



Create a Framework for a Comprehensive CIP Prioritization Plan that Considers all City Assets

City Council Meeting
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OUTLINE

- Purpose and background
- Santa Rosa Water CIP Prioritization Program
- Why Asset Management?
- What is Asset Management?
- How do we get from Asset Management to Project Development?
- Citywide Prioritization Program Development

BACKGROUND

- Council directed staff to develop a prioritized project list as part of FY15/16 CIP budget hearing
 - Improve transparency and clarity
 - Ability to describe and defend projects
 - Develop project prioritization process
 - Project selection to maximize public benefit
- Comprehensive CIP = Excellence in Asset Management
- Build on foundation set by SRW Asset Management

WHAT IS AN ASSET?

as·set –noun

a useful or valuable thing, person, or quality



INCREASING CHALLENGES

- Regulatory compliance
- Aging assets
- Customer demands
- Security
- Financial constraints
- Loss of institutional knowledge
- Climate change
- Emergency response
- Resiliency / how quickly we recover



WHY ASSET MANAGEMENT?

- No surprises
- Right decisions
- Right time



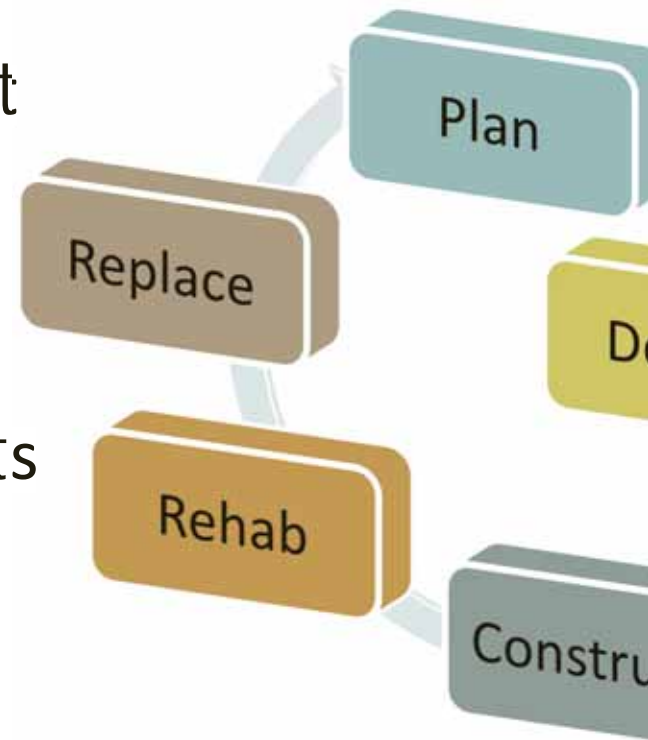
WHY ASSET MANAGEMENT?

- What work should our operations and maintenance crews be doing, where, and why?
- Which projects to undertake, when, and why?
- When to repair, when to refurbish, and when to replace?
- Provide the best value for our customers.

