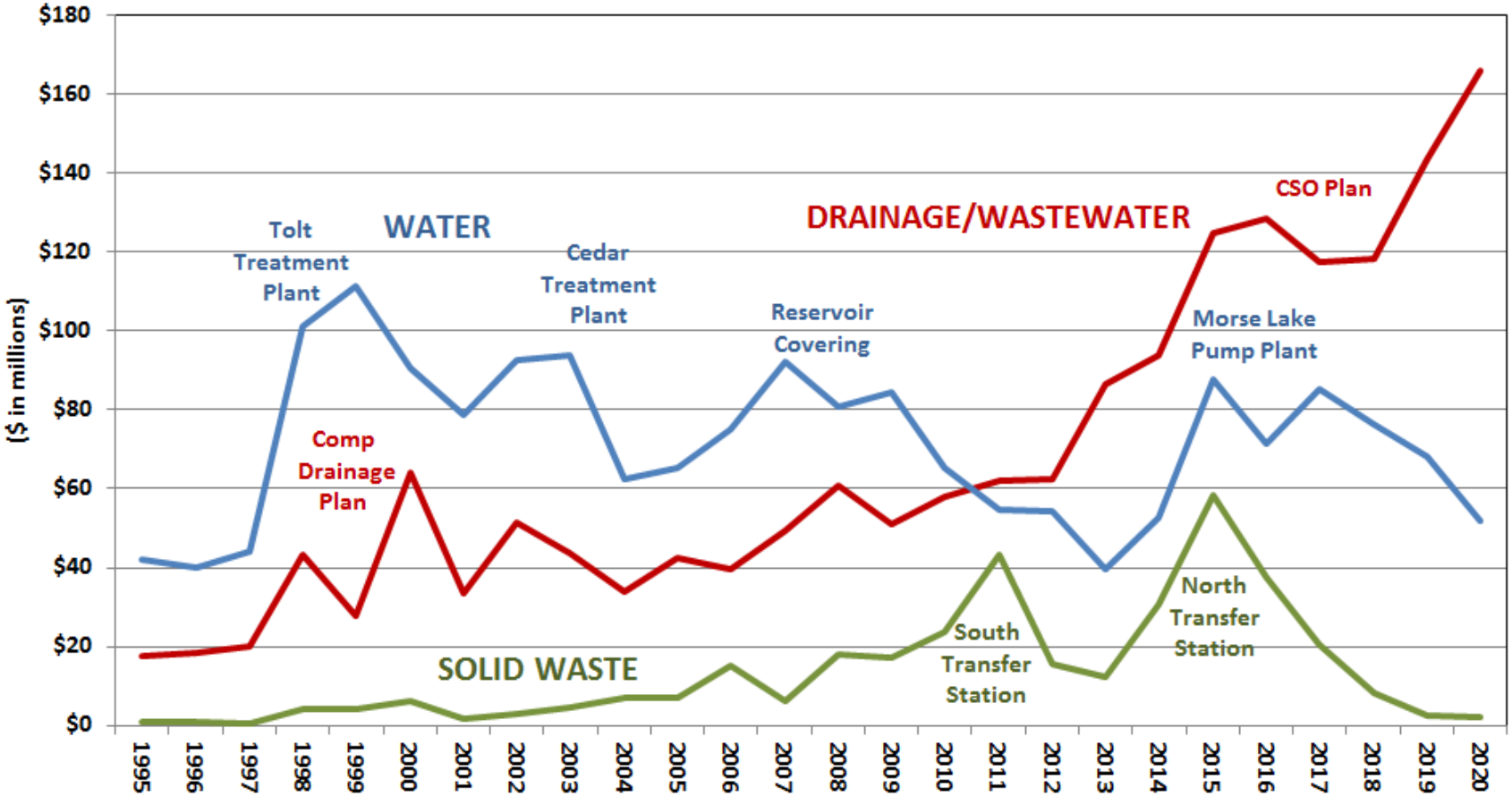
Seattle Public Utilities
2015 Capital Improvement Plan

