration is the cost of switching onto mass transit. In each case, there is a time penalty for a switch onto a new mode; the time spent waiting for the Bus/Train to arrive.

> **NOTE**
>
> The probability that all Sims will opt for mass transit when it's available is the same for all Sims (100 percent); they always consider it within the limits set by their travel strategy. Boost this probability by passing the Commuter Shuttle Service ordinance. See Chapter 24 for details.

Only certain transportation modes can enter or exit a station. The switching costs (in time) and modes of entering and exiting are shown in the table.

Transit Switching Costs, Transfer Modes

	Cost (in minutes)	Transfer from	Transfer to
Bus	0.2	Walk	Walk
Subway	0.05	Walk	Walk
Passenger Rail	0.05	Walk, Car, Passenger Rail	Walk
Freight Rail	0	Freight Truck	N/A

NOTE

All stations except Passenger Rail and Freight Rail can be accessed and exited only on foot. There must be at least one Road tile between station exits and the next station to go directly from one transit mode to another.

The switching cost rises if you reduce mass transit funding; the reduced maintenance makes Trains and Buses run less frequently, plus sometimes escalators are broken. The cost increases from funding decreases are shown below.

Sims can't go directly from one mass transit mode to another. To allow switching between transit stations, there must be at least one Road/Street tile in between.

Funding Reductions and Transit Switch Entry Cost

Mass Transit Funding Level	Percentage of Switch Cost
0	200%
10	190%
20	180%
30	170%
40	160%
50	150%
60	140%
70	130%
80	120%
90	110%
100	100%

TRANSIT SYSTEM CAPACITY

Every station has a fixed capacity that it can comfortably funnel into its transit system. Above maximum capacity, the cost of the switch increases.

- Bus: 1,000

- Subway: 2,000

- Passenger Rail: 2,000

- Freight Rail: 2,000

TRIPS TO NEIGHBOR CONNECTIONS

If there are Neighbor Connections via appropriate network types in your city, these can be used to complete a trip.

For Residential trips, if you have a Neighbor Connection to a city (not SimNation), and it's the closest destination, Sims will take jobs in the neighboring city.

Neighbor Connections such as these are crucial, especially near Industrial and Commercial zones.

How long this trip takes depends on whether you've played that city since making the connection. If you open it, the simulator knows what jobs are available and how far they are from the connection; this known distance is added to the trip time to the connection for the total trip time. If you haven't played the neighboring city, a large presumed trip time is added instead.

When setting up Neighbor Connections, enter the other city and link your connections to job zones. Your commuters will thank you.

TRIP CONSEQUENCES

When you add together the factors in trip time, you get the total time it takes the Sim to make his or her trip. How long that is makes a difference.

A trip time of 2.5 hours is high, and your Sims will not take a trip that's longer (raising the no-job zot). The commute time for their tract will show as high and the tract's desirability will take a hit. Likewise, your Mayor Rating on that tract will suffer.
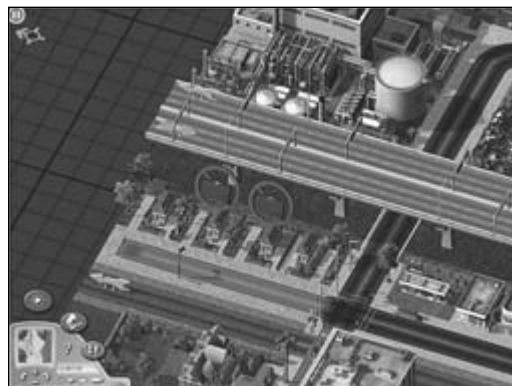
The no-job zot (briefcase) is a sign of trouble, possibly traffic trouble.

If a Sim is unable to find the destination, a no-job zot declares his or her intention to abandon in six months unless you fix the problem. You might also see the no-road-connection zot to indicate that there's no valid network to get where the Sim wants to go. When these pop up, add more mass transit or new Roads or convert clogged Streets to higher capacity Roads.

ORDINANCES

Two ordinances benefit your traffic system:

- Carpool Incentive Program
- Commuter Shuttle Service

GETTING INFORMATION ABOUT TRANSPORTATION AND TRAFFIC

There are many ways to find out how your transportation and traffic system is doing:

- Query buildings to see what their Commute/Freight Trip rating is. If it's too high, find a way to better serve that area's traffic needs (lay more Roads or upgrade Streets to Roads).
- Look for no-job or no-road-connection zots. These can alert you to problems, both isolated and widespread.
- Zoom in and inspect your Roads during commuting hours. If they look crowded, they are.
- Look at the Traffic City Opinion Poll to see what your citizens think of the traffic situation and which direction that opinion is headed.
- Have a tête-à-tête with your Transportation Advisor.
- Inspect funding in the Transportation Department budget.
- Illuminate the Traffic Data View. This view graphically shows your transportation network, where volume is the heaviest, and the location of hard-to-find transit stations.
- Look at the Commute Time Graph for your citywide average. This is one of a few average values that is useful.

EDUCATION

Education is the secret weapon of Mayors destined for greatness. Cultivate your Sims' minds and you'll be shocked at the effect on your burgeoning burg.

Education has the following effects:

- Lowers crime
- High EQ attracts High-Tech Industry
- School coverage affects desirability
- School coverage affects Mayor Rating

NOTE

New education buildings introduced in the *Rush Hour* expansion pack are detailed in Part 8.

EDUCATIONAL QUOTIENT

A Sim's intelligence is reflected in his or her Education Quotient ("EQ"). How a Sim inherits, grows, preserves, and bequeaths this quality is crucial to the intellectual improvement of your city.

NOTE

EQ ranges from 0 to 200.

Follow the progress of your EQ development with the Education Quotient Graph.

INITIAL EQ

Every Residential Sim is born with a base EQ corresponding to his wealth level. The wealthier the Sim, the greater his initial EQ:

- §: 20 EQ
- §§: 40 EQ
- §§§: 60 EQ

This base EQ is increased only by the influence of the Sim's parents by way of EQ inheritance.

EQ DECAY

A Sim's EQ drops every month the Sim is alive. No matter what you do as Mayor, every Sim's EQ sags by 0.2 points per month, or 2.4 points per year. At that rate, with no external educational influences, a low-income Sim drops to 0 EQ in eight years. It doesn't take much to turn your Sims into drooling Simpletons.

COMBATING EQ DECAY — EDUCATION

Stem the march into ignorance by providing your Sims with educational structures that outweigh the effect of EQ decay.

Each variety of educational institution imparts to anyone within its area of effect an educational boost. Any amount of EQ boost equal to or above EQ decay prevents your Sims from losing what intelligence they possess. The more boost you provide, the faster Sims gain intelligence, and the faster your city as a whole will realize the benefits of big brains. How does it work?

A pervasive and well-funded educational system is crucial for intellectual development.

LOCAL EDUCATIONAL EFFECT

As with most municipal buildings, educational structures have local impact. Only those Sims within the building's radius of effect receive a portion of its EQ boost.

> **THAT IS *SO* 3K!**
>
> **In *SimCity 3000*, educational buildings affected your entire city regardless of their location.**

NOTE
Overlapping radii of the same kind of educational building do not increase the EQ boost on a tract with double coverage. When the same type of building affects one location because of overlap, it's as if there was only one building because the effect is averaged.

If an area's student population is larger than one school can hold, overlapping schools will be necessary to prevent them running over capacity.

To educate your entire city, every tract of your Residential population must be within the radius of an age-appropriate and adequately funded educational building.

> **NOTE**
> A few educational buildings affect the entire city because their area of effect is so large: City College, City Museum, Main Library, Main Art Museum, Opera House, and University.

AGE AND EDUCATIONAL EFFECT

Not every educational building affects every citizen in the same way. An elderly Sim living near an elementary school receives only a minimal EQ boost from the school's proximity, while a young Sim receives the full effect.

Each of the nine educational buildings in *SimCity 4* primarily benefit a different age range. Those in that age range absorb the building's full gift, with the effect diminishing among Sims older and younger than the target range.

The Population by Age Graph tells you how old your population is.

> **NOTE**
> Don't be confused by the ages represented in this table. They don't signify the age of the students themselves, but the average age of the family in the household.

Educational Buildings Age Range

Building	Target Age Range
K–8 Small Elementary School	20–50
9–12 Large High School	30–60
Private School	20–60
City College	30–80
Small Library	20–100
Main City Library	20–100
City Museum	30–100
Major Art Museum	30–100
University	20–100
Opera House	80–100

The educational effects on each target age group are represented in these curves:

Elementary School

Local Branch Library

High School

City Museum

City College

Private School

University

Major Art Museum

Main Library

Opera House
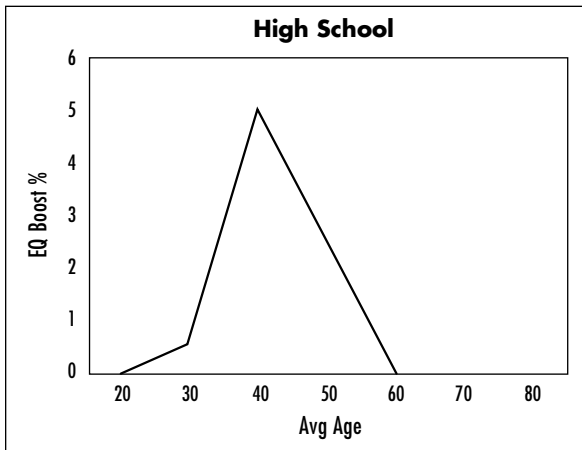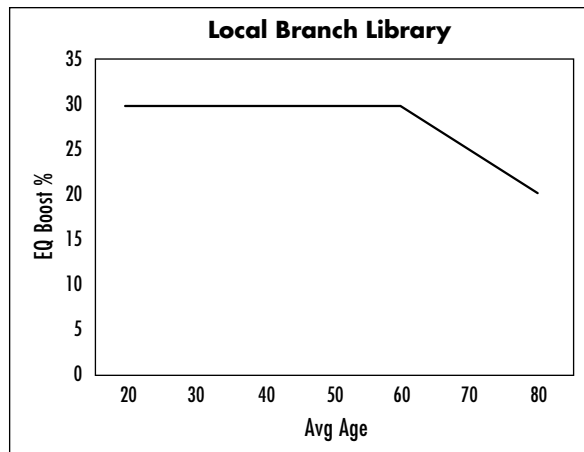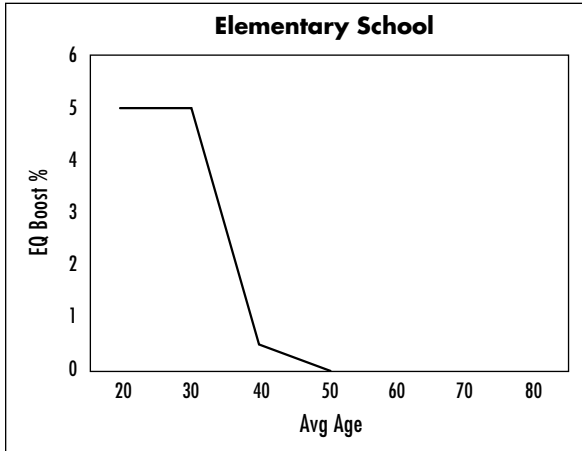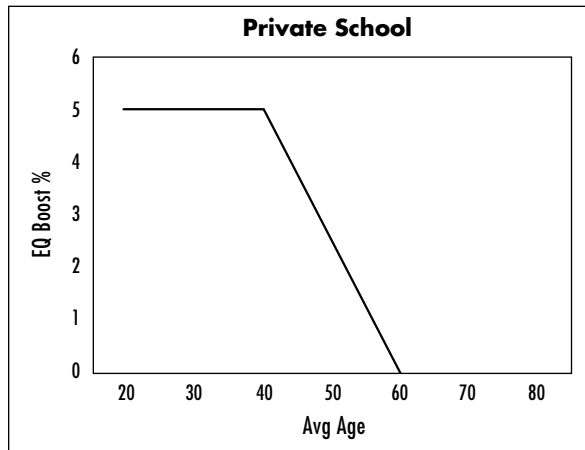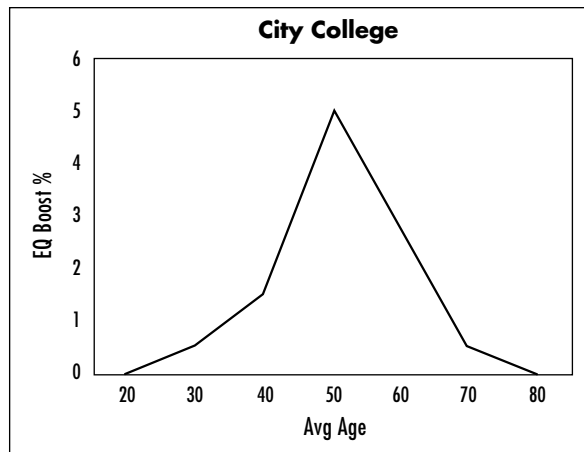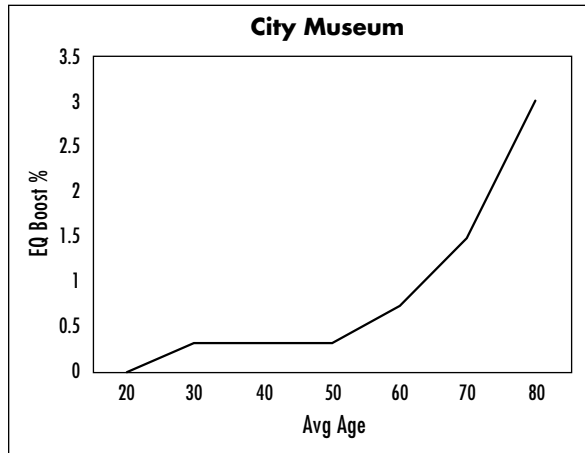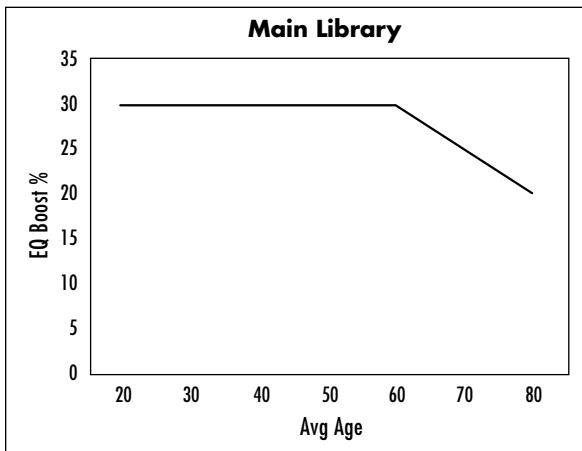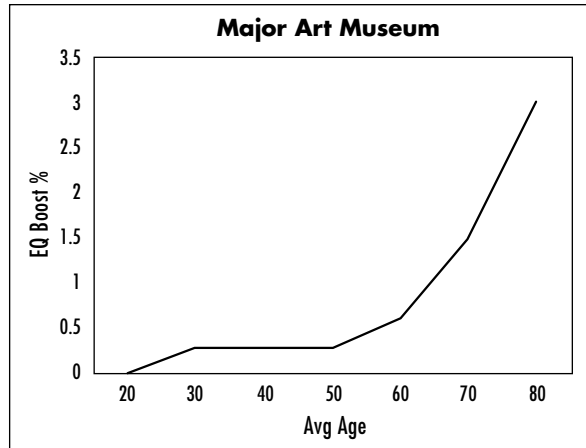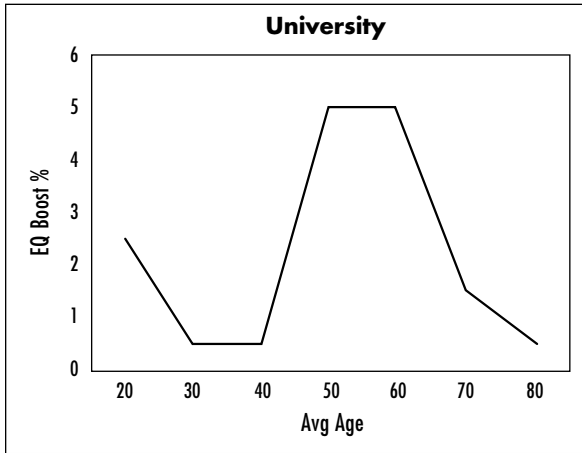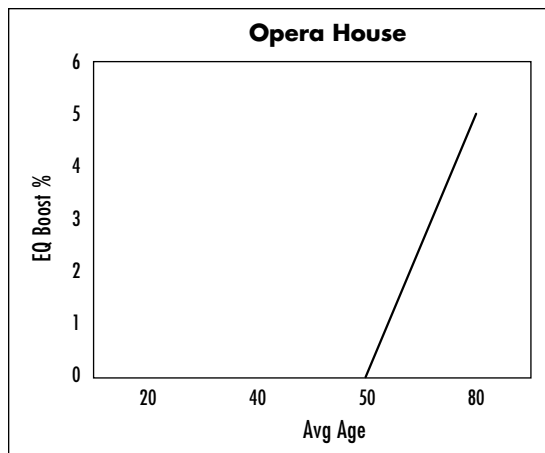
The key to maximizing your educational investment is to place schools where they'll do the most good. To guide you in these decisions, activate the Resident Average Age Data View and observe the average age of various locations.

The Resident Average Age Data View shows you where your schools should go.

Place schools in areas with high concentrations of applicable students. If the area is mixed, place the building, but reduce its funding so it's not running with lots of empty seats (and wasted Simoleons).

BEQUEATHING AND INHERITING EQ

At the end of life, a Sim's EQ is the sum of his or her base EQ, plus any net lifetime gain from education or net loss to decay. Well-educated Sims die smarter than they're born, while those with minimal education break even at best.

NOTE

Birth ages can be confusing. A Sim is not born at a particular age. It's just an illusion for the simulation. Think of it as when they're released from their parents' basement.

At death, a Sim bequeaths to the next generation 80 percent of his EQ.

CROSS-REFERENCE

See Chapter 21 for more information on Life Expectancy (LE).

For example, a medium-wealth Sim who's amassed an EQ of 100 and has reached maximum Life Expectancy (LE) bequeaths 80 EQ. Instead of starting life at the base EQ of 40, the new Sim starts at 80. Any education he or she receives in life (above EQ decay) adds to this number.

An educated populace begets a more educated populace, and you thereby foster the long-term evolution of your city toward intellectual richness.

To illustrate how this works, imagine a city in which the Residential population is perfectly supplied with age-appropriate schools (Small School, Large School, Private School, City College). The low-income population of this city will hit maximum EQ in four generations.

With libraries added to the equation, this same low-income population will reach full EQ in three generations.

With all educational buildings in place and imparting their full effects, the same population will advance to maximum EQ in one generation!

Your medium- and high-income populations will max out even earlier due to their initially higher base EQs.

SCHOOL EFFECTIVENESS

To bless those in its locality with their full effect, a school must maintain full effectiveness. Effectiveness of an individual school is represented in its Query box on a scale of one to five apples.

At full effectiveness, a school provides the full effect of the curves shown above. When that grade drops, the effect diminishes with it.

Maintaining effectiveness means watching and preserving each educational building's grade. Grade is the ratio of desks to students. If there are more students than desks (if the school is over-crowded), its effectiveness declines.

If a school is overcrowded, you have three choices: Place another school, increase funding to raise capacity, or decrease bus funding to lower the number of students.

A fully effective school is funded enough so that student capacity exceeds the number of students. Any more funding than this is a waste. The school's radius is dictated by the amount of funding to busing.

To increase capacity, increase the individual school's funding. This raises the number of desks in the school and restores the school to full effectiveness. This is a cheaper solution than plopping a new school building.

NOTE

If you've expanded the radius of your school by increasing its busing funding, you have another way of increasing its grade. Reduce bus funding to shrink the school's radius, and thereby serve a smaller geographical area. This means fewer students in the school's district, but also a significant population now lacks educational facilities.

Don't push funding above 110 percent; any further increase yields only minimal changes in capacity.

SHRINKING CAPACITY AND ENLARGING RADIUS

At times your schools may have too much capacity: too few students within their area of effect. This is a waste of money.

To handle a low-attendance school, reduce its funding, thereby shrinking its capacity. This permits you to save funds until the surrounding population grows large enough to fill the school's fully funded capacity. Watch such schools as population grows, or you'll end up with an underfunded school and maybe a teacher strike.

You may decide to bring more students into the reach of your school by adding funding to busing. Increasing bus funding (in the school's Query box) enlarges the school's radius. Be careful here as population increases; you may bring in more students than your school can handle. In that event, either increase funding to the school or decrease busing.

TIP

Your school attendance can skyrocket without your adding any new zones. If a low-density block is redeveloped by a high-rise apartment building, the student population of the area will increase. Beware these hidden capacity-blowers.

EDUCATIONAL ORDINANCES

You may increase your Sims' EQ by passing the education-enhancing Pro-Reading Campaign.

For every month this ordinance is in effect, its EQ bonus is added to every wealth population.

EFFECTS OF EDUCATION

Education may be its own reward, but there are others too.

LOWERED CRIME

The level of criminality is partially dictated by the EQ of your populace. For each wealth level, the level of EQ dictates how many members of that level will be criminals. The more criminals, the more crimes will be committed throughout your city.

If you raise EQ, you strike at the root of crime, reducing it for each increase in education. Were you to achieve the very elusive goal of full education of all wealth levels, your city would be crime free!

Reducing crime increases desirability in the areas where crime occurs and, as a result, ups your Mayor Rating.

INCREASE DEMAND FOR BETTER BUILDINGS

EQ is a crucial component in the development of great cities. Without high EQ, your populace will not demand lucrative and environmentally clean High-Tech and Commercial Office populations.

These prestigious employers provide a rich tax base and introduce jobs for high-income residents who pay substantial taxes.

As a side benefit, the propagation of High-Tech Industry supplants much of the polluting Dirty and Manufacturing Industries. This lowers your pollution, extends your Sims' Life Expectancy, and increases your Mayor Rating.

High Tech is clean and wealthy. You can never rid yourself of a polluting Industrial sector, but having a sizeable High-Tech population does wonders for a town.

DESIRABILITY

The presence and effectiveness of school coverage is a major factor in desirability to all residential wealth levels. To make your Sims want to move in, provide good school coverage.

MAYOR RATING

School coverage feeds into your Mayor Rating. Every property within a fully funded and age appropriate school's area of effect gets the full Mayor Rating boost.

EDUCATIONAL STRATEGY

So, what's the catch? As with most things, providing an optimal educational system requires lots of Simoleons. As with a good mass transit system, forging a potent education for your Sims will be a major drain on your budget.

Does this mean that raising your Sims' EQ has to wait until later in the game, when your tax base is established? Not necessarily. The desirability effects of educational structures work themselves to attract Sims to your town, increasing your tax base. You can (as described here) micromanage your school funding levels to avoid paying for unused capacity. There is a third option, but it's a secret.

You may prioritize your educational blessings based on wealth level. For example, you could place all your schools in low-wealth areas to dry up crime in your city's largest source of criminality. Or, you could place everything among your wealthiest Sims to speed the arrival of Commercial Office and High-Tech Industry. This third option carries with it more than a few ethical quandaries.

EDUCATION AND TRANSPORTATION

Educational buildings do not need to be in contact with transportation to impart their EQ boost. There are, however, other benefits of giving them transportation access.

Keep your schools, libraries, and museums on the traffic network. These buildings provide job demand satisfaction in the form of teacher/administrator jobs. As with all municipal buildings, this means small satisfaction of Residential demand, without the expense of zoning Commercial or Industrial.

EDUCATIONAL BUILDING DIRECTORY

Educational Building Statistics

Structure	Age Range	School Coverage Radius	School Student Capacity	School EQ Boost	Cost	Monthly Cost	Bulldoze Cost
City College	20–50	363	7,000	24	§3,000	§1,000	§270
City Museum	30–60	363	900	40	§1,500	§450	§140
Elementary School	20–60	24	500	24	§300	§400	§30
High School	30–80	512	47	24	§1,050	§750	§90
Local Branch Library	20–100	32	30,000	0.3	§1,000	§250	§90
Main Library	20–100	5,800	25,000	0.4	§19,000	§130	§750
Major Art Museum	30–100	363	24,000	50	§13,000	§90	§1,170
Opera House	30–100	363	1,200	2.4	§28,000	§200	§2,520
Private School	20–100	32	1,000	30	§0	§0	§820
University	80–100	363	10,000	30	§12,000	§1,500	§1,080

K–8 ELEMENTARY SCHOOL

- Size: 2x2

CITY COLLEGE
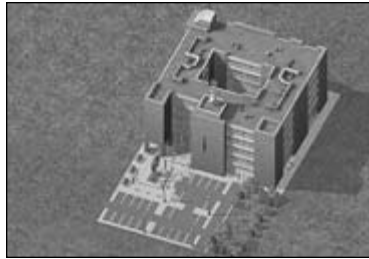
- Size: 4x3

9–12 HIGH SCHOOL

- Size: 4x4

LOCAL BRANCH LIBRARY

- Size: 2x2

CITY MUSEUM

• Size: 2x3

PRIVATE SCHOOL (REWARD)

• Size: 3x4

MAIN LIBRARY (REWARD)

• Size: 3x4

MAJOR ART MUSEUM (REWARD)

• Size: 3x3

UNIVERSITY (REWARD)

• Size: 12x10

OPERA HOUSE (REWARD)

• Size: 3x4

GETTING INFORMATION ABOUT EDUCATION

Each building's Query box is your most powerful tool for reading and adjusting your educational buildings. Here you'll find the school's rating and budget sliders.

Querying an educational building reveals its radius. Funding changes that adjust this radius show as you adjust the funding slider. Radii of placed schools are revealed when you attempt to plop any other educational building.

In the Data Views and Graphs menus, you'll want to consult:

- Resident Average Age Data View: Shows location of different age ranges within your residential zones.
- Education Data View: Displays educational level and the radii of educational buildings.
- Education Quotient Graph: Displays EQ over time.
- Education by Age Graph: Displays level of education for each 10-year age group.
- Resident Population: Shows how your Sims are distributed within those age groups.

HEALTH

Keeping your Sims healthy is, like education, a crucial priority you can serve only with buckets of cash and considerable attention to detail. After you understand the mechanism, however, it's a manageable undertaking. It's still expensive, but the steps and their effects are observable. What effects does good Sim health have?

- Good health increases Life Expectancy (LE).
- It increases EQ by lengthening LE (and therefore the Sim's time to gain education).
- Good healthcare coverage increases your Mayor Rating.
- Healthcare coverage also has a marked effect on desirability.
- Number of healthcare buildings partially unlocks Disease Research Lab Reward.

HEALTH QUOTIENT

Your Sim's average Health Quotient (HQ) dictates Life Expectancy (LE). Like Education Quotient, HQ is set at birth, increased by living under the effective coverage of healthcare structures, decreased by gradual and inevitable decay, and passed to the next generation of Sims. How, therefore, you treat your Sims now impacts how healthy their offspring will be and how hard you'll have to work in the future to improve their lives.
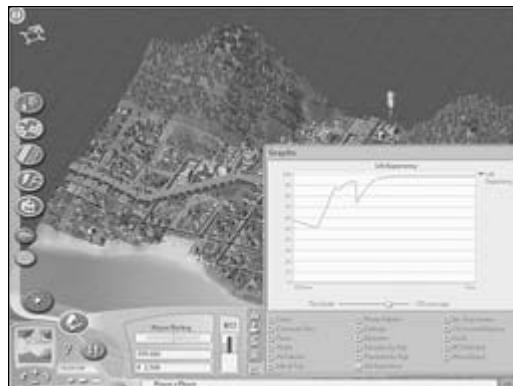
To tell if you're winning the health war, check the Life Expectancy Graph.

NOTE
HQ ranges from 0 to 200.

INITIAL HQ

Every Residential Sim is born with a base HQ corresponding to his wealth level. The wealthier the Sim, the greater his or her initial HQ:

- §: 20 HQ
- §§: 40 HQ
- §§§: 60 HQ

This base HQ is increased only by the influence of the Sim's parents by way of HQ inheritance.

HQ DECAY

A Sim's HQ drops every month the Sim is alive. No matter what you do as Mayor, therefore, all Sims in your city feel their HQs sag by 0.2 points per month or 2.4 points per year. At that rate, with no external healthcare influences, a low-income Sim drops to 0 HQ in only eight years. As you can see, it doesn't take much effort to turn your Sims into sickly shells.

OTHER HQ REDUCERS

For healthcare, one controllable factor joins with HQ decay to lower your Sims' HQ: pollution.

POLLUTION

The amount of pollution (the combined effect of water, air, garbage, and radiation pollution) on a given tract subtracts from the resident Sims' HQ every month. Thus, if pollution is so high that it, combined with HQ decay, is greater than the beneficial effects of your healthcare system, your Sims will get sicker.

Keeping pollution away from your Residents is the best way to keep your healthcare system humming.

NOTE
It doesn't matter what your citywide pollution amount is. If you keep its effects away from your Residential zones, it has no effect on your Sims' health.

Beyond a comprehensive healthcare system, the only way to reverse this trend is to reduce pollution. Find strategies for doing this in Chapter 14.

NOTE
Increasing HQ contributes to pollution reduction. Even if negative healthcare forces are greater than the positive effects of your healthcare buildings, a high HQ boost from these buildings minimizes drag to your Sims' life expectancy. The higher LE is, the longer Sims have to be educated, and the quicker they're educated, the faster low-polluting High-Tech and Commercial Office pop up. In other words, it's important to maintain your healthcare system even if pollution is winning the battle.

COMBATING HQ DECAY — HEALTHCARE

How does a Mayor fight the atrophy of his or her populace? By providing your Sims with healthcare structures that outweigh the effect of HQ decay.

Each variety of healthcare institution imparts an HQ boost to anyone within its area of effect. Any amount of HQ boost equal to or above HQ decay prevents your Sims from losing what health they possess. The more boost you provide, the faster Sims gain HQ and the faster your city realizes the benefits of a robust populace.

Plant these in your city when you can afford it to get the ball rolling on good health. The more complete the coverage, the faster HQ grows.

LOCAL HEALTHCARE EFFECT

As with most municipal buildings, healthcare structures have strictly local impact. Only those Sims within the building's radius of effect receive its HQ boost.

> **THAT IS *SO* 3K!**
>
> In *SimCity 3000*, healthcare buildings affected your entire city regardless of their location.

To care for your entire city, you must have every tract of your residential population within the radius of an adequately funded healthcare building.

Health is a local effect. Observe its local effects through the Health Data View and find out who's not getting the care they deserve.

NOTE
Two of your healthcare buildings affect the entire city because their areas of effect are so large. Both of these special buildings are Reward buildings.

It's essential that your hospitals keep their grade at maximum. If it drops below full, the hospital's efficiency falls, reducing the amount of HQ boost it bestows. This leads to shortages and a lessening of the hospital's beneficial effect.

AGE AND HEALTHCARE EFFECT

Unlike for Educational Quotient, the HQ-boosting effect of healthcare buildings benefits all Sims within their radii regardless of age.

This means that your goal in healthcare is to cover your residential population with healthcare facilities. Because everyone is affected equally, you need full coverage for optimum results (though pollution still may outweigh HQ boost). That doesn't mean the task is simple.

Your first obstacle is money; full coverage costs a lot. Second, covering every tile with healthcare might not do it if your population is dense and pollution is out of control. In that situation, overlap your hospital coverage areas to keep capacity ahead of demand.

TIP

As with educational buildings, reduce funding on your healthcare buildings when demand on them is low. Funding need only be high enough to keep capacity ahead of the number of patients. Any more money than that and you might as well be stuffing your bean bag with Simoleons.

HEALTHCARE EFFECTIVENESS

To bless those in its locality with its full effect, a healthcare building must maintain full effectiveness. Effectiveness of an individual building is represented in its Query box on a scale of one to five doctors.

At full effectiveness, a healthcare building provides its HQ benefit to everyone at full effect. As soon as that grade drops, the effect diminishes with it.

Maintaining effectiveness means watching and preserving each healthcare building's grade. Grade is the ratio of patient capacity to patients. If there are more patients than patient capacity (if the hospital is overcrowded), its effectiveness declines.

If a healthcare building becomes overcrowded, you have three choices: Place another building, increase funding to raise capacity, or decrease the existing building's capacity.

To increase capacity, increase the individual building's funding. This raises the number of beds in the facility and, when capacity is greater than the number of patients, restores the building to full effectiveness (and top grade). This is a cheaper solution than plopping a new building.

NOTE

If you've expanded the radius of your hospital by increasing its ambulance funding, you have another way of increasing its grade. Reduce ambulance funding to shrink the building's radius and thereby serve a smaller geographical area. This means fewer patients in the building's coverage area, but also means a significant population now lacks healthcare facilities.

Don't push funding above 110 percent, as any further increase yields only minimal changes in capacity.

SHRINKING CAPACITY AND ENLARGING RADIUS

At times your hospitals may have too much capacity: too few patients within their area of effect. This is a waste of Simoleons.

To handle a low-capacity hospital, reduce its funding, thereby shrinking its capacity. This permits you to save funds until the surrounding population grows large enough to fill the building's fully funded capacity. Watch such hospitals carefully as population grows or you'll end up with an underfunded facility and a healthcare strike.

On the other hand, you may decide to bring more patients into the reach of your school by adding funding to ambulances. Increasing ambulance funding (in the hospital's Query box) enlarges the hospital's radius. Be careful here as population increases; you may find yourself bringing in more patients than your building can handle. In that event, either increase funding to the hospital or decrease ambulance funding.

TIP

Your healthcare admittance can skyrocket without your adding any new zones. If a high-rise apartment building redevelops a low-density block, the patient population of the area increases. Beware these hidden capacity-blowers.

ORDINANCES

Two ordinances act to contribute to HQ on every block of your city.

- Community CPR Training Program
- Free Clinic Program

CROSS-REFERENCE

For more on ordinances, see Chapter 24.

BEQUEATHING AND INHERITING HQ

At the end of life, a Sim's HQ is the sum of his or her base HQ plus any net lifetime gain from healthcare coverage or net loss to decay. Well-cared-for Sims, therefore, will die healthier than they were born, while those with minimal healthcare coverage will break even at best.

At death, a Sim bequeaths to the next generation 80 percent of his HQ as a modification to his children's HQ.

For example, a medium-wealth Sim who's amassed an HQ of 100 and reaches his or her maximum Life Expectancy (LE) bequeaths 80 HQ to her offspring. Therefore, instead of starting life at the base HQ of 40, the new Sims start at 80. Any HQ boost they receive over their lives (above HQ decay) adds to this number.

Thus a healthy populace begets an even healthier populace and you foster the long-term evolution of your city toward peak health.

To illustrate how this works, imagine a city in which the Residential population is supplied with healthcare and pollution is nonexistent. The low-income population of this city will amass an HQ of 200 in 65 years.

With healthcare Reward buildings added to the equation, this same low-income population will reach maximum healthcare in only 50 years—one lifetime.

Your medium- and high-income populations will max out earlier due to their initially higher base HQs.

N O T E

Elevating average HQ at this rate is impossible. It would require a staggering amount of Simoleons and an epic anti-pollution effort to achieve this level of perfection. This is, therefore, presented only to provide a model of what occurs under ideal circumstances.

HEALTHCARE BUILDING DIRECTORY

Healthcare Building Statistics

Structure	Coverage Radius	Patient Capacity	HQ Boost	Cost	Monthly Cost	Bulldoze Cost
Disease Research Lab	363	6,000	8	§26,000	§180	§2,340
Farmer's Market	363	200,000	0.1	§4,900	§30	§440
Large Medical Center	37	3,000	11.52	§1,100	§1,200	§100
Medical Clinic	24	500	11.52	§400	§400	§40

MEDICAL CLINIC

• Size: 1x2

LARGE MEDICAL CENTER

• Size: 3x4

DISEASE RESEARCH LAB (REWARD)

• Size: 5x6

NOTE

The Farmer's Market benefits citywide health by providing organic fruits and vegetables that are healthier than the pesticide-laden stuff you get at the Simway food stores. The increase to HQ is minimal, but it does have an impact.

FARMER'S MARKET (REWARD)

• Size: 3x3

GETTING INFORMATION ABOUT HEALTH

• Query structures to see the current Hospital Grade.

• Look for the current citywide status in the Health Opinion Poll.

• Compare notes with your Health and Education Advisor.

• Examine your Health and Education Budget.

• Switch on the Health Data View, and see what you're up against in the various Pollution Data Views.

• Examine citywide health over time with the Life Expectancy Graph, and see what's cooking in the various Pollution Graphs.

• See what your My Sims have to say on the subject.

PARKS AND RECREATION

Your Sims need the essentials: power, water, streets, places to live, places to shop, and places to work. Your Sims also need fun. To grow your city beyond the most modest levels, offer your citizenry facilities for blowing off steam and enjoying the beautiful SimCity weather.

The mechanism for this is park and recreation structures, as well as several specially designed Reward buildings. Each one benefits nearby properties and grants your city the potential to grow.

Parks and recreation structures have several effects, most of them beneficial:

- Provide Residential Demand Cap Relief
- Reduce air pollution
- Contribute air or water pollution and garbage
- Increase desirability of Residential, Commercial, and High-Tech Industrial land
- Consume power and water
- Help to unlock some Rewards

N O T E

For most purposes, parks and recreation structures are identical. For the scant moments when the distinction makes a difference, the building catalog in this chapter specifies into which class each structure fits.

THAT IS *SO* 3K!

The Demand Cap Relief from Parks isn't free anymore. You have to pay for it now, both when you add it and on a monthly basis.

PARK AND RECREATION FUNDING

Parks and recreation facilities cost money, but their effects make them worth the outlay. You pay when you add them to your city, and you pay more on a monthly basis as part of your City Beautification budget.

Funding can, however, make a difference in the effects of parks and recreation facilities on your city. If you underfund your Parks and Recreation budget, the positive effects of every park or recreation area in your city will proportionally reduce. At 60 percent funding, parks will look grimy and distressed to reflect their waning positivity.

PARKS, RECREATION, AND DEMAND CAP RELIEF

Demand Caps control the size of your city and the three major developers (Residential, Commercial, and Industrial). These population ceilings act as dynamic limits beyond which your various populations can't grow until you provide something that lifts the ceiling.

In the case of Residential Sims, this ceiling is lifted by adding park and recreation structures to your city. Each time you add one, the Residential Demand Cap rises.

NOTE

The capacity for structures or connections to raise Demand Caps is called "Demand Cap Relief."

For example, a city has an initial R§ Demand Cap of 20,000 R§ Sims. With no recreational facilities whatsoever, your city can grow to 20,000 R§ Sims. As you approach that point, the maximum demand for R§ structures gradually drops, eventually leveling off at 0. Add one or more park or recreation structures, and the Demand Cap rises (according to the Demand Cap Relief provided by each structure) to a new ceiling; your Residential population can then grow to that new size without your having to add more Demand Cap Relief.

The lesson is this: Were Demand Caps your only issue, there'd be no reason to add park or recreation structures until your population nears its first Demand Cap. Fortunately, things are more complicated than that.

PARKS, RECREATION, AND DESIRABILITY

Parks and recreation buildings have a positive desirability effect on nearby property.

These structures can raise desirability (within their radius of effect) for all Residential, Commercial, and High-Tech Industrial development.

> Not all park and recreation facilities benefit both Residential and High-Tech Industrial desirability on one hand and Commercial desirability on the other. Many, however, do.
>
> In the directory and table here, the effect of parks and recreation facilities on each group are referred to as "Res. NIMBY/YIMBY" and "Com. NIMBY/YIMBY."

PARKS, RECREATION, AND POLLUTION

Like other structures, parks and recreation structures produce some measure of air and water pollution and garbage.

Some parks, however, are so green and environmentally wonderful, they reduce air pollution. If a structure has a negative Air Pollution Effect, it can counteract the effects of nearby air pollution contributors.

REWARD RECREATION BUILDINGS

Several Rewards (see Chapter 23) act as recreational buildings, providing large doses of Demand Cap Relief. These buildings include:

- Farmer's Market (R§, R§§)
- Major Art Museum (R§§, R§§§)
- Major League Stadium (R§, R§§)
- Minor League Stadium (R§, R§§)
- Opera House (R§§§)
- Tourist Trap (R§)

NOTE

Two recreational Reward buildings (City Zoo and Minor League Stadium) require that your city already has demonstrated a commitment to recreation. To obtain each, you must have (among other requirements) a defined number of recreation structures in your city.