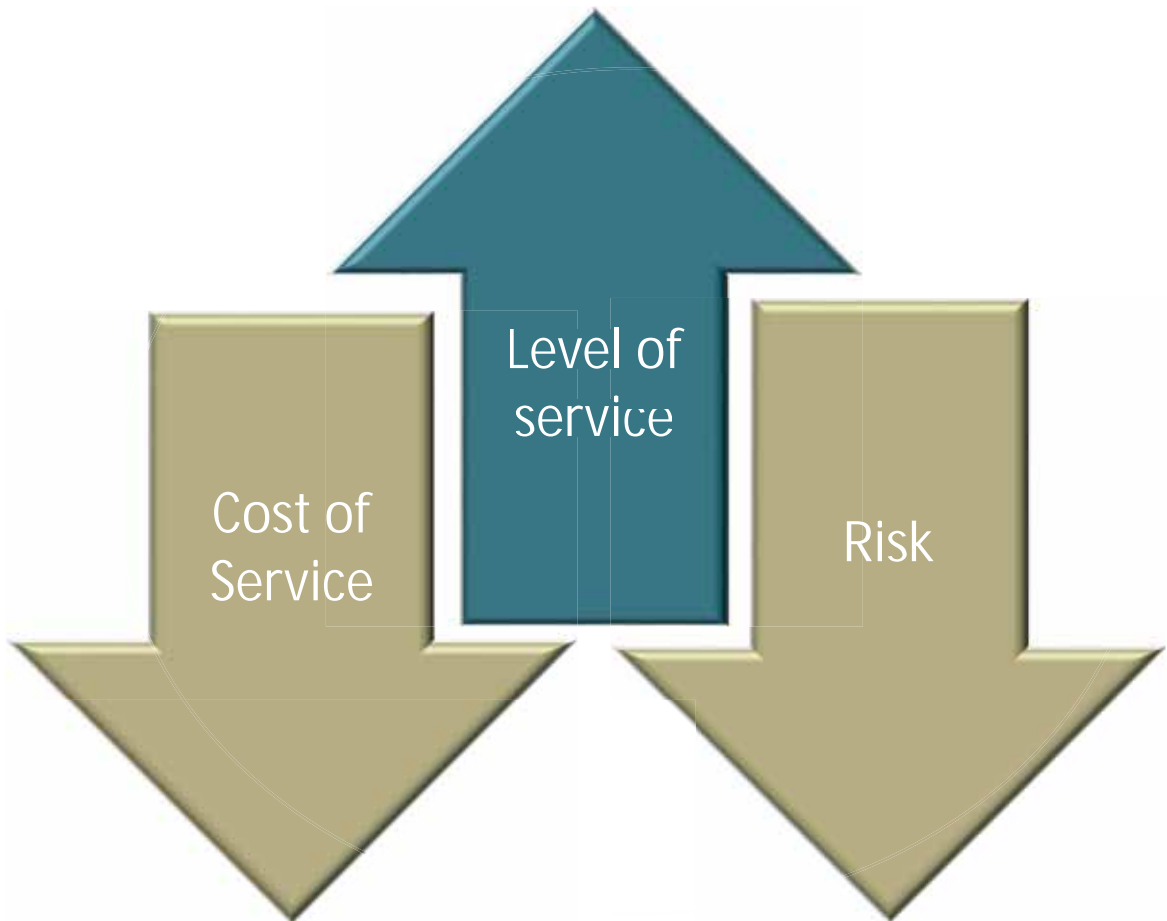


WHAT IS ASSET MANAGEMENT

- Not software
- Management commitment
- Long term financial plan
- Project development
- Based on life cycle of assets



COMPREHENSIVE ASSET MANAGEMENT



PROCESS: ASSET MANAGEMENT T PROJECT DEVELOPMENT

- Comprehensive Asset Management
 - Data
 - Standardized Criteria
- Leads to Data Driven Decisions
 - Project Development
 - 5-Year CIP Program
 - O&M Budgets



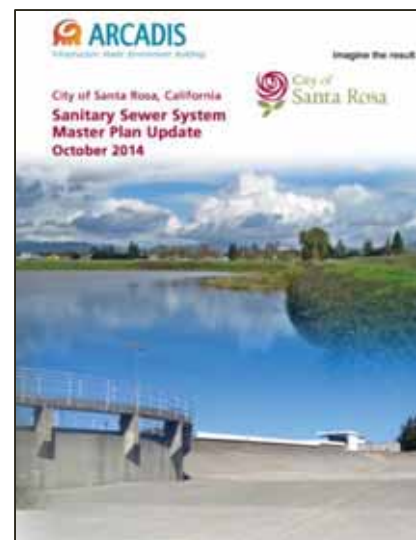
SRW PRIORITIZATION PROGRAM

- Capital projects have been systematically prioritized for some time
- Program re-evaluated and re-prioritized every year
- Incorporates
 - Water
 - Sewer
 - Subregional