Presentation to Seattle Public Utilities and Neighborhoods Committee

Seattle Public Utilities

August 11, 2015

SPU Capital Improvement Program – 1995 to 2020



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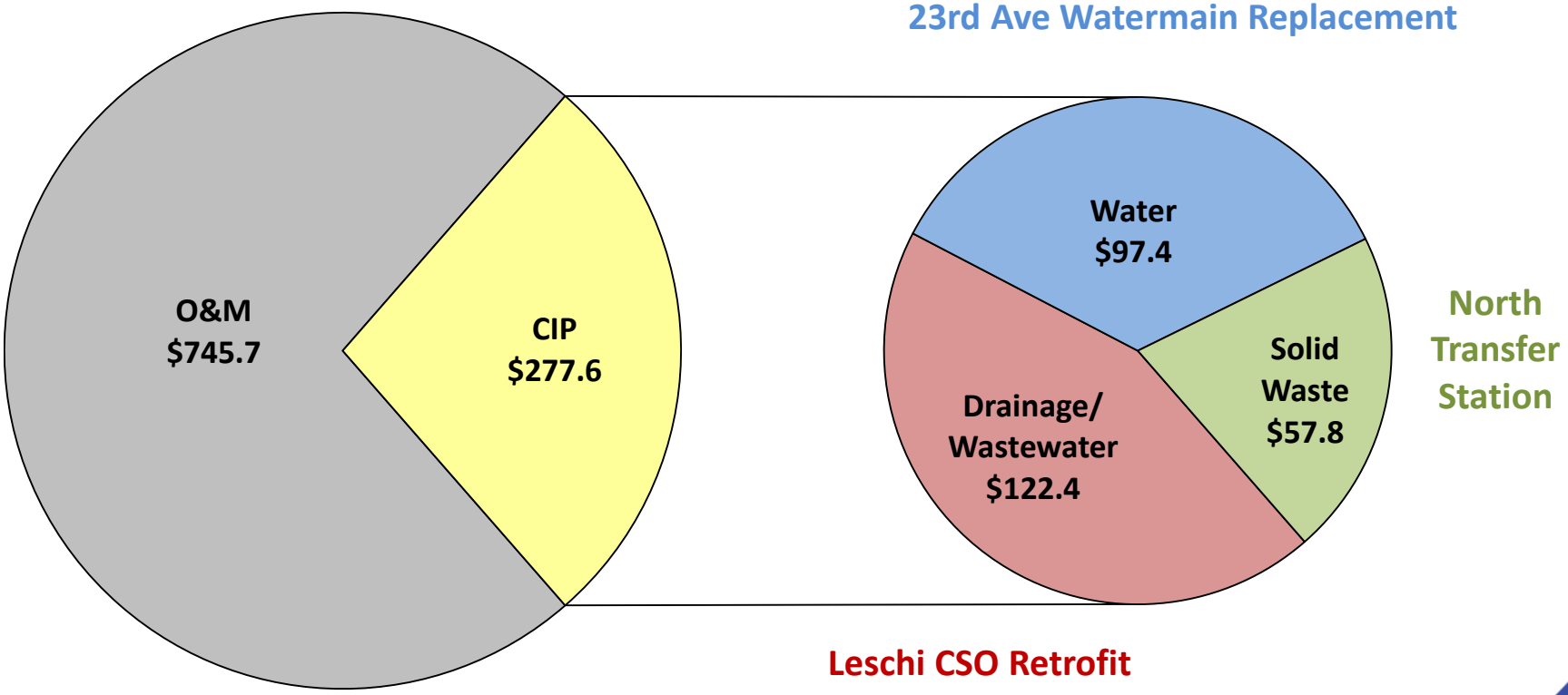
2015 Spending Plan ($ in millions)



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North Transfer Rebuild

- Former facility was too small, outdated and inflexible for current and future needs
- Complaints from the community regarding noise, odor, dust and traffic congestion
- New state of the art facility will address community concerns and allow flexibility to meet current and future needs

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North Transfer Rebuild

- Fully enclosed building will control noise, dust, and odors and maintain sanitary conditions
- Separate entrance and drop-off areas for residents and garbage trucks improves safety and efficiency
- Separate Recycling/Reuse Building
- Community use area
- Solar panels on top of tipping building
- Project Status:
  - 2014 Mar - Start of construction
  - 2016 Feb - Anticipated substantial completion
  - 2016 Jun – Opening of new station
- Total Projected Cost: $105.8M