PARKS AND RECREATION BUILDING CATALOG

Park and Recreation Building Statistics

Structure	Com. NIMBY/ YIMBY	Com. NIMBY/ YIMBY Radius	Res. NIMBY/ YIMBY	Res. NIMBY/ YIMBY Radius	Air Pollution	AP Radius	Water Pollution	WP Radius	MR Effect	MR Effect Radius	Cost	Monthly Cost	Bulldoze Cost	Demand Cap Relief R§	Demand Cap Relief R§§	Demand Cap Relief R§§§
Basketball Court	0	0	30	30	0	0	0	0	0	0	§90	§10	§10	1,000	1,000	1,000
Beach	50	10	80	10	0	0	0	0	0	0	§70	§5	§10	250	250	250
Community Garden	0	0	40	35	-2	3	1	1	0	0	§70	§5	§10	250	250	250
Gazebo	20	10	40	40	-1	2	1	2	0	0	§90	§10	§10	1,000	1,000	1,000
Large Flower Garden	35	10	85	45	-15	6	3	3	0	0	§310	§35	§30	7,000	7,000	7,000
Large Park Green	30	15	75	45	-15	6	4	3	0	0	§320	§25	§30	2,500	2,500	2,500
Large Plaza	80	15	35	30	0	0	0	0	0	0	§400	§35	§40	9,000	9,000	9,000
Medium Flower Garden	20	10	70	30	-7	4	2	2	0	0	§170	§20	§20	3,000	3,000	3,000
Medium Park Green	20	15	60	30	-7	4	2	2	0	0	§160	§15	§20	1,000	1,000	1,000
Medium Playground	0	0	75	25	-5	4	2	1	0	0	§210	§25	§20	3,000	3,000	3,000

Park and Recreation Building Statistics continued

Structure	Com. NIMBY/ YIMBY	Com. NIMBY/ YIMBY Radius	Res. NIMBY/ YIMBY	Res. NIMBY/ YIMBY Radius	Air Pollution	AP Radius	Water Pollution	WP Radius	MR Effect	MR Effect Radius	Cost	Monthly Cost	Bulldoze Cost	Demand Cap Relief R§	Demand Cap Relief R§§	Demand Cap Relief R§§§
Medium Plaza	60	15	25	25	0	0	1	0	0	0	§210	§25	§20	4,000	4,000	4,000
Open Grass Area	20	10	30	15	-2	2	1	1	0	0	§40	§5	§10	250	250	250
Open Paved Area	30	10	10	10	0	0	0	0	0	0	§40	§5	§10	250	250	250
Playground	0	0	60	15	-1	2	1	1	0	0	§90	§10	§10	1,000	1,000	1,000
Ranger Station	0	0	20	80	-3	2	1	1	0	0	§90	§10	§10	1,000	1,000	1,000
Skateboard Park	0	0	30	60	0	0	0	0	0	0	§210	§25	§20	4,000	4,000	4,000
Small Flower Garden	20	10	60	15	-2	2	1	1	0	0	§80	§5	§10	750	750	750
Small Park Green	30	15	50	15	-2	3	1	1	0	0	§40	§5	§10	250	250	250
Small Plaza	50	15	25	15	0	0	0	0	0	0	§90	§10	§10	1,000	1,000	1,000
Soccer Field	20	5	30	50	-8	5	4	3	0	0	§340	§35	§30	5,000	5,000	5,000
Softball Field	20	5	30	50	-10	5	4	4	0	0	§400	§35	§40	6,000	6,000	6,000
Tennis Court	0	0	30	30	0	0	0	0	0	0	§130	§15	§10	4,000	4,000	4,000
City Zoo	50	14	25	17	-5	3	5	4	5	440	§37,000	§260	§3,330	0	0	0
Farmer's Market	50	22	75	27	1	1	1	2	0	0	§4,900	§30	§440	20,000	150,000	0
Major League Stadium	75	27	-50	20	-10	4	7	5	5	440	§48,000	§340	§4,320	300,000	300,000	0
Minor	50	22	-20	16	-10	4	5	5	3	440	§17,000	§120	§1,530	200,000	200,000	0
Opera House	50	22	0	0	1	2	1	15	0	0	§28,000	§200	§2,520	0	0	5,000
Tourist Trap	50	36	-25	17	1	2	1	2	0	0	§10,000	§210	§2,700	100,000	0	0

BASKETBALL COURT

- Size: 2x1
- Kind: Recreation

BEACH

- Size: 7x5
- Kind: Recreation

COMMUNITY GARDENS
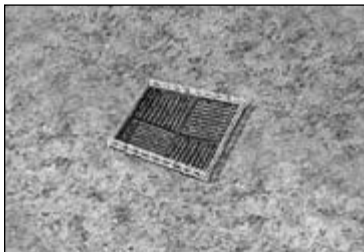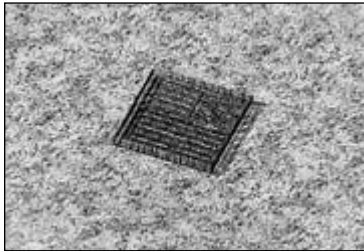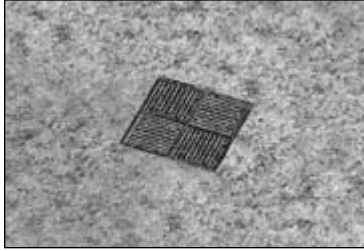
- Size: 1x1
- Kind: Park

GAZEBO

- Size: 1x1
- Kind: Park

LARGE FLOWER GARDEN

- Size: 3x3
- Kind: Park

LARGE PARK GREEN

- Size: 3x3
- Kind: Park

LARGE PLAZA

- Size: 3x3
- Kind: Park

MEDIUM PLAYGROUND

- Size: 2x2
- Kind: Recreation

MEDIUM FLOWER GARDEN

- Size: 2x2
- Kind: Park

MEDIUM PLAZA

- Size: 2x2
- Kind: Park

MEDIUM PARK GREEN

- Size: 2x2
- Kind: Park

OPEN GRASS AREA

- Size: 1x1
- Kind: Park

OPEN PAVED AREA
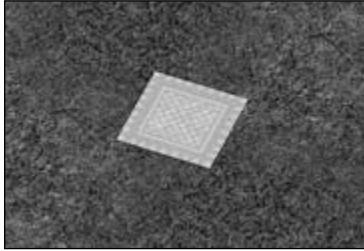
- Size: 1x1
- Kind: Park

SKATEBOARD PARK

- Size: 2x1
- Kind: Recreation

PLAYGROUND

- Size: 1x1
- Kind: Recreation

SMALL FLOWER GARDEN

- Size: 1x1
- Kind: Park

RANGER STATION

- Size: 2x1
- Kind: Park

SMALL PARK GREEN

- Size: 1x
- Kind: Park

SMALL PLAZA

- Size: 1x1
- Kind: Park

SOFTBALL FIELD

- Size: 3x3
- Kind: Recreation

SOCCER FIELD

- Size: 3x5
- Kind: Recreation

TENNIS COURT
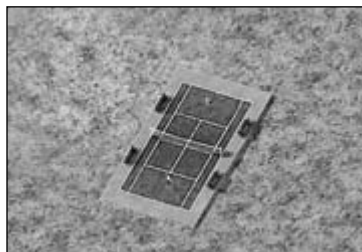
- Size: 2x1
- Kind: Recreation

REWARDS

What keeps you going as Mayor? Is it the satisfaction of seeing your creation come to life, grow, and change? Is it the power that comes with greater and greater achievement? Or is it getting great new stuff for your efforts?

If prizes and baubles are what you're after, check out *SimCity 4*'s long and eye-popping slate of Reward buildings.

Reward structures play several roles. Some are special structures that become available only after you achieve certain goals such as population milestones, Regional expansion, Residential prosperity, or development of a sizeable high-tech Industrial population. The more impressive the achievement, the more luminous the Reward.

Other kinds of Rewards, such as the series of Mayor Statues, are trophies for a job well-done. For anyone not reading this guide, these Rewards are hidden surprises that mark your progress through city evolution. As your city and your success grows, new ones get added to your Rewards menu. You now know they're coming, but that doesn't make them any less special.

NOTE

Many new Rewards and reward mechanisms have been added with the *Rush Hour* expansion pack. Consult Part 8 for details if the Reward you're looking for doesn't appear here.

Finally, some Rewards give you a choice about what you want your city to be. Do you want Houses of Worship in your city? Like the statues, they don't preview in the Rewards menu, but they're more option than prize—a chance to make a statement about what you want your city to be.

> **THAT IS *SO* 3K!**
> **Get ready for sticker shock! Rewards aren't free anymore. Most now cost Simoleons to build and to maintain. On the upside, they can be potent and desirable.**
>
> **Adding these structures becomes, therefore, a strategic decision. Are the benefits worth the price?**

Rewards can have several effects:

- Affect desirability of Commercial, Industrial High-Tech, and/or Residential areas
- Affect Mayor Rating
- Create jobs
- Provide Demand Cap Relief

- Unlock other Reward buildings
- Affect EQ or LE
- Increase crime
- Consume power and water
- Contribute to air and water pollution and generate garbage

GENERAL REWARD PRINCIPLES

All Rewards share one basic commonality: They must be earned before you can place them in your city.

REWARD REQUIREMENTS

The combination of requirements for a Reward can be as simple as population and Mayor rating or as sophisticated has having a certain number of highly rated libraries. The more demanding the standard, the more valuable the Reward will be.

Requirements will be met in the current city you're playing (ignoring any other cities in the region). How many park buildings do you have? How big is your R§§ population? That sort of thing. Most of these standards can be checked in your Graphs and Data Views.

Sometimes a requirement feeds off of the Region (see Regional Play in Chapter 25). The Resort Hotel, for example, looks to the size of the Regional population. Why? Because "hotel" implies that people have to come from elsewhere. There must, therefore, be an elsewhere (and a sizeable one) from which they can come to justify something so opulent.

Rewards sometimes are based on your entire Region. This is another incentive to grow your metropolis beyond one city.

REWARD MECHANISMS

After you meet the requirements for a Reward, your City Planner Advisor or your News Ticker sends you an announcement. At the same time, it becomes available in your Civic Tools>Build Rewards & Business Deals menu.

After you earn a Reward, it remains available for building even if you subsequently drop below the Reward's original requirements.

A Reward announcement is hard to miss. After you see this, you can accept or decline, then place it wherever you want. (If you decline, it's still available in the menu.)

For a majority of Rewards, you may plop only one of its kind in a city. You may earn multiple instances of certain rewards (Cemeteries, Houses of Worship, Private Schools) as your city grows, to meet the growing needs of your Sims, but you must independently earn each individual building.

When you place a Reward in the city, its place on the menu grays out. For multiple Rewards, each version has its own spot on the menu, and each won't appear even in grayed-out form until you earn it; technically they're surprises.

After you place a Reward, you can move it only by demolishing it (at a substantial cost), plopping it in a new place, and paying the acquisition fee.

! WARNING

The cost of moving a Reward building is astronomical. Take care when deciding where to place each one. Save your game before you place a Reward. If you accidentally put the Reward in the wrong place, exit the Region without saving, then reload your city.

PURCHASE COSTS AND MONTHLY COSTS

You can't place your newfound Rewards anytime you please; you need to be able to afford them.

This means first being able to pay the purchase price. Many Rewards come with a hefty acquisition price that must be paid the moment you lay them down.

After the Reward is part of your burg, your new structure may also cost you a fixed sum every month to maintain. If you reduce funding of a Reward (in the various lines on which they appear in your Budget), it slowly deteriorates, eventually becoming a distressed eyesore. As funding is reduced, the Reward's positive effects decrease in proportion to the reduction in funding (e.g., a Reward funded at 60 percent exerts 60 percent of its effects).

REWARD EFFECTS

Rewards have substantial effects. The bulk of these effects are beneficial. Reward buildings can boost your Mayor Rating, increase the desirability of surrounding land, offer jobs, provide Demand Cap Relief, improve your educational or healthcare systems, or open the way to other Rewards.

NOTE

Not everything is valued by every segment of your population. A welcome addition for your Commercial Sims might be an eyesore to your Residential population. Weigh the impact of a Reward on everyone before deciding to purchase it—and decide whether to put it near residences, Commercial districts, or out on its own.

You may be surprised to find, however, that not all of these effects are positive. At the least, Rewards put additional burdens on your utility systems and contribute at least a bit of additional pollution (as would any other building). Some even increase crime.

The effects of each Reward are detailed in the Reward Catalog.

What effects a Reward has guides you to put it where it'll do the most good.

If you're going for the "seat-of-power" look, focus on the governmental Rewards.

REWARDS AND CITY CHARACTER

Rewards are also excellent sources of self-expression and definition of your city's character.

It's impossible to earn all Rewards for one city. They're expensive. Some Rewards require other Rewards as a prerequisite, locking you into a chain or theme of Rewards (e.g., to get the Major League Stadium, you must first place the Minor League Stadium). Finally, some Rewards cover large areas, taking up real estate that could be producing tax revenue.

Careful study of the Reward structures reveals several city themes. Collecting all related Reward buildings lends to your city a coherent look and feel. If one of these city characters is your goal, this can help you choose which Rewards to select.

City Characters

Level	Government City	Average Joe City	Media Savvy City	Educated City	Aesthetic City	Opulent City	Evil City	Milestones
Small Time	Mayor's House	Farmer's Market	Tourist Trap	—	Resort Hotel	—	Toxic Waste Dump	Mayor's Statue
2	House of Worship and Cemeteries	—	Radio Station	Private School	—	Private School	Missile Range	Impressive Mayor's Statue
3	City Hall	Minor League Stadium	—	University	—	Country Club	Federal Prison	—
4	Main Branch Library	State Fair	—	Major Art Museum	Major Art Museum	—	Army Base	Magnificent Mayor's Statue
5	Courthouse	City Zoo	Television Studio Research Lab	Disease	—	Convention Center	—	Casino
Big Time	Bureau of Bureaucracy	Major League Stadium	Movie Studio	Advanced Research Center	Opera House	Stock Exchange	—	Colossal Mayor's Statue

REWARD DIRECTORY

Every Reward in *SimCity 4* is listed on the following pages, including each structure's cost, monthly fee, prerequisites, and other items of interest.

Reward Building Statistics

Structure	Com. Proximity Effect	Com. Proximity Effect Radius	Res. Proximity Effect	Res. Proximity Effect Radius	Air Pollution	AP Radius	Water Pollution	WP Radius	Crime Effect	Crime Effect Radius	MR Effect	MR Effect Radius
Advanced Research Center	50	22	-50	22	3	2	4	3	0	0	-3	220
Bureau of Bureaucracy	25	17	-50	22	2	3	2	4	0	0	0	0
Cemeteries	0	0	40	20	-15	3	4	3	0	0	2	220
City Hall	50	22	0	0	1	2	1	3	0	0	0	0
City Zoo	50	14	25	17	-5	3	5	4	0	0	5	440
Colossal Mayor's Statue	100	48	100	48	0	0	0	0	0	0	3	440
Convention Center	100	32	-50	22	3	4	2	5	20	10	0	0
Country Club	0	0	75	27	-22	4	8	3	0	0	-5	220
Courthouse	70	26	0	0	2	2	1	3	0	0	0	0
Disease Research Lab	40	20	0	0	3	3	2	4	0	0	2	440
Farmer's Market	50	22	75	27	1	1	1	2	0	0	0	0
Houses of Worship	0	0	80	28	1	2	1	3	0	0	4	110
Hydrogen Power Plant	0	0	0	0	10	3	8	4	0	0	0	0
Impressive Mayor's Statue	50	14	50	22	0	0	0	0	0	0	3	220
Magnificent Mayor's Statue	75	27	75	27	0	0	0	0	0	0	3	330
Main Library	50	22	50	22	1	2	1	3	0	0	0	0
Major Art Museum	70	26	50	22	1	2	1	3	0	0	5	440
Major League Stadium	75	27	-50	20	-10	4	7	5	0	0	5	440
Mayor's House	100	48	100	48	1	2	1	3	0	0	2	220
Mayor's Statue	25	17	25	17	0	0	0	0	0	0	3	110
Minor League Stadium	50	22	-20	16	-10	4	5	5	0	0	3	440
Movie Studio	50	14	0	0	4	4	3	5	0	0	0	0
Nuclear Power Plant	0	0	0	0	10	4	45	5	0	0	0	0
Opera House	50	22	0	0	1	2	1	15	0	0	0	0
Private School	0	0	60	24	1	2	1	3	0	0	0	0
Radio Station	25	17	0	0	4	3	3	4	0	0	2	440
Resort Hotel	25	17	0	0	2	3	3	4	0	0	4	440
Solar Power Plant	0	0	0	0	5	3	5	3	0	0	0	0
State Fair	50	14	-25	17	2	2	2	3	20	20	5	440
Stock Exchange	70	26	0	0	2	3	2	4	0	0	0	0
Television Studio	50	22	-25	17	6	3	4	4	0	0	0	0
Tourist Trap	50	36	-25	17	1	2	1	2	0	0	0	0
University	50	22	50	22	2	2	1	3	0	0	0	0

Cost	Monthly Cost	Bulldoze Cost	Jobs R§	Jobs R§§	Jobs R§§§	Demand Cap Relief R§	Demand Cap Relief R§§	Demand Cap Relief R§§§	Demand Cap Relief Co§§	Demand Cap Relief Co§§	Demand Cap Relief IM	Demand Cap Relief IHT
§0	§0	§6,300	0	92	31	0	0	0	0	0	0	150,000
§46,000	§320	§1,440	0	100	0	0	0	0	0	0	0	0
§0	§0	§230	0	0	0	0	0	0	0	0	0	0
§40,000	§280	§3,600	0	30	0	0	0	0	0	0	0	0
§37,000	§260	§3,330	0	0	0	0	0	0	0	0	0	0
§57,000	§400	§5,130	0	0	0	0	0	0	0	0	0	0
§32,000	§220	§2,880	15	0	0	0	0	0	100,000	100,000	0	0
§0	§0	§730	0	0	0	0	0	8,000	0	0	0	0
§44,000	§310	§3,960	0	0	0	0	15	15	30	0	0	0
§26,000	§180	§2,340	0	80	32	0	10,000	10,000	0	0	0	0
§4,900	§30	§440	0	0	0	20,000	150,000	0	0	0	0	0
§0	§0	§500	0	0	0	0	0	0	0	0	0	0
§100,000	§10,000	§4,500	10	23	15	0	0	0	0	0	0	0
§6,400	§40	§580	0	0	0	0	0	0	0	0	0	0
§22,000	§150	§1,980	0	0	0	0	0	0	0	0	0	0
§19,000	§130	§750	0	0	0	0	0	0	0	0	0	0
§13,000	§90	§1,170	0	0	0	0	6,000	6,000	0	0	0	0
§48,000	§340	§4,320	0	0	0	300,000	300,000	0	0	0	0	0
§1,800	§10	§160	0	0	0	0	0	0	0	0	0	0
§3,700	§30	§330	0	0	0	0	0	0	0	0	0	0
§17,000	§120	§1,530	0	0	0	200,000	200,000	0	0	0	0	0
§0	§0	§4,590	0	0	34	0	0	0	0	0	0	0
§40,000	§3,000	§1,800	20	20	8	0	0	0	0	0	0	0
§28,000	§200	§2,520	0	0	0	0	0	5,000	0	0	0	0
§0	§0	§820	10	19	4	0	0	6,000	0	0	0	0
§0	§0	§1,260	0	0	0	0	9,000	0	0	0	9,000	0
§0	§0	§3,780	0	37	0	0	5,000	5,000	0	0	0	0
§30,000	§1,000	§1,350	10	12	10	0	0	0	0	0	0	0
§0	§0	§990	0	0	0	0	0	0	0	0	0	0
§0	§0	§5,760	0	0	15	0	0	125,000	0	0	0	0
§0	§0	§3,060	0	0	0	0	3,000	0	10,000	0	0	0
§10,000	§210	§2,700	0	0	0	100,000	0	0	0	0	0	0
§12,000	§1,500	§1,080	76	116	19	0	15,000	15,000	15,000	0	0	100,000

Rewards fall into three basic categories.

- One-Shot: Only one of these Rewards may exist in your city at a time.
- Multiple: More than one of these may grace your city, but you must individually earn each instance.
- Power Plant: Power Plants are available only by virtue of special prerequisites. After you earn one, you can, unlike other Reward buildings, place as many of these plants as you can afford.

ONE-SHOT REWARDS

The vast majority of Reward buildings are of this kind. After you earn one, you can place it in one location.

ADVANCED RESEARCH CENTER

- Size: 6x7

Prerequisites:

- High-Tech Industry Population: 2,000
- Mayor Rating: 54
- University

BUREAU OF BUREAUCRACY
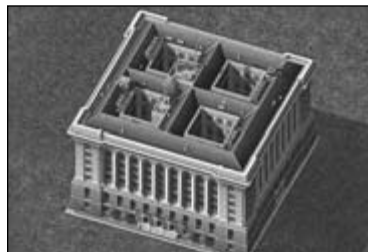
- Size: 4x4

Prerequisites:

- City Size: 39,000
- Mayor Rating: 30
- Well-Funded Health and Education System

CITY HALL

- Size: 3x4

Prerequisites:

- Total Population: 12,500
- Mayor Rating: 20

CITY ZOO

- Size: 8x8

Prerequisites:

- City Size: 80,000
- Mayor Rating: 68
- Number of Parks: 25

CONVENTION CENTER
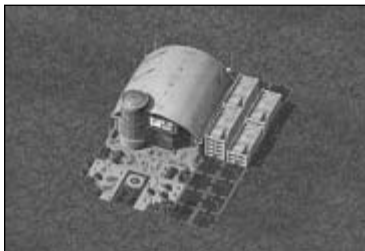
- Size: 6x9

Prerequisites:

- Commercial Population: 25,000
- Mayor Rating: 40
- Major Airport

COUNTRY CLUB

- Size: 12x12

Prerequisites:

- R§§§ Population: 2,000
- Mayor Rating: 55

COURTHOUSE

- Size: 3x3

Prerequisites:

- City Size: 40,000
- Mayor Rating: 33
- City Hall

DISEASE RESEARCH LAB

- Size: 5x6

Prerequisites:

- Total Population: 56,000
- Mayor Rating: 45
- Number of Hospitals: 3

FARMER'S MARKET

- Size: 3x3

Prerequisites:

- City Size: 3,000
- Mayor Rating: 34
- Farm Population: 600

MAIN LIBRARY

- Size: 3x4

Prerequisites:

- Residential Population: 34,000
- Mayor Rating: 37
- Number of Good (>85) Public Libraries: 5

MAJOR ART MUSEUM

- Size: 3x3

Prerequisites:

- R§§ and R§§§ Population: 12,000
- Mayor Rating: 45
- Number of Good (>85) Public Museums: 4

MAJOR LEAGUE STADIUM

- Size: 9x8

Prerequisites:

- City Size: 85,000
- Mayor Rating: 30
- Minor League Stadium

MAYOR'S HOUSE

- Size: 2x3

Prerequisites:

- City Size: 500
- Mayor Rating: 20

MINOR LEAGUE STADIUM

- Size: 7x7

Prerequisites:

- Total Population: 22,500
- Mayor Rating: 20
- Number of Recreation Structures: 16

MOVIE STUDIO

- Size: 8x6

Prerequisites:

- City Size: 110,000
- Mayor Rating: 52
- Television Studio

OPERA HOUSE
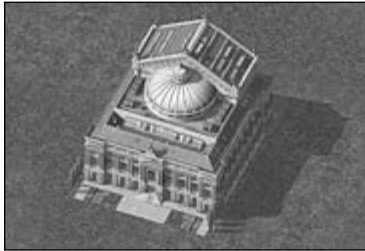
- Size: 3x4

Prerequisites:

- R§§ and R§§§ Residential Population: 48,000
- Mayor Rating: 52
- Major Art Museum

RADIO STATION

- Size: 3x3

Prerequisites:

- Total Population: 18,000
- Mayor Rating: 30

RESORT HOTEL

- Size: 4x4

Prerequisites:

- Regional R§§ and R§§§ Population: 50,000
- Mayor Rating: 52
- Cities in Region: 4
- Pollution: Low

STATE FAIR

- Size: 8x12

Prerequisites:

- City Size: 3,500
- Mayor Rating: 48
- Farm Population: 1,200

STOCK EXCHANGE

- Size: 3x4

Prerequisites:

- Commercial Office Population: 25,000
- Mayor Rating: 45

TELEVISION STUDIO

- Size: 3x3

Prerequisites:

- City Size: 65,000
- Mayor Rating: 50
- Radio Station

TOURIST TRAP

- Size: 3x2

Prerequisites:

- Regional Population: 40,000
- Number of Connected Neighbor Cities: 4
- Number of Regional Cities Connected to Other Cities: 6

UNIVERSITY

- Size: 12x10

Prerequisites:

- Residential Population: 15,000
- Mayor Rating: 42
- City School Grade: 95

MULTIPLE REWARDS

You may have several instances of these Rewards in your city but you receive only one of them at a time. Each time you reach the next milestone you get another, until you've placed all available instances in your city. Collect them all!

NOTE

These Rewards won't appear in the Rewards & Business Deals menu, even in grayed-out form, until you earn them.

HOUSES OF WORSHIP (X4)

• Size: 3x3

Prerequisites:

House of Worship Requirements

Number	Residential Population	Mayor Rating
First House of Worship	1,000	40
Second House of Worship	5,000	44
Third House of Worship	30,000	48
Fourth House of Worship	120,000	52

CEMETERY (X3)

• Monthly Cost: §0

• Size: 5x5

Prerequisites:

Cemetery Requirements

Number	Residential Population	Mayor Rating
First Cemetery	2,000	42
Second Cemetery	15,000	46
Third Cemetery	60,000	50

PRIVATE SCHOOL (X3)

- Monthly Cost: §0
- Size: 3x4

Prerequisites:

Private School Requirements

Number	R§§§ Population	Avg. School Grade
First Private School	750	<85
Second Private School	3,750	<85
Third Private School	7,500	<85

MAYOR'S STATUES

NOTE

All Mayor's Statues come in a male and female variety. After you place one, the other disappears from the menu until you demolish the first.

Statues and Requirements

Statue	Cost	Monthly Cost	Size	Residential Population	Mayor Rating
Mayor's Statue	§3,700	§130	1x1	5,000	60
Impressive Mayor's Statue	§6,400	§220	1x1	30,000	60
Magnificent Mayor's Statue	§22,000	§840	2x2	60,000	60
Colossal Mayor's Statue	§59,000	§1,500	3x3	120,000	60

POWER PLANT REWARDS

These high-tech Power Plants are earned, not given. To get these efficient (but each in their way problematic) power structures, you have to jump through some prerequisite hoops.

SOLAR POWER PLANT

The Solar Power Plant can be a point of pride for cities with well-heeled and environmentally conscientious citizens.

• Monthly Cost: §1,000

• Size: 6x6

Prerequisites:

• R§§§ Population: 3,000

• Mayor Rating: 60

NUCLEAR POWER PLANT

Nuclear Power Plants are for the city that wants tons of power no matter the consequences.

• Monthly Cost: §3,000

• Size: 4x4

Prerequisites:

• Total Population (R+C+I): 85,000

• Total City Energy Demand (Plus Deals): 25,000

HYDROGEN POWER PLANT
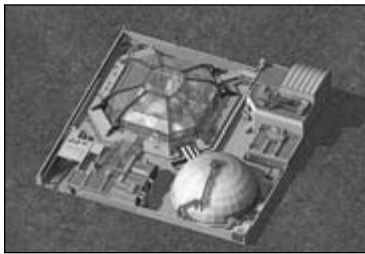
These are for cities well along the bridge to the 22nd century. If your city is a tech-heaven, this plant becomes available.

• Monthly Cost: §10,000

• Size: 5x5

Prerequisites:

• Industrial High-Tech Population: 4,000

• Total City Energy Demand (Plus Deals): 30,000

ORDINANCES

Ordinances let you influence many elements of your city in a more passive way. Acting by executive fiat rather than by hands-on management is more subtle and can be more profound.

No ordinance is a magic bullet. For every benefit, there's a cost in terms of money or the reduction of some other game element.

Ordinances can be classified by where they appear on your Budget ledger and whether they cost money or make money.

ORDINANCES THAT COST MONEY

Each of these ordinances has beneficial effects, but you don't get something for nothing. Each ordinance carries a price tag that gets larger as your city grows. In addition to the drawback of money expenditure, many of these ordinances have ancillary negative effects you must take into account.

AUTOMOBILE EMISSION REDUCTION ACT

- Effects: Reduces air pollution globally by 10 percent; reduces Mayor Rating (-5)
- Monthly Cost: §20 plus §0.05 per resident

CARPOOL INCENTIVE PROGRAM

- Effects: Decreases traffic congestion by reducing traffic volume by 20 percent
- Monthly Cost: §50 plus §0.01 per resident

CLEAN AIR ACT

- Effects: Reduces air pollution globally by 10 percent; reduces Dirty Industrial demand by 5 percent
- Monthly Cost: §20 plus §0.005 per resident

COMMUNITY CPR TRAINING PROGRAM

- Effects: Increases the Health Quotient in all parts of your city (+10 percent)
- Monthly Cost: §50 plus §0.005 per resident

COMMUTER SHUTTLE SERVICE

- Effects: Increases probability of Sims using public transportation (+5 percent); reduces air pollution by 2 percent
- Monthly Cost: §20 plus §0.005 per resident

FREE CLINIC PROGRAM

- Effects: Raises Health Quotient citywide (+10 percent)
- Monthly Cost: §50 plus §0.005 per §1 of citywide total monthly Medical Clinic funding

JUNIOR SPORTS PROGRAMS

- Prerequisite: Must have one park structure
- Effects: Reduces crime globally (-5 percent)
- Monthly Cost: §100 plus §0.005 per § in the park and recreation budget

LANDFILL GAS RECOVERY PROGRAM

- Prerequisite: Must have an operating landfill and a Gas Power Plant
- Effects: Gas Power Plant made more efficient; reduces air pollution generated by Landfill tiles (-3 percent)
- Monthly Cost: §20 plus §50 per Landfill tile

NEIGHBORHOOD WATCH

- Prerequisite: Must have one police structure
- Effects: Reduces crime globally (-5 percent)
- Monthly Cost: §10 plus §0.001 per resident

NUCLEAR FREE ZONE

- Effects: Raises Mayor Rating (+5); Nuclear Power Plants unavailable or existing plants decommissioned
- Monthly Cost: §50 plus §0.002 per resident

PAPER WASTE REDUCTION PROGRAM

- Effects: Reduces garbage output by 10 percent; reduces Commercial demand by 5 percent.
- Monthly Cost: §20 plus §0.005 per resident

POWER CONSERVATION ACT

- Effects: Reduces global power consumption, lifespan of Power Plants, and/or cost of Neighbor Power Deals by 10 percent; reduces Industrial demand by 5 percent; decreases Mayor Rating (-10).
- Monthly Cost: §0.005 per resident

PRO READING CAMPAIGN

- Effects: Increases Education Quotient by 10 percent
- Monthly Cost: §50 plus §0.005 per §1 total citywide monthly Library funding

SMOKE DETECTOR PROGRAM

- Effects: Reduces global flammability by 5 percent
- Monthly Cost: §0.001 per resident

TIRE RECYCLING PROGRAM

- Effects: Reduces global garbage output by 3 percent
- Monthly Cost: §20 plus §0.001 per resident

TOURISM PROMOTION PROGRAM

- Effects: Increases Commercial Service demand (+2 percent if demand is greater than 0)
- Monthly Cost: §50 plus §0.005 per § in the landmark budget

TRASH PRESORT REQUIREMENT

- Prerequisite: Must have one Recycling Center

- Effects: Reduces garbage output by 3 percent

- Monthly Cost: §26 for the first Recycling Center, §1 for each additional
  Recycling Center

WATER CONSERVATION PROGRAM

- Effects: Reduces citywide water consumption (-10 percent) and pressure on water
  system; depresses all forms of Industrial demand (IA: 10 percent, ID: 5 percent,
  IM: 5 percent, IHT: 5 percent)

- Monthly Cost: §50 plus §0.005 per resident

YOUTH CURFEW ACT

- Effects: Reduces global crime (-5 percent); reduces Mayor Rating (-10)

- Monthly Cost: §40 plus §0.002 per resident

ORDINANCES THAT MAKE MONEY

There is no financial expense attached to the only income-producing ordinance, but there is a
price to pay.

LEGALIZE GAMBLING

- Effects: Monthly income of §100; allows you to get Casino
  Business Deal; increases crime globally by 20 percent (reducing
  Mayor Rating); repealing it demolishes Casino

- Monthly Income: §100

MULTIPLE CITIES

Your city shouldn't be alone, not with so many possibilities for creating multiple cities. And neighbors are more than trading partners; you can build and play several cities in one Region and link their economies to make a megalopolis. With neighbor cities and Regional play, you can:

- Expand each city's Commercial and Industrial population by creating links to many neighbors.

- Make deals to buy or sell power, water, or garbage disposal.

- "Share" demand to create specialized city areas (such as Industrial districts, bedroom communities, downtown skyscraper corridors, etc.).

- Gain Rewards available only with a sizeable Regional expansion.

- Combat pollution by "quarantining" your big polluters into one neighbor city.

There is no requirement to build or connect to neighbor cities in *SimCity 4*. A solitary city can grow (up to a point) without any neighbors. To ascend in the urban world, however, you need to move beyond your borders.

THE REGION

When you begin your first city, you start with an individual "city tile" in a larger multi-tiled "Region." No matter where you build, other city tiles that could someday be home to another city surround you.

TIP
When selecting where to start in a Region, select a city tile with many neighbors. It's possible for many small cities to surround a large city, but you won't see that on any real Regional map. It's not uncommon, however, to see a medium city tile bordered by four small and two medium cities, offering six possible adjacent connections. You can connect cities to each other and have a connected Region, too.
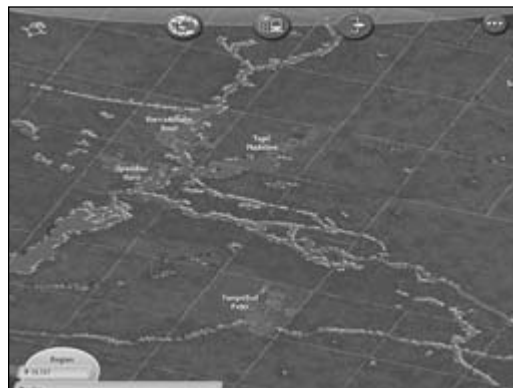
A Region can be green and flat or finely sculpted like this one. Either way, it's made up of several cities-in-waiting.

NEIGHBOR CONNECTIONS

TIP

Start your city in a corner of the city map so it won't cost much to run Roads to the map edges and make two Neighbor Connections.

There are several ways to connect with your neighbors:

- Highway
- Pipe
- Power Line
- Rail
- Road
- Subway

To make a connection, drag a network element to and past the edge of a map. You'll be given the option to build a Neighbor Connection. If you accept, the connection is made and a large orange arrow sign indicates the link.

A connection is denoted by a large orange arrow pointing off the map. If you click on the last tile of the connection, you see a Query box giving you information about the connection and any Neighbor Deals it hosts.

THAT IS *SO* 3K!

Neighbor Connections now cost nothing to establish beyond the cost of a network tile.

NOTE

There may be more than one neighbor on each side of a city map.

Each kind of connection is free, beyond the expense of the network tiles to get to the map edge.

SIMNATION CONNECTIONS

Links made off the map where no cities exist (because you haven't created them) link not to a city, but to SimNation. Connections to SimNation serve limited functions, but are not full-fledged Neighbor Connections.

You can't, for example, make Neighbor Deals with SimNation, and connections to it don't provide as much Demand Cap Relief for your Commercial Office Sims as would connections to several bordering cities.

A SimNation connection gives Industrial Sims an outlet for their freight shipments. On a mechanical level, this provides them a way to complete a "freight trip," an essential element for Industrial desirability (see Chapter 10 for more detail).

CONNECTIONS FOR DEMAND CAP RELIEF

As described in Chapter 8, your Commercial Office populations eventually stagnate without connections to the outside world. Each connection of a different type provides more Demand Cap Relief while additional connections of the same type to the same neighbor provide diminishing amounts. For example, the Commercial Office Demand Cap Relief gained from building three Road connections to the same neighbor drops with each additional Road.

When the only neighbor you have is SimNation, you're limited in the amount of Industrial/Commercial Demand Cap Relief you can obtain. Because SimNation acts as one neighbor on all four sides of your city, you get Demand Cap Relief only for the initial connection of each type. After that, it's all downhill and your Commercial Office populations eventually stagnate.

TIP

To offer optimal Demand Cap Relief, don't develop the cities surrounding your city, just establish (i.e., name) them. After you give them names and Mayors, they offer the full options of Demand Cap Relief even if you never open them again.

Even if you have no intention of playing multiple cities, spend time in Region View and establish cities in the city tiles surrounding your chosen city tile. They won't offer anything but Demand Cap Relief and trip completion, but that's enough to build a sizeable standalone city.

CONNECTIONS FOR TRIP COMPLETION

Industrial buildings need to complete freight trips to a connection for two reasons.

First, Industrial Demand Cap Relief (see Chapter 8) is tied to the number of trips from Industrial zones to a connection.

Second, the length of trips impacts Industrial desirability. For Residential zones it's a commute to work, but for Industrial, it's freight trips out of town. If Industrial trips can't get out of town in a reasonable time or at all, the desirability of your zones to Industry diminishes.

REGIONAL DEVELOPMENT

If you choose to take the plunge into Regional play, there are several concepts you need to secure under your belt.

The most important is a Region-wide sharing of RCI demand; you can satisfy demand created in one city in another city.

This is easier to understand with an example. If you spend a long time working on one city and building up your city's EQ, you'll have a balanced city (lots of all three zone types) that's ripe for some High-Tech Industrial development. Normally, what you'd have to do is zone Industrial in non-polluted areas of your city and wait for IHT buildings to start growing.

On its own, a city this young has no business having High-Tech Industry, but it's part of a Region in which education is a priority.

If, on the other hand, you begin a new adjacent city and zone it Industrial with a Road network connected to the first city, High-Tech Industry grows in the new city. This might seem odd because the usual prerequisite for High-Tech (high EQ) is absent in this city, there are no Residents. Instead, the roaring demand for IHT in the original city is driving demand in the new city. Because of this, you can create cities as specialized urban districts.

After you link two developed cities (undeveloped connected cities don't contribute demand because they don't have zones), the pool of demand and satisfaction combines, allowing you to create and satisfy demand in either city.

As things expand, the RCI demand pool gets bigger. Every city directly and indirectly connected becomes part of the single, Region-wide RCI demand.

THE REGIONAL PLAY TIME WARP

You can play only one city at a time. It's easy, therefore, to think that your neighbor cities are growing and changing without you. This can lead to feelings of loss of control and fear that, without your strong guiding hand, the non-playing city will go astray and drag down the Region.

Fear not; it doesn't work that way. Cities only grow when open. A time warp makes Regional play possible in a situation where you can only play one city at a time.

NOTE

The time warp becomes confusing when it comes to Neighbor Deals. Keep the idea of the time warp in mind, however, and it is easy to understand.

When you exit a city, it freezes in time (check the calendar; it'll be where you left it when you return). Important information saves when you close the city, and that information is taken into account when you open a different city.

You open the different city to find it on the same day you left it. Nothing has changed except demand; it now reflects demand contributed by the changes you made while the other city was open.

Return to the original city again to find it as you left it (on the same day with no changes on the ground), but with demand further altered by what you did while playing the second city.

All this is accomplished through a system of "extrapolation."

GROWTH EXTRAPOLATION

Because inactive cities can't grow when you're playing a different city, how does the inactive city impact RCI demand over the long term? Answer: extrapolation.

When you save and exit a city, all information about it saves. The demand simulator extrapolates (or projects) this growth into the future. How could this develop to its maximum potential? In other words, it presumes how the city will grow and adds that projected demand into Region-wide RCI demand. This creates the illusion that the city is growing in your absence.

The simulator does this by looking at the city's current state and presuming 10% growth for extrapolation purposes. Thus a city with 20,000 R§, 10,000 R§§, and 5,000 R§§§ will, when exited, toss out extrapolated growth of 2,000 R§, 1,000 R§§, and 500 R§§§. In other words, the city says to all other regional cities, "expect me to grow my population by 10% in the immediate future."