STANDARDIZED CRITERIA

- Regulatory Requirements
- Legal Mandates
- Condition Assessment
- Operations Maintenance History
- General Plan and Master Plans
- Public Input
- Street Overlays
- Proximity to Other Assets



ASSET SCORING PROCESS

CONDITION

- Remaining Service Life
- CCTV-Pipe Condition
- Number of repair work orders
- Number of scheduled maintenance

PERFORMANCE

- Hydraulic Capacity
- Flush Score
- Slope

RISK

- Seismic Activity
- Fire Flow Deficiencies
- Creeks
- Hwy Right-of-Way
- Railroad Crossings

ASSET SCORING PROCESS

CONDITION

+

PERFORMANCE

+

RISK

=

TOTAL SCORE

CONDITION ASSESSMENT

- CCTV allows us to assess condition of sewer pipes
- Allows us to identify deteriorated pipes that need replacement.



RESIDUAL LIFE

Remaining Service Life Sanitary Sewers

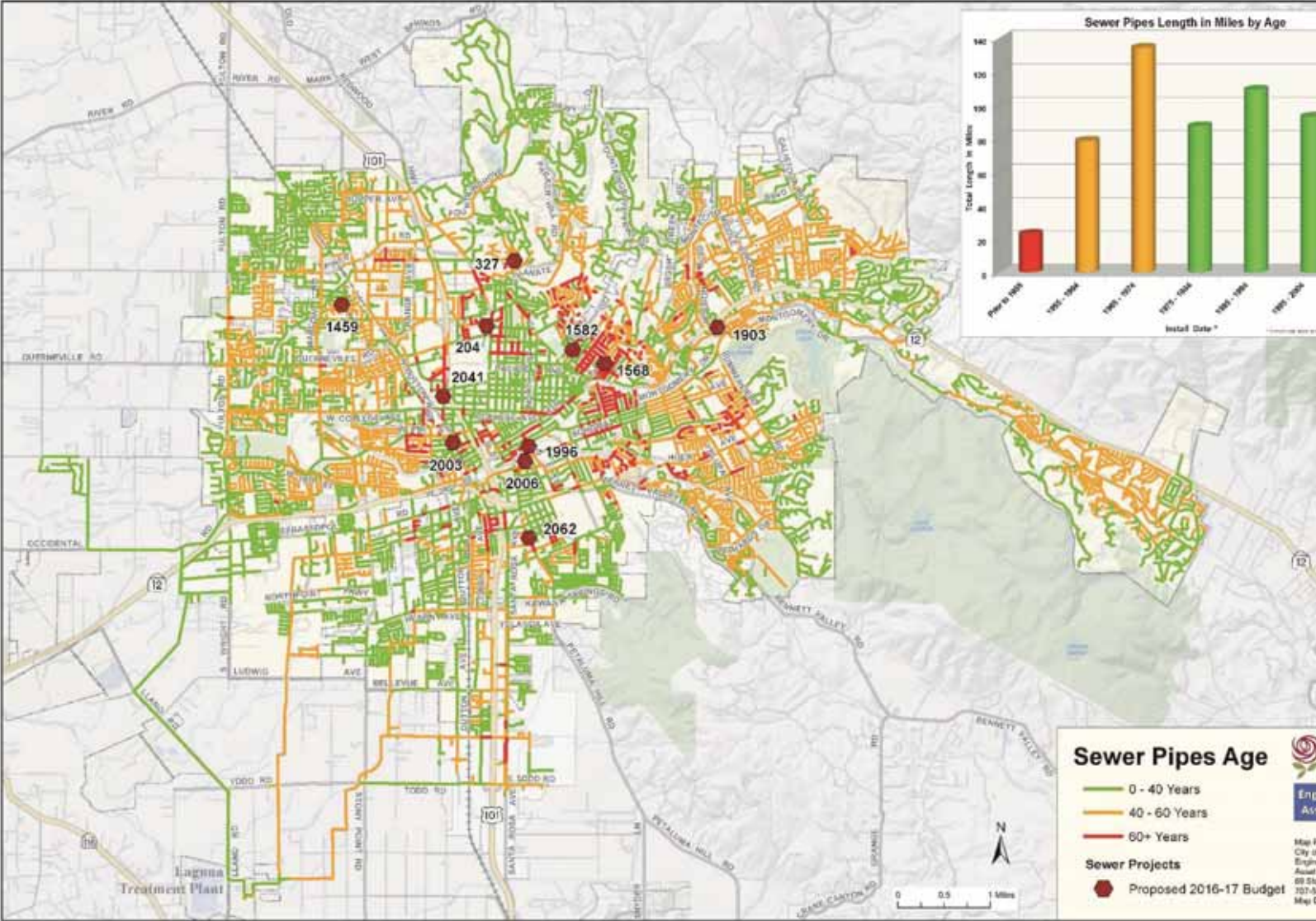
Material Type	Description	Estimated Service Life
PVC	POLYVINYL CHLORIDE	100
PE	POLYETHYLENE	100
DIP	DUCTILE IRON PIPE	80
AC	ASBESTOS CEMENT	65
CAS	CAST IRON	75

