

W-67 Pressure Reducing Valve (PRV) Rehabilitation

Category: **Water**
 Department: **Utilities**

Status: **Ongoing**Location: **Various locations throughout Water Utility's service area****Programmed Expenditures**

Programmed Expenditures	Appropriated To Date	FY 2015 Budget	FY 2016 Budget	FY 2017 Budget	FY 2018 Budget	FY 2019 Budget	FY 2020 Budget	FY 2021 Budget
10,494,971	7,639,971	433,000	384,000	392,000	399,000	407,000	416,000	424,000

Description and Scope

This ongoing program is to rehabilitate or replace old and deteriorating pressure reducing valves (PRVs) throughout the water service area. The number of pressure reducing valves that are rehabilitated varies from year to year based on the annual program budget and the rehabilitation costs, but over the long term should average about 3 PRVs per year. Replacement criteria include service requirements, safety, maintenance history, age, and availability of replacement parts.

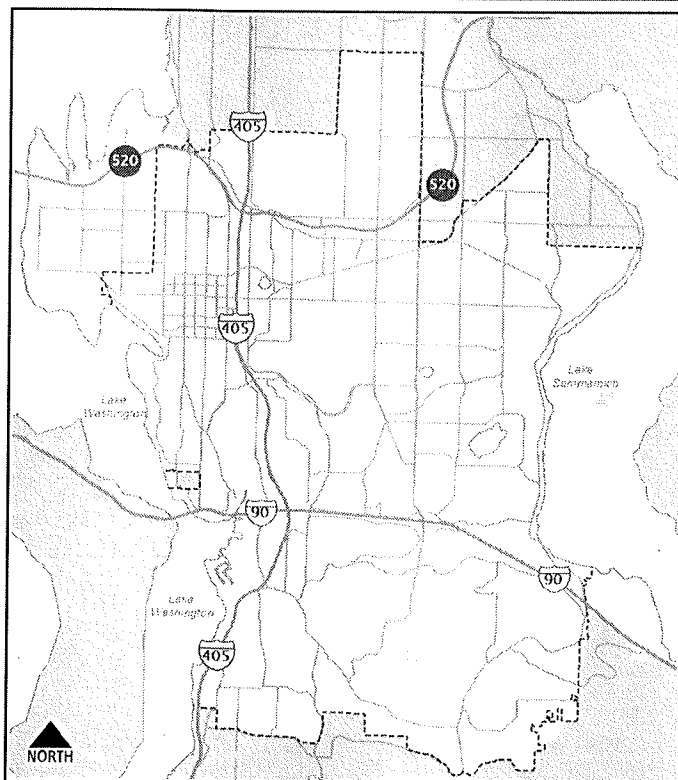
Rationale

Bellevue's water system includes 142 PRVs that supply water throughout Bellevue. During normal operation they sustain the water pressure to homes and businesses in service areas of similar elevation, known as 'water pressure zones'. When they sense a drop in system pressure, these valves open wide to provide additional water to fight fires or in response to other supply deficiencies.

PRVs require rehabilitation or replacement every 35-45 years, as parts become obsolete and mechanical wear leads to unreliable performance. The oldest PRVs are in small, deteriorating vaults that make the increased maintenance and repair work problematic, are too small to accommodate newer valves and fittings, and in some cases raise safety concerns for personnel. The program budget funds replacement of about 3 PRVs/yr; the oldest PRV will be no more than 45 years old at this replacement rate.

Environmental Impacts

Projects are generally confined to a small area within an existing utility vault, or may involve replacement of the vault, and so generally have little if any environmental impact during construction. Replacing PRVs before failure reduces the chance of erosion or other environmental damage from water leakage.

Operating Budget Impacts**Project Map****Schedule of Activities**

Project Activities	From - To	Amount
Project Costs	1991 - 2021	10,494,971

Total Budgetary Cost Estimate: 10,494,971

Means of Financing

Funding Source	Amount
Miscellaneous Revenue	15,000
Utility Rates/Fees	10,479,971

Total Programmed Funding: 10,494,971
 Future Funding Requirements:

Comments