When you enter a neighboring city, it gradually adds this extrapolated growth (and demand extrapolated from all other inactive cities) to its own and satisfies as much of it as it can with its available zone capacity.

EXPORTING DEMAND

When you're playing an active city, inactive connected cities can satisfy the active city's demand with their unused zone capacity, but only to the tune of 10% of their existing populations and only if the demand can't be satisfied in the open city.

At the end of a month, demand not satisfied by building construction in the active city is tossed to other cities in the Region. The active city looks at the inactive cities, analyzes their presumed growth, and decides how much of the active city's demand each could satisfy if they were simultaneously running.

Demand falls as the buildings that satisfy it "grow" in the inactive cities. They aren't growing because the cities are frozen in time, but your active city thinks they are. What you have is demand satisfaction without any construction.

This process, however, can only last to the extent of the extrapolated growth. Once the 10% growth has been used up, your active city will eventually stagnate if you let it run long enough. Successful regional play and creation of specialized cities requires you, for this reason, to switch cities frequently.

TIP

If you play one city long enough, you could fill the imaginary zone capacity in the inactive cities. Switch cities occasionally to keep the various extrapolations up to date.

RETURNING TO EXTRAPOLATED CITIES

When you load a city in which extrapolation has occurred, the growth we presume was occurring while the city was inactive sprouts. Give it some time to grow before leaving or dire consequences could befall you.

> If you enter a city that's been extrapolated and exit it before the pent-up growth is finished, the extrapolated growth is lost forever. As far as other cities are concerned, the city that lost its extrapolated growth has actually shrunk in size. This could trigger a small recession and cause other cities to suffer some abandonment. To avoid this, give your city a chance to catch up on its extrapolation before exiting.

REGIONAL PLAY, AN EXTENDED EXAMPLE

Now let's see all this in action. Mayor Smith is running a medium-sized city called Simville. It has no Neighbor Connections and is growing in traditional balanced fashion with Residential and healthy populations of Industrial and Commercial.

Industry reaches its Demand Cap and demand dries up. An advisor informs Smith of the need for Neighbor Connections, and he makes one to the west by Road to SimNation. Industrial growth begins with Demand Cap breathing room and Freight Trucks on the Road leading out of town.

Smith decides to focus this city as a Commercial district. That means creating a new adjacent city designed to be a haven for Residential Sims (a "bedroom community"). To prepare for this, he stops zoning Residential (letting demand build up) and pauses to zone new Commercial and Industrial, providing them with power and water and Roads. After he sets up these and Residential demand is high, Smith exits to the Region View.

He enters and establishes a city to the east of his original city (East Simville). Based on the city's initial demand, he zones Residential and Commercial conservatively until Residential demand is zero.

He runs a Road to the west toward Simville and sets up a Neighbor Connection. This link provides a substantial boost to Residential demand from two sources. First, there's an instantaneous jump in Residential demand as the city's economy shifts from local to regional and all the unmet Residential demand from Simville is added to the Residential demand in East Simville. Second, very soon Residential demand will also increase as its Industrial demand is exported to Simville.

The next month, East Simville's Industrial demand (heretofore unsatisfied) declines as it's satisfied by extrapolation in Simville. This heightens Residential demand in East Simville, and Smith can lay out more Residential zones that fill. After a couple of years, East Simville has a sizeable Residential population.

With all three developer demands at zero, Smith saves and exits East Simville to return to Simville. On entering, Industrial demand is high and Commercial has demand, too. Construction in the zones he built before leaving grows. To establish Simville as a Commercial downtown, Smith stops zoning Industrial, drops extensive high-density Commercial zones, and exits to the Region again.

With great grandeur, Smith establishes North Simville and designates it his new Industrial district. In the corner near both Simville and East Simville, he lays out a good Road network, runs Road connections to both neighbor cities and zones Industrial and Residential (to add fuel to the Industrial growth).

Each city grows into its specialization, each feeding demand in the other without having to satisfy all three developers within the same city.

REGION SUMMARY

After you lay the groundwork, the interlocking demand and demand satisfaction systems do the heavy lifting.

There are several benefits to Regional play of this kind. First, it allows creativity in the layout of multi-city areas. No longer are you limited by having to have a little bit of everything in your city to keep things balanced.

Specialization allows for clean and simple pollution control. By putting Industrial development off in its own city, you shield the bulk of your Residential and Commercial zones from pollution.

TIP

You can extend this pollution-control strategy by building your Power Plants in the Industrial city. You'll need, however, to strike Neighbor Deals for the Residential and Commercial cities to keep them going.

WORKING IN NEIGHBOR CITIES

As mentioned in Chapter 19, Residential Sims use Neighbor Connections to real cities to complete job trips.

If the connected city hasn't been visited since the connection was established or the connection isn't linked to any jobs, the active city must estimate how far the job is from the connection on the inactive city side. This estimate is always punitively high.

You must enter the other city after you establish the connection. Link the connection to the main Road network. When you exit this city, the simulator remembers the average commute time and adds it to trips exiting from the first city.

NEIGHBOR DEALS

After you have neighbors (rather than SimNation), you can strike Neighbor Deals. Accessible through the Budget pane, Neighbor Deals are agreements between two cities to buy or sell any of three resources:

- Power (via Power Lines)
- Water (via Water Pipes)
- Garbage Disposal (via Road or Highway)

> **THAT IS *SO* 3K!**
>
> **A lot has changed with Neighbor Deals since *SimCity 3000*. The way deal amounts are computed is different and simpler. There are no penalties for early or involuntary cancellation. Deal amounts are no longer variable from month to month, making it easier for a seller to determine how much a deal will cost in lost capacity. Seaports and Rails no longer permit garbage deals, only Roads and Highways.**

This provides two opportunities: to have a city become a supplier of resources, earning income from an overabundance of utility capacity, or to allow a city to pay to rid itself of the pollution caused by utilities. Either is a good strategy depending on the situation.

These and other benefits of Neighbor Deals are easy to see: lowered pollution, more land available for development, and extension of the lifespan of aging Power Plants by reducing usage, to name a few. What can be hard to predict are what deals are available to you at any given time and are what the terms of those deals.

INITIATING DEALS

Initiate any available Neighbor Deal at any time via the Budget pane. Your City Planning Advisor also proposes Deals when conditions are right.

The basic conditions differ depending on whether it's a buy or sell deal.

BUY DEAL

A buy deal is one to import power or water or to export garbage (buying garbage disposal).

Deals are initiated through the Neighbor Deal line item in the budget.

There are three conditions for a buy deal to be available:

1. There must be appropriate Neighbor Connections (Power Lines for power, Water Pipes for water, Roads or Highways for garbage).

2. The other party must have a surplus of the resource greater than the minimum deal amount of 1,000 units.

3. The initiator of the deal must have at least enough cash to cover one year of the deal.

> **TIP**
>
> A city consumes its purchased resources before those it produces domestically. If you buy enough, you can reduce the load on your utility buildings. This permits you to reduce their usage enough to extend their lifespan.

SELL DEAL

A sell deal is one to export power or water or import garbage (sell garbage disposal).

There are four conditions for a sell deal to be available:

1. There must be appropriate Neighbor Connections (Power Lines for power, Water Pipes for water, Roads or Highways for garbage).

2. The other party must have less of the resource than his projected need (120 percent of current usage).

3. The other party must have enough money in the treasury at the deal's inception to cover one year of the deal.

4. Your city must have a surplus of the resource greater than usage plus the minimum deal amount.

DEAL DURATION

Deals are struck for one year, but can be broken by either party at any time without penalty. They can also be broken involuntarily if the supplier goes over capacity for the resource or a Disaster severs the Neighbor Connection on which the deal is based.

After one year, the deal terms are reevaluated based on current circumstances. You may reject the revised terms and cancel the deal or accept them and continue at the altered rate.

ONE DEAL PER RESOURCE PER NEIGHBOR

You can only have one deal (buy or sell) with any one neighbor. This prevents profiteering with the same neighbor based on changing supply/demand conditions. To change the terms with a neighbor, you must cancel the existing deal.

NOTE

Even if you run both cities, you can't assemble a sweetheart deal for one of your cities by working both sides of the table. The other party in the deal never has any discretion, no matter the terms; they take what you offer because your only options are the ones that fit the buyer.

DEAL AMOUNT

The amount of a deal, whether buy or sell, is fixed for the deal's term, unless you change it. It does not vary from month to month.

The maximum amount of resource that can be traded depends on the lesser of:

- The projected need of the buyer; or
- The surplus of the seller

You may purchase less of the resource if you don't want the maximum. Look at the appropriate graph to see how much you'll need to meet your city's demand, and buy more than that.

THE TIME WARP REVISITED, ACTIVE VS. INACTIVE CITIES

Because this is a deal between two cities, you'd think that their calendars would have to match up to make this work. You'd think that the inactive city is earning or spending money from the deal while you're playing the active city. You might think that the different cities will see different phases of the deal when you switch between them.

You'd be wrong, wrong, and wrong. Considering that the calendars of two cities could be off by a year, a decade, or a century, time coordination is impossible.

Instead, you have simplicity. Let's say you strike a buy deal in year one, and play the active city for two years (paying out two years of monthly payments). Switch to the inactive city on the other side of the deal to find that the amount in that city's treasury does not include the two years of payments, and that the deal is currently in year two, the same place you left it in the other city.

The money in question isn't changing hands, it's entering or exiting the treasury of the active city from or to the simulation ether. A city only pays for or benefits from a deal when the city is active.

DEAL TERMS

The cost per unit for each resource is determined by current conditions of supply and demand for both parties. Cost is the sum of three things:

1. Average cost per unit for the seller to produce the resource.

2. The degree of the buyer's need (deal amount to buyer's current usage); the greater the need, the higher the cost.

3. The amount of surplus the seller has after the deal; the less surplus the seller has when the deal is struck, the higher the cost.

BREAKING A DEAL

A neighbor deal is broken if any of its obligations are not met. Thus, if a buying city runs out of money or a selling city cuts a necessary connection (i.e. the only intercity power line), the deal theoretically can't continue.

To prevent misunderstandings, however, neighbor deals include a six month grace period in which the defaulter can get back in the game. If, during the six months after the deal is breached, the breaching city sets things right, the deal picks up automatically where it left off.

There is, however, a catch. Even if the breach was accidental, the breaching city is placed on a temporary probationary period of three months after rejoining the deal. Any breach for any reason during this probationary period instantly ends the deal. Once, on the other hand, the probationary period ends with no repeated breach, the breaching city will receive the customary six month grace for any future violation.

NEIGHBOR DEAL SUMMARY

Neighbor Deals are excellent tools if you have the money to buy your infrastructure needs or the overcapacity to sell to others.

There are two guarantees in Neighbor Deals:

1. The seller makes a profit.

2. The buyer pays more for the resource than he or she would for domestically producing it.

TIP

A small city with low power needs might be better off striking a Neighbor Deal than adding a Coal Power Plant. Because a small city uses only a fraction of the power provided by a plant for a long time, much of what is spent on power is wasted money. If you strike a deal for the minimum amount, it costs you less in the short term.

Neither of these guarantees accounts for the intangibles of low pollution, greater development space, or any hidden costs that cut into profits. These are features of your individual city and the choices they present are in your hands.

BUSINESS DEALS

Business Deals are the last refuge of the fiscally desperate. Unless your goal is to build the capital of an evil empire or torture your citizenry, you don't want these five pariahs in your city.

Yes, you place them for free and they provide a steady and substantial source of monthly income (adding up to as much as §5,400 a year in "blood money"), but they come with costs. No matter where you place it, each Business Deal building injures your city with myriad negative local and global effects.

That said, there are times when they are a necessary evil and when using them is your best strategy.

Business Deals can have the following effects:

- Provide monthly income
- Supply jobs
- Consume power and water and contribute garbage
- Contribute (substantially) to air and water pollution
- Increase crime citywide

- Decrease Mayor Rating
- Affect Residential, High-Tech Industrial, and/or Commercial desirability
- Increase Commercial demand
- Emit radiation
- Create chance of Missile Misfire Disaster

NOTE

The new, top secret business deal introduced in the *Rush Hour* expansion pack is in Part 8.

WHEN BUSINESS DEALS ARE OFFERED

Your Financial Advisor brings you Business Deals when your coffers run low.

However, they don't show up in isolated low-cash months, but only after prolonged financial malaise. The specific prerequisites are in the building directory here.

When a deal is offered, it permanently stays in your Rewards & Business Deals menu.

The Legalized Gambling Ordinance is a mandatory prerequisite to receiving a Casino offer. Repeal it after you have the deal, and the Casino tumbles down.

One deal has an additional trigger before it can be brought to you. The Casino Business Deal is offered only if you enact the Legalized Gambling Ordinance. Without it, you'll never see the deal.

TIP

When you receive and accept the Casino, you can't repeal the Legalized Gambling Ordinance. If you do, the Casino will be demolished, terminating the Business Deal.

However, repealing the Legalized Gambling Ordinance is a cheap alternative to bulldozing the Casino (at a cost of §15,000).

INITIATING A BUSINESS DEAL

After you accept an offer, it's added to your Build Rewards & Business Deals menu. You won't receive the income stream (or negative effects) from the building until you plop it in your city.

Business Deal Income

Deal	Monthly Income
Army Base	§350
Casino	§300
Federal Prison	§250
Missile Range	§450
Toxic Waste Dump	§400

The money from a Business Deal building shows up when you place one in your city.

When you do, it immediately hands over money. This occurs even if you place it in the middle of nowhere with no roads, water, or power.

Of course, it behooves you to provide this basic infrastructure. Water in particular is required to reduce the flammability of these large structures. Roads are essential in making available the jobs offered in the buildings and in making it possible for Fire Dispatches to reach them in an emergency.

Because it's incumbent upon you to locate these buildings outside the heart of your city, you must balance the cost of running infrastructure out to the boonies with the money these buildings generate.

TIP

Though you'll see a power zot over an unpowered Business Deal Building, it will function and provide income without power. Unless you can't abide the lightning bolt flashing over the structure, save money by neglecting to run Power Lines to it.

BUSINESS DEAL BUILDING EFFECTS

It seems that, beyond money, there's no good reason to build these structures, but that's not true. They provide some benefits, but the balance is tipped toward the negative.

NOTE

Another reason to build them reflects your character as a Mayor. If you wish to be an evil ruler, place these in the most damaging places possible. Think of these as your Reward buildings (because chances are you won't get many others).

To aid you in making an informed decision, here's a brief summary of each structure's effects. The precise numbers are in the table at the end of this chapter.

Business Deal Building Effects

Structure	Positive Effects	Negative Effects
Army Base	Jobs, + Com. desirability	Lowers MR, raises air/water pollution, lowers Res./IHT desirability, raises crime
Casino	Creates Com. demand, + Com. desirability	Lowers Res./IHT desirability, raises crime, high power and water consumption, lowers MR
Federal Prison	Jobs	Lowers Res., Com., and IHT desirability, raises crime, lowers MR
Missile Range	None	Lowers Res., Com., and IHT desirability, high air/water pollution, lowers MR, Missile Misfire Disasters
Toxic Waste Dump	None	Lowers Res., Com., and IHT desirability, high radiation (lowers ALL desirability), lowers air/water pollution, very flammable, lowers MR

TERMINATING A BUSINESS DEAL

If you can't live with yourself any longer, you can terminate a Business Deal by destroying the corresponding structure. The building remains available in your Build Reward & Business Deals menu in case you change your mind.

Upon demolition of the building, you will lose the Business Deal income for the current month and the Monthly Estimate.

Changing your mind is difficult and painful. The primary problem is money. Not only do you lose the monthly income from the deal, but you have to pay a hefty sum to bulldoze the building. Bulldozing costs of Reward Buildings are:

The price tag for demolishing some of the Business Deal buildings is staggering. Find another way to tear them down.

- Army Base: §17,500
- Casino: §15,000
- Federal Prison: §12,500
- Missile Range: §22,500
- Toxic Waste Dump: §20,000

You can pay this fee even if it puts you in the red. When deciding whether to place these buildings, take these destruction costs into account.

TIP

To get rid of expensive-to-demolish Business Deal buildings without paying the bulldozing fee, use a Disaster to do the dirty work for you. A Meteor works nicely.

The downside to this tactic is that the Meteor destroys or damages any nearby structures. To plan for this, put your Business Deal buildings away from your city and from each other.

BUILDING CATALOG

Business Deal Structures

Structure	Com. Proximity Effect	Com. Proximity Effect Radius	Res. Proximity Effect	Res. Proximity Effect Radius	Air Pollution	AP Radius	Water Pollution	WP Radius	Radiation	Radiation Radius
Army Base	25	9	-90	30	4	4	5	5	0	0
Casino	50	22	-65	25	3	4	3	5	0	0
Federal Prison	-70	26	-90	30	4	4	4	5	0	0
Missile Range	-50	22	-100	48	9	6	10	7	0	0
Toxic Waste Dump	-60	24	-100	48	44	8	75	10	10	5

Structure	Crime Effect	Crime Effect Radius	MR Effect	MR Effect Radius	Monthly Income	Bulldoze Cost	Jobs R§	Demand Cap Relief IM	Created C§	Created C§§	Created C§§§
Army Base	30	64	-7	440	§350	§17,500	45	100,000	0	0	0
Casino	50	128	-7	440	§300	§15,000	0	0	45	21	10
Federal Prison	15	128	-7	440	§250	§12,500	35	0	0	0	0
Missile Range	0	0	-5	440	§450	§22,500	0	0	0	0	0
Toxic Waste Dump	0	0	-10	440	§400	§20,000	0	0	0	0	0

ARMY BASE

- Size: 12x12
- Monthly Income: §350

Prerequisites:

- Funds less than §7,000
- Funds less than 40 percent less than three previous years
- Current dedicated expenditures greater than income
- Total population greater than 2,000

Your Commercial Sims appreciate this structure being nearby, but keep it away from your Residential areas. No matter where you put it, it does moderate damage to your Mayor Rating and raises crime in every part of your city. On the upside, it's a good employer of R§ Sims. It costs a fortune to demolish.

CASINO

- Size: 6x3
- Monthly Income: §300

Prerequisites:

- Legalize Gambling Ordinance enacted
- Total population greater than 24,000

Your Commercial and Residential populations vary on whether they like this building in their back yard; keep it among the Commercial zones to give them a boost in desirability. It hobbles your Mayor Rating, increases your city's crime rate, and drains your power grid.

FEDERAL PRISON

- Size: 4x4
- Monthly Income: §250

Prerequisites:

- Funds less than §7,000
- Funds have dropped by at least half in last two years
- Current dedicated expenditures greater than income
- Total population greater than 5,000

Don't place this near your Residential, Commercial, or High-Tech zones unless you want to kill desirability. Having it around harms your Mayor Rating and increases citywide crime, but is a good employer of R§ Sims.

MISSILE RANGE

- Size: 4x4
- Monthly Income: §450

Prerequisites:

- Funds less than 1,000
- Funds have dropped by at least 20 percent in last 6 months
- Current dedicated expenditures greater than income
- Total population greater than 500

Everyone hates having this one nearby (with its crushing desirability drain on Residential, Commercial, and Industrial High-Tech Sims and massive pollution). Locate it in the boonies to minimize the damage and keep your city away from malfunctioning missiles. There is a minor-to-moderate Mayor Rating drag citywide, but less so than the other Business Deal buildings.

TIP

There's no need to run water to the Missile Range; it can't catch fire. Aboveground, it's a slab of concrete, so it's fireproof.

TOXIC WASTE DUMP

- Size: 4x4
- Monthly Income: §400

Prerequisites:

- Funds less than -§1,000
- Current dedicated expenditures greater than income

If you must have it, put it far away from any valuable part of your city. It destroys desirability for Residential, Commercial, and Industrial High-Tech Sims just for being a NIMBY. It trashes desirability for all developer types thanks to its Radiation Effect—even Dirty Industry won't want to build near it. Throw in its massive air and water pollution and its brutal Mayor Rating Effect and you've got one nasty building.

APPLICABLE ORDINANCES

- Legalized Gambling

DISASTERS

Feeling cruel? Does it make you angry to see those ungrateful Sims daring to complain about the paradise you've lovingly created for them? Or does it just infuriate you to see them living contentedly?

> **NOTE**
> For information on disasters introduced in the *Rush Hour* expansion pack, see Part 8.

You can keep them on their toes (or put the fear of You into them) by raining down Disasters. Disasters serve three functions:

- Stress relief: Being Mayor is a tough job; you gotta get your jollies somehow. What better way than raising a volcano in the center of your bustling metropolis?

- Providing a challenge: It's one thing to be Mayor when everything's going well, but it's another to be a leader in "interesting times." How well you and your city services can stand up to the challenge of a Disaster is a measure of your success.

- A reminder that you can't live on borrowed time: Cutting back on certain vital city services or ignoring your city's well-being has a price if you do it for too long. The price is paid in the form of fire, riot, sparking power lines, bursting water pipes, exploding power plants, and the like. Though the precise moment these occur is out of your control, they are your fault.

THAT IS *SO* 3K!

Disasters were once random acts of god that interrupted your diligent city building. There you were, zoning and plopping away when suddenly an earthquake struck. You had to drop everything and tend to putting out fires and repairing damage. If you sounded the Emergency Warning System in time, you could minimize damage and get Disaster Relief from the national government. No more.

One of the key features of *SimCity 4* is this: There are no random acts of god because you are god. This means that all Disasters are within your control.

Because of this, the familiar "Disasters Off" option is no longer available. Major Disasters occur only if you make them happen, and minor ones never happen if you're a good Mayor.

Also no longer in the game are the Emergency Warning System, premonitions of Disaster, or Disaster Relief. With all Disasters under your control, none of these concepts are relevant.

HOW DISASTERS STRIKE

As alluded to above, Disasters strike only when you tell them to ("God Mode Disasters") or when you've been neglectful or made a conscious decision to brave the consequences of certain decisions ("simulation-initiated Disasters"). God Mode Disasters include:

- Volcano
- Fire
- Meteor
- Robot Attack
- Tornado
- Lightning
- Earthquake

For each God Mode Disaster, you decide whether, which, when, and where (where it begins and where it goes from there).

Fire can be a God Mode Disaster but it, like other simulation-triggered Disasters (a.k.a. "mini-Disasters"), can also occur thanks to decisions you make as mayor. These kinds of Disasters include:

- Fire
- Riot
- Pipe Burst
- Sparking Power Lines
- Power Plant Explosion
- Missile Misfire
- Arson

These Disasters lurk below the surface of your city, waiting for a lapse on your part before they strike. The good news: If you maintain full funding and universally good local Mayor Ratings, eschew certain Business Deals, and keep crime down, none of these Disasters will occur. The bad news: If you take your chances with any of them, the probability of Disaster increases with time (among other factors).

GENERAL DISASTER PRINCIPLES

Some basic features are common to many Disasters.

DISASTER SPEED

When any kind of Disaster strikes, the simulation goes into a special Disaster Speed. The simulation slows to bare minimum time passage to permit you to respond in real time.

Disaster speed is indicated by a red frame around your screen. During Disasters, you can't pause the simulation or save your game. Short of quitting, you're forced to deal with the situation unfolding before you.

After the Disaster ends, speed is returned to normal (whatever it was before the Disaster) and you may clean up.

The red frame and yellow "!" triangle in the upper left mean a Disaster is in progress.

MOVEABLE DISASTERS

Many Disasters can be directed after you invoke them.

You can drag each of these Disasters around (as if on an imaginary leash) by clicking-and-holding your left mouse button. You may either click-and-hold, pointing to a single location to direct the Disaster to a precise place or move your mouse while holding the mouse button to swing around the Disaster.

NOTE

The longer you hold the left mouse button in one location, the faster the Disaster moves toward it.

If you release the mouse button, the Disaster's automatic pathfinding resumes control.

How each moveable Disaster is affected by these controls differs:

- Meteor: Change the trajectory of the falling meteor to have it land in a different place than you first indicated. The faster you make it descend (by holding the left mouse button while pointing to one location), the harder it will hit.

- Robot Attack: After the robot lands, you can direct him where to rampage. Get him up to a brisk run by clicking-and-holding on a single location. Occasionally, he'll stop and launch plates at the location you select.

- Tornado: Drag the tornado around to hit the buildings you want to see spun into dust.

THE DISASTERS

Your arsenal of destruction awaits. Each of these bits of horror has its own character in terms of what it destroys and how.

GOD MODE DISASTERS

As described above, God Mode Disasters never occur unless you enter God Mode and choose to start them (with one exception). If you don't want your city visited by giant killer robots, then the giant killer robots will stay away.

The exception is fire, which can occur without your explicit say-so. The important thing in God Mode is that you have the power to start a fire if you want to. You can't, by contrast, choose to start a riot; that you have to "earn" (or perhaps "deserve").

There's no such thing as an unexpected blast of lightning. Only you can create lightning strikes!

VOLCANO

A massive volcano rises from any location you choose. First, it raises the terrain into a cratered mountain (destroying all structures on and around it and below ground). And that's not the worst part.

Then comes the lava! Down it oozes and up it sprays. Lava has the potential to start fires either by spray or flow.

After the volcano bursts from the ground, the lava flows and sprays.

> **TIP**
>
> As with most Disasters, you may have trouble dispatching to flaming locations if the initial Disaster destroyed roads to it. Rebuild them to get the fire crews in.

After the Disaster is past and the fire crews have extinguished fires, you're left with a towering dormant volcano. This can be developed to a limited extent.

> **TIP**
>
> You can use your limited Terrain tools to level the volcano, but it'll cost you some hefty Simoleons.

FIRE

Fire is a byproduct of several other Disasters. You can, however, ignite fires on your own.

> **TIP**
>
> The longer you hold down the button when you place a fire, the faster it progresses through the fire stages.

God Mode fires are more likely to catch if a location has high flammability (because there's no water service to the location). Fires grow only if they occur outside a Fire Station's area of protection or their stage is more than can be handled by the covering station's effectiveness.

The funding levels of your Fire Departments also affect whether fires go beyond ignition. If the applicable Fire Station is underfunded, the effectiveness of its area of protection is lessened. Fires that ordinarily wouldn't catch will ignite and spread.

The larger a fire is, the greater the chance it will spread. This probability is increased depending on the flammability of surrounding structures and wind direction.

TIP
To see which way a fire will spread, zoom out to observe which way the smoke is blowing.

Fires can ignite on structures and trees but not on bare ground, transportation elements, or rubble.

CROSS-REFERENCE
For more on fires and flammability, see Chapter 18.

You can extinguish fires that catch, or ones that arise outside any Fire Station's area of protection, only if you summon dispatch units to fight it. See "Dispatch."

METEOR

Click on a spot on the map and a burning hunk of space rock screams groundward. When it hits, it leaves a massive crater, destroying anything on the surface and below (always check Water Pipes and Subway Tunnels after a Disaster).

The spray of red-hot debris falls on surrounding tiles, starting fires everywhere.

You can direct a meteor in flight and change its course. Click-and-hold and drag in the direction you wish the meteor to go.
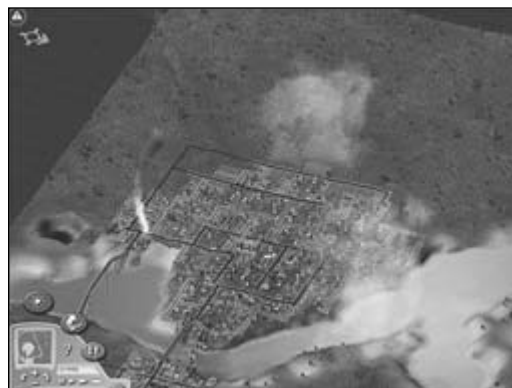
The vengeful god/Mayor diverts the meteor's path toward the peaceful and crowded public beaches.

ROBOT ATTACK

Boy, is Servo the Home Robot (of *The Sims* fame) tired of serving! He's big, he's back, and he's really torqued.

When you click on a map location, Servo descends and begins a destructive rampage. He stomps on structures and throws massive plates, wreaking havoc from a great distance.

Robot attacks don't start fires, and they don't affect anything below ground.

The puny buildings of your city don't stand a chance against Servo's massive iron feet.

You can control Servo's path of wanton destruction by clicking-and-holding the left mouse button.

After a time, Servo becomes satisfied that the ungrateful Sims have suffered enough, and he rockets into the sky.

TORNADO

Pick a location and a terrifying funnel cloud touches down. The tornado moves more or less at random, destroying any aboveground structures it touches.

NOTE

An autonomously moving tornado changes direction when it encounters a large building. The counter-winds created by large structures push the tornado in the opposite path.

It's a twister! Head for the root cellar!

Tornadoes don't start fires. After a while, the tornado loses power and disappears.

NOTE

Tornados dissipate if they reach water.

Manipulate the path of a tornado by clicking-and-holding in a location or dragging in a direction.

LIGHTNING

Wherever you click, a lightning bolt crackles down. The result: spontaneous fires at the point of impact.

One of the fun features of this Disaster is its speed; you can unleash several in succession in different locations.

EARTHQUAKE

An earthquake rends your city open with one click. From the point at which you initiate the earthquake, damage radiates out in a straight line in two directions to form a straight fault line of destruction (above ground and below).

The direction of this fault line is random unless you've previously visited an earthquake upon your city. In that case, all subsequent fault lines follow the direction of the first.

The aftermath comes in the form of shattered buildings and rampant fires. Get it all under control to return your city to normal.

The earth crumbles and drops out in an awesome fault line. The earthquake lays to waste everything above and below ground.

The intensity of the earthquake is yours to command—the longer you hold the mouse button to invoke the earthquake, the stronger the effect.

SIMULATION-INITIATED DISASTERS ("MINI-DISASTERS")

A few kinds of Disasters occur on their own, but they occur only as a consequence of something you did wrong or a choice you made. These Disasters come without warning, but they aren't a surprise.

FIRE

Fires break out spontaneously all the time, but require attention only if you haven't lowered flammability or provided adequate fire coverage.

Whether a fire ignites is based on the flammability; the more flammable a structure is, the more likely a fire will ignite.

Once fire does catch, how you extinguish it is a factor of fire coverage. Leaving an area uncovered by a Fire Station or reducing funding to any or all Fire Stations increases the risk of a fire igniting and spreading.

Simulation-initiated Fire Disasters, therefore, occur only when you make the strategic choice to leave portions of your city unprotected or reduce Fire Stations' budgets to save money. A properly covered and funded city will hardly ever have significant fires.

RIOT

Riots are the result of low local Mayor Rating. After a tile descends to -50 Mayor Rating, there's a chance of a riot. If there are at least three tracts within a four-tile radius with -50 Mayor Rating, that forms a riot "hot spot" with a dramatically heightened probability of riot.

Riots spark spontaneously, when one Sim becomes the "leader." After he or she accumulates some followers and the riot gets rolling, however, the uprising takes on a life of its own.

After a mob amasses enough participants, it reaches critical mass and spawns a second riot. This mob multiplication continues as long as the riot goes unquelled.

Riots progress through five stages, with 30 seconds between stages. At the highest stage, a riot reaches such a level of frenzy that participants start lobbing Molotov cocktails. This means fire. Not only do you need to bring in the police to stop the riot, you have to count on firefighters to put out the resulting blazes.

Reducing fire funding increases the probability of a spontaneous fire. Do so at your own risk.

An area such as this, several blocks with low Mayor Rating, is a breeding ground for rabble-rousers and malcontents. Leave them to fester and you'll get riots.

A large riot spawns a second, and so on.

To deal with a riot, nip it in the bud. The instant it breaks out, dispatch several police units to the area. It's not enough to have them on the scene; you need to use your dispatches to surround or corner the rioters.

Call in the police to contain the rioters before they get out of hand. The longer you wait, the harder it'll be.

NOTE

Controlling a riot with two dispatch units (one small Police Station) is difficult if the riot occurs anywhere but a dead-end street. Four is the minimum for any serious riot.

When a riot sees a fully funded dispatch unit, it changes direction and slows (losing energy each time it does so). When a riot arrives at a dead end, it also changes direction and slows even further. Cornering a riot, therefore, causes it to peter out.

To win the riot game, strategically place your dispatch units around the riot to close all avenues of escape. With no escape available, the rioters have no choice but to chill out.

TIP

A severely underfunded or on-strike Police Department proves inept at riot control. Rioters encountering these Keystone Cops move past them rather than change direction.

Riots can be avoided. Stay mindful of your Mayor Rating, both globally and locally (using the Mayor Rating data map). For riot prediction purposes global Mayor Rating tells you nothing. Look for areas of low Mayor Rating and make an effort to reverse the trend in *that place*.

SPARKING POWER LINES

If you reduce the Power budget (via the Budget tool) below 50 percent, or if you have a lot of Power Lines citywide, Power Lines will spark. These sparks can be thrown onto adjacent structures or trees and initiate fires.

Avoid this Disaster by maintaining proper funding of Power Lines. This means keeping funding at 100 percent, but degradation between 100 percent and 51 percent is gradual.

PIPE BURST

Water Pipes, like all utility elements, deteriorate over time. Maintain full funding of your pipe network so that aged pipes are automatically replaced before they wear to the point of bursting.

NOTE

Distressed pipes look rusty and old. This is a warning sign that a burst is in your future. A fully funded Utilities Department automatically replaces old pipes before they get to this point.

Lowering funding (via the Budget window) speeds deterioration and reduces your utility crews' ability to keep the system in good repair. When funding is low (below 50 percent) distressed pipes can burst.

The results of this are severe. The spout of water shooting out of the ground is the least of your worries; the sinkhole it creates destroys all structures on the surrounding land.

If left to its own devices, a pipe burst can spread. After 45 seconds, neighboring pipes can burst as well. Continue to neglect the situation and more will burst.

Stop pipe bursts by either bulldozing the pipe or replacing the burst pipe with a new one. Restoring funding above 90 percent also stops any new bursts and repairs existing ones.

Avoid pipe bursts by maintaining 100 percent funding of the Water Department Budget. Reduce this funding to save money at your own risk.

POWER PLANT EXPLOSIONS

When Power Plants reach the end of their lives, they explode. It's your job as Mayor to be cognizant of the condition of your plants and have them replaced and safely bulldozed before they expire on their own. If it looks like a plant is getting "long in the tooth," purchase a new source of power, then quietly take the old one offline and destroy it.

THAT IS *SO* 3K!

In *SimCity 3000*, Power Plants would explode if they were run over capacity for too long. That is no longer the case.

In S*imCity 4*, running a plant over capacity does not contribute directly to failure, but instead shortens the lifespan of the plant, quickening the arrival of its explosion/ replacement.

Explosions also can occur if a Power Plant catches fire and burns down. To combat this, keep your plants within the radius of a Fire Station.

Plant explosions are gigantic. They destroy buildings and set fires for blocks around.

If the plant is a Nuclear Power Plant, the consequences are more profound. A nuclear explosion means game over. You can wait for the resulting radiation pollution to run its course, but it'll take a *looooong* time.

ARSON

If your city has a lot of crime, there's a low probability that one of your Sims will commit arson. Arson crimes can create large fires with which dispatches must deal.

If a Nuclear Power Plant catches fire, put it out or be prepared to face this!

To combat arson, stop it before a Sim sets a building ablaze. If you regularly check your crime map, you get some warning before an arsonist strikes. If you can find him in the streets (with the flaming torch over his head, he's hard to miss), you can dispatch police to lock him up before he can do the deed.

MISSILE MISFIRES

If you've made the unwise choice to place the Missile Range Business Deal building in your city, you have to accept a certain amount of risk for the blood money you're raking in.

After you place the Missile Range and give it power, it periodically hurls missiles skyward. In 3–4 percent of launches, a missile doesn't do what it's supposed to. The faulty missile explodes after launch and rains debris onto the surrounding landscape. If that landscape holds parts of your city, you'll see damage and fires.

Every time one of these beauties goes up, it can come back down to disastrous results.

Avoid this Disaster by saying "no" to the Missile Range.

FIGHTING DISASTERS

After a Disaster strikes, you have to deal with the consequences; Disaster Speed persists until all consequential Disasters, such as fire, are dealt with.

Put out any ancillary fires the Disaster caused or (in the case of a riot) swarm in with an overpowering police response.

You can respond to these situations in several ways, depending on style and the extent of your public safety coverage.

AUTOMATIC EMERGENCY RESPONSE

If a Disaster occurs within the radius of a Fire Station (as applicable), the inhabitants often snuff the blaze. Buildings within the protection area of a Fire Station are provided with free fire extinguishes; if a fire is small enough to be controlled with these and a bucket brigade, it goes out without any dispatch.

DISPATCH

To combat persistent fires and riots, manually dispatch units to the scene of the Disaster. Do this via the Emergency Tools menu in Mayor Mode.

DISPATCHES AND RIOTS

Use your Police Dispatches when riots break out. Whenever an angry rioting mob confronts a Police Dispatch, it changes direction and slows. If dispatches surround a mob or back it into a dead-end road, the rioters calm down and resume their normal lives.

This dynamic makes riot control a game of shifting your dispatches to head off mobs. This isn't too difficult unless you have only two dispatches or your dispatch squads are underfunded below 60 percent. An underfunded police unit can't divert a strong riot; the crowd will walk past as if the dispatch unit wasn't even there.

MAKING FIRE LINES

When a fire is out of control, stop it with managed destruction.

Bring up the Bulldoze tool and destroy all structures and trees in the direction the wind is blowing. The stronger the wind, the farther the fire can spread.

NOTE
You can't bulldoze a burning building.

Discourage the spread of fire by creating a fire line with your bulldozer. Destroy flammable structures in the direction the wind is blowing to leave nothing more to burn.

TIP

Watch where the smoke is going and how quickly it blows to determine the direction and strength of the wind.

Because rubble doesn't burn, this tactic leaves the fire with no further fuel to ignite.

For fire lines to work, be merciless in your bulldozing. The one flammable structure you spare could catch, forcing you to bulldoze a new area. Let the fire burn out, then clean up.

CLEAN UP

To rebuild anything on zoned land, you must bulldoze any rubble a Disaster leaves behind. Only when a tract is clear can anything develop.

The next priority is to rebuild any Roads the Disaster has wrecked. If any Power Lines provided an area with its only source of juice, rebuild those.

Clear rubble off zoned land to enable redevelopment.

NOTE

After a Disaster settles, your Public Safety Advisor issues a damage report outlining the number of structures destroyed and the cost of rebuilding (clearing rubble, rebuilding, civic structures, and infrastructure).

Go underground to fix the damage to Water Pipes and Subway Tunnels.

You aren't obligated to restore things the way they were. You can take the opportunity to reshape affected areas of your city. You could even look at something like a Meteor Disaster as low-cost bulldozing or "urban renewal."

LANDMARKS

Nothing puts a stamp of greatness on your city like a towering Landmark. Visitors flock from all over the Region to gaze upon it, while your inhabitants look to it for inspiration and the comfort of knowing their Mayor is inspired by vision. Plus, they look cool.

> **THAT IS *SO* 3K!**
>
> In *SimCity 3000*, Landmarks were free and had little impact on your city; their main function was visual. This is no longer the case.
>
> Landmarks now come with high acquisition costs and monthly maintenance costs. They also have building effects (pollution, Mayor Rating, desirability, etc.), as outlined here.

Landmarks have several effects:

- Increase local Cs, Co, and IHT desirability
- Increase local Mayor Rating
- Increase air and water pollution and garbage output
- Cost money to build and maintain

NOTE

New Landmarks introduced in the *Rush Hour* expansion pack are catalogued in Part 8.

LANDMARKS IN GENERAL

ACQUISITION COST

Every Landmark has a price tag. To gain the honor of putting one of these in your city, you must pony up the Simoleons. If you can afford the price, you can have as many Landmarks as you like; you can even have more than one of each if you're Mayor Moneybags.

If you're swimming in money, you can afford lots of Landmarks.

MAINTENANCE COSTS

You must maintain Landmarks or they start to look shabby. These fees range §90–§470 per month.

Find the line item for each Landmark in the City Beautification budget.

You can adjust the amount of funding for all Landmarks (not individually), but there's a price to pay for the cost savings. If you decrease Landmark funding, all Landmarks slowly distress, turning dingy and shabby. A distressed Landmark attracts fewer visitors and is less desirable to your city's Commercial Sims—the positive desirability effect of a Landmark can be mitigated by low funding.

Landmark buildings' maintenance costs appear in your city beatification budget and drain your treasury each month.

The funding-to-effect ratio for Landmarks is linear; reducing funding to 60 percent reduces the positive effects to 60 percent. Reducing funding to 0 eliminates effects.