PROJECT DEVELOPMENT PROCES

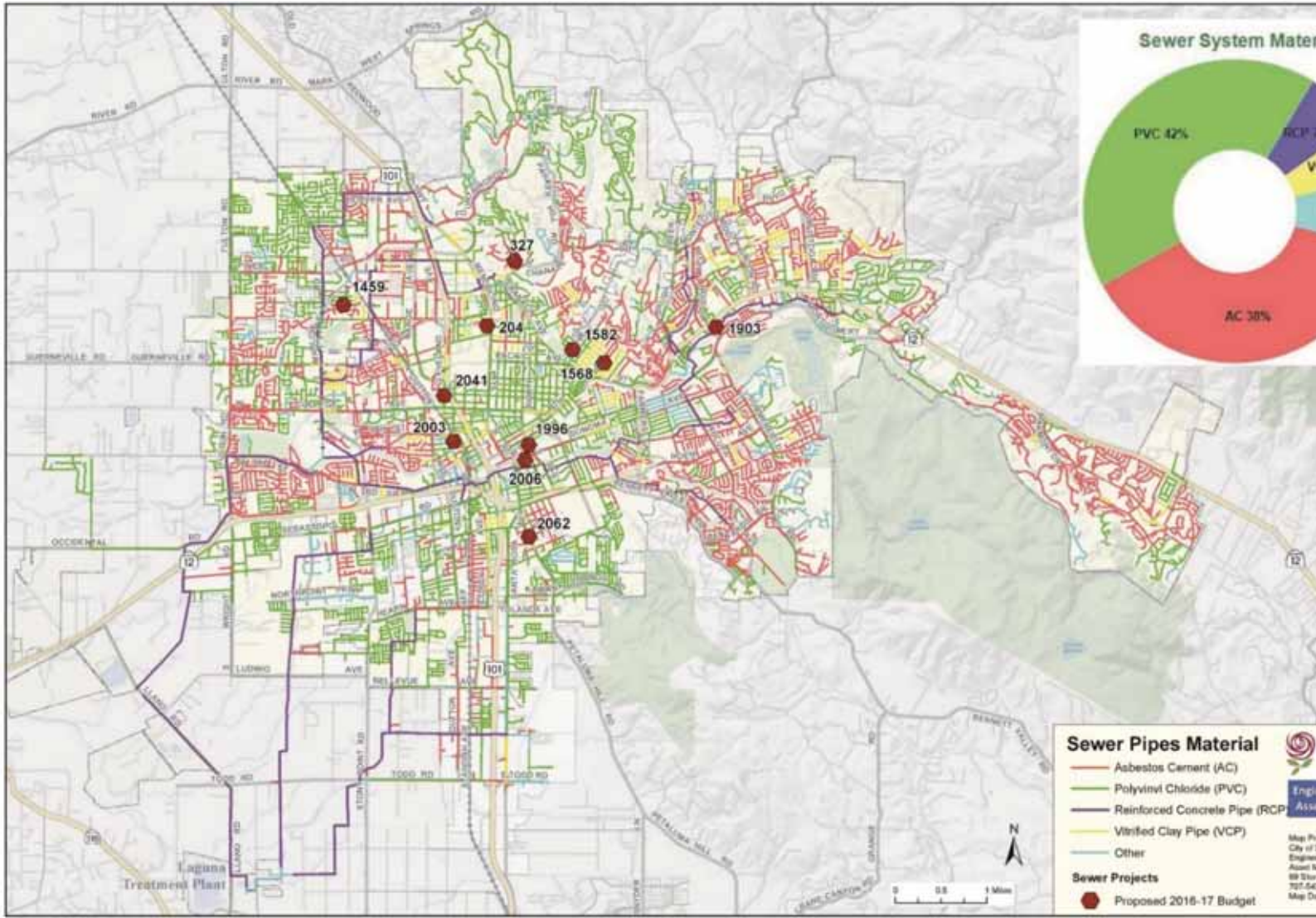
1. Review Master Plans
2. Update asset scores
3. Assess risks
4. Establish new scores
5. Rank priorities
6. Reality check
7. Develop CIP based on funding