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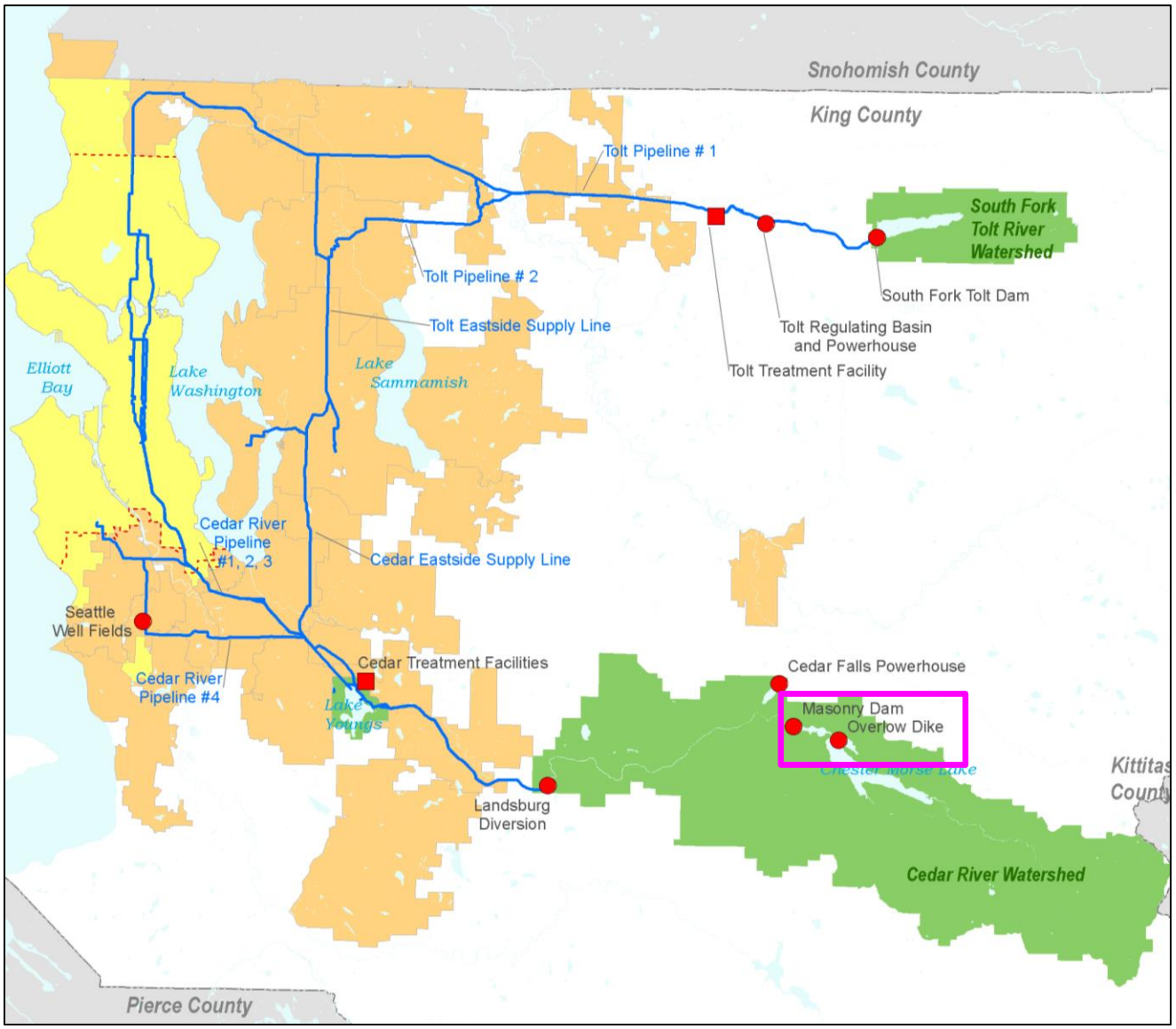
Morse Lake Pump Plant Replacement Project