COMMERCIAL NIMBY/YIMBY

Landmarks are one factor in Commercial desirability. Both Cs and Co Sims are attracted to land that's near things, such as Landmarks, and draws people. For Commercial Service Sims, people equal customers; for Commercial Office Sims being in a Landmark neighborhood lends prestige. The closer land is to these things, the more desirable it is to Commercial interests.

> The Commercial NIMBY/YIMBY isn't limited to Landmarks. Other buildings (Rewards, parks, recreation, etc.) also have Commercial NIMBY/YIMBYs.

This presumes that you are maintaining the Landmarks. Their desirability effect is diminished if they're underfunded (below 100 percent).

Put Landmarks near your Commercial zones for maximum benefit. Be mindful of any negative effects that come with the positive.

It's possible to negate the positive desirability effect of a Landmark by reducing its funding to 0. It won't negatively impact or contribute to desirability.

Though a building's Commercial NIMBY/ YIMBY is inherent to it, how it impacts each wealth developer type (and wealth level) varies. Think of it as how much each kind of citizen appreciates the building.
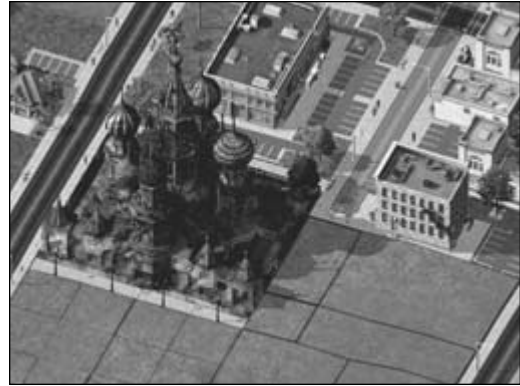
A run-down Landmark isn't doing the work you paid for. To get the most out of Landmarks, keep their funding at full.

LANDMARKS AND MAYOR RATING

Your Mayor Rating is enhanced by the presence of Landmarks in your city. So powerful are the Mayor Rating Effects of these structures that they enhance Mayor Rating everywhere in your city, no matter where they're placed.

There is one exception that has a minor negative Mayor Rating Effect: Alcatraz Prison. Though your Commercial interests love the tourism the former prison draws, it is still a condemned prison.

LANDMARKS AND POLLUTION

Like other buildings, Landmark buildings pollute (air, water, and garbage). How much so depends on the buildings. As a general rule, tourist attractions (e.g., Big Ben) produce the least pollution, while working office buildings (e.g., Bank of America Building) produce the most.

BUILDING DIRECTORY

NOTE
Downloadable landmarks (marked with a *) are listed in the table below, but not pictured in the accompanying directory. See simcity.com for pictures and origin.

Landmark Statistics
(Buildings marked with a * are downloadable from simcity.com.)

Structure	Com. NIMBY/ YIMBY	Com. NIMBY/ YIMBY Radius	Air Pollution	AP Radius	Water Pollution	WP Radius	MR Effect	MR Effect Radius	Cost	Monthly Cost	Bulldoze Cost
Alamo	40	20	0	1	1	2	7	256	§65,000	§130	§5,850
Alcatraz	10	24	1	1	1	1	-2	256	§50,000	§100	§4,500
Amalienborg	30	18	1	2	1	3	5	256	§70,000	§120	§4,950
Arc de Triomphe*	30	18	1	1	1	2	15	256	§55,000	§110	§4,950
Bank of America	80	28	5	6	5	7	6	256	§110,000	§210	§9,900
Bank of China Tower	100	48	4	4	4	5	5	256	§180,000	§300	§4,950
Big Ben	40	20	1	1	1	2	7	256	§75,000	§150	§6,750
Brandenburg Gate*	40	20	1	1	1	2	6	256	§60,000	§120	§5,850
California Plaza	30	18	2	2	2	3	0	0	§50,000	§100	§4,500
Capitol Records Building*	30	18	3	4	4	5	3	256	§50,000	§100	§4,500
Chrysler Building	100	48	3	4	4	5	9	256	§170,000	§330	§15,300
CN Tower	80	28	0	0	1	2	7	256	§225,000	§440	§20,250
Coit Tower	30	18	0	0	1	2	5	256	§55,000	§110	§4,950
Empire State Building	100	48	5	5	6	6	9	256	§240,000	§470	§21,600
Faneuil Hall	20	16	1	2	1	3	5	256	§50,000	§100	§4,500
Fernsehturm	50	22	1	1	1	1	5	256	§85,000	§170	§7,650
Gateway Arch	50	22	0	0	0	0	8	256	§90,000	§180	§8,100
Globe Arena*	45	25	2	2	3	2	5	256	§70,000	§140	§4,950
Grand Central Station*	90	40	3	4	4	5	8	256	§110,000	§220	§4,500
Great Pyramid	70	26	0	0	0	0	10	256	§160,000	§310	§14,400
Guggenheim Museum	70	26	1	1	1	2	8	256	§95,000	§180	§8,550
Hagia Sofia	40	20	1	1	1	2	7	256	§80,000	§160	§7,200
Hollywood Sign	20	16	0	0	0	0	2	256	§30,000	§60	§2,700
Independence Hall	30	18	1	1	1	2	7	256	§60,000	§120	§5,400
Jefferson Memorial	50	22	0	0	0	0	8	256	§80,000	§160	§7,200
John Hancock Center	90	30	6	6	5	7	8	256	§165,000	§320	§14,850
Lincoln Memorial	50	22	0	0	0	0	8	256	§85,000	§170	§7,650
Living Mall	80	20	10	4	12	5	5	256	§55,000	§110	§4,950
Palace of Fine Arts	30	18	1	1	1	2	6	256	§90,000	§180	§8,100

Landmark Statistics continued

Structure	Com. NIMBY/ YIMBY	Com. NIMBY/ YIMBY Radius	Air Pollution	AP Radius	Water Pollution	WP Radius	MR Effect	MR Effect Radius	Cost	Monthly Cost	Bulldoze Cost
Palacio Real	30	18	1	2	1	3	6	256	§65,000	§130	§5,850
Parthenon*	40	20	0	0	1	2	7	256	§60,000	§120	§6,750
Rotes Rathaus	30	18	2	2	2	3	5	256	§65,000	§130	§5,850
Seoul City Hall*	90	30	4	2	3	3	5	256	§65,000	§130	§4,950
Seoul World Cup Stadium*	40	20	-11	4	10	6	5	256	§160,000	§310	§4,950
Smith Tower	40	20	3	4	4	5	5	256	§55,000	§110	§4,950
Sphinx	20	16	0	0	0	0	7	256	§50,000	§100	§4,500
St. Basil's	60	24	1	1	1	2	7	256	§90,000	§180	§8,100
Statue of Liberty	60	24	0	0	1	2	9	256	§85,000	§170	§7,650
Sungrye-mun*	30	18	0	0	2	2	8	256	§65,000	§130	§5,850
Taj Mahal	60	24	0	0	2	2	8	256	§105,000	§200	§9,450
Temple Expiatoiori de la Sagrada Familia*	30	18	1	2	1	3	5	256	§95,000	§180	§8,550
Tokyo Tower	80	28	1	1	1	2	7	256	§175,000	§340	§15,750
Tower of London	30	18	1	2	2	3	6	256	§55,000	§90	§4,950
U.S. Capitol Building	80	28	1	2	2	3	9	256	§135,000	§260	§12,150
Washington Monument	40	20	0	0	0	0	7	256	§70,000	§140	§6,300
White House	40	20	1	1	1	2	6	256	§70,000	§140	§6,300
63 Building*	80	28	5	6	5	7	8	256	§110,000	§210	§9,900

THE ALAMO

- Origin: San Antonio, USA
- Size: 2x3

ALCATRAZ

- Origin: San Francisco, USA
- Size: 10x5

AMALIENBORG

• Origin: Copenhagen, Denmark
• Size: 12x12

BANK OF AMERICA
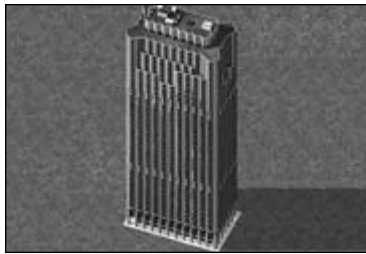
• Origin: San Francisco, USA
• Size: 5x3

BANK OF CHINA TOWER
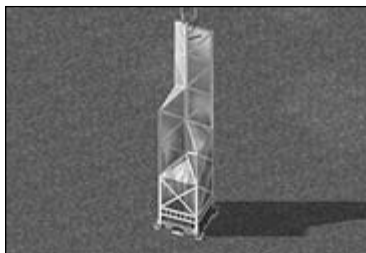
• Origin: Hong Kong, China
• Size: 4x4

BIG BEN

• Origin: London, United Kingdom
• Size: 1x1

CALIFORNIA PLAZA (MAXIS HQ)

• Origin: Walnut Creek, USA
• Size: 8x6

CHRYSLER BUILDING

• Origin: New York City, USA
• Size: 4x4

CN TOWER

- Origin: Toronto, Canada
- Size: 6x7

COIT TOWER

- Origin: San Francisco, USA
- Size: 3x3

EMPIRE STATE BUILDING

- Origin: New York City, USA
- Size: 8x4

FANEUIL HALL

- Origin: Boston, USA
- Size: 2x2

FERNSEHTURM

- Origin: Berlin, Germany
- Size: 3x3

GATEWAY ARCH

- Origin: St. Louis, USA
- Size: 10x2

GREAT PYRAMID
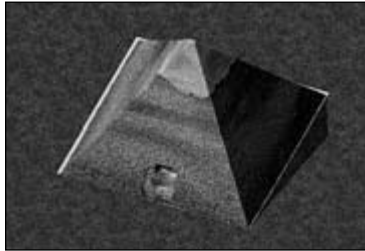
- Origin: Giza, Egypt
- Size: 8x8

GUGGENHEIM MUSEUM

- Origin: New York City, USA
- Size: 6x4

HAGIA SOFIA

- Origin: Istanbul, Turkey
- Size: 6x6

HOLLYWOOD SIGN

- Origin: Los Angeles, USA
- Size: 7x1

INDEPENDENCE HALL

- Origin: Philadelphia, PA
- Size: 2x2

JEFFERSON MEMORIAL

- Origin: Washington DC, USA
- Size: 6x7

JOHN HANCOCK CENTER
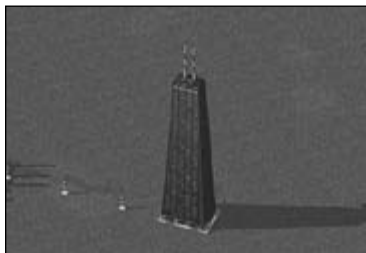
- Origin: Chicago, USA
- Size: 6x4

LINCOLN MEMORIAL

- Origin: Washington DC, USA
- Size: 5x4

LIVING MALL

- Origin: Taipei, Taiwan
- Size: 6x6

PALACE OF FINE ARTS

- Origin: San Francisco, USA
- Size: 10x11
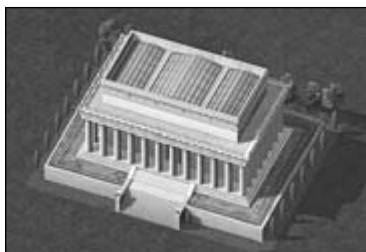
PALACIO REAL

- Origin: Madrid, Spain
- Size: 6x6

ROTES RATHAUS

- Origin: Berlin, Germany
- Size: 4x4

SMITH TOWER

- Origin: Seattle, USA
- Size: 3x3

THE STATUE OF LIBERTY

- Origin: New York City, USA
- Size: 4x4

THE SPHINX
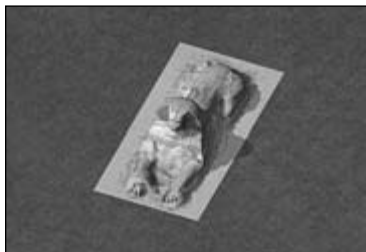
- Origin: Cairo, Egypt
- Size: 2x4

TAJ MAHAL

- Origin: Agra, Uttar Pradesh, India
- Size: 6x6

ST. BASIL'S

- Origin: Moscow, Russia
- Size: 4x4

TOKYO TOWER

- Origin: Tokyo, Japan
- Size: 6x6

TOWER OF LONDON

- Origin: London, United Kingdom
- Size: 3x3

WASHINGTON MONUMENT

- Origin: Washington DC, USA
- Size: 3x3

U.S. CAPITOL BUILDING

- Origin: Washington DC, USA
- Size: 6x5

WHITE HOUSE

- Origin: Washington DC, USA
- Size: 6x6

CHEATS

The last several chapters have taught you how to handle the hard work and challenges of managing a metropolis over the course of centuries.

This one does the contrary, telling you how to get something for nothing. Cheats do many things. Some give you a gameplay advantage, while others allow you to do things you couldn't otherwise.

CONSOLE CHEATS

To enter these cheats, first type the console access code: Ctrl + Shift + Alt + X . Then enter any of these codes. It's between you and your conscience.

- stopwatch: Pause/resume the 24 hour clock
- whattimeizit: Set the time of day. Follow with a space and the time you wish to set (in military time, e.g., 8 pm = 20).
- whererufrom: Change city name. Follow with new name you want to apply.
- hellomynameis: Change mayor name. Follow with new name you want to apply.
- you don't deserve it: All Rewards available
- sizeof: Increases magnification (1–100)
- weaknesspays: Adds §1,000 to your treasury
- fightthepower: Removes power requirement for all buildings
- zoneria: Hides empty zone colors
- tastyzots: Toggles zots
- howdryiam: Removes water requirement from all buildings

GOD MODE CHEAT

After you establish your city, you can't get the pre-city God Mode Terraform tools—unless you use the God Mode Cheat.

While in Mayor or My Sim Mode, hold Ctrl + Alt + Shift and click on the God Mode button. The tools you see aren't the usual post-establishment, trimmed-down tools, but rather the more extensive pre-city tools. They remain as long as you stay in God Mode. If you leave and come back, the tools revert to normal.

TOOLS AND EXTRAS

There's more to the game than just the game. To make your city truly your own, you must personalize it—take it outside the strict design of the game. That's what this chapter is about—the things outside *SimCity 4* that make the game even more fun.

> **N O T E**
>
> This chapter describes only tools and modifications created and supported by Maxis. Many other "unofficial" tools out there do more radical things to your *SimCity 4* experience. Consult the Fansites Directory (under the Community button) at *SimCity.com* to learn more.

> **MAC NOTE**
>
> Now that *SimCity 4* is available on the Mac, there are several issues and incompatibilities to mention. Though the game is the same on both platforms, use of many of these extras is not possible with the Macintosh OS X version of *SimCity 4.* These sidebars alert you to those issues. The content plug-ins and downloads work with the Mac, so you can download Maxis issues.

SIMCITY.COM

When you want to go outside the game, begin at *SimCity 4*'s official website, *SimCity.com*. You can play the game without visiting this site, but there's plenty here for those who wish to explore.

> **MAC NOTE**
>
> Some of *SimCity.com* is inaccessible without a computer running some form of Windows.

To visit *SimCity.com*, direct your Web browser to *http://www.simcity.com*. If you have the game running, go to Region View and click on the Internet Options button to be taken directly to *SimCity.com*.

Make yourself at home at *SimCity.com.*

NOTE

Internet Options also contains a link to SimCityscape—but we'll get to that later.

The site offers useful news, tips and tricks, and game patches. Check in occasionally to find out what's new.

DOWNLOADABLE LANDMARKS

Under the Cool Stuff menu is a list of new Landmarks that you can add to your game. The list is constantly expanding, so check back often. Choose what you like or grab them all.

MAC NOTE

Landmarks from *SimCity.com* can only be downloaded from a Windows PC. They may, however, become available from unofficial fansites or from the Macintosh publisher Aspyr at *http://www.aspyr.com.*

NOTE

Downloaded Landmarks are placed in the game's main *SimCity 4 Plugins* folder (not the one in your *My Documents* or *Home\Documents* folder):

• On Windows: *C:\Program Files\Maxis\SimCity 4\Plugins*

• On Mac: *Applications\SimCity 4\SimCity 4 Data\Plugins*

When you download the Landmarks, just run their installer. The new Landmarks will be available to use any time.

NOTE

Like all Landmarks, each of these downloads has a unique effect on your city in regard to Mayor Rating, Commercial YIMBY/NIMBY Effect, cost, etc. For your convenience, all Landmarks available at press time have been added to the tables in the preceding chapters. See Chapter 28 for details.

DOWNLOADABLE CITIES AND REGIONS

Though there's a more voluminous source for downloadable cities (see SimCityscape below), you can download a few cities/regions designed by the official Maxis testers. These will give you an idea of how to construct a large city with specialized regional functions.

Downloadable Regions must be placed in the *Regions* folder (in *My Documents\SimCity 4\Regions* in Windows or in the *Home\Documents\SimCity 4\Regions* folder in Mac). They can then be selected from the Load Region button under the Region View Options menu in Region View.

![TIP icon]
TIP
You may import cities from other regions already on your hard drive. Doing this will erase the city from its original region.

Downloaded regions appear in the Load Region menu.

Downloadable cities must be placed in the *Regions\Downloads* folder. To incorporate them into a Region, load the region, click on a city square of the same size (small, medium, or large) as the downloaded city, and click on the Import City button. From the list of correctly sized cities (non-matching-sized cities won't appear in the list), choose the one you want to load and it will overwrite the terrain of the existing city in the square.

![NOTE icon]
NOTE
Once a city is imported into a region, it's erased from the *Downloads* folder. To import the city into another Region, you must place a fresh copy of the downloaded file in the *Downloads* folder.

Downloadable cities are found in the *Downloads* folder but will only appear if they match the size of your selected city square.

![TIP icon]
TIP
Don't overlook The Inside Scoop under *SimCity.com*'s About menu. Inside you'll find informative articles by members of the Maxis team. These are "super tips," going beyond mere mechanics and delving into design, advanced use, and urban philosophy.

CREATING CITIES AND REGIONS

Using the provided topographical maps or crafting your own with the God Mode tools is a good way to play, but wouldn't it be nice to exercise more control over the land on which your city will grow? That's what these tools are all about.

TERRAIN GENERATOR

The Terrain Generator creates *city* files based on real world topographical maps from the United States Geological Survey. It can be accessed through *SimCity.com* under the Cool Stuff>Tools menu. As of the publication date, you could select maps of the continental United States only.

NOTE

When you see text like this: "Cool Stuff>Tools menu," it means that Tools is a submenu of the Cool Stuff menu.

MAC NOTE

Terrain Generator, at this point, works only on a PC running Windows.

The Terrain Generator gives you both a terraforming head start and a chance to use real-world terrain.

To make a real-world city map, activate this web-based tool in your Internet browser and zoom in to the location you wish to render by pointing and clicking and using the zoom controls. To assist pinpointing your desired location, major cities are labeled in the 3, 4, and 5 zoom levels.

Once you find the location you want to render, click on it and zoom in as close as possible. Select the city size you wish to create (small, medium, or large) from the City Size buttons and the cursor will form a box reflecting the chosen size.

Get as close as you can and pick your city size. Click Create City to continue.

When you have the box properly positioned, press the Create City button. This initiates the download of a file called "newCity.sc4." Do not alter this name! Save it to your *Regions\ Downloads* folder.

Launch *SimCity 4*. At a region map, select a city of the same size as the downloaded map, press the Import City button, and open the *Downloads* folder. A list of correctly sized cities appears. Select and import "newCity.sc4" and, when the import is complete, enter the city. You'll find a realistic approximation of the location you chose reflecting water and elevation. It's a great way to quickly create complex city maps without meticulous terraforming.
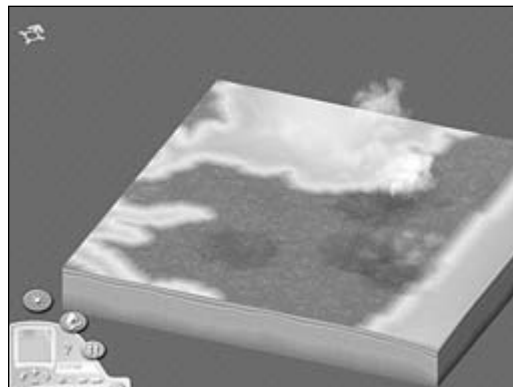
Ta-da. A pretty good likeness of the real world.

NOTE

It isn't possible to create complete regional maps with Terrain Generator, at least not yet. That doesn't mean it can't be done. Check out some of the fansites in the *SimCity.com* Community menu to learn how to create scale-accurate regions from U.S.G.S. data. This is an advanced procedure and shouldn't be undertaken by the faint of heart. Those interested in doing this but intimidated by the procedure should first master creating region maps from grayscale images described later in this chapter.

CREATING REGIONS FROM GRAYSCALE IMAGES

You don't have to live with the randomly divvied up city maps that come with a new region; you may specify the layout of the city tiles and, if you're proficient with a painting program like Photoshop, even create a custom topographical map.

NOTE

Maxis's Ocean Quigley contributed to the graphics and information in this section.
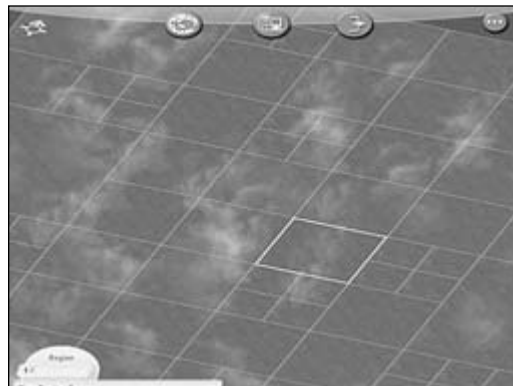
You don't know what you'll get when you click on Create New Region. The city sizes and configurations are out of your control. Unless….

Regions are laid out in kilometers. A typical region is 16 km by 16 km, but can be larger or smaller (though a region of 20–30 km per side requires a fast computer with considerable memory). The first step in Region creation is specifying what size you want your region to be.

This is done by the creation of a config file, a color-coded bitmap that tells *SimCity 4* where to draw city lines.

NOTE

There are unofficial freeware tools available to automate this process. Check out fansites for the latest.

To do this, create a small RGB bitmap that's the same size in pixels that you want your region to be in kilometers. If you want a 16 km by 16 km region, make your config image 16 pixels by 16 pixels. This is a small image, but it's essential to creating a region.

Once you have your region size defined, carve it into city squares.

Each city size has different pixel dimensions and color code:

- Small: 1 by 1/red
- Medium: 2 by 2/green
- Large: 4 by 4/blue

To define these dimensions, paint groups of pixels in the bitmap according to size and color. For example, to place a large city in the upper left corner of your region, color a 4 by 4 square of pixels blue. You must paint every pixel in the bitmap one of the three colors. The finished product might look something like this:
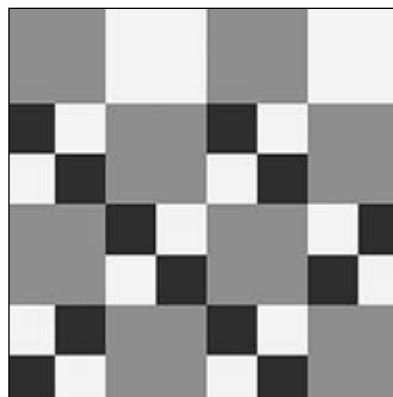
NOTE

The colors used in the config map don't have to be pure red, blue, or green. You need only set the desired color to 255 and the other two to anything *but* 255. For example, blue could be B = 255, G = 0, R = 0; or B = 255, G = 150, R = 150. As far as *SimCity 4* is concerned both are blue.

When all the pixels in the config file are coded properly, save it as a 24-bit bmp file called "config.bmp." Launch *SimCity 4*, go to the Region View Options, and click on Create New Region. Name the region (e.g., "My Home Town," "Funky Town," or "A Big Country"). Copy the config file into this folder.

Create a new region before applying your config file.

If all you wanted to do was specify the city square layout of your region, you'd be done and could load your newly created region via the Region View Options menu. Properly loaded, the region we specified would look like this:
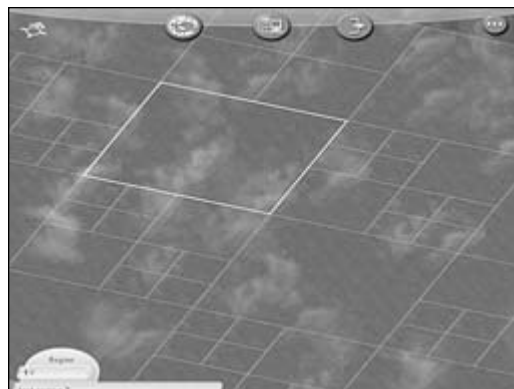
Note that the region is flat. All you've done here is dictate where the city squares will be; the terraforming must be done in the usual fashion.

GRAYSCALE TOPOGRAPHICAL MAPS

If you want to define your region's topography, there's more you can do, though it's a bit more advanced.

Regions can be created using a grayscale image in which the shade of gray indicates the map's elevation. In this range:

• Black: The bottom of the ocean. Represented by the color value 0.

• White: The highest elevations. Color value can be up to 255.

• Gray: In between water and high elevation. Sea level is represented by the color value 83. Thus, any place you want to be underwater should be in the range 0–82, and any dry land should be in the range 83–255.

The first step is to define the size of your region map. Map size in pixels must be the size of the region in kilometers × 64 + 1.

If we stick with the 16 km by 16 km map, the necessary grayscale image must be: 1,025 by 1,025 pixels.

Next create an image of that size and paint it in varying shades from 0 to 255. Run a river down the center by drawing a thick black line (color value = 0) and some mountains capped with white (color value = 255).

A rough grayscale region with a river and a small raised area to the northwest.

When you're through, save this as an 8-bit grayscale bmp file, given any name you please.

Now, launch *SimCity 4* and open the newly created region defined by the config file you saved earlier. When it loads, press [Control] [Shift] [R] and locate the grayscale bitmap. Load it: Voilà; a region crafted by your own hand. Polish the region by entering the various cities and terra-forming to add features and vegetation.

When you press [Control] [Shift] [R] , it brings up this menu.
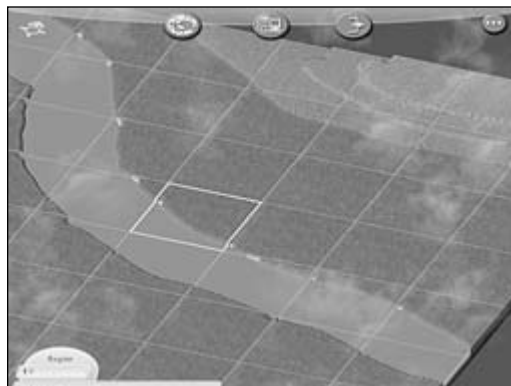
After some load time, the resulting region reflects your handcrafted grayscale image.
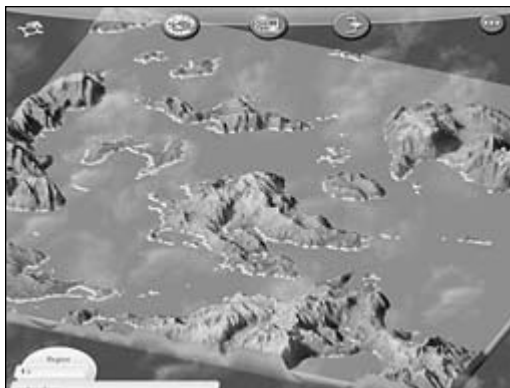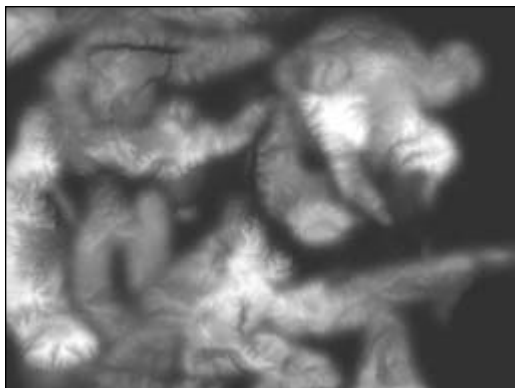
Here's an example made by a genuine professional. Before and after.

LOT EDITOR

Let's bring things down in scale. Now that you know how to personalize the earth on which your city sits, it's time to discover how to change the face of your city as it grows. The tool for this is the Lot Editor.

> **MAC NOTE**
>
> **There is, at publication time, no Macintosh version of the Lot Editor program.**

The Lot Editor, its manual, and a necessary prop plug-in are available from *SimCity.com* under the Cool Stuff>Tools menu. Download all three to begin.

When all three files are on your hard drive, read the manual (most of the information contained in it is not be repeated here). Install the Lot Editor program and copy the Building and Props plug-in (called bldgprop_vol1.dat) into our *SimCity 4/Plugins* folder.

NOTE

The Building and Props plug-in isn't necessary to run Building Editor, but it enables use of any building in the game as a prop in the lots you build. For example, you could do a mockup of the Washington Mall by expanding the U.S. Capitol Building's lot and adding the Washington Monument, Lincoln Memorial, Jefferson Memorial, and several museums as props.

NOTE

To view user-made lots with buildings as props, Mac players must have the bldgprop_vol1.dat file in their *Home\Documents\SimCity 4\Plugins* folder. It can be downloaded from *SimCity.com* even from a Mac browser: Go to the Cool Stuff>Tools>Lot Editor menu and look for the download link.

To begin, launch Lot Editor and pick a building to modify. You can search this or any list by entering words that appear in the item's name. To find the Lincoln Memorial, for example, type "lincoln." If another building (say, Lincoln Center) is highlighted, press ⌷Return⌷ and the list will jump to the next item in which "lincoln" appears. When you select your building, its lot opens for editing.

Use the Choose Lot to Edit box's search function to find the building you need.

NOTE

Buildings come in two varieties: ploppable and RCI. Ploppable buildings are ones that you can place in the game manually. These include Landmarks, Civic/Transportation/Utility buildings, and Rewards. Many of these carry conditions or other limitations but are otherwise usable at will. RCI buildings can only grow in your Residential, Commercial, and Industrial zones. You can't will individual RCI structures to appear; you must wait for the correct conditions.

It's important to understand what constitutes the buildings you see in the game. Each building sits on a lot of a given size; that's what you should be looking at now. On the lot, a designer must place one "building." The building, though it may be only a small part of the total lot, exerts all the lot's simulation effects. An international airport, for example, is controlled by a small building (i.e., the tower), but the entire lot is much larger.

The movie studio is made up of a central building and several dozen props and textures.

Around the building several things give the lot realism and function:

- Base texture: The ground texture (i.e., grass, dirt, etc.).

- Overlay texture: Any ground decoration placed over the ground texture (e.g., a sidewalk, dirt path, parking lots, etc.). Overlays can be opaque, translucent, or partially transparent (showing the ground texture in places).

- Props: Items placed on lots. These can be people milling around, parked cars, trees and bushes, swimming pools, signs, small structures, or special effects (e.g., fireworks).

- Flora: Some kinds of plants can be placed on a lot and will grow and change over time. These are different from prop plants that are static.

Lot Editor allows you to place and move all of the elements and change the properties of the lot (though not the buildings themselves). You can change how the lot reacts to different elevations or road proximities, whether it requires part of itself to be over water, and its total size. You cannot alter the lot's air pollution output. Read the manual to understand the mechanics of these changes.

NOTE
There are ways to alter the simulation effects of lots, but they're not officially supported by Maxis.

TIP
You can band together select multiple props, overlay textures, ground textures, flora, and water or land designators in the 2D pane of the Lot Editor. You can, therefore, drag, copy, or delete objects en masse rather than one at a time.

LOT EXCHANGE

The Lot Exchange can be found on *SimCity.com* and is the trading post for all user-created lots. You can view these creations of your fellow mayors with either Windows or Mac and most any web browser, but you can only download lots with the Windows version of Internet Explorer.

The Lot Exchange is but one place to post your handiwork and view that of mayors worldwide.

Downloaded lots should be placed in the following folder:

- On Windows: *My Documents\SimCity 4\Plugins*
- On Mac: *Home\Documents\SimCity 4\Plugins*

MAC NOTE

There are a few sample modified lots you can use. Go to the Lot Editor page on *SimCity.com* to see download links for three Maxis-modified lots: the Mayor's House, Country Club, and State Fair.

You may be able to download lots from several of the larger fansites. Note that even the ones hosted at *SimCity.com* may have hacked or altered simulation effects, so read their descriptions carefully.

SIMCITY CLASSIC

You can play a web-based version of the original *SimCity* via the Play menu on *SimCity.com*. You need a machine running Internet Explorer on a Windows PC to play.
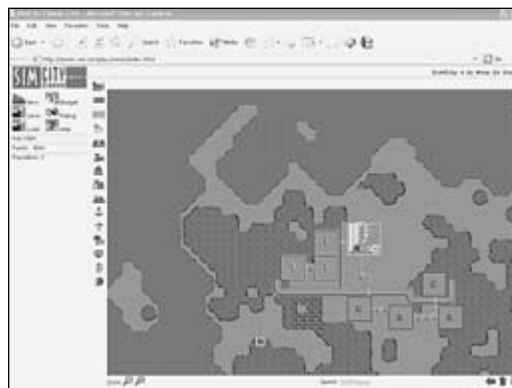
Ah, the memories. Don't forget to connect everything with power lines.

SIMCITYSCAPE

SimCityscape is a cooperative city building game accessible from the Play menu at *SimCity.com*, directly at *SimCityscape.com*, or via the Internet Options button in Region View.

The Internet Options button takes you to SimCityscape.

The object of the game is to take command of a new or already developed city for a fixed number of days and put your fingerprint on it. At the end of your mayoral tenure, another player can download it and run it his or her way. After a fixed number of turns, the resulting cooperatively evolved city is posted for download to the SimCityscape Hall of Fame.

Everything you need to know about SimCityscape is at SimCityscape.com.

While you are in control of a city, you can make entries in the city's Mayor's Log. You can describe in detail what you did in office, tell a story, and post screenshots of major moments during your reign. Subsequent mayors can review these logs and add their own.

You can choose Download Mode to snatch a city for your own use or enable Mayor Mode and take a turn running a SimCityscape city.

MAC NOTE

You can only play SimCityscape with a computer running Windows.

You may also download finished cities from the SimCityscape Hall of Fame. It is fully searchable and is a great source for well-built completed cities.

Full instructions on the rules and use of SimCityscape are on the SimCityscape website under the Help menu.

More developed cities can be downloaded from SimCityscape's searchable Hall of Fame.

CHANGING CITY BACKGROUND

When viewing your city from high zooms or near the edges, you can see the background, a gray grid pattern. If you're bored with this, you can easily change it.

Look in your main *SimCity 4 Plugins* folder:

- On Windows: *C:\Program Files\Maxis\SimCity 4\Plugins*
- On Mac: *Applications\SimCity 4\SimCity 4 Data\Plugins*

Here you'll find five images, one for each zoom level:

- Background3D0.pgn
- Background3D1.pgn
- Background3D2.pgn
- Background3D3.pgn
- Background3D4.pgn

You can create bitmap images of your own with the following specs:

- Size: 128 pixels by 128 pixels
- Resolution: 46.431 pixels/inch

Back up the original files and overwrite them with the files you create. Load the game and see your city in a whole new way.
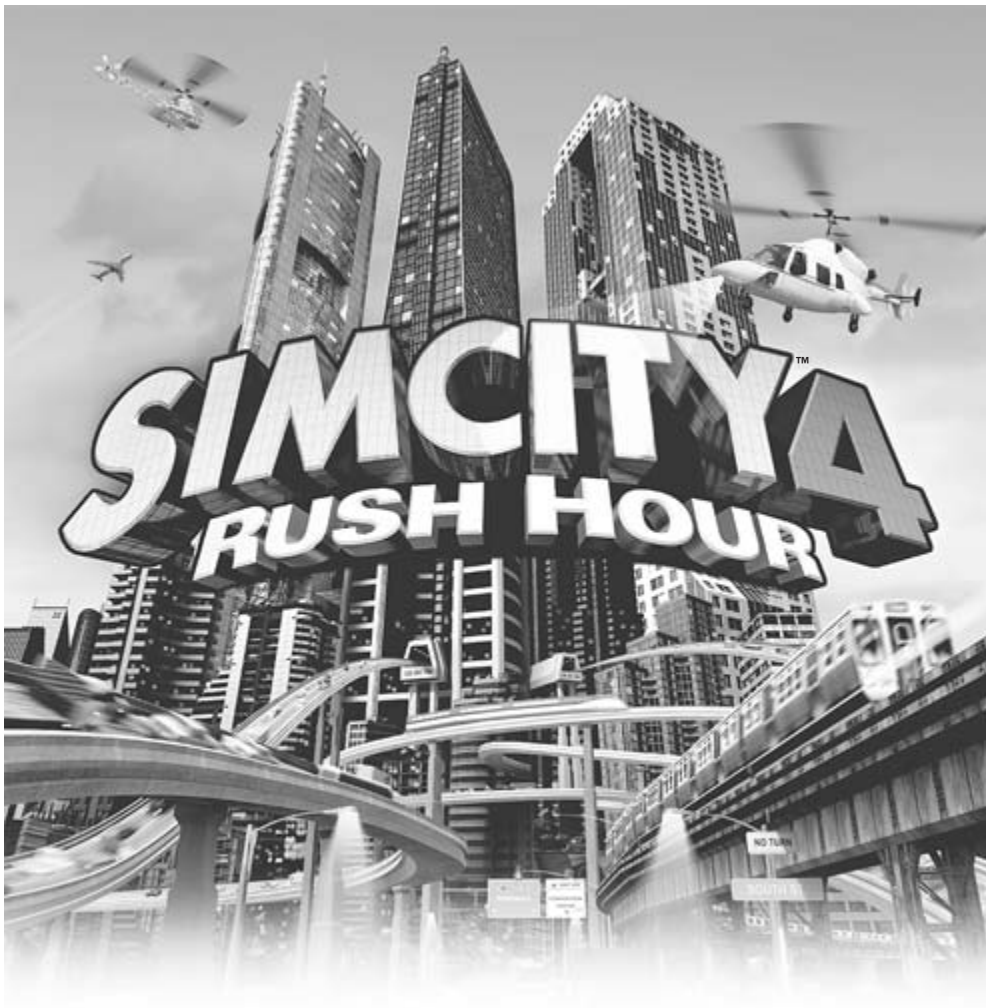
PART 8: *RUSH HOUR* EXPANSION PACK

It could be argued that your Sims' most vital need is transportation. Otherwise, all they'd do is sit around the house all day cooking, exercising, watching TV—that, of course, is another game.

In *SimCity 4*, the Sims need reasonable transportation to get to and from work and to receive all manner of city services. No transportation, no city.

The *Rush Hour* expansion pack gives you even greater control over your Sims' comings and goings, more powerful tools to diagnose transport problems, more ways to have fun on your city's highways and byways, and a host of new buildings and features (some of which have nothing to do with transportation) to expand and enhance your cities.

WHAT'S NEW?

For example, you'll find:

- New automobile networks: one-way roads, avenues, and ground highways

- New mass transit systems: Elevated Rail, Monorail, and Ferries

- New Rewards (not all are transportation related) and Landmarks and a top secret new Business Deal

- Three levels of difficulty for new cities

- Changes and additions to the basic RCI Model

- New My Sim functionality

- New ways to affect Mayor Rating and desirability and alternate ways to win Rewards

- New civic buildings in Education, Public Safety, and Water

- A new mode: U-Drive-It puts you behind the wheel of dozens of SimCity's vehicles, including police cars, taxis, the Mayor's Limo, helicopters, airplanes, boats, etc. Just race around your city's streets or complete missions to gain money or affect your city in other ways.

- New Graphs and Data Views and the powerful Route Query, which let you play doctor with your Sims' traveling ways

- Signs and labels to further personalize your city

- Spectacular new Disasters

- A new Euro-Contemporary building set

- The new microphone tool and Dispatch My Sim, which let you get deeper into your Sims' heads

- The ability to choose your My Sim's car and pedestrian style and change his or her home or job

- A way to set tax rates for each developer type, including (for the first time) Agricultural structures

A NOTE ON VERSIONS

If you're playing the original version of *SimCity 4* (not *SimCity 4 Deluxe Edition*), this part of the book does not apply to you. The changes and additions don't exist in your game. To gain access to them, you must install the *Rush Hour* expansion pack.

