

# Municipal GIS Strategies

*(and a path to profit)*

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# Enterprise GIS Strategic Objectives

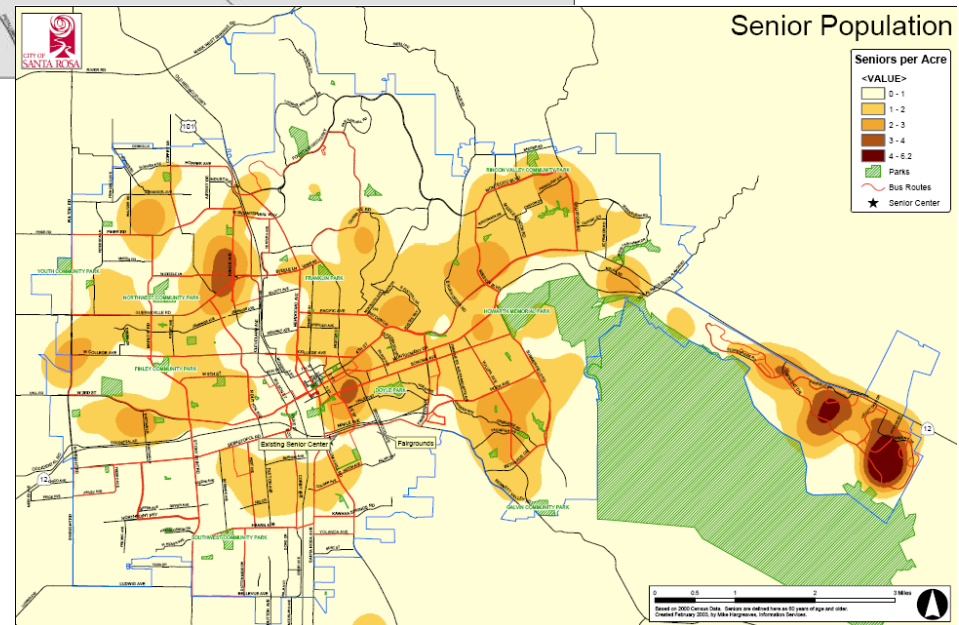
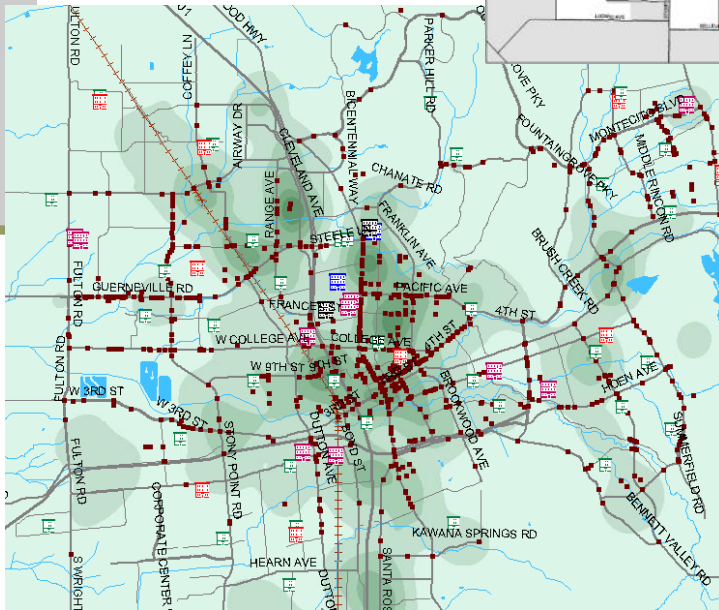
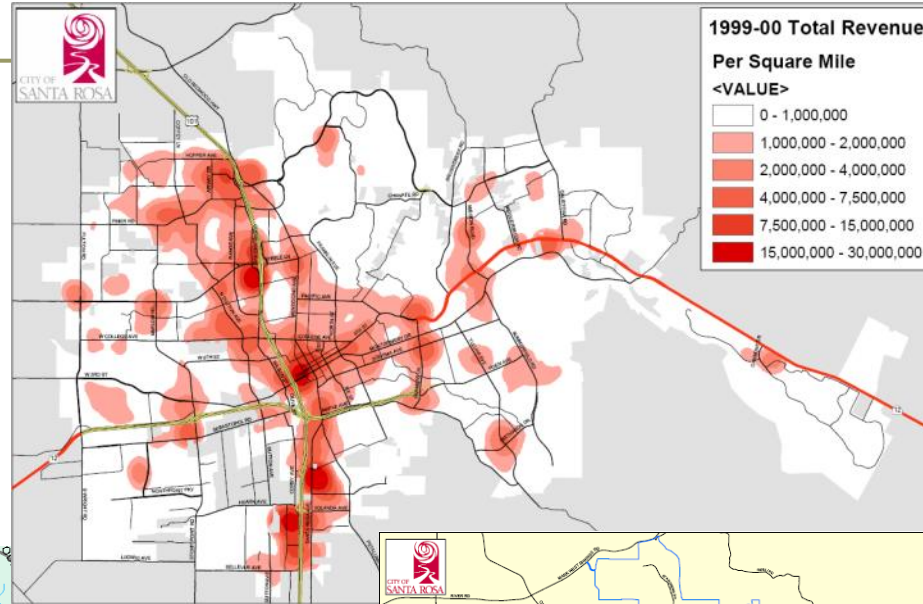
*“Do more from the desktop”*