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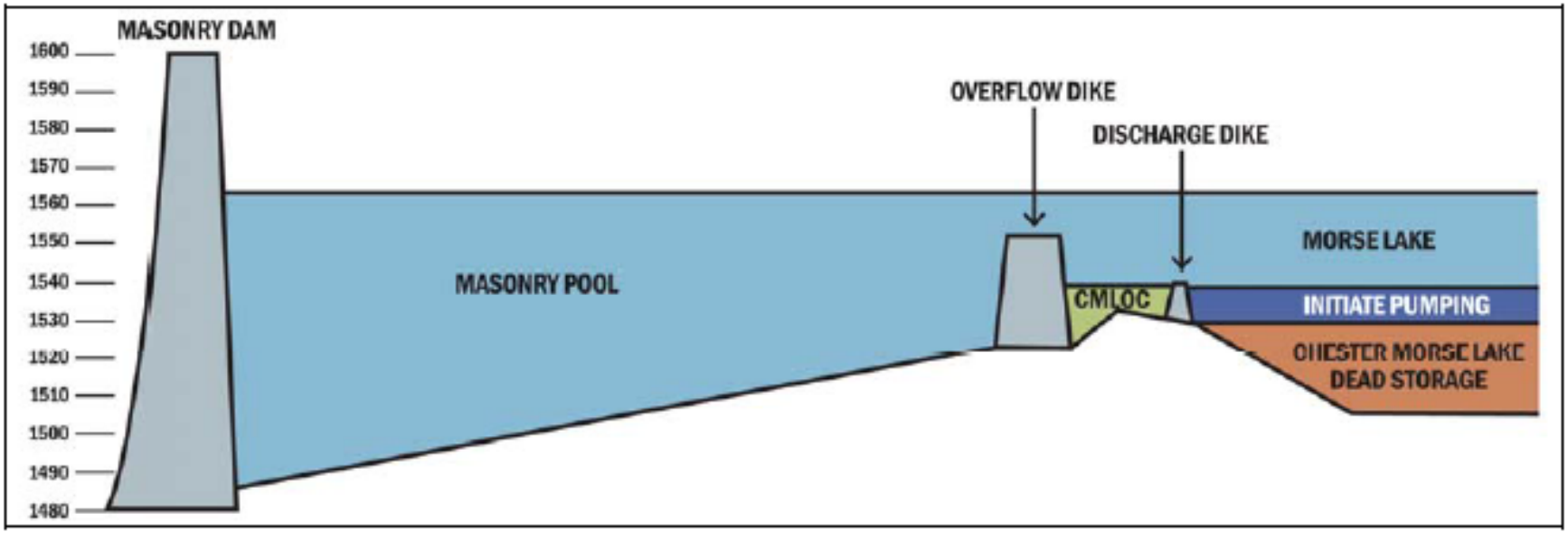
Morse Lake Pump Plant Replacement Project



With low water levels, pumps allow access to water stored below the discharge dike to meet instream flow commitments (fish) and demand (people)

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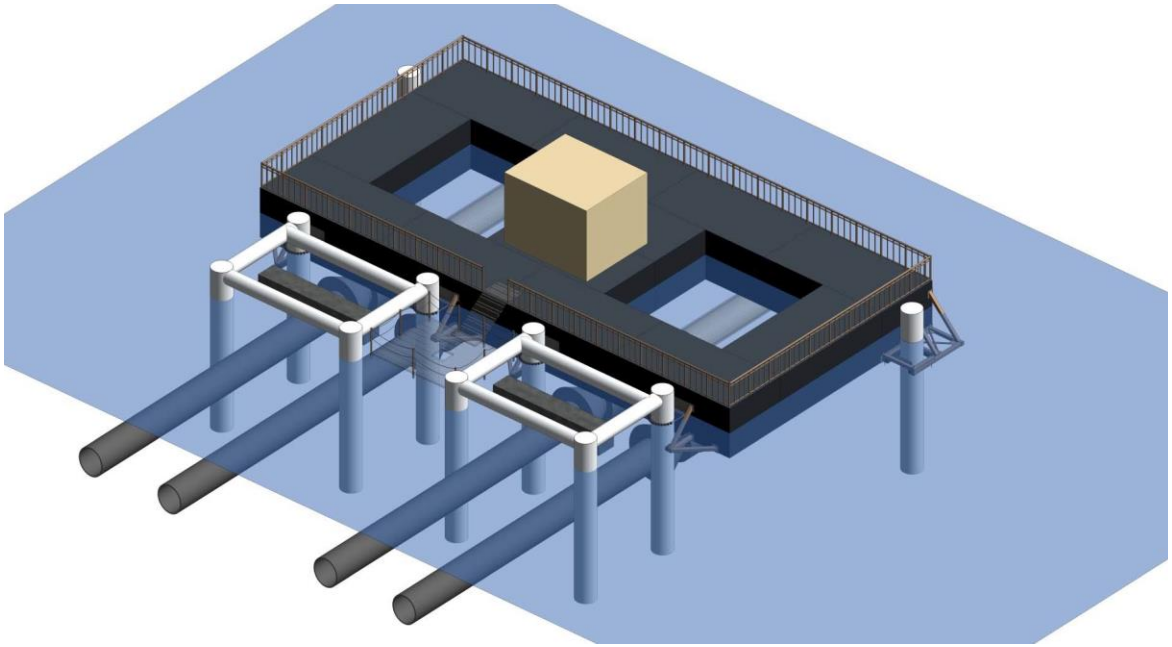
Morse Lake Pump Plant Replacement Project