If you've installed the *Rush Hour* expansion pack or have purchased *SimCity 4 Deluxe Edition* (which includes *Rush Hour*), you'll find applicable information in all eight parts of this guide. When information in this part conflicts with data in the first seven parts (those that cover the basic *SimCity 4* game), the information in this part rules.

Rush Hour adds many new features and tools, but also changes some fundamental elements of gameplay. Notes in the early chapters alert you to many of these changes.

DIFFICULTY LEVELS AND THE RCI MODEL

DIFFICULTY LEVELS

Though the game is geared to be played by mayors of any skill and experience, starting a new city can be difficult for beginners. Many find it hard, without practice, to get and keep their city's finances in the black. That is why new cities can now be started at one of three difficulty levels: Easy, Medium, and Hard.

When establishing a new city, you have three difficulty levels to choose from. Read this chapter before you decide.

> **NOTE**
>
> In Region View, the number of stars below the city and mayor's name indicates the difficulty level on which the city was created. Cities carried over from *SimCity 4* are labeled Hard (three stars).

The difficulty levels are defined by several factors that impact your city's creation and how it grows.

INITIAL FUNDS

The amount of money stored in your city treasury at city establishment is dictated by the difficulty level you choose:

- Easy: §500,000
- Medium: §200,000
- Hard: §100,000

The extra money can be useful in setting up a city with full services right out of the gate; early investment in things like Education can pay off. Players with Hard cities, by contrast, have to wait many years before plopping down their first school. A warning: Don't overspend just because you have the cash; you still have to pay for services every month.

STAGED GROWTH BOOST

Staged growth dictates how quickly your city can grow larger buildings in each of the three zone types. This mechanism prevents, for example, small populations from developing skyscrapers.

Still, for an eager player, waiting the time it takes to build a large population and see tall buildings can seem an eternity. For this reason, the Easy and Medium skill levels come with a Staged Growth boost:

- Easy: 83 percent
- Medium: 91 percent
- Hard: 100 percent

No matter how strong your city, you won't see buildings like these until you've attracted a large population.

These percentages alter the population thresholds listed in the stage limits outlined in Chapter 11 (and modified for low-wealth buildings as described later in this chapter).

Let's say, for example, that your city has an R§§ population of 37,000. This permits your city to grow a small number of Stage 7 buildings, but not Stage 8 (the largest) buildings. If this city was begun on the Easy difficulty level, the next stage limit would be lowered from 43,859 to 36,403 (43,859 × .83), enough to put it past the next threshold and see a small number of Stage 8 buildings.

DEMAND BOOST

After a while, it can be hard to fight the downward pull of negative demand or build up demand when it sags. To ease this challenge for less-experienced players, the Easy and Medium difficulty levels include a demand boost that makes it easier to keep demand on the positive side.

For each difficulty level, the boost multiplier is:

- Easy: 6 percent
- Medium: 3 percent

All existing demand is multiplied before it's shown in your RCI Demand Indicator/RCI Demand Graph. Thus, whereas a city at Hard difficulty might have 2,000 R§ demand and 1,000 ID demand, the same city at the same moment begun instead on Easy would have 2,120 R§ demand and 1,060 ID demand.

Because this boost is a percentage, it can never convert negative demand into positive demand; it can only prop negative demand closer to zero.

TAX BOOST

Taxes and how to manage them are among the subtler elements of *SimCity 4*. Effective tax strategy is necessary to get your city running at a surplus as early as possible.

To facilitate profitable cities, the lower difficulty levels provide a boost to all tax income. The taxes collected are multiplied by these numbers to give you the income numbers you see in Budget View:

- Easy: 1.2
- Medium: 1.1

A city at the Hard level might, for example, collect §10,000 in R§§ taxes. The same city at the same moment begun instead on the Easy level would show revenue of §12,000.
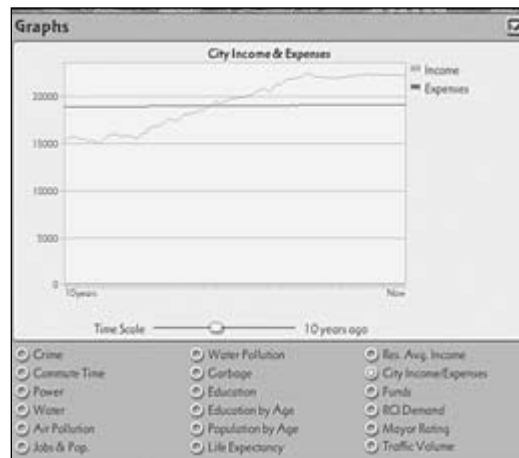
Keeping the green line above the red line is a matter of smart tax strategy. Your chosen difficulty level can make this easier.

ADVISOR MESSAGES

The frequency and types of urgent Advisor messages you see popping up in alert boxes are also dictated by difficulty level. The messages appear for all players in the News Flipper, but only players on Easy and, in some cases, Medium difficulty levels are specially notified via alert boxes.

For example, at the Hard level, mayors could easily overlook News Flipper messages about threats of strike, roads/streets/connections over capacity, neighbor deal cancellation, excessive tax increases, or notice of other impending problems. Players on Easy difficulty will have their attention drawn and their game paused by the appearance of an urgent Advisor message.

Urgent Advisor messages like these will be more frequent on low difficulty levels.

NOTE

Choice of difficulty level dictates one other factor. Only a Hard city can be offered the secret Area 5.1 Business Deal building. This means that only cities created before you installed *Rush Hour* (since they are considered "Hard") and those created on the Hard difficulty level with the expansion pack installed (or with *SimCity 4 Deluxe Edition*) will see this building; cities set for Easy or Medium will never earn it in the normal fashion.

As you'll see in Chapter 33, there is another way to unlock Area 5.1 that's open to all difficulty levels. Win the correct U-Drive-It missions, and you will get this building regardless of difficulty level.

CHANGES TO THE RCI MODEL

All the growth and activity of your Residential, Commercial, and Industrial zones is dictated by the game's RCI Model. This simulator does the calculations to resolve and grind together the issues of developer types, occupancy, demand, zoning, desirability, and development (see Chapters 7–11). What you see sprouting in your RCI zones is the current end product of this system.

Rush Hour introduces some fundamental changes to this system that alter the information presented in Part 3 of this guide.

STAGE LIMITS FOR LOW-WEALTH DEVELOPER TYPES

As discussed above and in Chapter 11, the size of buildings that can grow in a zone is limited by fixed population thresholds. These thresholds, called stage limits, define what building sizes can grow and in what proportions in your city's zones.

NOTE
Residential and Commercial buildings have eight building stages. Industrial buildings have only three.

For example, stage limits dictate that a city with a Cs§§§ population of 12,000 *can* grow buildings in these proportions:

Sample Staged Growth Proportions

Stage	Proportion
1	7 percent
2	13 percent
3	18 percent
4	37 percent
5	19 percent
6	6 percent
7	0 percent
8	0 percent

The simulator constantly balances a city with a Cs§§ population of this size to maintain these proportions until the next stage limit is surpassed.

NEW STAGE LIMITS FOR LOW WEALTH

To facilitate the growth of large low-wealth buildings, the stage limits have been changed to permit larger buildings at lower population thresholds for the game's three low-wealth developer types: R§, Cs§, and ID.

NOTE
All other developer types (R§§, R§§§, Cs§§, Cs§§§, Co§§, Co§§§, IA, IM, and IHT) are still ruled by the tables in Chapter 11.

Low-Wealth Residential (R§) Stage Limits

Stage	0	300	360	432	518	622	746	895	1,074	1,289	1,547	1,856	2,227
1	100%	95%	80%	60%	45%	30%	27%	24%	21%	17%	14%	12%	10%
2	—	5%	20%	35%	40%	45%	40%	36%	33%	30%	26%	23%	20%
3	—	—	—	5%	15%	25%	28%	30%	32%	35%	33%	31%	28%
4	—	—	—	—	—	—	5%	10%	14%	18%	23%	27%	32%
5	—	—	—	—	—	—	—	—	—	—	4%	7%	10%
6	—	—	—	—	—	—	—	—	—	—	—	—	—
7	—	—	—	—	—	—	—	—	—	—	—	—	—
8	—	—	—	—	—	—	—	—	—	—	—	—	—

Low-Wealth Commercial Service (Cs§) Stage Limits

Stage	0	300	360	432	518	622	746	895	1,074	1,289	1,547	1,856	2,227
1	100%	95%	92%	89%	86%	83%	80%	77%	74%	71%	68%	66%	64%
2	—	5%	8%	10%	12%	14%	16%	17%	18%	19%	20%	20%	20%
3	—	—	—	1%	2%	3%	3%	4%	4%	5%	5%	6%	6%
4	—	—	—	—	—	—	1%	2%	3%	3%	4%	4%	5%
5	—	—	—	—	—	—	—	—	1%	2%	3%	4%	4%
6	—	—	—	—	—	—	—	—	—	—	—	—	1%
7	—	—	—	—	—	—	—	—	—	—	—	—	—
8	—	—	—	—	—	—	—	—	—	—	—	—	—

Dirty Industrial (ID) Stage Limits

Stage	0	300	360	432	518	622	746	895	1,074	1,289	1,547	1,856	2,227
1	100%	99%	98%	97%	96%	94%	91%	89%	86%	83%	79%	75%	71%
2	—	1%	2%	3%	4%	6%	9%	11%	14%	16%	19%	21%	22%
3	—	—	—	—	—	—	—	—	—	1%	2%	4%	7%

These decreases are significant. Under the previous thresholds, you wouldn't see a Stage 8 R§ building until your R§ population reached 43,859. Now one can appear when the population reaches 9,571.

2,672	3,206	3,847	4,616	5,539	6,647	7,976	9,571	11,485	13,782	16,538	19,846
9%	8%	7%	6%	5%	4%	3%	2%	2%	1%	1%	1%
17%	15%	13%	11%	9%	8%	7%	5%	4%	3%	2%	2%
25%	21%	18%	15%	12%	10%	8%	7%	6%	5%	5%	5%
36%	39%	37%	34%	32%	28%	26%	22%	19%	16%	13%	10%
13%	14%	19%	24%	27%	30%	27%	24%	22%	19%	17%	15%
—	3%	6%	10%	15%	18%	24%	27%	25%	24%	21%	18%
—	—	—	—	—	2%	5%	11%	16%	21%	25%	29%
—	—	—	—	—	—	—	2%	6%	11%	16%	20%

2,672	3,206	3,847	4,616	5,539	6,647	7,976	9,571	11,485	13,782	16,538	19,846
62%	60%	58%	56%	54%	52%	50%	48%	46%	44%	42%	40%
19%	19%	18%	18%	17%	16%	16%	17%	14%	14%	14%	15%
7%	7%	8%	8%	8%	9%	9%	9%	10%	10%	10%	10%
5%	6%	6%	7%	7%	8%	8%	8%	9%	9%	9%	9%
5%	5%	6%	6%	7%	7%	7%	7%	8%	8%	8%	8%
2%	3%	4%	4%	5%	5%	6%	6%	6%	7%	7%	7%
—	—	—	1%	2%	3%	4%	4%	5%	5%	6%	6%
—	—	—	—	—	—	—	1%	2%	3%	4%	5%

2,672	3,206	3,847	4,616	5,539	6,647	7,976	9,571	11,485	13,782	16,538	19,846
66%	61%	56%	50%	44%	37%	31%	23%	16%	8%	7%	7%
23%	24%	25%	26%	27%	29%	29%	32%	33%	35%	29%	23%
11%	15%	19%	24%	29%	34%	40%	45%	51%	57%	64%	70%

CHANGES TO AIRPORT DEMAND CAP RELIEF

The amount of Demand Cap Relief provided by the nine Airport types has been altered to provide greater Demand Cap Relief for your city's Commercial Office zones. These allow your Commercial Office population to grow bigger before larger and more expensive Airports become necessary.

NOTE
For a full explanation of Demand Cap Relief in general and Airport Demand Cap Relief in particular, see Chapter 8.

Airports can now handle far more volume and provide greater Demand Cap Relief for your Commercial Office population.

Airports' Modified Maximum Demand Cap Relief

Airport Type	Small	Medium	Large
Landing Strip	102,000	131,000	160,000
Municipal Airport	288,000	341,000	400,000
International Airport	700,000	800,000	900,000

DESIRABILITY CHANGES

In addition to all the ways to affect desirability described in Chapter 10, *Rush Hour* introduces a new factor that alters, albeit temporarily, desirability: short-term Mayor Rating changes.

DESIRABILITY AND MAYOR RATING

With *Rush Hour*, desirability of a tract is influenced by short-term Mayor Rating Effects. These effects include:

- Fire
- Flora added
- Civic building added
- Some U-Drive-It mission outcomes (new)

The effect of these events, for both Mayor Rating and desirability, can be dramatic for the brief time they're in force. A fire or the addition of a civic building can visibly reverse both MR and desirability in the respective Data Views. Short-term Mayor Rating Effects decline in magnitude by about 25 percent per month; so too does the resulting desirability effect.

Desirability Impact of Short-Term Mayor Rating Effects (All Developer Types)

Short-Term MR Effect	Desirability Change	Short-Term MR Effect	Desirability Change
-127	-100	7	6
-112	-88	22	18
-97	-76	37	29
-82	-65	52	41
-67	-53	67	53
-52	-41	82	65
-37	-29	97	76
-22	-18	112	88
-7	-6	127	100

The radius of the temporary desirability effect is the same as the Mayor Rating Effect on which it's based (four tiles for Mayor Rating increase and two tiles for a decrease). See Chapter 34 for full details.

NOTE

In the case of the U-Drive-It mission, the effect occurs locally at the spot where the mission ended. Though this location is usually out of your control, you can often use this feature to your advantage. If, for example, you're trying to stop a carjacker, corner him or her in an area that needs increased Mayor Rating and desirability; the bystanders will be impressed with your law-enforcement prowess.

This connection between short-term Mayor Rating Effects and desirability can also be exploited in a more controllable way. If you've earned the Mayor's Limo and take it for a spin in Free Drive Mode, you can use the Throw Money control (Spacebar). Activate this special U-Drive-It feature and the Mayor's Limo will spew cash. The result is increased local Mayor Rating and, indirectly, increased desirability. The boost radiates four tiles in every direction and persists for three months.

Buy your citizens' love with cold hard cash.

TIP

Hold down [Spacebar] to flood an area with money.

Keep in mind that every Simoleon that goes out the window comes out of your treasury in §50 increments.

The best use of this tool is in areas of extremely low Mayor Rating. If the situation has gotten so dire that riots are imminent, fend them off by spreading a little monetary cheer. In SimCity, happiness can be bought—for a while at least.

INFORMATION TOOL CHANGES

A couple of small added features deserve mention.

MARK HISTORICAL

First, via an RCI building's Query box, you can designate a building Historical. This prevents it from changing because of a shift in desirability or occupancy. This is a great way to preserve buildings you find appealing.

Marking an RCI building Historical prevents it from being redeveloped.

Historical designation won't protect a building from abandonment due to negative demand, loss of water service, or other such catastrophic events. In fact, the building's inability to redevelop in the face of changing desirability might make it more prone to abandonment.

Historical buildings also won't be protected against the effects of fire or other Disasters. They can still be destroyed like any other building; they just can't be redeveloped.

ABANDONMENT CAUSE

To help clear up the ambiguity that comes with an abandoned building, such a structure's Query box now includes the *reason* it was abandoned.

Now you'll know *why* a building was abandoned. This book tells you what to do about it.

Now you can know just by clicking if you're losing residents due to poor water service, negative demand, or excessive commute time. If the latter is the reason, acquaint yourself with the Transportation Tools discussed in the next chapter.

BUILDING SETS

A building set is a collection of RCI buildings that follow some architectural/historical style to give a city some aesthetic coherence.

The stand-alone version of *SimCity 4* drew its RCI buildings from three building sets: Chicago 1890, New York 1940, and Houston 1990. The interplay of these sets was all behind the scenes and couldn't be accessed by the player.

The *Rush Hour* expansion pack throws a fresh building set (Euro-Contemporary) into the mix, and a new tool controls which building sets are active and how often new development switches to use them.

A new button, Building Style Control, is in the Mayor Mode controls. Press it to see the new options: Either randomly draw from all selected styles or shift styles every specified

The new Building Style Control menu lets you enrich the variety of your city's RCI buildings.

number of years. Click on the Expand button in the upper-right corner of the Building Style Control pane to see a listing of all four building sets—check a box to tell the simulator which building sets to use.

The Building Style settings dictate only *new* development and *redevelopment* of existing structures. Thus, whenever an empty zone develops or an existing RCI building is selected for redevelopment, the building developed will be from the currently active building style (or randomly selected from all four if you've chosen "Build all styles at once").

RUSH HOUR TRANSPORTATION

Changes in the transportation game form the core of the *Rush Hour* expansion pack. Though the fundamental get-the-Sims-to-work-and-back game is the same, much of the detail has been fleshed out and the inner workings exposed for you to use, analyze, and (of course) exploit.

CHANGES TO THE FUNDAMENTAL COMMUTING MODEL

Before we get into the myriad transportation changes, there are some adjustments "under the hood" that alter the way you manage and understand *SimCity* transportation.

In *SimCity 4*, Sims didn't have static jobs they traveled to day after day, month after month.

As described in Chapter 19, with each cycle the simulator would take each Residential building and find the closest open job to it. If the trip between home and job could be made in under 2.5 hours, this was considered a completed trip and thus the illusion exists that a Sim living in that house is driving to a job somewhere. With the next cycle, the simulator did this again,

Sims now keep their specific jobs over the long term. This means you can see how and where they travel to work.

finding an entirely different job from the one during the prior cycle. All previous versions of *SimCity* have used some variation of this basic formula.

With *Rush Hour*, however, fiction has come closer to reality. Here's the difference: The simulator remembers from month to month what jobs it finds for each Residential structure and holds onto them until something changes. In other words, the Sims hold their jobs until something forces them to find another. Quite a bit more like life, no?

REROUTES AND JOB CHANGES

Every four months or so (it can be longer for larger cities and sooner for smaller ones), the traffic simulator recalculates the route from a Residential structure to the existing job. If it finds a faster way (due to reductions in volume or availability of new routes or mass transit), the simulator will keep the Sim in the same job but take the new faster route.

If, however, it can't complete the trip to that job in time or some other factor has made it impossible for the trip to be completed in under 2.5 hours, a new job is selected that will persist until at least the next recalculation.

> If a trip's route is severed by, for example, destruction of a road, the simulator recalculates the route rather than waiting until the next scheduled recalculation. If it can't complete the trip to the same job, it tries to select a new job.
>
> For this reason, pause the simulation before upgrading a road. As the road is destroyed to make room for a higher-capacity road, Sims may mistakenly think their route has been severed and recalculate their commute. If you pause, renovate, and resume, recalculations will be minimal.

Other than increased commute time, what else could cause a change in job? A change in desirability at the workplace location could cause the number of jobs to drop. In this case, all Residential routes to the job site are recalculated, with some Sims having to look for work elsewhere. If a worker ousted by this process can't complete a trip to any another job, he or she becomes unemployed and the no-job zot appears above that Sim's home. Think of this as downsizing, *SimCity* style.

RAMIFICATIONS

The ramifications of this new system are profound. First, it makes it possible to observe the commute between Residential and Commercial/Industrial zones. This helps to diagnose traffic problems and makes possible the new Route Query tool. Second, it allows the simulator to accurately depict traffic volume on your city's streets. What you see as congestion on the streets directly reflects the congestion, flow, and volume shown in the Traffic Data View—you can diagnose most of your city's traffic problems without ever consulting the Data View.

This is a sample of the things possible under this new transportation system. Read on to see how this works in practice and for full details on all of *Rush Hour*'s traveling features.

REGIONAL TRANSPORTATION MAP

When you launch *Rush Hour* for the first time, pause at the Region View. It looks the same at first, but there's a useful tool hiding in the Region View Options menu. Two new buttons allow you to choose between Satellite View (the same regional view as in *SimCity 4*) or a new Transportation Map.

Rather than showing the actual appearance of your city, the Transportation Map displays all traffic networks regionwide. Without even entering a city, you can see all the major transportation elements and how they fit together:

The regional Transportation Map displays how everything fits together.

- Gray: Roads (thick gray lines are Avenues)

- Red: Highways

- Black: Passenger/Freight Rail tracks

- Purple: Elevated Rail and Monorail tracks

- Dotted Black: Ferry routes

- Airport and Seaport icons: Note the air traffic above the region.

This alternative Region View gives a holistic view of your transportation system for what it is, a complex web of interlocking networks and cities. It's especially useful for setting up major neighbor connections or quickly determining how cities are interconnected.

To view a city's transportation system in more detail, however, you'll have to choose and enter a city.

NEW TRANSPORTATION MENUS AND ELEMENTS

You have several fresh transportation toys to play with: two new kinds of road, a new highway system and new ways to connect to it, three new mass transit systems, new bridge and highway interchange tools, new traffic structures, and a two new transportation Rewards.

You'll also work with a newly reorganized Transportation Tools menu broken down along these lines: roads, highways, rails, miscellaneous transportation (non-rail, land-based mass transit), airports, and water transportation.

BUILD ROADS

Previously "Build Roads & Bus Stops," this menu now concerns itself exclusively with matters of car and basic asphalt networks. In addition to Roads and Streets, your Sims can drive their cars on two new thoroughfares: Avenues and One-Way Roads.

The revised Build Roads menu contains your Roads, Streets, One-Way Roads, and Avenues.

AVENUES

- Traffic Capacity: 2,500 trips

- Used by: Pedestrian, Car, Bus, Freight Truck

- Max Speed: 40 kph

- Initial Cost per Segment: §60

- Cost per Month per Segment: §1

Avenues are two-way, extra-high-volume, high-speed, double-wide (2x2 per segment) roads. Their primary use is for main thoroughfares on which volume is too high for a Road. Because, however, Avenues are twice the width of Roads, replacing a Road with an Avenue requires some demolition if anything's built on the sides of the existing road.

You could lay out Avenues to begin with, but their expense might be too high for a young city (§60 per segment and §1 per month).

Also keep in mind that the increased traffic volume that comes with going from Road to Avenue brings with it several side effects. The greater the volume that travels on the road, the more noise and pollution you'll have, both independently reducing Mayor Rating on adjacent tracts. Any increased traffic volume can have a negative desirability effect on Agricultural and Residential tracts but a positive effect on Commercial Office and Commercial Service tracts.

Avenues can connect freely with other Avenues, Roads, Streets, and One-Way Roads. Avenues can even transition head-to-head into and from Roads and Streets, expanding from the Road/Street's two lanes to the Avenue's four or vice versa.

Avenues carry lots of traffic, but they take up lots of space.

Avenue connectivity is flexible, with Roads and Streets joining them at intersections and head-to-head.

TIP

It's good to make your Street or Road cross to the other side of the Avenue even if there is no Road there, because it provides cars a place to make a U-turn.

The handiest thing Avenues can do is transfer directly and linearly onto a Highway (Ground or Elevated). Roads, by contrast, can only access Highways if they run parallel or perpendicular to the Highway. The linear onramp required for this transition is automatically drawn but costs a fair chunk of cash (§200 for Ground Highway and §600 for Elevated). It's still cheaper than the traditional onramps.
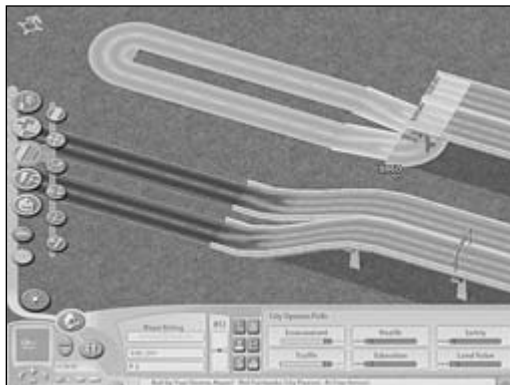
Avenues can go directly onto either kind of Highway. It's the cheapest way to connect.

TIP

You can transition linearly from a Road or Street to a Highway if you first connect to the Highway with a few tiles of Avenue, then link the Road or Street to the Avenue.

As with Highways (the other 2x2 network parts in the game), it can be difficult to link to or extend Avenues. *Rush Hour* simplifies this by changing the way such dragging is done. Click and hold on the last row of squares of an Avenue and drag it where you want to go. See Ground Highways following for full details.

ONE-WAY ROADS

- Traffic Capacity: 2,000 trips
- Used by: Pedestrian, Car, Bus, Freight Truck
- Max Speed: 46 kph
- Initial Cost per Segment: §10
- Cost per Month per Segment: §0.10

One-Way Roads direct traffic in a single direction but offer two lanes rather than a Road's one, thus doubling the capacity of Roads. The downside is that vehicles using a One-Way Road can't come back the way they came; you must design your One-Way Road network to maintain round-trip access.

One-Way Roads are useful, but make sure every property reliant on them has a way in and a way out.

The best use for One-Way Roads is in alternating blocks in high-rise downtown areas.

Drawing One-Way Roads is easy: Drag in the direction you want traffic to flow. To switch directions, redraw over the existing road, dragging in the opposite direction.

NOTE

If you try to link head-to-head two One-Way Roads going in different directions, the existing road will switch directions up to the nearest intersection.

Connecting them to other kinds of roads, however, is more challenging. Generally, One-Way Roads can do anything Roads can except:

- Feed head-to-head into Avenues
- Accommodate Toll Booths
- Build bridges
- Connect to neighbor cities

BUILD HIGHWAYS & RAMPS

This menu's name is unchanged, but many more options are included. Highways now come in two kinds: Elevated and the brand-new Ground Highway. Also at your disposal are a Highway T-Intersection and a new tool for placing interchanges and onramps.

GROUND HIGHWAYS

- Traffic Capacity: 4,000 trips
- Used by: Car, Bus, Freight Truck
- Max Speed: 100 kph
- Initial Cost per Segment: §200
- Cost per Month per Segment: §1

These new Highways add realism to your cities and are a less expensive alternative to the pricey Elevated Highways.

In most ways, Ground Highways are identical to Elevated Highways. They have the same high capacity and high speed and are still the fastest automotive medium of intercity transportation.

Ground Highways share several downsides with Elevated Highways, too. Access is only available by onramps, and they chew up lots of otherwise revenue-generating real estate.

Where they differ, however, is in both the lesser building expense (one-third the cost of Elevated Highway segments) and their intersection with mass transit. Elevated Rail and Monorail tracks can cross Ground Highways at right angles and vice versa.

While it's easier to cross with these new networks, it's harder than with others. Streets and Train tracks, for example, can't cross a Ground Highway, and Roads and Avenues can only do so with large overpasses. Elevated Highways, by contrast, can intersect with all of these networks without using any extra tiles.

Ground Highways are cheaper than Elevated Highways, but crossing them via expensive overpasses devours tiles around the intersection.

Last, but not least, you can switch from Elevated to Ground Highway and back again by changing types and dragging from the end of an existing Highway.

DRAWING AND DRAGGING HIGHWAYS

Highways are now easier than ever to draw and extend. Select the kind of Highway you want to draw (Elevated or Ground). Place the square drawing indicator on the final row of squares on an existing Highway, click and hold, and drag in a straight line or in a permissible diagonal.

NOTE

Think of the new Highway extension system as grabbing the loose end of the Highway and stretching it.

Place the drawing square over the outermost tiles of the existing Highway…
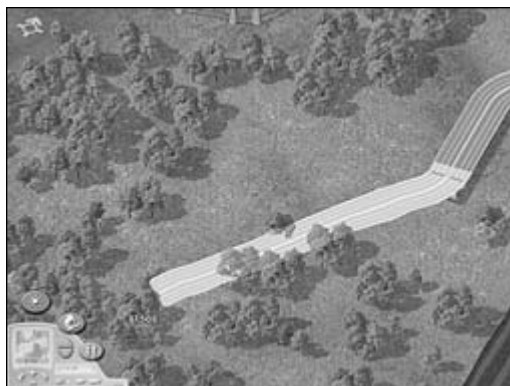
…and drag to extend.

CLOVERLEAFS AND T-INTERSECTIONS

Connecting Highways to each other requires some major (and expensive) engineering. With several changes and new additions, however, it doesn't have to be difficult.

Formerly, whenever you crossed two Highways, you were offered the chance to build a Cloverleaf or let one Highway pass under the other. If you declined the Cloverleaf, you could always add it later, selecting it from the Build Highways & Ramps menu and dragging it over the intersection, where it was popped automatically into place. You couldn't, however, place a Cloverleaf first and draw Highways from it.

Rush Hour changes some of this. When crossing two Highways of the same kind (Ground to Ground or Elevated to Elevated), the system still works the same. Now, however, you can begin with the Cloverleaf, placing it wherever you like and drawing Highways from it.

The Cloverleaf is no longer the only interchange option. You may now use a T-Intersection, at which one Highway ends (rather than crosses) at another. As with Cloverleafs, T-Intersections may only connect Highways of the same type.

Cloverleafs can be placed before Highways.
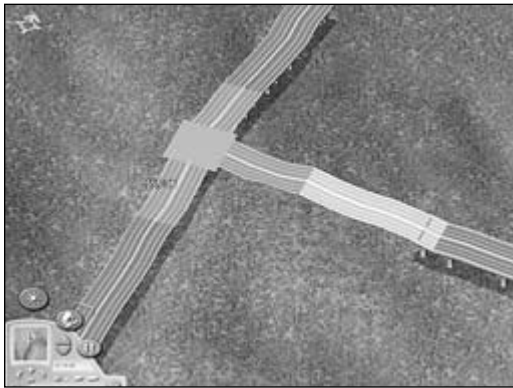
When Highways collide in this arrangement…
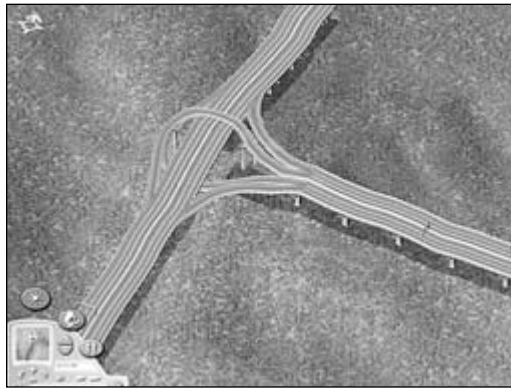
…you can make a new T-Intersection.

The orientation of a Cloverleaf or T-Intersection dropped in isolation is controlled via the keyboard:

- [Tab] switches between Ground and Elevated versions.
- [Home] and [End] rotate the interchange through its configurations.

HIGHWAY ACCESS

Getting onto a Highway can be tricky, but it's easier now thanks to a new onramp system and a new way to get into the fast lane.

When you cross a Highway (either Elevated or Ground) with a Road or Avenue, you have the option of inserting onramps. If you elect to do so, the Avenue gets both onramps at once while the Road requires you to choose whether you want each ramp independently.

If you decline the onramps, you can get an overpass now and add the ramps later. Elevated Highways make overpasses at no extra cost, while Ground Highways (where the Road/Avenue/Street/One-Way goes over the Highway) require a substantial extra expense.

As with interchanges, you can now draw any kind of onramp in any orientation before drawing the Highway. Pick the general type of onramp you want from the Build Highways & Ramps menu and orient it as you like:

You can now place onramps before drawing your Highways.

- Tab switches between Ground and Elevated versions and various networks that can cross (e.g., Road, Street).

- Home and End rotate the interchange through all its possible configurations.

You can now access Highways head-to-head, converting directly in-line from Avenue to Highway or vice versa. From the end of a Highway (either kind), select the Avenue tool and drag as if you were extending the Highway. An in-line ramp appears after you drag far enough. The expense (greater for Elevated Highways) is added to the cost of the Avenue. You can do this the other way, too, starting from an existing Avenue.

BUILD RAILS AND DEPOTS

Rail Stations are primarily for moving things and people in and out of your city, not around it. The stations are large and the rails require lots of ground. Plus, you now have the added risk of toxic spills from Freight Trains on underfunded tracks (see Simulation-Initiated Disasters in Chapter 37).

For getting freight from Industrial zones to the city's border, rails are a perfect solution. For commuters, however, they're slow. Subways are the best alternative, but at §154 per segment (nearly 20 times as much as a rail segment), the added efficiency is pricey.

Enter the Monorail! This ain't an amusement park, folks; this is state-of-the-art intercity transportation.

MONORAIL

- Traffic Capacity: 2,000 trips

- Used by: Monorail

- Max Speed: 200 kph

- Initial Cost per Segment: §100

- Cost per Month per Segment: §1

- Initial Station Cost: §500

- Cost per Month per Station: §20

The Monorail is the fastest means of intercity transportation. It's most economical and efficient when traveling over long distances with few stops. It's a bit pricey for travel within one city.

Monorails travel at high speed but are pricier than Elevated Rail.

Monorails are accessed via Monorail Stations your Sims can enter on foot (or by car if you have a Public Parking Garage nearby).

Monorail tracks are expensive (more than Elevated Rail tracks), but the Monorail's speed is outrageous, even faster than a Subway. Like Elevated Rail tracks, Monorail tracks follow the finicky and land-consuming rules of rails, making the Monorail a poor alternative for in-city commuting; you might as well use the cheaper Elevated Rail.

Subways are better in a single city because they don't use up surface land and because their stops occupy only a single tile. They are, on the other hand, very expensive per segment of track. The Monorail has the advantage of speed but at a lesser expense.

A Monorail is a good single-city choice if you need to cover a long distance with no or few stops between points A and B.

GRAND RAILROAD STATION

- Capacity: 10,000

- Initial Station Cost: §24,000

- Monthly Cost: §300

- Size: 10x6

The Grand Railroad Station is a transportation Reward building earned when:

- R and C population combined >172,000

- City contains at least one Small Rail Station near full capacity

The Grand Railroad Station operates like a Passenger Rail Station but at five times the capacity. Locate it in the center of a large job or population center so as many Sims as possible can depart the station and reach either a destination or mass transit station. Place a Bus Stop near the station and watch the commuters roll in (assuming there are other Bus Stops nearby).

MISCELLANEOUS TRANSPORTATION

Your land-based, non-rail mass transit tools have been consolidated here. This includes Bus, Subway, Elevated Rail, Parking, and Toll Booth tools.

ELEVATED RAIL

- Traffic Capacity: 2,000 trips
- Used by: Elevated Rail train
- Max Speed: 150 kph
- Initial Cost per Segment: §50
- Cost per Month per Segment: §1
- Initial Station Cost: §500
- Cost per Month per Station: §20

Elevated Rail is the cheaper alternative to Subways and the faster alternative to Passenger Rail.

Elevated Rail offers many of the benefits of a Subway system (rapid high-capacity transit) without the crushing per-segment track expense. It's harder to lay out than a Subway; you must run it above ground, and you can't make sharp turns. It is, however, cheaper.

What you get with Elevated Rails is the cheapest high-speed transportation available, not to mention a system that can link inexpensively with an existing or future Subway system. The Subway-to-Elevated Transition moves Elevated Rail track below ground (or Subway tracks above ground) to tie the two systems together. In essence, your Elevated Rail trains are just Subway trains riding above ground. A good use for these interlocking systems is if, for example, you want to run Elevated Rail tracks through a dense area or across a segment of Elevated Highway. Transition to Subway tracks, go under the difficult area, and re-emerge on the other side with another Subway-to-Elevated Transition.

NOTE

Bus Stops have moved from the Build Roads menu to the Miscellaneous Transportation menu.

PUBLIC PARKING GARAGE

- Capacity: 1,000 trips

- Used by: Cars, pedestrians

- Initial Cost: §150

- Monthly Cost: §5

- Size: 3x3

The Public Parking Garage is a very important addition to the *SimCity 4* transportation system. Previously, one of the big limitations on mass transit was that Sims would only take the Bus or the Subway if it was in walking distance. Why? The stations had nowhere to park cars. Since Sims can't abandon their vehicles while they go to work, they had no choice but to drive the rest of the way or use a slow Passenger Rail Station (which has parking).

The Public Parking Garage allows car-bound Sims to switch to mass transit.

The Parking Garage changes this. If you place one in contact with a Road, then place Bus, Subway, Elevated Rail, or Monorail Stations nearby, many Sims will drive to the garage, park, and walk to one of the mass transit stations.

TOLL BOOTH

- Capacity: 60 percent of network capacity

- Used by: Cars, Freight Trucks

- Initial Cost: §200

- Monthly Cost: §10

- Size: 1x2 or 2x2

The toll booth is good way to bring in some extra cash from your asphalt transportation systems. You can place Toll Booths on:

- Roads

- Avenues

- Ground Highways

- Elevated Highways

Make 'em pay to come and go with the new Toll Booth. Beware, however, the congestion they cause.

To build a Toll Booth, there must be two tiles of straight, non-intersection asphalt on either side of the booth.

Seems like a pretty good deal, huh? Just put a booth down on your busiest thoroughfares and rake in the cash (§0.10 per car). Not so fast!

The cost of this added lucre is congestion; traffic must slow down to enter the booth, pay the toll, and move on. In more technical terms, traffic is slowed by the booths' lower capacity (60 percent of the network it's using). For example, a stretch of Highway has a capacity of 4,000 trips. The two tiles of the Toll Booth, by contrast, can only handle 2,400 trips. Anything above this amount causes slowdowns (see the table Congestion vs. Speed in Chapter 19).

That's not all; like a transit station, the Toll Booth requires a time penalty (a "switch cost") to cross through it. Toll Booths also count as intersections, requiring approaching and departing vehicles to reduce speed on the booth tiles themselves and on the two tiles each before and after the booth (see Intersections, Chapter 19). Still sound like money for nothing?

WATER TRANSPORTATION

Formerly the Build Seaports menu, the Water Transportation menu contains all three buildings concerned with boats. The Seaport is still here, but so, too, are a new water-based transportation network and a Reward building with all sorts of power.

FERRIES

- Traffic Capacity: 1,000 trips
- Used by: Passenger Ferry/Car & Passenger Ferry
- Max Speed: 96 kph
- Initial Station Cost: §150/§300
- Cost per Month per Station: §10/§20

Bridges are expensive. There must be a better way to cross large bodies of water. Enter the Ferry Boat! This wonder of modern city dwelling can carry either pedestrians or cars across large bodies of water to distant shores where, upon landing, they resume their happy trek to work in the same way they boarded.

Ferries come in two kinds: Passenger Ferries and Passenger & Car Ferries.

The Ferry Boat is a less expensive way to get your commuters across the water, even the ones on foot.

The trickiest part is building them. Like Seaports, they must be part on land and part on water at the right elevation. You may need to do some ad hoc landscaping to clear a suitable area. After that's done, link up some Roads (both Road connections in the Passenger & Car Ferry Terminal must touch transportation).

For a ferry system to operate for pedestrians, there must be at least two Ferry Terminals of a single kind; a single Passenger Ferry Terminal won't have anywhere for its Ferry Boats to go no matter how many Car & Passenger Ferry Terminals there are. The matching terminals don't, however, have to be in the same city. If there are other cities on a contiguous body of water, ferries will route off the map and connect to them.

NOTE
There can only be 16 of each type of Ferry Terminal in a single city.

MARINA

The Marina isn't a station for any actual transportation; it's a nice bauble that complements your waterside city's transportation system. Its main function is to trigger several U-Drive-It missions and vehicles (see Chapter 33). You can even have more than one Marina in your city, making it unique among Rewards.

The full skinny on the Marina is in Chapter 35. To get this structure, you must boast:

- Combined R§§ and R§§§ >18,000
- Mayor Rating >53
- City of greater than 25 percent water

Earn the Marina and the world of water recreation opens to your city.

NEW TRANSPORTATION ELEMENTS STATS AND TABLES

Transit Switching Costs, Transfer Modes

	Cost (in minutes)	Transfer From	Transfer To
Toll Booth	0.2	Car	Car
Monorail	0.05	Walk	Walk
Elevated Train	0.05	Walk	Walk
Car & Passenger Ferry	0.05	Walk, Car	Walk, Car
Passenger Ferry	0.05	Walk	Walk
Public Parking Garage	0.2	Car, Walk (evening)	Car, Walk (evening)

BRIDGES

In the past, you were forced to accept the kind of bridge dictated by the length and altitude you had to cross. No more.

With the new Bridge Selection tool, you can choose from a variety of bridges for any situation. Whenever you drag a Road, Avenue, Highway, Rail, Monorail, or Elevated Train over a body of water in a straight line and reach buildable land on the opposite shore, the line you're drawing changes from red to a basic bridge. Let go of the button and you'll see the new Bridge Selection tool.

The new Bridge Selection tool gives you several choices for all your bridge-building needs.