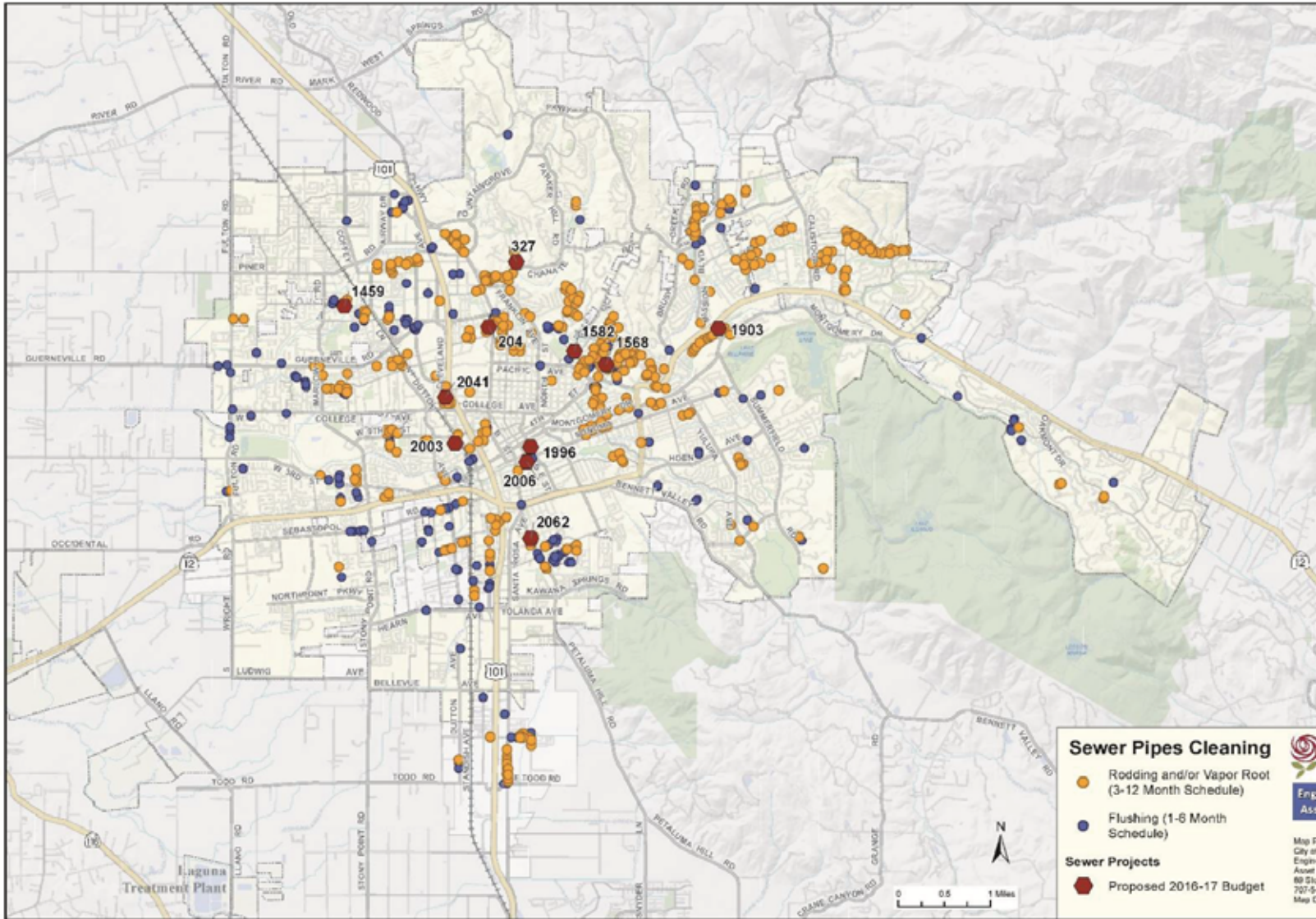
SEWER COLLECTION SYSTEM BY AGE



SEWER COLLECTION SYSTEM BY MATERIAL



SEWER COLLECTION SYSTEM SCHEDULED MAINTENANCE



LTP PROJECT DEVELOPMENT

- Largely driven by regulatory requirements
- Risk
 - Seismic
 - Flood
- Planning Tool
 - O&M asset analysis
 - 2-20 year life cycle
- Master Plan under development
 - CIP 20-50 year horizon



PRIORITIZATION PROGRAM DEVELOPMENT

- Retained The Matrix Consulting Group
- Key program factors
- Many common themes among the various programs
- Ability to focus on Council Goals and Priorities



PRIORITIZATION FACTORS

- Risk to health, safety and environment
- Regulatory or mandated requirements
- Asset condition, annual recurring costs and asset life
- Community investment and economic prosperity
- Level and quality of service
- Public & CAB Input



PRIORITIZATION FACTORS

- Sustainability and conservation
- Funding availability
- Project readiness
- Community demand
- Multiple category benefits and bundling opportunities



EXAMPLE PRIORITIZATION SCORING MODEL