Background

- 1. Ease of Doing Business with the City**  
Aerials, maps, land-use analysis, parcel information, etc  
Streamline planning and permitting processes
- 2. Improve Staff Efficiencies: *Do more from the desktop***  
R&P street trees pilot project  
System integration across enterprise applications  
Support mobile applications (inspections, work orders, permitting)
- 3. Improve visualizations and decision-making capabilities**  
Departments: deliver “what-if” scenario modeling  
Policy makers: enhance communication of key concepts  
Public: increase awareness and/or participation (“an informed public”)

# More than Pretty Maps

*Improve Visualizations and Decision Making Capabilities*



# 3D Modeling Capabilities

## *Generating Excitement around GIS*

### GOAL: Leverage new, off-the-shelf technologies

Google Earth, Microsoft, ESRI

Take advantage of growing expertise in 3D modeling

More models as necessary (\$50-\$100/building)

### GOAL: Open Platform

Easy to add and modify

Optimized for “What-if” scenarios

Connects with existing GIS-based asset and map information

### How can we use this?

Early planning tools

Transit Mall

Courthouse Square

Mendocino Avenue corridor

Sightline and ridgeline analysis

Water towers, golf driving range, ridgeline development, etc



# Today's Usage of GIS

*Beyond just internal GIS...*

## 1. Residents and Businesses

- Over 200 external GIS users per day through [srcity.org](http://srcity.org)
- Land use, zoning, permitting (residential and commercial)

## 2. City Staff

- Over 150 internal GIS users per day
- Planning, zoning, permitting, code enforcement, front counter service
- Mailing labels (notification)

## 3. GIS Hosting Service for Other Cities

- Rohnert Park, Sebastopol, Windsor, Coverdale, Sea Ranch
- ~\$20K per year revenue to City of Santa Rosa

## 4. GIS Map Services

- Roughly 100 FREE maps available through [srcity.org/maps](http://srcity.org/maps)
- ~\$10K per year revenue in Fee-based GIS services
- ~\$5K per year revenue in Subscription-based GIS services

# Fee-Based GIS Services

## Revenue Opportunities



### Three tiers of GIS access

- Free
- Advanced (via subscription)
  - \$500/year for institution
  - \$150 for individuals
- Custom work at \$100/hour

### ADVANCED INTERACTIVE MA



Skip To: Content

HOME VISITORS RESIDENTS BUSINESS

City of Santa Rosa \ Departments \ Administrative Services \ Information Technology \ GIS, Maps and Documents

- Downloadable PDF Maps
- Beginner Interactive Map
- Interactive Maps
- Advanced Interactive Maps
- Other Fee-Based Services
- 3D Simulation of Downtown Santa Rosa

#### Advanced Santa Rosa GIS

This map is an extension of the Intermediate Interactive Map, and will be accessed through that link. This site is for individuals and firms who would like to have access to additional functionality. This includes online access to thousands of scanned documents, including Final Maps and Improvement Plans. Another feature is the ability to create Resident Mailing Labels for parcels anywhere in Sonoma County based on a geographic selection. There are also high resolution Aerials that can be viewed and downloaded. There will be an annual subscription fee of \$150 for individuals and \$500 for firms for this new service. To apply, applicants will need to fill out the application below, and return it to the address on the form, along with a check made out to the City of Santa Rosa.