TIP

If you have any intention of using ferries, build any bridge tall enough for them to pass under. If a bridge is too low, nudge its height up until the ferry symbol shows "Height is OK for Ferries."

Here you can choose the type of bridge, adjust its height, and see its total cost and whether it's tall enough to permit ferry traffic. Not all transportation networks have multiple selections; Monorail and Elevated Train tracks have only one bridge type each, but you can use the tool to nudge the bridge's elevation if necessary.

TRANSPORTATION INFORMATION

So you've met your new networks and tools. You've become acquainted with the under-the-hood changes brought about in *Rush Hour*. The most important part, however, is how to "read" your traffic system to fix problems and stop them before they start. Here's an exhaustive profile of your informational tools.

YOUR EYES

You can tell by looking at your city if you have a problem with traffic. The traffic you see on the ground and on the rails is an accurate reflection of relative traffic volume that's directly tied to the simulation.

It's also tied to the clock (the one you see when you point to the city date) and the day/night cycle (if you have it activated); traffic is heaviest in the morning and evening, traveling in the directions of rush-hour traffic. When the clock reads 7 a.m., heavy traffic travels along a bridge in one direction. At 6 p.m., the volume returns the other way.

If you spy a traffic jam, there's too much congestion.

Zoom in and check out your intersections, side streets, highways, bridges, or anywhere there's traffic. If you see a long line of cars backed up on a Road, it might be time to upgrade that Road to an Avenue or expand your transit system.

TRAFFIC PILE-UPS

A visual clue that a traffic congestion problem has gone beyond what your Sims will tolerate is the occurrence of pileups. Pileups occur only at intersections with high congestion, and the probability of pileups rises with volume.

If you see cars crashing or hear the telltale smashing noises (noticeable at close zoom levels), you should have fixed something a long time ago. It is, however, never too late.

See Chapter 37 for full details on the Traffic Pileup Disaster.

ROUTE QUERY

Your most detailed tool in traffic diagnosis is the Route Query. Located on the Mayor Mode control panel below the Query tool, the Route Query gives you another probe for checking the health of your city.

Point to a building or a transportation network segment (e.g., a block of road or an intersection) with the Route Query tool and you'll see a pop up of the types and number of trips arriving at or departing from it. What you see, however, depends on what you're pointing at:

Use the Route Query to point at buildings and you'll see what kind of and how many trips pass through them.

> **NOTE**
>
> When reading the Route Query pop-ups, note that Sims arriving or leaving as pedestrians are the ones who took the entire trip on foot. If they walk to or from mass transit, they show up in the pop-up as having taken whatever mass transit they walked from.

- Residential (green): Number of commuters leaving that building in the morning or arriving in the evening by car or on foot or by mass transit (via walking).
- Commercial (blue): Number of workers arriving in the morning or departing in the evening and by what means they arrived.
- Industrial (yellow): Number of workers arriving in the morning or departing in the evening and by what means they arrived. Also shows the number of Freight Truck trips departing in the morning.
- Civic/Utility (orange/light blue/red): Number of workers arriving in the morning or departing in the evening and by what means they arrived.

- Transportation Buildings (pink): Commuters arriving and departing the station listed by means. The number of pedestrians is the number of Sims who began their trip on foot with the transportation buildings as their first stop. If they came directly from another transportation building, they are counted by that mode, not as a pedestrian.

- Transportation Network Segment: Any Road, Highway, Rail, tunnel, track, bridge, onramp, Street, Avenue, interchange, or One-Way Road can be Route Queried to see the number of trips traversing it.

That's only part of what the Route Query can do. Click on a building for the big payoff. You can see graphically every trip arriving at or departing from a building, the route it takes, where it came from, and by what mode (or modes).

For more detail, click on a building and see where those trips go.

NOTE

One arrow can represent several trips of the same kind. The darker and more opaque the arrow, the more trips it represents.

This information is infinitely useful. Here are a few examples of what Route Queries can tell you:

- Where Sims work and how they get there. Compare this to their Commute Time listing (via the normal Query tool) to see if you need to find them a faster way or move more workplaces closer to them.

- Find out how and to where an Industrial building is exporting its freight. Compare this to the Freight Trips rating (in the normal Query Tool) to see if you need to provide better road or rail systems.

- Analyze how a transit station is attracting Sims, how they're arriving, and where they're coming from. For example, you may put an Elevated Rail Station in a R§§§ neighborhood and find that no one's using it. Since R§§§ Sims prefer to use their cars (see Chapter 19, Transportation Mode), only a few of them will walk to a transit station. Try plopping a Public Parking Garage next to the station and see if the rich Sims drive to the garage and switch from there to Elevated Rail.

- See how overtaxed a busy intersection is by Route Querying its central tile.

- Gauge how widely you can space Bus Stops by querying one and seeing how far Sims are willing to walk to or from it. Find the outer reaches of the stop's use and place another Bus Stop beyond that. This distance varies by situation, however, because the farther your Sims had to travel before reaching the Bus Stop dictates how far they can go after they arrive.

- Query Industrial and Commercial buildings to determine where their workers are coming from. If lots of buildings nearby have no workers, you may have found the outer limit that your Sims are willing to commute. Provide other, faster or shorter means and the other buildings will likely fill, too.

- Find transit stations, highways, onramps, etc. that aren't getting any use. If you can't determine the reason (e.g., no road leads to them, etc.), demolish them; they're costing you money and providing nothing in return.

N O T E

Freight trips never come into a city. Even if you know that freight trips are going from your neighbor city to yours, you won't see those incoming freight trips in the Route Query. Also note that all freight goes out in the morning commute so you won't see any freight trips in the evening commute.

N O T E

Sometimes you may see a Sim arrive by car at something that you know can't accept car traffic (e.g., a Bus Stop). That's not a mistake—it's an employee. Even transit buildings have workers, so such anomalous-looking trips are normal.

TRAFFIC VOLUME GRAPH

This new graph is handy for looking at trends in your city's various transportation systems.

The Traffic Volume Graph shows, with nine color-coded lines (for Pedestrian, Car, Bus, Subway/Elevated Train, Freight Train, Freight Truck, Passenger Train, Ferry, and Monorail), how many trips are occurring and have been taken on each kind of transportation.

Route Query a Road to find out from where your traffic's coming.

You can learn a lot about your mass transit system by Route Querying various stations.
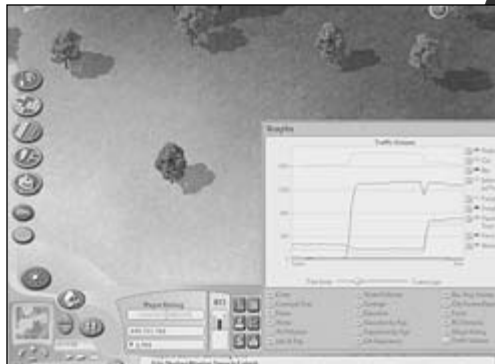
The Traffic Volume Graph lets you see trends in your city transportation system.

Here you can see, for instance, the effect of introducing a large-scale bus system. If all goes according to plan, the Car line should decline as the Bus line climbs. If, on the other hand, you introduce a public transit system and your Car traffic fails to decline, something's gone wrong. Time to whip out the Route Query and investigate.

You may toggle each line on and off to isolate transportation systems that interest you, and, as with most graphs, you can change the time scale to get a more historical view.

TRAFFIC DATA VIEW

The Traffic Data View isn't new, but it has gained enhanced functionality.

First, it still shows you, via color coding, the amount of congestion on your traffic networks. You can view this on the expanded Data View map or on the ground in your city itself. Find the red Streets, for example, and you'll know which need upgrading to Roads.

Second, you can switch the Data View instead to show traffic volume. The amount of volume is shown on each network independently (push the button for the network you want to see) in color coding from white (low volume) to dark blue (high volume). Moving dots on the overhead map show you the direction of the traffic flow. The toggle button for the evening commute shows the different volumes and directional flow for the journey home.

The Traffic Data View has two parts. The first is the familiar congestion view showing where traffic is in trouble.

The new Volume View lets you see how much of each kind of transportation you have and how it flows.

TRANSPORTATION BUDGET

Transportation can bring Simoleons in and send them out. Don't, however, get grand notions of making a profit off of tolls and fares; they're only meant to defray your costs, not exceed them.

INCOME

The first change to the Transportation Department budget is an addition to monthly income. All tolls collected at Toll Booths (§0.10 per car) are included on this line and added to the sum total of fares collected by your mass transit stations.

Fares work differently. Sims are charged §0.001 per tile traveled on mass transit (Bus, Passenger Rail, Subway, Elevated Rail, and Monorail) plus §0.01 for each trip taken on a Ferry Boat. The longer the trips, therefore, and the more Sims who utilize mass transit, the more money this'll bring in.

EXPENSES

On the expense side, there are a few largely cosmetic changes. Road Maintenance is now called "Road Services" and includes the new traffic elements and the building costs of all Toll Booths.

The Mass Transit section has changed to add the new Elevated Rail and Monorail maintenance costs. Their corresponding station maintenance costs are rolled into the existing Building Maintenance line.

SIGNS AND LABELS

With all the new toys and tools at your fingertips, you have more ways than ever to make your city your own. Now you see that the shape of your city is dictated by transportation.

What better way, therefore, to make it your own than with a fully labeled and signposted city? You can, of course, lay labels and signposts anywhere in your city, but their most effective use is to mark special locations and major traffic arteries.

To place a label or sign, go to the Landscaping Tools menu and choose Signs & Labels. Pick which you want to use and choose a location.

CAUTION
The Signs & Labels menu also contains buttons to toggle signs and labels, and buttons to delete them with a special-purpose bulldozer. Don't use the regular bulldozer or you'll destroy whatever's under the label or sign.

After you click on the location, enter the name you choose. Once placed, you can edit signs and labels by double-clicking on them with the Place Label or Place Sign tool (respectively). You can also delete a sign or label by double-clicking on it with its tool and pressing the Remove button.

To rotate a sign or label, use the Place Sign or Place Label tool, click and hold on the sign or label, and press Home and End to rotate it by one-eighth turns counterclockwise or clockwise, respectively.

To move a sign or label, click and hold with the Place Sign or Place Label tool and drag it to a new location. Release the mouse button to finish the relocation.

U-DRIVE-IT

U-Drive-It is a new gameplay mode that puts you behind the wheel of dozens of vehicles on the streets and tracks of your city, in the skies above, and on the waters around it. But there's more to it than just getting to be one of those cars among the masses; U-Drive-It features more than 75 missions that can affect your city's coffers or even its well-being, and net you otherwise hard-to-earn Rewards.

This chapter takes you through the mechanics of this new mode and into the heart of each mission.

U-DRIVE-IT EFFECTS

U-Drive-It is about more than fun and the wind in your virtual hair; you can affect your city with your choice of mission and skill in completing it.

Each mission comes with a set of consequences for both success and failure. Either result can be good or bad depending on the alignment of the mission.

A mission's alignment should be obvious from its description. You can be sure, however, that if the insidious Dr. Vu is involved, there's dirty work afoot.

Except for training missions, all U-Drive-It missions have an alignment, either good or evil. The mission alignment should give you an idea of what kind of consequences will result from the mission.

The alignment of several missions dictates what prize you receive. For example, the Deluxe Police Station Reward is unlocked in U-Drive-It Mode only by completing four good Police Car missions. Doing evil Police Car missions won't hurt your quest for this building; it just won't count in favor of it.

Likewise, the Area 5.1 Business Deal and Space Port Reward are unlocked by a series of oppositely aligned but alternative missions. You can pursue both paths and both Rewards, of course, but only the good or evil ones will get you to the corresponding structure.

MAYOR RATING AND DESIRABILITY

Mayor Rating and desirability are crucial factors in many of the U-Drive-It missions. Success or failure at a mission can cause an increase or a reduction in the local Mayor Rating and (indirectly) desirability at the location where the mission ended.

TIP

You can't always control where a mission ends, but do so when the mission allows. This lets you target areas of low Mayor Rating/desirability for a short-term fix.

Behold the white glowing orbs of hard-won Mayor Rating!

And just look at what that did to the house across the street. They love you!

These Mayor Rating effects are short-term, wearing off about 25 percent per month, and they have a radius that varies based on the mission's difficulty and alignment; generally, the magnitude and radius of the failure Mayor Rating reduction are half those of the positive outcome. See Chapter 16 for more details about short-term Mayor Rating effects.

Desirability is also affected because, as outlined in Chapter 31, short-term Mayor Rating is now a factor in desirability. Thus, if there's a change in short-term Mayor Rating, there will be a proportional temporary shift in desirability.

Another way to affect Mayor Rating/desirability in U-Drive-It is in Free Drive: Throwing Money. If you tootle around in the Mayor's Limo, you can throw money to the masses by pressing and holding [Spacebar]. This money comes out of your city treasury, but the hoi polloi will be impressed. If, therefore, you see a riot-ready area of low Mayor Rating, take a spin in the Mayor's Limo and toss the folks some cold hard cash.

Throwing money away? Not entirely; there's a hefty Mayor Rating boost in store for generous mayors.

MONEY

Many missions offer a monetary Reward that drops into your city coffers if you successfully complete the mission. These bonuses make it worthwhile to pursue these missions.

Each mission is unique in the money amount offered for it. The most lucrative ones are the missions that force you to damage your city (i.e., reduce Mayor Rating, destroy key buildings, etc.). In other words, the evil missions pay better than the good.

Many missions cost you money if you fail. This amount is less than the potential Reward for success, but is still a painful sum. The lesson: Practice before you take on missions.

REWARD UNLOCKS

Most missions provide an alternative means of unlocking many of the game's Reward buildings. Want the Hydrogen Power Plant but don't want to wait until you get a big High-Tech population? Complete the Cripple City Industrial Complex mission, and it's yours right now!

Reward Buildings Unlocked by UDI Missions

Reward Building	UDI Mission(s)	Required Vehicle(s)
Advanced Research Center	Take Out Dr. Vu's "Secret" Lair	Military Helicopter
Area 5.1	Sell Secret Rocket Formula, Pure Evil Ice Cream, Spread Zombie Dust	Steam Train, Ice Cream Truck, Crop Duster
Army Base	Simlent Orange	Hearse
Bureau of Bureaucracy	Mayor's Got New Socks	News Van
Cemetery	Goo for the Masses	Toxic Waste Truck
City Hall	You CAN Throw Money at It	Mayor's Limo
City Zoo	Water Drop for Fire	Fire Plane
Convention Center	Sick Bus Driver	City Bus
Country Club	Rare Fish Viewing	Yacht
Courthouse	Shady Ambulance Driver	Ambulance
Cruise Ship Port	Waterproof Mind Control Device	Speed Boat
Deluxe Police Station	Any four "good" Police Car missions	Police Car
Disease Research Center	Slipped on Llama Dung	Ambulance
Farmer's Market	Farmer's Got Vermin	Crop Duster
Federal Prison	Uncle Vinnie Asks a Favor	Garbage Truck
Fire Department Landing Strip	Complete Fire! three times	Fire Engine
Grand Railroad Station	Train Station Tour	Freight Train
House of Worship	Get the Deceased to the Funeral	Hearse

Reward Buildings Unlocked by UDI Missions continued

Reward Building	UDI Mission(s)	Required Vehicle(s)
Hydrogen Power Plant	Cripple City Industrial Complex	Jet Fighter
Lighthouse	Here Fishy, Fishy, Fishy	Fishing Boat
Major Art Museum	SOS	Tug Boat
Major League Stadium	Who Loves You, Baby?	Sky Writer Plane
Missile Range	New Missile Testing	Tank
Movie Studio	Dr. Vu Gets a Tank	Tank
Nuclear Power Plant	Study for Profit	School Bus
Opera House	Scientist Late for Flight	Taxi Cab
Private School	Get Little Binghampton to School	School Bus
Radio Station	Cover the Hostage Crisis	News Helicopter
Resort Hotel	Rx Pick-Up and Delivery	Speed Boat
Solar Power Plant	Monorail Ride	Monorail
Space Port	Train Ride for Rocket Formula, Super Seatbelt Fabric for Space Ships!	Steam Train, Freight Train
State Fair	Ice Cream Delivery	Ice Cream Truck
Stock Exchange	Mmm…Endangered Dinner	Fishing Boat
Television Studio	Catch the Crook from the Air	Police Helicopter
Tourist Trap	Whistle Stop Tour	Passenger Train
Toxic Waste Dump	A Special Load of Garbage	Garbage Truck
University	Organs for Profit	Medical Helicopter

This back door is useful for the elusive Area 5.1 Reward. Since one of the Reward's requirements is that the city be at Hard difficulty level, players on Easy and Medium can only get Area 5.1 via U-Drive-It.

HOW TO GET MISSIONS

To joyride through your city, you must know how to get in the car (boat, bus, plane, etc.). There are several doorways into U-Drive-It Mode.

MISSION INDICATORS

With the *Rush Hour* expansion pack installed, notice that some vehicles have a gray button floating above them as they move. These are Mission Indicators, and they tell you that that vehicle can get you into a U-Drive-It mission.

Click on the Mission Indicator to see (in a dialog box) which activated mission that vehicle can play. If the mission presented isn't the one you want, either click on the What's My Alternative link (if there is one) or press Cancel and click on the

Mission Indicators tell you that there's a vehicle with a mission waiting for you. Click on it to find out what the mission entails.

Mission Indicator again to bring up another available mission. If there's only one mission available for a vehicle, pressing Cancel makes that mission unavailable for a very short time; be patient, it'll come back.

TIP
If there are no activated missions for a vehicle, it doesn't show a Mission Indicator. That doesn't mean you can't drive it, however. Go instead to U-Drive-It in My Sim Mode to select any unlocked vehicle for Free Drive.

The various Mission Indicators signal the class of mission. There are indicators for police vehicles, helicopters, airplanes, boats, and tanks (to name a few). Most vehicles, however, carry a generic "car" logo; zoom in closer to see to what kind of vehicle it's pointing.

TIP
You can turn off the Mission Indicators via the Mission Indicators On/Off toggle. This control is in My Sim Mode under the U-Drive-It menu.

CHOOSE U-DRIVE-IT VEHICLES

The simplest way into a mission is through the U-Drive-It Vehicles menu in My Sim Mode. This menu contains submenus for land, sea, and air vehicles and a button to turn on and off Mission Indicators (see Tip).

The U-Drive-It menu gives you quick access to every unlocked vehicle and a preview of what you haven't earned yet.

In each submenu, all unlocked vehicles are shown in thumbnail. All locked vehicles are grayed out, and their requirements are shown in pop-up. If a yellow box surrounds a vehicle's picture, there's an activated mission for that vehicle. If there's no yellow box, you can drive the vehicle only in Free Drive fashion.

When you click on a yellow-boxed vehicle, a dialog box for one of its activated missions appears. You may accept this mission, switch to a designated alternative mission, drive the vehicle freely, or cancel the mission offer. When a vehicle (like the Police Car) has several possible missions, you can see others by pressing Cancel and reselecting the vehicle. If there are no other available missions, the yellow box and the ability to select the vehicle's missions will be temporarily disabled. Wait a few minutes and they'll return.

High Roller in Town

Franky Bigbucks wants to build a casino in Newcastle. The site he's picked just happens to be an ancient Sim burial ground. Drive him around the area to check out the site. Better hurry before he changes his mind.

<u>What's my alternative?</u>

If you are successful:
Mayor Rating: -40
Cash: +20000

| Accept | Free Drive | Cancel |

Find out what the mission is about, what the Rewards are, and if there's an alternative version. If you want the mission, click Accept.

ALTERNATIVE MISSIONS

Many missions have designated alternative missions you can select via the What's My Alternative link in the mission dialog. Clicking on it takes you to the mission dialog box for the alternative mission. You can switch to the original mission by clicking the What's My Alternative link again.

Alternative missions often involve the same vehicle in an oppositely aligned mission. A good mission like Help the Cats, for example, has as its alternative the evil mission Hose Down the Cats. One gives you positive compensation for completing the mission; the other offers negative effects.

In some cases, the only easy way into a mission is via the alternative link. For example, Freedom of Expression isn't tied to any specific vehicle you can select from the Choose U-Drive-It Vehicles menu (it's a random car chosen by a car thief). The easy way into the mission is to access the Police Car mission Nab the Car-jacker and click on the What's My Alternative link.

NOTE
You can also find Freedom of Express if you click on a stolen vehicle's Mission Indicator. You can do this purposefully if you consult the crime data view to see if there are any car thefts this month. If there is one, find it on the map to see the Mission Indicator pop up as the thief snatches the car.

MY SIM CARS

Some land-based missions involve your My Sims. These missions are only available if you have My Sims, and which mission you get is dictated by the Sim's wealth level.

You activate My Sim U-Drive-It missions by clicking on My Sim, then on his or her Transportation pane. Click Drive My Sim's Vehicle and any available mission will appear in a dialog box.

My Sims can go on U-Drive-It missions, too. Click on Drive My Sim's Vehicle to see where they can go.

TIP

You can specify what kind of car your My Sim drives by clicking on Choose My Sim's Vehicle and selecting from any car of the Sim's wealth level or lower. This is the car he or she'll use in all U-Drive-It missions and vehicular dispatches (see Chapter 32).

GENERAL U-DRIVE-IT CONTROLS

Several navigational controls work regardless of vehicle type.

Using ⊞ and ⊟ on your vehicle console or keyboard, you can zoom in and out. The zooms you can use, however, depend on the type of vehicle. Cars (including the Tank) and boats allow zooms 4–6. Planes and trains allow 3–6.

The timer and controls for the specific vehicle you're driving appear in the upper-right corner.

Inset into your vehicle console is a miniature map of your city. You can rotate this map and your entire view by pressing [Page Up] and [Page Down].

![TIP airplane icon] **TIP**
While the map is useful, your best guide is to know your city well. Strategically placed signs and name labels for major streets come in handy in these missions, so liberally use these personalization tools. See Chapter 32 for more.

Use your map inset and the red-and-white directional indicator (in the upper-left corner) to find your next destination.

On the map, a flashing red dot marks your destination. A white box (indicating the extent of your view) shows your position.

Your best guide to your destination, however, is the blinking directional indicator. This red-and-white floating signpost points in the direction (as the crow flies) of your current destination. The closer you get, the faster the indicator blinks.

TIME LIMITS

Each goal in a U-Drive-It mission has a time limit. The timer is shown in the upper-right corner, counting down the time for the current mission goal.

If you fail to achieve the current goal before time runs out, the mission will be a loss. These times are scaled to the distance to the target, so a mission undertaken in a large city will offer more time than the same one in a small city.

Keep in mind that this limit refers to the current goal within the mission, not the mission as a whole.

CRASHING AND DAMAGE

If you crash into other vehicles, your ride sustains damage. Amass enough damage (distinct to every vehicle) and it'll explode, causing a mission failure and any penalty the mission dictates. If you see smoke billowing out of your vehicle and the damage indicator above it is yellow then red, it's getting banged up; drive carefully.

![TIP airplane icon] **TIP**
If you've taken too much damage, it's better to surrender than take the penalty for a failed mission. If smoke is pouring out of your vehicle, press [Esc] and start over.

FIRE DISPATCHES

Tired of sitting on the sidelines while your brave firefighters battle with the hungry blaze? No more, thanks to U-Drive-It!

TIP
The fastest way to do this is to first dispatch the fire vehicle, let it get most of the way to the fire, then activate the mission in U-Drive-It. This guarantees a quick trip to the fire because the truck you take over will be the dispatched one.

When a fire breaks out, head not for the fire dispatch, but instead for the U-Drive-It menu. Pick the Fire Engine from the Earned Land Vehicles menu and, if there's a fire burning, you'll receive the mission "Fire!" The mission will direct you to put out the fire burning in your city. Race to the scene and use the fire crew controls to spray the fire.

NOTE
Any low-funding incompetence you'd see in any underfunded fire dispatches won't show when it's you holding the hose. Your fire crew is just as competent at full funding or none.

The same applies if you have the Fire Department Landing strip. You can go to the Fire Plane in U-Drive-It to get the "Water Drop for Fire" mission or, alternatively, "Let it Burn!"

Though there's no mission attached to it, you can use U-Drive-It to take care of toxic spills, too. Pick the Fire Engine in Free Drive mode and navigate to the spill (no directional indicator will be there to help).

U-DRIVE-IT VEHICLES

The number of vehicles at your disposal is epic. Whether it's by land, sea, or air, there are plenty of ways to get around SimCity.

LAND VEHICLES

Land vehicles include three classes of transport, each with its own training mission: road, rail, and tank. Each type has its own Mission Indicator icon.

NOTE
Because there are so many police missions, all police vehicles carry a special Police Car Mission Indicator.

Driving land vehicles is simple: speed up, slow down/reverse, turn right, or turn left. Many vehicles have special controls, too. For example, emergency vehicles can activate their sirens, causing nearby cars to pull out of their way. Tanks have several other controls for aiming and firing their weapons; all other land vehicles are unarmed.

NOTE

Any weapon-firing vehicles have indicators for ammo count; if you run out of ammo, you can't finish the mission. The tank also has an indicator for shot power.

Cars and tanks can drive on-road or off (switch to and from Snap to Roads by pressing Shift). When on-road, vehicles can turn only when they encounter intersections. You can hold the turn button ahead of time (listen for the turn signal sound) to tell the car to turn at the next opportunity. When off-road, you can drive freely on the streets (in either lane), over corners, through empty lots, and on the curbs.

NOTE

It takes practice, but driving with Snap to Roads off is more effective. Instead of waiting behind other vehicles, you can zoom around them; this saves precious seconds.

When driving off-road, road vehicles slow when driving anywhere but on pavement (or on rails, but that's a secret). Tanks, on the other hand, can maintain full speed on grass or other off-road terrain.

Riding on the grass doesn't bother the Tank. Full speed ahead!
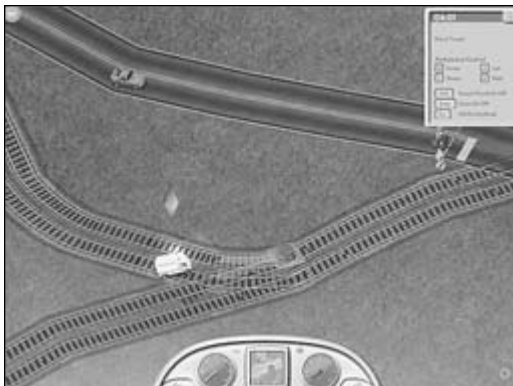
If you can avoid the trains, driving road vehicles on rails is a great way to avoid traffic.

TIP

The Snap to Roads On/Off indicator is in the lower-right of any road vehicle's console.

Trains are a different matter. They don't intentionally drive off-track, off-road, or off-anything for that matter. The trick to driving trains is to not drive them too fast; excessive speed causes derailments. You need an extensive rail system in place to have any fun driving a train; practice flipping rail switches and learn the quickest way to each station.

> **NOTE**
> Derailments can cause a **Toxic Spill Disaster** requiring a quick clean-up by fire department dispatch. See Chapter 37.

Drive a train at full throttle, especially around curves, and you'll go off the rails.

> **NOTE**
> Honking the horn doesn't help clear the roads ahead, but it does make the pedestrians flee in terror. And that's always fun.

POLICE CAR
- Requires: Small, Large, or Deluxe Police Station
- Special Controls: Siren, Bullhorn
- Missions: On the Trail, Disturbance Reported, Catch the Robbers, Shakedown, Nab the Car-jacker.

POLICE VAN
- Requires: Deluxe Police Station
- Special Controls: Bullhorn, Siren
- Missions: Cop Gone Bad

AMBULANCE
- Requires: Large Medical Center
- Special Controls: Siren
- Missions: Slipped on Llama Dung, Shady Ambulance Driver

FIRE ENGINE
- Requires: Any fire building
- Special Controls: Siren, Fire Crew, Aim Water
- Missions: Fire!, Hose Down the Cats, Help the Cats

SCHOOL BUS
- Requires: Elementary or High School
- Special Controls: Honk Horn
- Missions: Get Little Binghampton to School

CITY BUS
- Requires: 1 Bus Stop
- Special Controls: Honk Horn
- Missions: Sick Bus Driver, Dr. Vu Steals a Bus

GARBAGE TRUCK

- Requires: Landfill
- Special Controls: Honk Horn
- Missions: Uncle Vinnie Asks a Favor, A Special Load of Garbage

TOXIC WASTE TRUCK

- Requires: Toxic Waste Dump
- Special Controls: Toxic Spill
- Missions: Goo for the Masses

ARMY TRUCK

- Requires: Army Base
- Special Controls: Drill Sergeant
- Missions: Launch Time, Steal a Warhead

ICE CREAM TRUCK

- Requires: Residential structures
- Special Controls: Ice Cream Tunes On/Off
- Missions: Ice Cream Delivery, Pure Evil Ice Cream

NEWS VAN

- Requires: TV Station
- Special Controls: News Reporter
- Missions: Mayor's Got New Socks!, Paparazzi

GETAWAY VAN

- Requires: Commercial development
- Special Controls: Get Away Guy (Taunt)
- Missions: Escape with the Loot

TAXI CAB

- Requires: Landing Strip
- Special Controls: Honk Horn
- Missions: Scientist Late for Flight, Insane Taxi

MAYOR'S LIMO

- Requires: Mayor's House
- Special Controls: Throw Money
- Missions: You CAN Throw Money at It, High Roller in Town, Mayor Visits Landmark, Ribbon Cutting for Mayor

HEARSE

- Requires: Cemetery
- Special Controls: Honk Horn
- Missions: Get the Deceased to the Funeral, Simlent Orange

FREIGHT TRAIN

- Requires: Freight Train Station
- Special Controls: Honk Horn, Switch Control
- Missions: Super Seatbelt Fabric for Space Ships!, Train Station Tour

PASSENGER TRAIN

- Requires: Passenger Train Station
- Special Controls: Honk Horn, Switch Control
- Missions: Whistle Stop Tour, Hijack the Train

STEAM TRAIN

- Requires: Freight Train Station
- Special Controls: Smoke Stack, Train Whistle, Switch Control
- Missions: Train Ride for Rocket Formula, Sell Secret Rocket Formula

MONORAIL ENGINE

- Requires: Monorail Station
- Special Controls: Honk Horn
- Missions: Monorail Ride

TANK

- Requires: Army Base
- Special Controls: Barrel Up/Down, Barrel Power Up/Down, Aim Turret, Fire
- Missions: Tank Training Mission, New Missile Testing, Tank Joy Ride, Teach the Strikers a Lesson, Dr. Vu Gets a Tank

§ MY SIM VEHICLE

- Requires: § My Sim
- Special Controls: Honk Horn
- Missions: Run Some Errands, Knock Over Store, My Sim Wants to See….

§§ MY SIM VEHICLE

- Requires: §§ My Sim
- Special Controls: Honk Horn
- Missions: My Sim Goes Shopping, White Collar Crime, My Sim Wants to See….

§§§ MY SIM VEHICLE

- Requires: §§§ My Sim
- Special Controls: Honk Horn
- Missions: Take a Break at the Casino, My Sim Goes Gift Shopping, Took the Casino for a Bundle, My Sim Wants to See….

SEA VEHICLES

Water-going vehicles are easier to drive than land transport, but you must get used to the gradual turning and long stopping times (boats don't have brakes) that come with water navigation. Running aground or into bridges is a quick route to failure and the bottom of the sea; boats can't take much abuse.

MOTOR BOAT

- Requires: Marina
- Special Controls: Air Horn
- Missions: Water Escape

SPEED BOAT

- Requires: Marina
- Special Controls: Air Horn
- Missions: Rx Pick-Up and Delivery, Waterproof Mind Control Device

CIGAR BOAT

- Requires: Marina
- Special Controls: Water Ski
- Missions: Jet Ski Fiesta

FISHING BOAT

- Requires: Marina
- Special Controls: Air Horn
- Missions: Here Fishy, Fishy, Fishy;
  Mmm…Endangered Dinner

TUG BOAT

- Requires: Marina
- Special Controls: Pull Boat
- Missions: SOS

PASSENGER FERRY BOAT

- Requires: Passenger Ferry Terminal
- Special Controls: Air Horn
- Missions: None

FERRY BOAT

- Requires: Ferry Terminal
- Special Controls: Air Horn
- Missions: Whale Watching Tour,
  Ferry of Evil

YACHT

- Requires: Marina
- Special Controls: Air Horn
- Missions: Rare Fish Viewing

METAL WHALE

- Requires: Area 5.1 and Marina
- Special Controls: Water Spout,
  Fire Missiles
- Missions: Robotic Whale Destruction

AIR VEHICLES

Airborne vehicles are the most difficult to drive and come in two varieties: plane and helicopter (the UFO has the same flying behavior as a helicopter). Each type has its own training mission and requires lots of practice. After you get the touch, however, you're in for some fun. Keep your speed under control (it's easy to overshoot a target) and start your turns early. Watch the map or zoom out to gauge your proximity to your destination.

The hardest part of flying aircraft is knowing your position relative to the ground; the oblique angle of your view means your aircraft is not actually flying over the ground you think you see below it. Fortunately, each aircraft casts a shadow on the ground that's surrounded by a green circle. When a mission tells you to reach a location, make sure it's this circle, not your aircraft, that appears over the building.

POLICE HELICOPTER

- Requires: Deluxe Police Station
- Special Controls: Search Light, Bullhorn, Aim Search Light
- Missions: Catch the Crook from the Air, Disturbing the Peace

MEDICAL HELICOPTER

- Requires: Large Medical Center
- Special Controls: None
- Missions: Give Jenny a Hand, and a Heart; Organs for Profit

NEWS HELICOPTER

- Requires: TV Station
- Special Controls: News Reporter
- Missions: Cover the Hostage Crisis, Get the Perp's Story

SKY WRITER PLANE

- Requires: Landing Strip
- Special Controls: Cycle Colors, Sky Write
- Missions: Who Loves You, Baby?, Secret Sky Code

CROP DUSTER

- Requires: Landing Strip
- Special Controls: Chemical Spray
- Missions: Farmer's Got Vermin, Spread Zombie Dust

SKY DIVER PLANE

- Requires: Landing Strip
- Special Controls: Parachuter
- Missions: Infiltrate Dr. Vu's Secret Meeting, Skydiving Show at….

FIRE PLANE

- Requires: Fire Department Landing Strip
- Special Controls: Drop Water
- Missions: Water Drop for Fire, Let It Burn!

MILITARY HELICOPTER

- Requires: Army Base
- Special Controls: Fire Missiles
- Missions: Take Out Dr. Vu's "Secret" Lair, Raid on City

TIP

Many of the beweaponed vehicles offer another means of no-cost demolition of otherwise expensive-to-destroy buildings. Drive a Tank to your Casino, for example, and bring that thing down at no cost to the taxpayers.

JET FIGHTER
- Requires: Area 5.1
- Special Controls: Drop Bundle
- Missions: Cripple City Industrial Complex

UFO
- Requires: Area 5.1
- Special Controls: Abduction, Laser
- Missions: Blast-O-Ray, Alien Abduction for Fun and Profit

VEHICLE STRUCTURES

Vehicles are unlocked by the existence of structures. This list shows what you'll get with each vehicle-linked structure.

- Any Commercial: Getaway Van
- Any Residential: Ice Cream Truck
- Area 5.1: Jet Fighter, UFO, Metal Whale (if there's also a Marina)
- Army Base: Army Truck, Tank, Military Helicopter
- Bus Stop: City Bus
- Car & Passenger Ferry Terminal: Ferry Boat
- Cemetery: Hearse
- Fire Department Landing Strip: Fire Engine, Fire Plane
- Deluxe Police Station: Police Car, Police Van, Police Helicopter
- Elementary School/High School: School Bus
- Fire Station/Large Fire Station: Fire Engine
- Freight Train Station: Freight Train, Steam Train
- Landfill: Garbage Truck
- Landing Strip: Taxi Cab, Sky Writer Plane, Crop Duster, Sky Diver Plane
- Large Medical Center: Ambulance, Medical Helicopter
- Large Police Station: Police Car, Police Van
- Marina: Motor Boat, Speed Boat, Cigar Boat, Fishing Boat, Tug Boat, Yacht, Metal Whale (if Area 5.1 also exists)
- Mayor's House: Mayor's Limo
- Municipal or International Airport: Taxi Cab
- Passenger Ferry Terminal: Passenger Ferry Boat

- Passenger Train Station: Passenger Train
- Small Police Station: Police Car
- Toxic Waste Dump: Toxic Waste Truck
- TV Station: News Van, News Helicopter

MISSIONS

So you've got the know-how, you know the vehicles, and you know the buildings. What takes U-Drive-It over the top, however, is the long slate of missions that arise from these vehicles and buildings.

Here are all the vital stats attached to every mission so you'll know what you're getting into before you get behind the wheel.

> **N O T E**
>
> **You must complete training missions before missions using the same vehicle type become available. The training missions act, therefore, as implicit triggers to each mission of the same type (though they're not listed as explicit triggers in the summaries below).**

LAND MISSIONS

A SPECIAL LOAD OF GARBAGE

- Vehicle Required: Garbage Truck
- Difficulty: Hard
- Alignment: Evil
- Triggers: 1 Police Station, Commercial development, Landfill
- Success Result: Unlocks Toxic Waste Dump Business Deal, -80 MR/16 tiles, §70,000
- Failure Result: -40 MR/8 tiles, -§10,000
- Alternative Mission: Uncle Vinnie Asks a Favor

CATCH THE ROBBERS

- Vehicle Required: Police Car
- Difficulty: Hard
- Alignment: Good
- Triggers: 1 Police Station, Commercial population >50
- Success Result: 110 MR/32 tiles, §40,000, partial unlock of Deluxe Police Station
- Failure Result: -60 MR/16 tiles, -§5,000
- Alternative Mission: None

COP GONE BAD

- Vehicle Required: Police Van
- Difficulty: Hard
- Alignment: Good
- Triggers: Deluxe Police Station, Cs§ population >100
- Success Result: 110 MR/32 tiles, §40,000
- Failure Result: -60 MR/16 tiles, -§5,000
- Alternative Mission: Shakedown

DISTURBANCE REPORTED

- Vehicle Required: Police Car
- Difficulty: Easy
- Alignment: Good
- Triggers: Police Station, Residential population >50, partial unlock of Deluxe Police Station
- Success Result: 50 MR/8 tiles, §5,000
- Failure Result: -30 MR/4 tiles, -§2,000
- Alternative Mission: None

DR. VU GETS A TANK

- Vehicle Required: Tank
- Difficulty: Hard
- Alignment: Evil
- Triggers: Police Station, Residential population >50, Mayor's House, and Army Base
- Success Result: -80 MR/16 tiles, §70,000, unlocks Movie Studio Reward
- Failure Result: -40 MR/8 tiles, -§10,000
- Alternative Mission: New Missile Testing

DR. VU STEALS A BUS

- Vehicle Required: City Bus
- Triggers: 1 Bus Stop, Residential population >50
- Success Result: -60 MR/8 tiles, §20,000
- Failure Result: -30 MR/4 tiles, -§6,000
- Alternative Mission: Sick Bus Driver

ESCAPE WITH THE LOOT

- Vehicle Required: Getaway Van
- Difficulty: Hard
- Alignment: Evil
- Triggers: Deluxe Police Station, Commercial population >50
- Success Result: -80 MR/16 tiles, §70,000
- Failure Result: -40 MR/8 tiles, -§10,000
- Alternative Mission: None

FIRE!