Factors	Enterprise-Funded Assets and Mandated Programs	Mobility Assets	Public Safety Assets	Neighborhood Assets
1. Risk to Health, Safety and Environment and Regulatory or Mandated Requirements	25	20	15	10
2. Asset Condition, Annual Recurring Costs and Asset Longevity	20	20	20	15
3. Community Investment and Economic Prosperity	20	20	10	25
4. Level and Quality of Service	10	20	30	20
5. Sustainability and Conservation	10	5	5	10
6. Funding Availability	5	5	10	5
7. Project Readiness	5	5	5	5
8. Multiple Category Benefit and Bundling Opportunities	5	5	5	10
TOTAL	100	100	100	100

PRIORITIZATION PROGRAM

A prioritization program will:

- Improve transparency and clarity
- Describe and defend projects
- Ensure projects are selected to maximize public benefit



NEXT STEPS

- Finalize work with The Matrix (*May 2016*)
 - Project Development and Delivery
 - Capital Project Prioritization
- Bring final Capital Project Prioritization Program Council for adoption (*June/July 2016*)
- Implement The Matrix's recommendations:
 - Prioritization policy
 - Review Committee
 - 5-Year CIP
 - Prioritization protocol
 - Annual
 - Dept -> AM -> Committee
 - Funding restriction