Feel free to contact our GIS Coordinator at [mhargreaves@scity.org](mailto:mhargreaves@scity.org) if you have any questions or would like a demo.

To subscribe, print and fill out the appropriate form below, and then return along with payment.

- [Individual GIS Sign-Up Form](#)
- [Company GIS Sign-Up Form](#)

# Marketing GIS Services

## Awareness!

### Internal

- Executive Staff
- City Council
- Department staff

### External

- GIS Day
- Press Democrat (local paper)
- Local organizations: downtown committee, Chamber of Commerce, Rotary Clubs, architects, etc)

#### Santa Rosa's Digital Timeline

Published: Monday, October 13, 2008 at 4:21 a.m.  
Last Modified: Monday, October 13, 2008 at 10:09 a.m.

1972-- Santa Rosa begins processing utility bills on computerized punch-card system. It outsources the work to Sonoma County, which loses an entire month of its utility bills.

##### Related Links:

- Street-by-street, Santa Rosa is gathering digital data
- Policy updates urged to protect residents' privacy

1976-- The city hires Xerox Computer Services to begin digitizing records, such as utility bills and police files.

1980-- The city pays \$550,000 for computers and software to retain digital records in-house.

1983-- City installs word processing workstations.

1984-- Police Department gets first digital dispatch system.

1987-- City buys first PC and installs WordPerfect. It slowly begins phasing out workstations.

1995-- A PC is on nearly every city desk, totaling more than 1,000 personal computers.

1997-- The city launches its first Web site.

1998-- The same year Google is founded, employees begin overlaying property lines onto a digital map of Santa Rosa, creating the city's first geographical information system.

1999-- GIS carries favor with city employees who no longer have to spend hours locating and transcribing addresses to inform residents located near proposed building projects, as required by law. GIS locates addresses and prints out mailing labels within minutes.

2000-- City Council approves budget for a GIS coordinator. Aerial photos incorporated into GIS system.

2001 to 2002-- Heaps of digital blueprints, such as the location of sewer lines, fire hydrants, light poles and stop signs, are added to city's GIS.

#### 3-D Visions

SHARING UP PROJECTS: Free Google software may enable SR to see urban development plans in early stages to gauge viability



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ADDING DIMENSION: "We're taking advantage of the data we already have. We're just presenting it better," said Sky Holsinger, chief technology officer for the City of Santa Rosa, who is testing 3-D imaging software for the city's future planning projects.

By NATHAN HALVERSON THE PRESS DEMOCRAT  
Published: Monday, May 26, 2008 at 3:28 a.m.  
Last Modified: Monday, May 26, 2008 at 6:12 a.m.

It may look like a scene straight out of "The Sims," but this digital 3-D depiction of Santa Rosa is no video game. City staff are building a detailed three-dimensional model of downtown using graphic software.

#### Street-by-street, Santa Rosa is gathering digital data

By NATHAN HALVERSON  
THE PRESS DEMOCRAT

Published: Monday, October 13, 2008 at 4:25 a.m.  
Last Modified: Monday, October 13, 2008 at 2:52 p.m.

Santa Rosa is photographing every yard, building and lamppost along all city roads, from A Street to Zurlow Court.



JOHN BURGESS/ PD

The city of Santa Rosa is creating its own database, using an SUV with a 360-degree view camera to photograph everything on every street in the city.

##### Related Links:

- Policy updates urged to protect residents' privacy
- Santa Rosa's Digital Timeline
- Google claims right to post photos from private land
- Furor over Google views reignites
- Viewing life in Sonoma County

It is creating a vast database that it plans to use for everything from enforcing planning codes to cataloging the city's street trees.

It has hired a contractor to drive down streets and take millions of highly detailed photos to create a digital, panoramic world -- similar to Google's controversial Street View images but with higher resolution.

The street-level photos, which can be viewed by city employees on an internal computer network, are the latest addition to the city's growing arsenal of digital tools used to manage daily operations.

While it sounds like Big Brother incarnate, the city's growing use of technology is designed to save employee time, cut paper waste and curb emissions by reducing driving.

City officials believe efficiencies gained through technology will help maintain services in a time of severe budget cuts.

Funded with a \$197,000 matching grant from the