- Vehicle Required: Fire Engine
- Difficulty: Medium
- Alignment: Good
- Triggers: Fire Station, Fire in progress
- Success Result: 80 MR/16 tiles, §10,000, successfully complete three times to unlock of Fire Department Landing Strip Reward
- Failure Result: -40 MR/8 tiles, -§3,000
- Alternative Mission: None

FREEDOM OF EXPRESSION

- Vehicle Required: Stolen Vehicle
- Difficulty: Hard
- Alignment: Evil
- Triggers: 1 Police Station, Commercial population >50
- Success Result: -80 MR/16 tiles, §70,000
- Failure Result: -40 MR/8 tiles, -§10,000
- Alternative Mission: Nab the Car-jacker

GET LITTLE BINGHAMTON TO SCHOOL

- Vehicle Required: School Bus
- Difficulty: Medium
- Alignment: Good
- Triggers: Elementary School, Residential population >50
- Success Result: Unlock Private School Reward, 80 MR/16 tiles, §10,000
- Failure Result: -40 MR/8 tiles, -§3,000
- Alternative Mission: Study for Profit

GET THE DECEASED TO THE FUNERAL

- Vehicle Required: Hearse
- Difficulty: Medium
- Alignment: Good
- Triggers: Cemetery, Residential population >50
- Success Result: Unlock House of Worship Reward, 80 MR/16 tiles, §10,000
- Failure Result: -40 MR/8 tiles, -§3,000
- Alternative Mission: Simlent Orange

GOO FOR THE MASSES

- Vehicle Required: Toxic Waste Truck
- Difficulty: Medium
- Alignment: Evil
- Triggers: Toxic Waste Dump, Residential population >100
- Success Result: Unlock Cemetery Reward buildings, -60 MR/8 tiles, §20,000
- Failure Result: -30 MR/4 tiles, -§6,000
- Alternative Mission: None

HELP THE CATS

- Vehicle Required: Fire Engine
- Difficulty: Medium
- Alignment: Good
- Triggers: Fire Station, Residential population >500
- Success Result: 80 MR/16 tiles, §10,000
- Failure Result: -40 MR/8 tiles, -§3,000
- Alternative Mission: Hose Down the Cats

HIGH ROLLER IN TOWN

- Vehicle Required: Mayor's Limo
- Difficulty: Medium
- Alignment: Evil
- Triggers: Mayor's House
- Success Result: Unlock Casino Business Deal, -60 MR/8 tiles, §20,000
- Failure Result: -30 MR/4 tiles, -§6,000
- Alternative Mission: Mayor Visits Landmark

HIJACK THE TRAIN

- Vehicle Required: Passenger Train
- Difficulty: Medium
- Alignment: Evil
- Triggers: Deluxe Police Station, Passenger Train Station, >30 Rails
- Success Result: -60 MR/8 tiles, §20,000
- Failure Result: -30 MR/4 tiles, -§6,000
- Alternative Mission: Whistle Stop Tour

HOSE DOWN THE CATS

- Vehicle Required: Fire Engine
- Difficulty: Medium
- Alignment: Evil
- Triggers: Fire Station, Residential population >500
- Success Result: -60 MR/8 tiles, §20,000
- Failure Result: -30 MR/4 tiles, -§6,000
- Alternative Mission: Help the Cats

ICE CREAM DELIVERY

- Vehicle Required: Ice Cream Truck
- Difficulty: Medium
- Alignment: Good
- Triggers: 2 Elementary Schools
- Success Result: Unlocks State Fair Reward, 80 MR/16 tiles, §10,000
- Failure Result: -40 MR/8 tiles, -§3,000
- Alternative Mission: Pure Evil Ice Cream

INSANE TAXI!!

- Vehicle Required: Taxi Cab
- Difficulty: Medium
- Alignment: Evil
- Triggers: Landing Strip, Residential population >50
- Success Result: -60 MR/8 tiles, §20,000
- Failure Result: -30 MR/4 tiles, -§6,000
- Alternative Mission: Scientist Late for Flight

KNOCK OVER STORE

- Vehicle Required: § My Sim Vehicle
- Difficulty: Hard
- Alignment: Evil
- Triggers: Police Station, Residential population >1, 1 § My Sim, Cs§ development
- Success Result: -80 MR/16 tiles, §70,000
- Failure Result: -40 MR/8 tiles, -§10,000
- Alternative Mission: Run Some Errands

LAUNCH TIME

- Vehicle Required: Army Truck
- Difficulty: Easy
- Alignment: Good
- Triggers: Missile Range, Army Base
- Success Result: 50 MR/8 tiles, §5,000
- Failure Result: -30 MR/4 tiles, -§2,000
- Alternative Mission: Steal a Warhead

MAYOR VISITS LANDMARK

- Vehicle Required: Mayor's Limo
- Difficulty: Easy
- Alignment: Good
- Triggers: 1 Landmark, Mayor's House
- Success Result: 50 MR/8 tiles, §5,000
- Failure Result: -30 MR/4 tiles, -§2,000
- Alternative Mission: High Roller in Town

MAYOR'S GOT NEW SOCKS

- Vehicle Required: News Van
- Difficulty: Easy
- Alignment: Good
- Triggers: Mayor's House, TV Station
- Success Result: Unlocks Bureau of Bureaucracy Reward, 50 MR/ 8 tiles, §5,000
- Failure Result: -30 MR/4 tiles, -§2,000
- Alternative Mission: None

MONORAIL RIDE

- Vehicle Required: Monorail
- Difficulty: Easy
- Alignment: Good
- Triggers: 2 Monorail Station, >20 Monorail tracks
- Success Result: Unlocks Solar Power Plant Reward, 50 MR/8 tiles, §5,000
- Failure Result: -30 MR/4 tiles, -§2,000
- Alternative Mission: None

MY SIM GOES GIFT SHOPPING

- Vehicle Required: §§§ My Sim Vehicle
- Difficulty: Medium
- Alignment: Evil
- Triggers: Residential population >500, My Sim §§§, Cs§§§ >2
- Success Result: -60 MR/8 tiles, §20,000
- Failure Result: -30 MR/4 tiles, -§6,000
- Alternative Mission: None

MY SIM GOES SHOPPING

- Vehicle Required: §§ My Sim Vehicle
- Difficulty: Medium
- Alignment: Good
- Triggers: Residential population >100, 1 My Sim §§, Cs§§ >2
- Success Result: 80 MR/16 tiles, §10,000
- Failure Result: -40 MR/8 tiles, -§3,000
- Alternative Mission: White Collar Crime

MY SIM WANTS TO SEE....

- Vehicle Required: My Sim Vehicle (§, §§, or §§§)
- Difficulty: Easy
- Alignment: Good
- Triggers: Residential population >1, 1 My Sim any wealth, and a Landmark
- Success Result: 50 MR/8 tiles, §5,000
- Failure Result: -30 MR/4 tiles, -§2,000
- Alternative Mission: None

NAB THE CAR-JACKER

- Vehicle Required: Police Car
- Difficulty: Hard
- Alignment: Good
- Triggers: Police Station
- Success Result: 110 MR/32 tiles, §40,000, partial unlock of Deluxe Police Station Reward
- Failure Result: -60 MR/16 tiles, -§5,000
- Alternative Mission: Freedom of Expression

NEW MISSILE TESTING

- Vehicle Required: Tank
- Difficulty: Easy
- Alignment: Good
- Triggers: Army Base
- Success Result: Unlocks Missile Range Business Deal, 50 MR/8 tiles, §5,000
- Failure Result: -30 MR/4 tiles, -§2,000
- Alternative Mission: None

ON THE TRAIL

- Vehicle Required: Police Car
- Difficulty: Medium
- Alignment: Good
- Triggers: Police Station, Commercial population >100, Residential population >50
- Success Result: Partial unlock of Deluxe Police Station Reward, 80 MR/16 tiles, §10,000
- Failure Result: -40 MR/8 tiles, -§3,000
- Alternative Mission: None

PAPARAZZI

- Vehicle Required: News Van
- Difficulty: Medium
- Alignment: Evil
- Triggers: Mayor's House, TV Station
- Success Result: -60 MR/8 tiles, §20,000
- Failure Result: -30 MR/4 tiles, -§6,000
- Alternative Mission: None

PURE EVIL ICE CREAM

- Vehicle Required: Ice Cream Truck
- Difficulty: Medium
- Alignment: Evil
- Triggers: 2 Elementary Schools
- Success Result: Partial unlock of Area 5.1 Business Deal, -60 MR/ 8 tiles, §20,000
- Failure Result: -30 MR/4 tiles, -§6,000
- Alternative Mission: Ice Cream Delivery

RIBBON CUTTING FOR MAYOR

- Vehicle Required: Mayor's Limo
- Difficulty: Medium
- Alignment: Good
- Triggers: Commercial population >200, Mayor's House
- Success Result: 80 MR/16 tiles, §10,000
- Failure Result: -40 MR/8 tiles, -§3,000
- Alternative Mission: None

RUN SOME ERRANDS

- Vehicle Required: § My Sim Vehicle
- Difficulty: Medium
- Alignment: Good
- Triggers: Residential development, My Sim §, Cs§ population >50, Cs§ lots >2
- Success Result: 80 MR/16 tiles, §10,000
- Failure Result: -40 MR/8 tiles, -§3,000
- Alternative Mission: Knock Over Store.

SCIENTIST LATE FOR FLIGHT

- Vehicle Required: Taxi Cab
- Difficulty: Medium
- Alignment: Good
- Triggers: Landing Strip, Residential population >50
- Success Result: Unlocks Opera House Reward, 80 MR/16 tiles, §10,000
- Failure Result: -40 MR/8 tiles, -§3,000
- Alternative Mission: Insane Taxi!

SELL SECRET ROCKET FORMULA

- Vehicle Required: Steam Train
- Difficulty: Easy
- Alignment: Evil
- Triggers: Freight Train Station, Deluxe Police Station, >20 Rails
- Success Result: -40 MR/4 tiles, §10,000, partial unlock of Area 5.1 Business Deal
- Failure Result: -20 MR/2 tiles, -§3,000
- Alternative Mission: Train Ride for Rocket Formula

SHADY AMBULANCE DRIVER

- Vehicle Required: Ambulance
- Difficulty: Medium
- Alignment: Evil
- Triggers: Large Medical Center, Cs§§ and Co§§ population >50 each
- Success Result: Unlock Courthouse Reward, -60 MR/8 tiles, §20,000
- Failure Result: -30 MR/4 tiles, -§6,000
- Alternative Mission: Slipped on Llama Dung

SHAKEDOWN

- Vehicle Required: Police Car
- Difficulty: Hard
- Alignment: Evil
- Triggers: Police Station, Cs§ population >100
- Success Result: -80 MR/16 tiles, §70,000
- Failure Result: -40 MR/8 tiles, -§10,000
- Alternative Mission: Cop Gone Bad

SICK BUS DRIVER

- Vehicle Required: City Bus
- Difficulty: Medium
- Alignment: Good
- Triggers: 3 Bus Stops
- Success Result: Unlocks Convention Center Reward, 80 MR/16 tiles, §10,000
- Failure Result: -40 MR/8 tiles, -§3,000
- Alternative Mission: Dr. Vu Steals a Bus

SIMLENT ORANGE

- Vehicle Required: Hearse
- Difficulty: Medium
- Alignment: Evil
- Triggers: Cemetery, Commercial population >50
- Success Result: Unlock Army Base Business Deal, -60 MR/8 tiles, §20,000
- Failure Result: -30 MR/4 tiles, -§6,000
- Alternative Mission: Get the Deceased to the Funeral

SLIPPED ON LLAMA DUNG

- Vehicle Required: Ambulance
- Difficulty: Medium
- Alignment: Good
- Triggers: Large Medical Center, Commercial population >50
- Success Result: Unlocks Disease Research Center Reward, 80 MR/ 16 tiles, §10,000
- Failure Result: -40 MR/8 tiles, -§3,000
- Alternative Mission: Shady Ambulance Driver

STEAL A WARHEAD

- Vehicle Required: Army Truck
- Difficulty: Easy
- Alignment: Evil
- Triggers: Army Base, Deluxe Police Station
- Success Result: -60 MR/8 tiles, §20,000
- Failure Result: -30 MR/4 tiles, -§6,000
- Alternative Mission: Launch Time

STUDY FOR PROFIT

- Vehicle Required: School Bus
- Difficulty: Medium
- Alignment: Evil
- Triggers: 2 Elementary School, 1 High School, Commercial >50
- Success Result: Unlocks Nuclear Power Plant Reward, -60 MR/8 tiles, §20,000
- Failure Result: -30 MR/4 tiles, -§6,000
- Alternative Mission: Get Little Binghampton to School

SUPER SEATBELT FABRIC FOR SPACE SHIPS!

- Vehicle Required: Freight Train
- Difficulty: Easy
- Alignment: Good
- Triggers: 2 Freight Train Stations
- Success Result: Partial unlock of Space Port Reward, 50 MR/8 tiles, §5,000
- Failure Result: -30 MR/4 tiles, -§2,000
- Alternative Mission: None

TAKE A BREAK AT THE CASINO

- Vehicle Required: §§§ My Sim Vehicle
- Difficulty: Easy
- Alignment: Good
- Triggers: Residential population >1, 1 My Sim §§§, Casino
- Success Result: 50 MR/8 tiles, §5,000
- Failure Result: -30 MR/4 tiles, -§2,000
- Alternative Mission: Took the Casino for a Bundle

TANK JOY RIDE

- Vehicle Required: Tank
- Difficulty: Hard
- Alignment: Evil
- Triggers: Deluxe Police Station, Army Base
- Success Result: -80 MR/16 tiles, §70,000
- Failure Result: -40 MR/8 tiles, -§10,000
- Alternative Mission: None

TEACH THE STRIKERS A LESSON

- Vehicle Required: Tank
- Difficulty: Medium
- Alignment: Evil
- Triggers: Army Base, Commercial development
- Success Result: -60 MR/8 tiles, §20,000
- Failure Result: -30 MR/4 tiles, -§6,000
- Alternative Mission: You CAN Throw Money at It

TOOK THE CASINO FOR A BUNDLE

- Vehicle Required: §§§ My Sim Vehicle
- Difficulty: Hard
- Alignment: Evil
- Triggers: Casino, Residential population >1, 1 My Sim §§§
- Success Result: -80 MR/16 tiles, §70,000
- Failure Result: -40 MR/8 tiles, -§10,000
- Alternative Mission: Take a Break at the Casino

TRAIN RIDE FOR ROCKET FORMULA

- Vehicle Required: Steam Train
- Difficulty: Easy
- Alignment: Good
- Triggers: Freight Train Station, >20 rails
- Success Result: Partial unlock of Space Port Reward, 50 MR/8 tiles, §5,000
- Failure Result: -30 MR/4 tiles, -§2,000
- Alternative Mission: Sell Secret Rocket Formula

TRAIN STATION TOUR

- Vehicle Required: Freight Train
- Difficulty: Medium
- Alignment: Good
- Triggers: 3 Freight Train Stations, >20 rails
- Success Result: Unlocks Grand Railroad Station Reward, 80 MR/16 tiles, §10,000
- Failure Result: -40 MR/8 tiles, -§3,000
- Alternative Mission: None

UNCLE VINNIE ASKS A FAVOR

- Vehicle Required: Garbage Truck
- Difficulty: Medium
- Alignment: Good
- Triggers: Police Station, Commercial development, Landfill
- Success Result: Unlocks Prison Business Deal, 80 MR/16 tiles, §10,000
- Failure Result: -40 MR/8 tiles, -§3,000
- Alternative Mission: A Special Load of Garbage

WHISTLE STOP TOUR

- Vehicle Required: Passenger Train
- Difficulty: Medium
- Alignment: Good
- Triggers: 3 Passenger Rail Stations, >20 rails
- Success Result: Unlocks Tourist Trap Reward, 80 MR/16 tiles, §10,000
- Failure Result: -40 MR/8 tiles, -§3,000
- Alternative Mission: Hijack the Train

WHITE COLLAR CRIME

- Vehicle Required: §§ My Sim Vehicle
- Difficulty: Hard
- Alignment: Evil
- Triggers: Residential development, 1 My Sim §§, Cs§§ development
- Success Result: -80 MR/16 tiles, §70,000
- Failure Result: -40 MR/8 tiles, -§10,000
- Alternative Mission: Run Some Errands

YOU CAN THROW MONEY AT IT

- Vehicle Required: Mayor's Limo
- Difficulty: Medium
- Alignment: Good
- Triggers: Mayor's House, Commercial population >50
- Success Result: Unlocks City Hall Reward, 80 MR/16 tiles, §10,000
- Failure Result: -40 MR/8 tiles, -§3,000
- Alternative Mission: Teach the Strikers a Lesson

SEA MISSIONS
FERRY OF EVIL

- Vehicle Required: Ferry Boat
- Difficulty: Easy
- Alignment: Evil
- Triggers: Car & Passenger Ferry Terminal
- Success Result: -60 MR/8 tiles, §20,000
- Failure Result: -30 MR/4 tiles, -§6,000
- Alternative Mission: Whale Watching Tour

HERE FISHY, FISHY, FISHY

- Vehicle Required: Fishing Boat
- Difficulty: Medium
- Alignment: Good
- Triggers: Marina
- Success Result: Unlocks Lighthouse Reward, 80 MR/16 tiles, §10,000
- Failure Result: -40 MR/8 tiles, -§3,000
- Alternative Mission: Mmm…Endangered Dinner

JET SKI FIESTA

- Vehicle Required: Cigar Boat
- Difficulty: Hard
- Alignment: Good
- Triggers: Marina
- Success Result: 110 MR/32 tiles, §40,000
- Failure Result: -60 MR/16 tiles, -§5,000
- Alternative Mission: None

MMM…ENDANGERED DINNER

- Vehicle Required: Fishing Boat
- Difficulty: Easy
- Alignment: Evil
- Triggers: Marina
- Success Result: Unlocks Stock Exchange Reward, -60 MR/8 tiles, §20,000
- Failure Result: -30 MR/4 tiles, -§6,000
- Alternative Mission: Here Fishy, Fishy, Fishy

RARE FISH VIEWING

- Vehicle Required: Yacht
- Difficulty: Easy
- Alignment: Good
- Triggers: Marina
- Success Result: Unlocks Country Club Reward, 50 MR/8 tiles, §5,000
- Failure Result: -30 MR/4 tiles, -§2,000
- Alternative Mission: None

ROBOTIC WHALE DESTRUCTION

- Vehicle Required: Metal Whale
- Difficulty: Hard
- Alignment: Evil
- Triggers: Marina, Seaport, Area 5.1
- Success Result: -80 MR/16 tiles, §70,000
- Failure Result: -40 MR/8 tiles, -§10,000
- Alternative Mission: None

RX PICK-UP AND DELIVERY

- Vehicle Required: Speed Boat
- Difficulty: Medium
- Alignment: Good
- Triggers: Marina, Seaport
- Success Result: Unlocks Resort Hotel Reward, 80 MR/16 tiles, §10,000
- Failure Result: -40 MR/8 tiles, -§3,000
- Alternative Mission: Waterproof Mind Control Device

SOS

- Vehicle Required: Tug Boat
- Difficulty: Medium
- Alignment: Good
- Triggers: Marina
- Success Result: Unlocks Major Art Museum Reward, 80 MR/16 tiles, §10,000
- Failure Result: -40 MR/8 tiles, -§3,000
- Alternative Mission: None

WATER ESCAPE

- Vehicle Required: Motor Boat
- Difficulty: Medium
- Alignment: Good
- Triggers: Deluxe Police Station, Marina
- Success Result: 80 MR/16 tiles, §10,000
- Failure Result: -40 MR/8 tiles, -§3,000
- Alternative Mission: None

WATERPROOF MIND CONTROL DEVICE

- Vehicle Required: Speed Boat
- Difficulty: Medium
- Alignment: Evil
- Triggers: Marina, Seaport
- Success Result: Unlocks Cruise Ship Port Reward, -60 MR/8 tiles, §20,000
- Failure Result: -30 MR/4 tiles, -§6,000
- Alternative Mission: Rx Pick-Up and Delivery

WHALE WATCHING TOUR

- Vehicle Required: Ferry Boat
- Difficulty: Medium
- Alignment: Good
- Triggers: Car and Passenger Ferry Terminal
- Success Result: Unlocks Marina Reward, 80 MR/16 tiles, §10,000
- Failure Result: -40 MR/8 tiles, -§3,000
- Alternative Mission: Ferry of Evil

AIR MISSIONS

ALIEN ABDUCTION FOR FUN AND PROFIT

- Vehicle Required: UFO
- Difficulty: Hard
- Alignment: Evil
- Triggers: Residential, Commercial, and Industrial population >50 each, Area 5.1
- Success Result: -80 MR/16 tiles, §70,000
- Failure Result: -40 MR/8 tiles, -§10,000
- Alternative Mission: None

BLAST-O-RAY

- Vehicle Required: UFO
- Difficulty: Hard
- Alignment: Evil
- Triggers: Residential, Commercial, and Industrial population >50 each, Area 5.1
- Success Result: -80 MR/16 tiles, §70,000
- Failure Result: -40 MR/8 tiles, -§10,000
- Alternative Mission: None

CATCH THE CROOK FROM THE AIR

- Vehicle Required: Police Helicopter
- Difficulty: Hard
- Alignment: Good
- Triggers: Deluxe Police Station, Commercial population >50
- Success Result: Unlocks Television Studio Reward, 110 MR/32 tiles, §40,000
- Failure Result: -60 MR/16 tiles, -§5,000
- Alternative Mission: Disturbing the Peace

COVER THE HOSTAGE CRISIS

- Vehicle Required: News Helicopter
- Difficulty: Medium
- Alignment: Good
- Triggers: Residential and Commercial population >50 each
- Success Result: Unlocks Radio Station Reward, 80 MR/16 tiles, §10,000
- Failure Result: -40 MR/8 tiles, -§3,000
- Alternative Mission: Get the Perp's Story

CRIPPLE CITY INDUSTRIAL COMPLEX

- Vehicle Required: Jet Fighter
- Difficulty: Hard
- Alignment: Evil
- Triggers: Industrial population >100, Power Plant, Area 5.1
- Success Result: Unlocks Hydrogen Power Plant Reward, -80 MR/16 tiles, §70,000
- Failure Result: -40 MR/8 tiles, -§10,000
- Alternative Mission: None

DISTURBING THE PEACE

- Vehicle Required: Police Helicopter
- Difficulty: Hard
- Alignment: Evil
- Triggers: At least 100 Residential low-density tiles, Deluxe Police Station
- Success Result: -80 MR/16 tiles, §70,000
- Failure Result: -40 MR/8 tiles, -§10,000
- Alternative Mission: Catch the Crook from the Air

FARMER'S GOT VERMIN

- Vehicle Required: Crop Duster
- Difficulty: Hard
- Alignment: Good
- Triggers: Landing Strip, at least 50 IA tiles.
- Success Result: Unlocks Farmer's Market Reward, 110 MR/32 tiles, §40,000
- Failure Result: -60 MR/16 tiles, -§5,000
- Alternative Mission: Spread Zombie Dust

GET THE PERP'S STORY

- Vehicle Required: News Helicopter
- Difficulty: Medium
- Alignment: Evil
- Triggers: Commercial population >50, TV Station
- Success Result: -60 MR/8 tiles, §20,000
- Failure Result: -30 MR/4 tiles, -§6,000
- Alternative Mission: Cover the Hostage Crisis

GIVE JENNY A HAND, AND A HEART

- Vehicle Required: Medical Helicopter
- Difficulty: Medium
- Alignment: Good
- Triggers: Residential population >50, Large Medical Center
- Success Result: 80 MR/16 tiles, §10,000
- Failure Result: -40 MR/8 tiles, -§3,000
- Alternative Mission: Organs for Profit

INFILTRATE DR. VU'S SECRET MEETING

- Vehicle Required: Sky Diver Plane
- Difficulty: Hard
- Alignment: Good
- Triggers: Landing Strip, Industrial population >50
- Success Result: 110 MR/32 tiles, §40,000
- Failure Result: -60 MR/16 tiles, -§5,000
- Alternative Mission: None

LET IT BURN!

- Vehicle Required: Fire Plane
- Difficulty: Hard
- Alignment: Evil
- Triggers: Fire Department Landing Strip, Fire in progress
- Success Result: -80 MR/16 tiles, §70,000
- Failure Result: -40 MR/8 tiles, -§10,000
- Alternative Mission: Water Drop for Fire

ORGANS FOR PROFIT

- Vehicle Required: Medical Helicopter
- Difficulty: Medium
- Alignment: Evil
- Triggers: Industrial population >50 and Major Medical Center
- Success Result: Unlocks University Reward, -60 MR/8 tiles, §20,000
- Failure Result: -30 MR/4 tiles, -§6,000
- Alternative Mission: Give Jenny a Hand, and a Heart

RAID ON CITY

- Vehicle Required: Military Helicopter
- Difficulty: Hard
- Alignment: Evil
- Triggers: Any Train Station, water source, Army Base, Mayor's House
- Success Result: -80 MR/16 tiles, §70,000
- Failure Result: -40 MR/8 tiles, -§10,000
- Alternative Mission: Take Out Dr. Vu's "Secret" Lair

SECRET SKY CODE

- Vehicle Required: Skydiver
- Difficulty: Hard
- Alignment: Evil
- Triggers: Landing Strip
- Success Result: -80 MR/16 tiles, §70,000
- Failure Result: -40 MR/8 tiles, -§10,000
- Alternative Mission: Who Loves You, Baby?

SKYDIVING SHOW AT....

- Vehicle Required: Sky Diver Plane
- Difficulty: Hard
- Alignment: Good
- Triggers: Landing Strip, Landmark
- Success Result: 110 MR/32 tiles, §40,000
- Failure Result: -60 MR/16 tiles, -§5,000
- Alternative Mission: None

SPREAD ZOMBIE DUST

- Vehicle Required: Crop Duster
- Difficulty: Hard
- Alignment: Evil
- Triggers: Landing Strip, Cemetery
- Success Result: Partial Unlock of Area 5.1 Business Deal, -80 MR/16 tiles, §70,000
- Failure Result: -40 MR/8 tiles, -§10,000
- Alternative Mission: Farmer's Got Vermin

TAKE OUT DR. VU'S "SECRET" LAIR

- Vehicle Required: Military Helicopter
- Difficulty: Hard
- Alignment: Good
- Triggers: Army Base, Industrial population >50
- Success Result: Unlock Advanced Research Center Reward, 110 MR/32 tiles, §40,000
- Failure Result: -60 MR/16 tiles, -§5,000
- Alternative Mission: Raid on City

WATER DROP FOR FIRE

- Vehicle Required: Fire Plane
- Difficulty: Hard
- Alignment: Good
- Triggers: Fire Department Landing Strip, Fire in progress
- Success Result: Unlocks City Zoo Reward, 110 MR/32 tiles, §40,000
- Failure Result: -60 MR/16 tiles, -§5,000
- Alternative Mission: Let It Burn!

WHO LOVES YOU, BABY?

- Vehicle Required: Skywriter Plane
- Difficulty: Hard
- Alignment: Good
- Triggers: Landing Strip
- Success Result: Unlocks Major League Stadium Reward, 110 MR/32 tiles, §40,000
- Failure Result: -60 MR/16 tiles, -§5,000
- Alternative Mission: Secret Sky Code

NEW SIMULATION EFFECTS AND CIVIC STRUCTURES

Contrary to what you may think after the last two chapters, there's more to life than asphalt and onramps. Many other parts of the game have grown with new buildings and new simulation effects.

BUDGET AND FINANCE

Tax rates do more than bring in money; where you set them can either attract new residents and jobs, deter new immigration, or chase away those already in your city limits.

Sometimes you want to entice or discourage specific developer types from moving to or from your city. While you can't control their decisions, you can stack the deck for or against them by setting tax rates.

The new tax interface permits maximum control.

Until now, however, you could only set tax rates for each wealth level of Residential, Commercial, or Industrial. In other words, you had to set the same tax rate for Cs§§ as Co§§, even if it was only one of them you wanted to attract. The other downside to this generality was that Agriculture zones didn't generate any tax revenue.

Both of these limitations have been lifted in *Rush Hour*. Taxes may now be set distinctly for all 12 developer types through the expanded Taxes interface.

New cities begin with taxes for all developer types set at nine percent. This is the "neutral tax rate" that has no effect on demand. Raise it to cool demand and drop it to increase demand. Read Chapter 8 for full details and warnings about making excessively drastic tax rate changes.

Cities begun under *SimCity 4* and loaded with *Rush Hour* installed bring with them the tax rates as set the last time they were saved. Agriculture rates start at nine percent.

MAYOR RATING

Mayor Rating (outlined in full in Chapter 16) is the opinion of the job you're doing on each Residential tract in your city. The average of every tract citywide is the global Mayor Rating shown on your Mayor Mode control panel.

Mayor Rating effects come in two kinds: long-term and short-term. Long-term effects (e.g., pollution level, crime, school coverage, etc.) are those whose levels are always a consideration in Mayor Rating; the effects may shift (e.g., a drop in pollution), but they never disappear.

Short-term Mayor Rating, on the other hand, is the sum of effects that arise upon specific events and persist for a limited time. These effects impact Mayor Rating in a fixed radius first at full strength, then dissipate over time. In *SimCity 4*, these short-term Mayor Rating effects were limited to:

- Fire
- Addition of flora (via the Plant Flora tool)
- Addition of civic buildings

Whenever a fire breaks out, therefore, every tile in an eight-tile radius would see a -20 reduction in local Mayor Rating for the first month. The next month, the effect reduces to -15, dropping five points each month until it disappears.

Rush Hour adds two new short-term effects:

- U-Drive-It mission outcomes
- Throw money from the Mayor's Limo

U-DRIVE-IT MISSIONS

Several missions in U-Drive-It Mode (see Chapter 33) have an impact on Mayor Rating (either positive or negative). These effects occur at the spot where the mission concluded and in a fixed radius that varies based on the mission's difficulty, alignment, and whether you succeed or fail. As with all short-term Mayor Rating Effects, the impact decreases by 25 percent a month (ending in three months).

The precise amounts of Mayor Rating Effect and their radii for each mission are listed in the mission walkthroughs in Chapter 33.

NOTE

As discussed in Chapter 31, the cumulative effect of all short-term Mayor Rating Effects now has a small impact on a tract's desirability. If, for example, a U-Drive-It mission comes with a reduction in Mayor Rating, the tracts near where the mission ended also see a short-term reduction in desirability.

THROWING MONEY FROM MAYOR'S LIMO

One of the U-Drive-It vehicles (unlocked when you construct the Mayor's House Reward) is the Mayor's Limo. It comes complete with an added feature that enables you to manually affect local short-term Mayor Rating.

One of the special controls for this vehicle is called Throw Money. Just press and hold the [Spacebar] and money plumes out of the mayoral windows for the benefit of any local residents.

For every second you hold down the [Spacebar], every residential tract in a three-tile radius of the Limo will see a 10-point boost in local Mayor Rating for about three months.

This bit of micromanagement doesn't, however, come without a price tag. Every second of this approval-buying costs your treasury §50. Get too generous and these little glad-handing excursions could cost your city a lot of cash.

POLLUTION

Pollution (air, water, garbage, and radiation) is among your primary city management concerns. To help you work with the new *Rush Hour* buildings, here's a list of their contributions to your city's filth:

The new Space Port seems a nice decoration but comes with a considerable amount of pollution.

Pollution Effects of *Rush Hour* Structures

Structure	Air Pollution	AP Radius	Water Pollution	WP Radius	Garbage	Radiation	Radiation Radius
American Museum of Natural History	1	1	1	2	15	0	0
Area 5.1	12	3	18	4	10	3	7
Car & Passenger Ferry Terminal	1	1	1	1	1	0	0
Columbia Seafirst Center	1	1	1	2	15	0	0
Cruise Ship Port	2	2	22	4	13	0	0
Deluxe Police Station	1	2	1	3	14	0	0
Elementary School, Large	1	3	1	4	14	0	0
Elevated Rail Station	1	1	1	1	2	0	0
Fire Department Landing Strip	1	2	1	3	6	0	0
Grand Railroad Station	6	4	4	2	10	0	0
High School, Large	1	3	1	4	16	0	0
International Airport, Large	58	23	18	6	20	0	0

Pollution Effects of *Rush Hour* Structures continued

Structure	Air Pollution	AP Radius	Water Pollution	WP Radius	Garbage	Radiation	Radiation Radius
International Airport, Medium	54	21	15	6	18	0	0
International Airport, Small	50	20	12	5	16	0	0
Landing Strip, Large	18	13	4	3	4	0	0
Landing Strip, Medium	16	14	3	2	3	0	0
Landing Strip, Small	14	12	2	2	2	0	0
Lighthouse	1	2	1	3	1	0	0
Lincoln Center	1	1	1	2	8	0	0
Marina	3	2	4	3	15	0	0
Monorail Station	1	1	1	1	2	0	0
Municipal Airport, Large	38	20	10	5	12	0	0
Municipal Airport, Medium	35	19	8	4	10	0	0
Municipal Airport, Small	32	18	6	3	8	0	0
Passenger Ferry Terminal	1	1	1	1	1	0	0
Police Kiosk	1	2	1	3	2	0	0
Public Parking Garage	1	1	1	1	1	0	0
Schloss Neuschwanstein	1	1	1	2	15	0	0
Space Port	10	3	5	4	10	0	0
Subway-to-Elevated Transition	1	1	1	1	2	0	0
Toll Booth	1	1	1	1	1	0	0
Water Pump , Large	12	2	0	0	0	0	0

NOTE
Due to significant changes to the pollution produced by airports, these have been included in this list as well.

One of these new buildings (Area 5.1) emits radiation pollution, too. This pollution is unique in that it equally affects all tiles in its radius. The effect of this is a tremendous hit to any affected tract's desirability and Mayor Rating. The only way to manage such buildings is to locate them beyond any RCI buildings, making sure no structure is in their area of effect. Consider also whether you will want to develop that location later; radiation persists for a while after the building that caused it is removed.

UTILITIES

- Size: 1x2
- Cost: §15,400
- Monthly Cost: §3,150
- Water Produced: 200,000 cubic meters/month

Because every city needs water and large cities need lots of water, you can now build a high-capacity Large Water Pump. This structure is expensive (§15,400 for initial construction and §3,150 per month) and is only available once certain criteria are met:

Large Water Pump

- Total city population >10,000 *or*
- Total city water usage >40,000 cubic meters per month
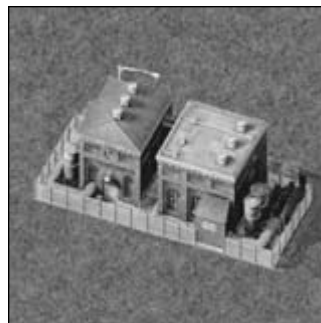
Though it is pricey, the Large Water Pump is preferable to and more economical than a large array of small Water Pumps. The cost of one Large Water Pump is more than the 10 Water Pumps that could supply the same capacity, but the monthly cost is lower (§3,150 versus §3,500 for 10 Water Pumps). Moreover, the Large Water Pump takes up only two tiles, while the equivalent number of smaller ones occupy ten tiles; tiles used for utility buildings can't produce tax revenue. Finally, the high capacity of the Large Water Pump could pay for itself if you strike water deals with neighbors to unload your unused capacity.

The downside to the Large Water Pump versus several small Water Pumps is that it's centralized. With one building supplying so much of your city's water, a small power outage could mean disaster if it occurs near your large pump. With 10 small pumps scattered around a city, you're protected against such disruptions.

TIP

If you employ the Large Water Pump, keep it very far away from any significant sources of water pollution. You don't want to risk it shutting down for contamination.

POLICE AND CRIME

Crime is one of your primary concerns in *SimCity 4*. Fortunately, *Rush Hour* provides a new challenge and several new tools to keep things interesting.

CRIME EFFECT BUILDINGS

Crime Effect is a force exerted by a building that counteracts police protection within its radius. The stronger the effect, the greater the counteraction of your carefully planned police coverage. Such buildings are, however, rare.

To the five Crime Effect buildings in *SimCity 4*, *Rush Hour* adds another: Area 5.1. Besides this Business Deal building's other nasty side effects, it sports one of the game's most punishing Crime Effects: 45 with a radius of 8 tiles. For this and so many other reasons, keep Area 5.1 far from your RCI buildings and out of your city unless you have a good reason to welcome it.

POLICE STRUCTURES

The police come ready for this new threat with a new pair of buildings of their own plus a new airborne dispatch that'll make criminals cower in the bushes.

POLICE KIOSK

- Size: 1x1
- Cost: §80
- Monthly Cost: §40
- Police Coverage: 100
- Coverage Radius: 12
- Dispatch: 0
- Inmate Capacity: 0
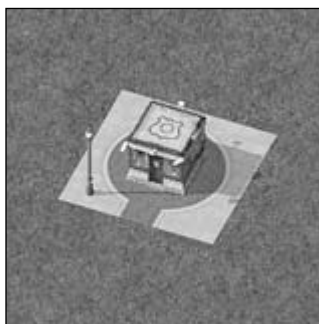
The Police Kiosk is a small police station with no dispatches and no jail. Though it claims half the effect and half the radius of a Small Police Station, it's a powerful weapon in the fight against crime. The Kiosk costs less than half as much initially and on a monthly basis as the Small Police Station and takes up only one-sixth the space. That's a lot of law enforcement in a small space! Kiosks make great starter police stations for small cities (before dispatches and jails become necessary) and continue to be useful in larger cities as gap fillers where the circular coverage areas of your larger stations don't quite meet.

Because police coverage is additive (overlapping coverage areas create a higher crime suppression), Kiosks are an inexpensive way to beef up police presence in bad neighborhoods.

DELUXE POLICE STATION

- Size: 3x3
- Cost: §1,200
- Monthly Cost: §300
- Police Coverage: 350
- Coverage Radius: 43
- Dispatch: 6 + 1 Police Helicopter
- Inmate Capacity: 75

The Deluxe Police Station is the opposite of the Kiosk—a full-service police headquarters. While it's slightly more expensive initially and per month than the Large Police Station, it features two additional squad car dispatches and an airborne dispatch: the Police Helicopter. There's no better riot disperser than this chopper!

The Deluxe Police Station is a Reward structure that becomes available after you reach a total city size (combined Residential, Industrial, and Commercial) of 41,000. You can also earn this building by completing all four good Police Car missions.

After you have this building in your city, you can tackle the Police Helicopter missions, use the chopper as a dispatch, and even fly it in Free Drive to catch perps in the act.

FIRE PROTECTION

Fire is a constant threat in your city, so it's good to be prepared. Having enough Fire Stations to cover your city can, however, be difficult and expensive. That's where the new high-end Fire Department Landing Strip comes in; no roads necessary!

FLAMMABILITY

Fire probability is increased in "hotspots," concentrations of tiles with high flammability ratings. In other words, the more fire traps you have in an area, the more likely there'll be a fire in the first place. For a full explanation, see Flammability "Hotspot" in Chapter 18.

With *Rush Hour*, this effect has been reduced. The result is fewer hotspot fires. This is welcome news to all but your city's firefighters, who'll now spend more time sitting around the station. The revised probabilities are listed here.

Hotspot Concentration and Fire Probability Increase, Revised

No. of High-Flammability Tiles	Fire Probability
39	0
40	7
50	15
70	20
100	25

FIRE DEPARTMENT LANDING STRIP

- Size: 15x4
- Cost: §1,200
- Monthly Cost: §800
- Fire Coverage: 200
- Coverage Radius: 37
- Dispatch: 2 + 1 Fire Plane
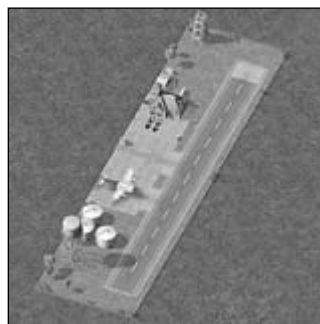
The Fire Department Landing Strip doesn't offer greater coverage or protection than the Large Fire Station, but the Fire Plane Dispatch can reach places Fire Engines can't. Previously, you had to have everything near a road so the engines could get in if a fire broke out. That's no longer necessary when you can dump water from a great height.

This station becomes available after your city reaches a combined RCI population of 31,000. Alternatively, you can earn it, regardless of population, by extinguishing three fires using the Fire! mission in U-Drive-It.

After you have the Fire Department Landing Strip, you can take on U-Drive-It missions with the Fire Plane and use it for dispatches. Don't rely entirely on this airborne dispatch or use it for small fires unless it's already in the air; it takes time to get off the ground.

EDUCATION

Education has received some reform in the shape of two new high-capacity schools. They're expensive and you have to grow a bit before you can earn them, but they're worth it. No more clustering three Elementary Schools on one block just to provide learning in high-density downtown corridors.

For EQ purposes, these schools do not count as a new kind of school that, to have a perfect educational system, you must have in addition to your smaller versions. They are meant to be replacements or supplements, providing no additional EQ boost where they overlap with the coverage area of a smaller version.

LARGE ELEMENTARY SCHOOL

- Size: 4x3
- Cost: §2,100
- Monthly Cost: §1,500
- School Radius: 43
- Student Capacity: 3,000
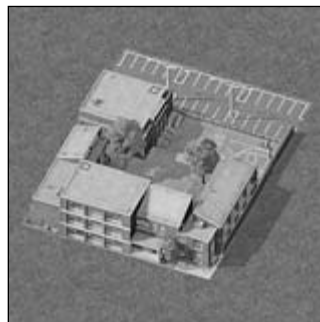
The Large Elementary School boasts a larger radius than a smaller Elementary School and can handle six times the students. While it's more expensive than six Elementary Schools, it's cheaper to run per month and takes up less space. What's more, as with all schools, you can scale down the capacity while your city is small; if you can afford the initial investment, you won't have to build another Elementary School for a while. The larger radius, however, comes with a price: Your default busing expense is §500 per month. This, too, can be scaled down to fit your city's needs.

LARGE HIGH SCHOOL

- Size: 4x6
- Cost: §7,350
- Monthly Cost: §3,250
- School Radius: 51
- Student Capacity: 4,500
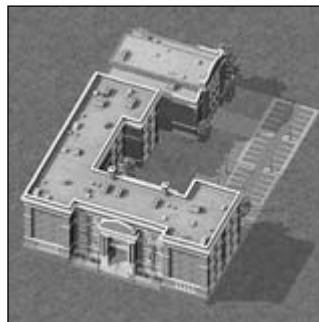
The Large High School is larger in both coverage area and capacity compared to its smaller version. Housing six times the students of a High School, this building is expensive to build but is less expensive per month, making it a more efficient means of educating large numbers of densely packed teens. The cost can be scaled to the number of students attending, and the coverage area can be adjusted to reduce the high busing expenses.

HEALTH

There are no new health-care buildings, but there is one significant change in how Health Quotient is developed. For details on how the system works, see Chapter 21.

Previously, to get an optimum boost from your city's health-care system, a tract had to be within the radius of the various kinds of health-care buildings. In other words, a tract covered by only a Medical Clinic or only a Large Medical Center would receive less of a boost than a tract covered by both.

In *Rush Hour*, however, these two kinds of health-care buildings are equivalent for HQ purposes. Thus, as long as a tract is covered by either a Medical Clinic or a Large Medical Center, it receives the same boost to its HQ.

REWARDS, BUSINESS DEALS, AND LANDMARKS

Rewards, Business Deals, and Landmarks aren't mandatory for any city, but they do serve myriad functions both utilitarian and aesthetic. The important thing with these buildings is to fully understand what they're going to do to (and for) your city after you get them on the ground. To know that, you have to get inside them and see what makes them tick.

The first thing many buildings will do is cost you money, both initially and monthly. Beyond that, they can affect pollution, desirability, Mayor Rating, power and water consumption, crime, Demand Cap Relief, and a host of other areas. This chapter will acquaint you with the newest additions to this catalog of special buildings.

REWARDS

Rewards are buildings you must earn before you're given the opportunity to build them. After you meet a building's prerequisites, one of your Advisors offers it to you. If you accept a Reward, you can build one of them anywhere in your city.

REWARDS AND U-DRIVE-IT

Rush Hour provides a way around many Reward buildings' prerequisites. Many U-Drive-It missions (see Chapter 33) can earn you Reward buildings, bypassing whatever simulation requirements the building normally carries.

With some practice and dedication to U-Drive-It, you can gain many important Rewards before you'd have achieved them otherwise.

See the Reward Buildings Unlocked by UDI Missions table in Chapter 33 for a full directory of Rewards and their corresponding missions.

Most, but not all, Rewards cost money to build and to maintain. This cost varies depending on whether the building is something your city pays for (e.g., City Hall) or one some interest in your city wants to build (e.g., a Movie Studio). The latter buildings, the private ones, cost you nothing initially or monthly, but cost you mightily if you want to demolish them with the Bulldoze tool.

NOTE

The high cost of demolishing private Reward buildings makes the U-Drive-It Tank a nice and precise alternative urban renewal device.

The bulldozing costs of many Reward buildings have been changed to reflect this private vs. public dichotomy. The revised costs are:

Revised Reward Demolition Costs

Structure	Cost to Bulldoze	Structure	Cost to Bulldoze
Advanced Research Center	§6,300	Major League Stadium	§24,320
Bureau of Bureaucracy	§7,440	Mayor's House	§160
Cemeteries	§1,200	Mayor's Statue	§330
City Hall	§2,700	Minor League Stadium	§9,530
City Zoo	§3,330	Movie Studio	§21,590
Colossal Mayor's Statue	§5,130	Nuclear Power Plant	§1,800
Convention Center	§2,880	Opera House	§1,520
Country Club	§18,730	Private School	§3,220
Courthouse	§2,960	Radio Station	§10,260
Disease Research Center	§3,000	Resort Hotel	§23,780
Farmer's Market	§440	Solar Power Plant	§1,350
Houses of Worship	§3,500	State Fair	§990
Hydrogen Power Plant	§4,500	Stock Exchange	§35,760
Impressive Mayor's Statue	§580	Television Studio	§13,060
Magnificent Mayor's Statue	§1,980	Tourist Trap	§9,000
Main Library	§2,750	University	§3,080
Major Art Museum	§10,070		

NEW REWARD BUILDINGS

All Reward buildings have some effect on your city. Most have several effects. To find all the vitals on every new Reward, look here:

Reward Building Statistics

Structure	Com. Proximity Effect	Com. Proximity Effect Radius	Res. Proximity Effect	Res. Proximity Effect Radius	Air Pollution	AP Radius	Water Pollution	WP Radius	Garbage	Radiation	Radiation Radius
Cruise Ship Port	60	24	0	0	2	2	22	4	13	0	0
Deluxe Police Station	0	0	0	0	1	2	1	3	14	0	0
Fire Department Landing Strip	0	0	0	0	1	2	1	3	6	0	0
Grand Railroad Station	0	0	0	0	6	4	4	2	10	0	0
Large Elementary School	0	0	0	0	1	3	1	4	14	0	0
Large High School	0	0	0	0	1	3	1	4	16	0	0
Large Water Pump	0	0	0	0	12	2	0	0	0	0	0
Lighthouse	50	22	-50	22	1	2	1	3	1	0	0
Marina	15	12	25	22	3	2	4	3	15	0	0
Space Port	25	17	-50	22	10	3	5	4	10	0	0

CRUISE SHIP PORT

- Size: 4x5
- Cost: §28,000
- Monthly Cost: §180
- Bulldoze Cost: §2,580

PREREQUISITES

- Commercial jobs >15,000
- City park structures >15
- City >35 percent water
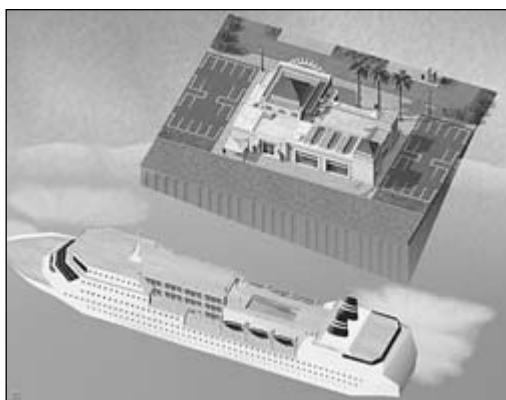
U-DRIVE-IT UNLOCK MISSION

- Waterproof Mind Control Device

Flammability	Max Fire Stage	Power Consumed	Water Consumed	Mayor Rating Effect	MR Effect Radius	Jobs R§	Jobs R§§	Jobs R§§§	Demand Cap Relief R§§§	Demand Cap Relief ID	Demand Cap Relief IM	Demand Cap Relief IHT
33	4	28	75	0	0	0	45	0	0	0	0	0
40	4	5	7	0	0	80	10	0	0	0	0	0
32	2	3	25	0	0	20	8	0	0	0	0	0
37	3	42	15	0	0	4	0	0	0	0	0	0
32	3	14	35	0	0	12	4	0	0	0	0	0
32	4	35	105	0	0	90	10	0	0	0	0	0
40	3	33	0	0	0	0	0	0	0	0	0	0
36	4	65	0	3	220	1	0	0	0	3,000	3,000	0
36	4	15	50	2	120	0	92	31	0	0	0	150,000
38	4	700	360	0	0	0	100	0	0	0	0	0

LIGHTHOUSE

- Size: 3x3
- Cost: §6,500
- Monthly Cost: §100
- Bulldoze Cost: §210

PREREQUISITE

- One functioning Seaport

U-DRIVE-IT UNLOCK MISSION

- Here Fishy, Fishy, Fishy
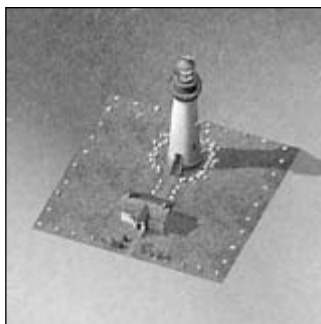
MARINA

- Size: 1x6
- Cost: §4,000
- Monthly Cost: §90
- Bulldoze Cost: §180

PREREQUISITES

- R§§ + R§§§ population >18,000
- Mayor Rating >53
- City >25 percent water

U-DRIVE-IT UNLOCK MISSION

- None

NOTE

Unlike with other Rewards, after you earn the Marina, you can place as many as you can afford.

SPACE PORT

- Size: 7x6
- Cost: §96,000
- Monthly Cost: §400
- Bulldoze Cost: §4,200

PREREQUISITES

- City difficulty level at Medium or Hard
- IHT jobs >25,000
- Advanced Research Center
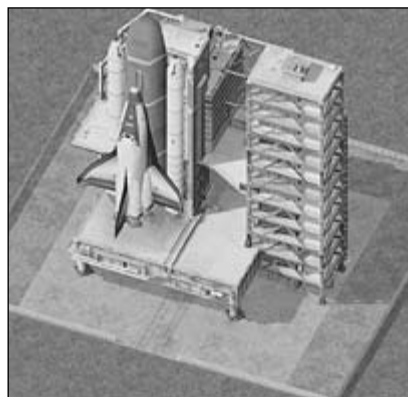
U-DRIVE-IT UNLOCK MISSIONS

- Train Ride for Rocket Formula *and*
- Super Secret Fabric for Space Ships!

CIVIC REWARD BUILDINGS

Several Reward buildings also serve civic purposes. These include a police station, a fire station, schools, transportation stations, and a utility station. The details of each of these buildings are listed in their respective chapters (Chapter 32 for transportation and Chapter 34 for all others).

DELUXE POLICE STATION

PREREQUISITE

- Total city population >41,000

U-DRIVE-IT UNLOCK MISSIONS

- Complete the four good Police Car missions

FIRE DEPARTMENT LANDING STRIP

PREREQUISITE

- Total city population >31,000

U-DRIVE-IT UNLOCK MISSION

- Put out three fires via the Fire! mission

GRAND RAILROAD STATION

PREREQUISITES

- R and C population combined >172,000
- City contains at least one Small Rail Station near full capacity

U-DRIVE-IT UNLOCK MISSION

- Train Station Tour

LARGE ELEMENTARY SCHOOL

PREREQUISITE

- Residential population >4,000

U-DRIVE-IT UNLOCK MISSION

- None

LARGE HIGH SCHOOL

PREREQUISITE

- Residential population >6,000

U-DRIVE-IT UNLOCK MISSION

- None

LARGE WATER PUMP

PREREQUISITE

- Total city population >10,000 *or*
- Total city water usage >40,000 cubic meters per month

U-DRIVE-IT UNLOCK MISSION

- None

BUSINESS DEAL BUILDINGS

Business Deal buildings provide income and cost you no money. That doesn't mean you won't pay the price for welcoming them.

In exchange for their ample income stream, Business Deal buildings come with a host of unsavory simulation effects (e.g., pollution, radiation, Crime Effect) that can mortally wound your Mayor Rating and the desirability of any property nearby.

Extreme caution should be exercised when you agree to take a Business Deal building into your city. Never is that more the case than with *Rush Hour*'s new Business Deal building: Area 5.1. Maybe it's the UFO hiding in the trees, maybe it's the presence of the evil Dr. Vu (more on him in Chapter 33), or maybe it's the litany of horrible effects that come with this building. Whatever the source, you know this building's bad news.

If getting Area 5.1 is bad, getting rid of it is worse. It has the highest bulldoze cost in the game and leaves behind radiation pollution for years to come.

Business Deal Structures Statistics

Structure	Com. Proximity Effect	Com. Proximity Effect Radius	Res. Proximity Effect	Res. Proximity Effect Radius	Air Pollution	AP Radius	Water Pollution	WP Radius	Garbage	Radiation	Radiation Radius
Area 5.1	-80	30	-90	36	12	3	18	4	10	3	7

Fortunately, it comes with some entertaining aspects, too. Area 5.1 opens several otherwise unavailable U-Drive-It missions that are almost worth the waves of deadly radiation the building emits. There's also the money it brings in, which never hurts.

NOTE

See chapter 26 for full details on Business Deals.

AREA 5.1 [TOP SECRET]

- Size: 20x9
- Monthly Income: §380
- Bulldoze Cost: §45,000

PREREQUISITES

- Funds <§20,000
- Total city population >15,500
- City difficulty level at Hard
- Funds decreased by at least §3,000 in past four months

U-DRIVE-IT UNLOCK MISSIONS

- Sell Secret Rocket Formula *and*
- Pure Evil Ice Cream *and*
- Spread Zombie Dust

Crime Effect	Crime Effect Radius	Flammability	Max Fire Stage	Power Consumed	Water Consumed	MR Effect	MR Effect Radius	Jobs R§	Jobs R§§	Jobs R§§§	Demand Cap Relief IM
45	128	40	5	300	150	-7	440	45	0	0	100,000

LANDMARKS

Landmarks are pure goodness. They do lovely things for your city, but only at a high cost. The more impressive the Landmark and the more beneficial its effects, the higher the initial and monthly cost. Demolishing them is pricey, too, so think carefully before you add one. *Rush Hour* adds four new Landmarks.

AMERICAN MUSEUM OF NATURAL HISTORY

- Size: 9x8
- Origin: New York, U.S.
- Cost: §110,000
- Monthly Cost: §220
- Bulldoze Cost: §7,900

COLUMBIA SEAFIRST CENTER

- Size: 6x6
- Origin: Seattle, U.S.
- Cost: §110,000
- Monthly Cost: §210
- Bulldoze Cost: §6,300
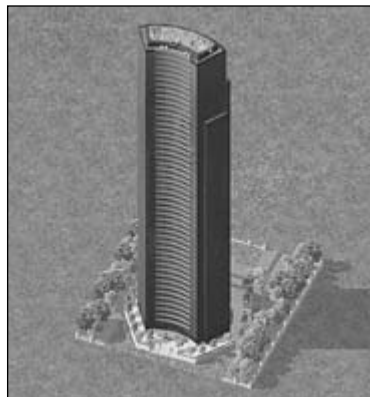
Rush Hour Landmark Statistics

Structure	Com. Proximity Effect	Com. Proximity Effect Radius	Res. Proximity Effect	Res. Proximity Effect Radius	Air Pollution	AP Radius	Water Pollution	WP Radius
American Museum of Natural History	40	20	0	0	1	1	1	2
Columbia Seafirst Center	40	20	0	0	1	1	1	2
Lincoln Center	80	28	0	0	1	1	1	2
Schloss Neuschwanstein	40	20	0	0	1	1	1	2

LINCOLN CENTER

- Size: 9x9
- Origin: New York, U.S.
- Cost: §125,000
- Monthly Cost: §275
- Bulldoze Cost: §15,750
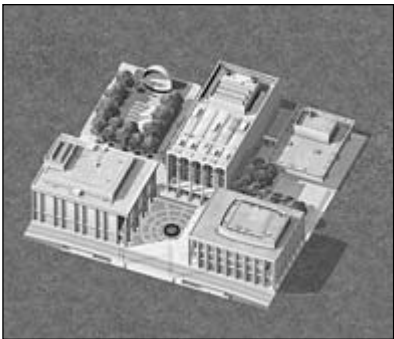
SCHLOSS NEUSCHWANSTEIN

- Size: 9x11
- Origin: Fuessen, Germany
- Cost: §90,000
- Monthly Cost: §180
- Bulldoze Cost: §6,300

Garbage	Flammability	Max Fire Stage	Power Consumed	Water Consumed	Mayor Rating Effect	MR Effect Radius
15	31	4	60	300	6	256
15	31	4	60	300	6	256
8	25	4	45	45	8	256
15	31	4	22	90	6	256

MY SIMS

Your individual citizens, embodied by your My Sims, are some of your best sources of information. With *Rush Hour*, you can get even more deeply inside their heads—and even inside their cars.

Rush Hour includes a plethora of new tools in the added Transportation tab under each My Sim's profile.

You can also use the new Microphone tool in My Sim mode to elicit the opinions of any Sim you see in the streets.

NOTE

My Sim Mode also contains the U-Drive-It menu. This topic is covered in depth in Chapter 33.

MY SIMS' THOUGHTS

In *Rush Hour*, My Sims are more expressive than ever, communicating their every thought about such topics as transportation, education, crime, Rewards, landmarks, pollution, etc., and holding conversations when working or visiting other Sims in their homes.

Sims express themselves with three kinds of bubbles:

Wherever they are, Sims are thinking about your city.

Speech bubble
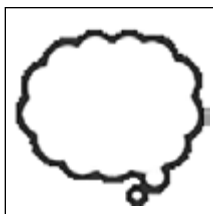
Thought bubble
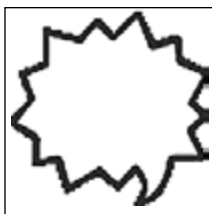
Complaint bubble

Speech bubbles and complaint bubbles are used in conversation with other Sims, while the thought bubble is produced when your My Sim is alone (at home or traveling). The complaint bubble is reserved for expressions of disapproval.

Whenever they're awake, Sims are always thinking and talking. The topics they discuss fall into four categories:

- Transportation
- Local conditions
- Leisure destinations
- Conversation

TRANSPORTATION

When Sims are driving or riding public transportation, they will tell you what they think about it. This opinion is based on the commute time and congestion between their homes and their destinations.

If the congestion is low and the travel time is good, you'll see a green thought bubble for the means of transportation your Sims are on. If it's bad, a red bubble appears.

How's the traffic out there? Just ask your Sims.

Transportation Subject Icons

Meaning	Icon
Trip time/congestion, car	
Trip time/congestion, bus	
Trip time/congestion, train/ monorail/el-train/subway	
Trip time/congestion, ferry	

Transportation subjects can appear in other contexts. When a Sim is at home or visiting another residence, a conversation about the traffic nearby might come up. If opinions are high, a green icon for the kind of transportation (usually, but not always, a car) appears.

Sims also express opinions on transit stations near their houses. If there's a Bus Stop nearby, for example, a R§§§ Sim will think disapprovingly of it while R§ and R§§ Sims will have a positive opinion.
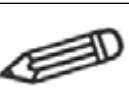
LOCAL CONDITIONS

In many situations, My Sims talk about what things are like where they are. For example, a Sim sitting at home might talk about the neighborhood educational system. If EQ is high in that tract, you'll see a green pencil. If EQ is low, it'll be a red pencil.

This kind of chatter is an alternative way to find out what key conditions are like in specific locations.

Topics for local conditions are:

At home, Sims talk about how things are at home. Not imaginative but informative.

Local Condition Subject Icons

Subject	Approval (green)	Disapproval (red)
Health (HQ)		
Education (EQ)		
Crime		
Pollution		

Local condition subjects aren't limited to the home. Sims discuss and think about such things while driving or walking, while visiting other residences, or at work. These thoughts, however, reflect the location at which the thought is produced. This makes local conditions fantastic barometers for how things are on the ground.

LEISURE DESTINATIONS

Sims discuss many other subjects:

Airport	Car-related Cs	Farm	Friend	Hotel Cs	Jails
Landmark	Marinas, Seaports, Ferries	Movie Theater	Nuclear Power Plant	Parks and recreation	Radioactive rat (for Nuclear Power Plant or Toxic Waste Dump)
Restaurant Cs	Reward	Shop Cs	Trash disposal		
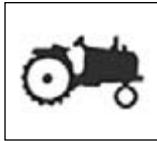
AT HOME

A Sim at home thinks about local conditions and leisure destinations:

- Landmarks: Sims like Landmarks nearby; if a Landmark is too far away, they'll complain.
- Bus Stops: Wealthy Sims don't like Bus Stops near their houses. Other Sims do.
- Nuclear Power Plant: If there's a nuke plant nearby, a Sim will complain about it when at home.

AT WORK

When at work, Sims cover many topics (see Conversation), including destination subjects:

- Radioactive rat: This is a random topic.

- Sailboat: Sims talk about whether or not there's a Marina near their house.

WHERE TO EAT

When Sims travel, they think about food. They're always scouting for suitable restaurants to dine at, even if they don't plan on stopping then. Passing by one is good enough to get a comment from a hungry Sim.

Everyone hates the radioactive rat. It's a big water cooler discussion topic.

Two things dictate Sims' thoughts about the dining establishments they see: their wealth level and the kind of restaurant. When their minds turns to restaurants, they think about the Restaurant icon shown earlier.

For these purposes, restaurants come in three kinds:

- Cheap: Only R§ approve.

- Family dining: Only R§§ approve.

- Fancy: Only R§§§ approve.

This feature doesn't really give you any useful information other than your My Sim's wealth level (which you probably already know), but it is funny to see their social snobbery on display now and then.

ON DISPATCH

If you send a My Sim on dispatch to the kinds of places represented by the leisure destination icons, they express opinions on them. Whether the opinion is positive or negative is often based on defined factors, but is sometimes random.

CONVERSATION

When Sims are around other Sims, they make conversation on a variety of topics. These icons are random and aren't based on anything in the simulation.

You know conversational icons because they are black. If you see a transportation, local condition, or leisure destination icon in black, it's just a random topic of conversation, not anything you need to absorb.

Black conversational icons represent general conversation topics. These don't reflect on your city; they just give your Sims more to talk about.

DISPATCH MY SIM

Previously, your Sims were willing to share their thoughts, but only about what they wanted to talk about.

Now you can elicit their opinions on almost anything with the new My Sims Dispatch. Choose any destination, place the My Sims Dispatch pylon on it, and your My Sim will travel to the pylon and tell you, via thought bubbles, some opinions on it.

NOTE

As with emergency dispatches, you can double-click on a Sim's dispatch pylon to follow on the journey to it.

GENERAL LOCATIONS

If you point to a sidewalk in a neighborhood and place a dispatch pylon, your Sims transport themselves to the location and give you a rundown on the local condition factors (pollution, education, etc.). This is the standard response for any nonspecific dispatch location.

Take your Sim for a stroll to find out how things are around the neighborhood.

SPECIFIC LOCATIONS

Many kinds of buildings elicit specific responses from My Sims on dispatch. If you place a pylon on a building for which there's a My Sim response, the Sim will get to the spot and go inside. After a moment, you'll get an opinion.

She's not too happy with the Toxic Waste Dump, is she?

- Airport: Sims approve of airports with a green Airport icon.

- Car-related Cs: Will generally approve with the green Wrench icon, but may randomly disapprove.

- Farm: On arrival will approve with the green Farm icon if air pollution is below medium or disapprove with the red icon if air pollution is above medium.

- Food-related Cs: Will randomly approve or disapprove with the green or red Restaurant icon.

- Health-care building: On arrival will approve with the green Health icon if the city-wide Health Quotient is above three and disapprove with the red Health icon if it's three or less.

- Hotel: Will randomly approve or disapprove with the green or red Hotel icon.

- Jail: On arrival will approve with the green Jail icon if Jail capacity is above the number of arrests and will disapprove if there are more arrests than cells.

- Landfill: Will be impressed if the Landfill is under 25 percent capacity and will complain if it's over 25 percent capacity.

- Landmark: On approach, will comment randomly on whether the Landmark appeals to them.

- Movie Theater: Will randomly approve or disapprove with the green or red Movie icon.

- Nuclear Power Plant: Will disapprove via the red Radioactive Rat icon.

- Park or recreation building: On arrival will show the green Park icon if air pollution at the site is below medium and the red Park icon if air pollution is higher than medium.

- Recycling Center: If there is no uncollected garbage in the city, Sims show approval with the green Rat icon. If there is uncollected garbage, the Rat is red.

- Residential building: En route, Sims comment randomly on whether they like the person they're visiting with the Friend icon. Once there, they'll chat about random conversational topics.

- Reward building: Will randomly approve or disapprove of the building with a green or red Reward icon.

- Seaport/Ferry Terminal/Marina: On arrival will approve with the green Sailboat icon if water pollution is below medium or disapprove with the red Sailboat if water pollution is above medium.

- Shopping-related Cs: Will randomly approve or disapprove with the green or red Shop icon.

- Toxic Waste Dump: Will disapprove via the red Radioactive Rat icon.

CHOOSE MY SIM VEHICLE

Previously, your Sims chose their own vehicle based on their wealth level. Now, the choice is yours and there are plenty to pick from.

Click on Choose My Sim's Vehicle in My Sim Mode, and you can pick from all available vehicles in your Sim's wealth level or any lower wealth levels (for unpretentious Sims). Your My Sim will drive this vehicle for commutes, on My Sim U-Drive-It missions, and on My Sim dispatches (see the Dispatch My Sim section).

You can change this choice at any time.

Pick any vehicle your Sim can afford. The motorcycles are a hoot.

CHOOSE MY SIM PEDESTRIAN STYLE

Next to Choose My Sim's Vehicle is another tool to individualize your My Sims. Click on Choose My Sim's Pedestrian Style to dictate what kind of conveyance your Sim will use to go places on foot.

Send your Sim out on a pogo stick, have him or her carried in a palanquin or a rickshaw, or strap him or her to a jet pack. Or let you're Sims walk. The choice is yours.

This is the mode of transportation your My Sim will use in My Sim dispatches close to home or on any pedestrian trips.
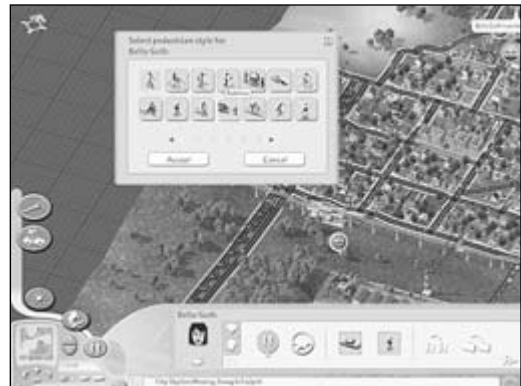
No, I'm more of a skateboard kind of Sim!

CHANGE MY SIM'S HOUSE

You can manually move your Sim to a new home with the Change My Sim's House button. Click on it and point to a new place where you want your Sim to reside. If it's wealth-appropriate, the arrow turns green.

This is a handy traffic information tool if you're trying to see what the commute is like from a particular neighborhood. The next time your My Sim commutes, watch and see what opinions pop up. If green transportation icons appear, that neighborhood has a good travel situation. If, on the other hand, your My Sim sits in traffic and thinks about how horrible the drive is (red transportation icon), odds are other Sims in that neighborhood are unhappy too. See what you can do for them.

Put a spy in a specific neighborhood by changing your Sim's home.

CHANGE MY SIM'S JOB

You can now specify where your My Sim goes to work. Click on the Change My Sim's Job button and point at a workplace; if the arrow turns green, it means that the job you've selected is wealth-appropriate and your Sim may take it.

Use this as a traffic diagnosis tool by putting your My Sim in a job in a particular work district you'd like to explore. Observe the commute and see how it goes. If it's difficult getting to a job in that location, there's a problem you have to fix.

Find out how hard it is to get to a workplace by putting your Sim in a job there.

MICROPHONE TOOL

The Microphone tool can be used on any Sim walking the streets and the cars as they pass by. Activate the Microphone tool and click on whomever you wish to "interview" for that Sim-on-the-street point of view. When you point at a Sim or car you can interview, the tool changes from yellow to green.

Excuse me, sir, what do you think of the educational system on this street?

Like My Sims, these random anonymous Sims tell you what they think of local conditions as they move with the Microphone tool attached to them.

DISASTERS

A well-orchestrated disaster can lay to waste the best plans. Every sadistic Mayor knows this, and that's why *Rush Hour* wouldn't be complete without five brand-new disasters.

GOD MODE DISASTERS

As discussed in Chapter 27, God Mode Disasters are user-initiated; they don't happen by chance. You must make the decision to inflict them on your city in a precise location. God Mode Disasters are activated in the God Mode menu under the Create Disasters menu.

Rush Hour adds two otherworldly Disasters to visit upon your terrified populace: Autosaurus Wrecks and UFO.

AUTOSAURUS WRECKS

Autosaurus Wrecks is the evil spawn of a thousand traffic pileups. This mighty metal beast has a bone to pick with your city, and he loves the taste of cars and trucks. In fact, as you see when he bursts into being, he's made of them.

If you sic him on your city, you can watch him pound his massive metal feet into your fragile buildings, crushing everything in his path. He does not, however, start fires or destroy anything below ground.

You direct Autosaurus Wrecks around your city by clicking and holding the left mouse button on the part of your city to which you want him to go. The longer you hold the button, the faster he trots.

The only thing this automotive nightmare fears is rust. If he encounters water during his rampage, he disappears in a massive (but not destructive) detonation.

Autosaurus Wrecks materializes in your city on your command. Are you ready for some footfall?

When Autosaurus reaches water, he departs in a ball of smoke and flame. Nice exit!

UFOS

If you think your Sims are ready for a close encounter, you can give it to them. Summon the UFOs and the first thing you'll see is an ominous and awesome shadow cast across the landscape.

When the UFOs descend, your city plunges into darkness.

It's OK, though; the UFOs will shine some light. Oops.

As it reaches your chosen ground zero, the UFO unleashes first an abduction beam, sucking up cars from below, followed by a vaporizing death ray. Finally, it releases several small UFOs that use your city for laser cannon target practice.

The destruction caused by this invasion is impressive but surgical in its precision. The rubble won't be widespread, but the ensuing panic will.

You can guide the mini-UFOs to target specific locations by clicking and holding on a spot on the ground.
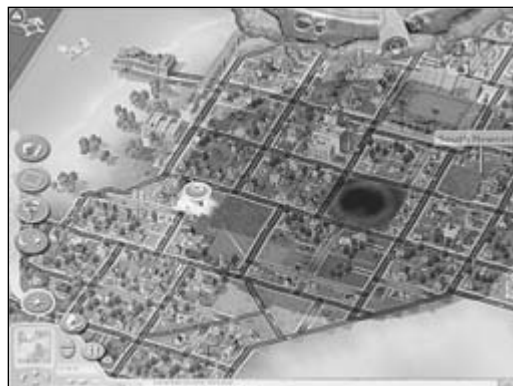
The mini-UFOs get out for a little fun at your city's expense.

SIMULATION-INITIATED DISASTERS (MINI-DISASTERS)

Mini-Disasters are outside your control but occur based on choices you've made or actions you've taken. Fire, for example, can occur automatically but only in places of high flammability. You only have highly flammable areas if you've neglected or chosen not to provide water service and fire protection to your city. All blame trickles to the Mayor!

Rush Hour introduces several new undesired consequences for your actions.

TRAFFIC PILEUP

The Traffic Pileup Disaster is an indication of extreme congestion at an intersection.

The more traffic passing through an intersection, the higher the probability of an accident. This chance begins as traffic volume through an intersection reaches 25 percent of its maximum, rises gradually until volume reaches 100 percent of the intersection's capacity, and skyrockets as congestion moves over full capacity.

A traffic pileup is a sign that you need to tinker with an intersection; it's too busy.

At any given moment after that, there's a rising probability of an accident, up to a 30 percent chance. Accidents, when they happen, make a lot of racket and cause mess that's hard to miss. They last for 20 seconds but have no Disaster-like aftereffects that you have to clean up. Each intersection is limited to one accident per month.

Traffic Pileup Probability

Congestion	Probability of Pileup
25 percent	0 percent
100 percent	5 percent
200 percent	30 percent

The Traffic Pileup is less a true Disaster and more of a big, "Hey, you! Heavy traffic here!" call from your transportation system. Pay attention to the warning signs and do something about it (hint, hint, Mayor: see Chapter 32).

TRAIN DERAILMENT

As with asphalt networks, decreasing funding to mass transit results in damage to your Rail network (not to Monorail, Subway, or Elevated Rail) in the form of gnarled track segments.

Unlike the traffic-slowing potholes such penny-pinching causes in asphalt networks, however, Rail damage causes Train Derailment Disasters. Any time a train rides over a damaged segment of track (in the normal simulation and in U-Drive-It Mode), it has a 100 percent certainty of derailment.
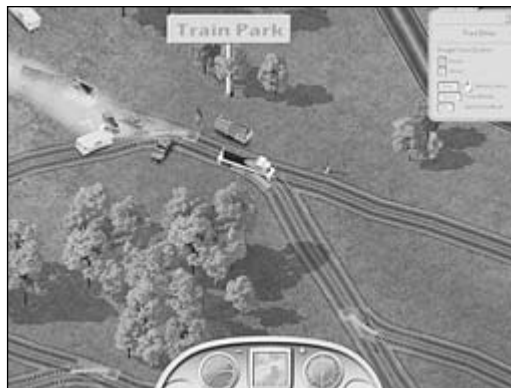
A train derails. Maybe reducing mass transit funding wasn't a good idea after all.

Derailments don't cause any simulation problems but should be a warning sign that your transportation funding is too low. Low funding can result in other messier disasters: See Toxic Spill.

You can repair tracks only by restoring mass transit funding above 100 percent. The higher you go, the faster repairs are made—optimum repairs for the money will occur at 110 percent. Restoring funding to only 100 percent leaves the system at status quo; no further damage but no repairs. You can also demolish the damaged segments and manually replace them.

> **NOTE**
> Derailments can also occur in U-Drive-It Mode, but these are caused by excessive speed around tight corners.

TOXIC SPILL

Occasionally, a Freight Train will have in its collection of cars a Toxic Waste Tank. The chance of such a car being in a given Freight Train is 10 percent.

Normally, these hazardous material shipments move around your city without incident. If your tracks are damaged, however, owing to decreased funding, one of these cars could spill in an otherwise harmless derailment. In any derailment with a Toxic Waste Tank car, there's a 50 percent chance it'll crack open. The result: a nasty Toxic Spill Disaster.

Toxic spills put you into Disaster Mode. To resolve the Disaster, you must dispatch your Fire Engines to the scene. Your firefighters know automatically to bring the required neutralizing foam for the toxic spill rather than their usual water.

> **NOTE**
> Your Hazmat Dispatches' skill at handling toxic waste spills is, as with fire dispatches, dictated by the level of departmental funding. Underfund them and it'll show in their ability to handle disasters. See Funding and Competence in Chapter 18.

DISPATCHES

Rush Hour introduces three new kinds of dispatches.

POLICE HELICOPTER

The airborne Police Helicopter Dispatch moves nimbly over your city and arrives quickly at distant or inaccessible locations. It's available only if you have the Deluxe Police Station Reward in your city. To summon it, use the new Police Helicopter Dispatch under the Emergency Tools menu in Mayor Mode.

When the helicopter flies to a dispatch (usually to quell a riot), it shines its spotlight onto the scene of the crime, causing the retreat of a rioting mob or apprehension of any criminal caught in the act.

Let the light shine on evildoers with the new Police Helicopter Dispatch.

Unlike for car dispatches, underfunding does not affect Police Helicopter Dispatches.

FIRE PLANE

Fire Plane Dispatches are only available from the Fire Department Landing Strip Reward building. They fly over the rooftops and trees of your city, dumping water in wide swaths wherever you place its special dispatch pylon. To summon it, use the new Fire Plane Dispatch under the Emergency Tools menu in Mayor Mode.

NOTE
You can also dispatch the Fire Plane by selecting it in the U-Drive-It menu and accepting the mission Water Drop for Fire.

The Fire Plane Dispatch is slow to get off the ground, making it less effective for large fast infernos. For inaccessible areas, however, where roads don't go or the trip is long, there's no finer way to put out the blaze.

Unlike with Truck Dispatches, underfunding does not affect the efficiency of Fire Planes.

It may take its time getting airborne, but the Fire Plane does a nice job putting out blazes.

TOXIC SPILL DISPATCH

The Toxic Spill Disaster calls for a special kind of dispatch; you can't just spray water on this stuff, you know! Your Fire Dispatches are now equipped and trained with neutralizing hazmat foam that erases any potential contamination from a toxic spill.

Fortunately, you don't need to do anything special to get this dispatch to work beyond calling in the fire trucks. They know what to bring when toxic spills occur.

When glowing green goo spills, who you gonna call? Your firefighters, of course; they know hazmat.

N O T E

Alternately, you can douse a toxic spill in U-Drive-It Mode by selecting the Fire Engine and racing to the scene in Free Drive.

When Fire Station funding is low, however, the fire trucks may not be as handy with the foam as you'd like. Low funding results in serious clumsiness and low effectiveness at dealing with your city's green messes.

INDEX

INDEX

INDEX

INDEX

INDEX

city characteristics, 287
costs, 17
Demand Cap Relief, 71, 76
demolition costs, 439
educational effect of, 259
jobs provided by, 79
NIMBY / YIMBY Effects, 100
pollution effect, 167
Reward Unlocks, 401
statistics, 265, 266, 288-89
utility usage, 221
U.S. Capitol Building, 343, 349
    Mayor Rating Effect, 21, 195
    NIMBY / YIMBY Effects, 100
    pollution effect, 167
    utility usage, 221
utilities
    costs, 200-202
    decay, 202-4
    information sources, 217
    Non-RCI Building utility use table, 217-21
    ordinances, 217
    quick tips, 25-26
Utilities Advisor, 137
Utilities Department funding, 150
utilities tool costs, 16-17
utility buildings
    decay, 201-2
    Queries, 130-31
Utility Tools, 34
Utility Use Table
    Non-RCI buildings, 217-21

V

vacated buildings, 119
vehicles
    mission, 402-14
vehicle structures, 413-14
visual clues, 123-26
vital factors
    RCI buildings, 127
volcano, 329

W

walking, 241-42
    trip time, 248
Washington Monument, 343, 349
    Mayor Rating Effect, 195
    NIMBY / YIMBY Effects, 100
    pollution effect, 167
    utility usage, 221
Waste to Energy Plant, 215-16
    air polluter, 18
    costs, 17
    flammability, 21
    jobs provided by, 79
    pollution effect, 167
    power/ pollution/ cost, 208, 210
    utility usage, 221
    water polluter, 18
water
    building directory, 213-14
    consumption in Non-RCI buildings, 217-21
    Data View, 133
    effects, 210-11
    graphs, 135
    Maintenance Cost, 201
    polluters & reducers, 19
    pollution, 213
    services, 211-13
    Utility Output, 203
Water Conservation Program, 217, 305
Water Department
    funding, 150
    funding effects, 154-55
Water Drop for Hire, 428
Watered
    vital factors in RCI Query, 127
Water Escape, 424
Water Pollution
    Data View, 134
    graphs, 135
    Landmark statistics, 342-43
    Transportation Building Query, 131
    Utility Building Query, 131
water pollution
    effect by structure, 162-67
    Mayor Rating factors, 188

Waterproof Mind Control Device, 425
Water Pump
    costs, 17
    utility usage, 221
water supply
    structure shut down, 169
    system, 40
        abandonment factor, 120
        stage cap, 114-15
Water Tower
    costs, 17
    pollution effect, 167
    utility usage, 221
water transportation
    building in Expansion Pack, 390-91
Water Treatment Plant, 173
    costs, 17
    jobs provided by, 79
    pollution effect, 167
    utility usage, 221
wealth
    levels of Residential Sims, 56
    ratio
        Mayor Rating factors, 193
    vital factors in RCI Query, 127
Whale Watching Tour, 425
Whistle Stop Tour, 423
White Collar Crime, 423
White House, 343, 349
    Mayor Rating Effect, 195
    NIMBY / YIMBY Effects, 100
    pollution effect, 167
    utility usage, 221
Who Loves You, Baby?, 428
Wind Power Plant
    costs, 16
    pollution effect, 167
    power/ pollution/ cost, 208, 210
workforce demand
    and Developer types, 65-66
WP Radius
    effect by structure, 162-67
    Landmark statistics, 342-43

Y

Yacht, 411
Yellow Smog, 124
YIMBY / NIMBY
    top RCIs, 20
YIMBY (Yes in my back yard), 96
You Can Throw Money at It, 423
Youth Curfew Act, 234, 305

Z

zones
    agricultural, 83-84
    balancing, 85-86
    commercial, 81-82
    compatibility, 118
    Data View, 134
    density, 84-85
    and developer types, 58-59
    industrial, 82-84
    kinds of, 80-84
    laying out, 87-89
    placement of to contain pollution, 170-71
    quick tips, 23-24
    residential, 80-81
Zone Tools, 15, 33
zots, 126