New Floating Pumps



- Existing pump plants are beyond useful life
- New pumps provide a safer and more reliable way to access water below the discharge dike
- Project Status:
  - 2015 Jun 10 to Sep 30 - In-water work (pile installation and dredging)
  - 2015 Nov - Testing and commissioning
  - 2016 1Q - Project substantial completion
- Total Projected Cost: $40M

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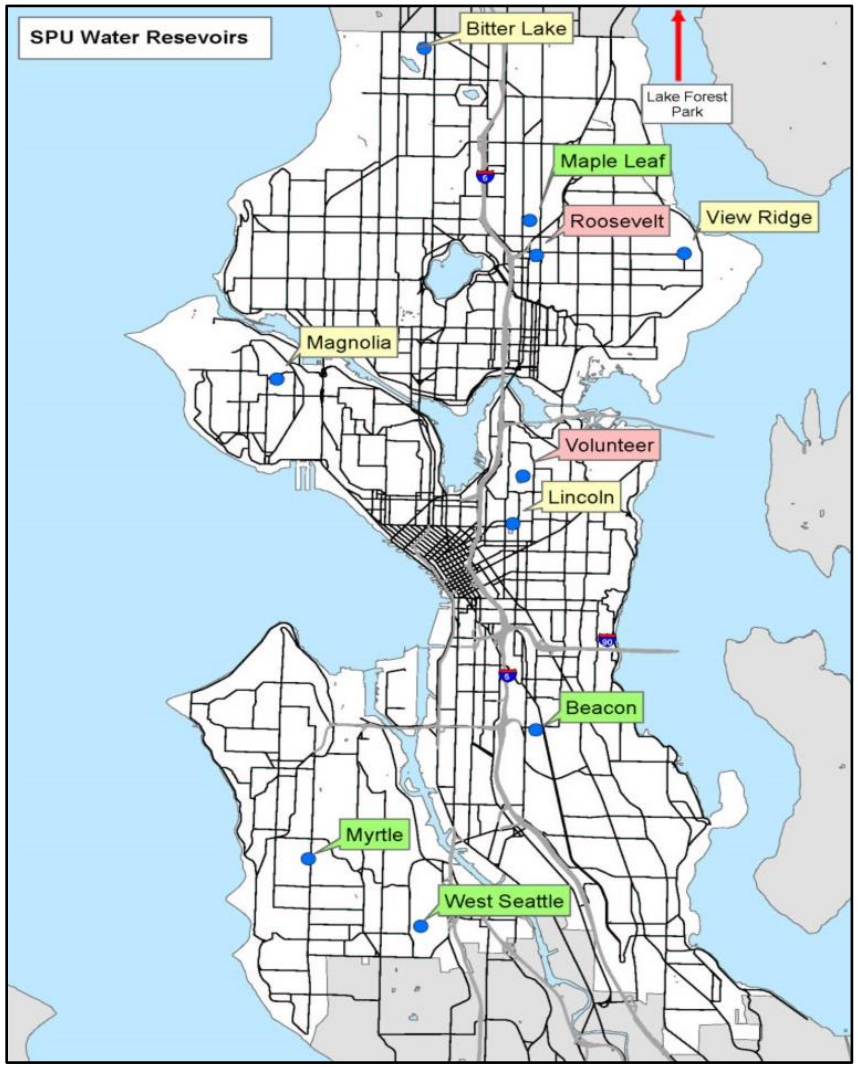
Buried Reservoir Seismic Program



Improve seismic performance of four buried concrete reservoirs to reduce impacts to drinking water and firefighting supply following major earthquakes.

- West Seattle Reservoir (30 MG)
- Maple Leaf Reservoir (60 MG)
- Myrtle Reservoir (5 MG)
- Beacon Reservoir (50 MG)

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Buried Reservoir Seismic Program

Addition of reinforced steel with concrete topping slab and wall liner

West Seattle Reservoir

- Complete and reservoir is back in service

Maple Leaf Reservoir

- Construction 2015-mid 2016

Myrtle Reservoir

- Construction 2015-mid 2016

Beacon Reservoir

- Currently in design with construction projected to be completed in 2017

Total Projected Cost: $25M

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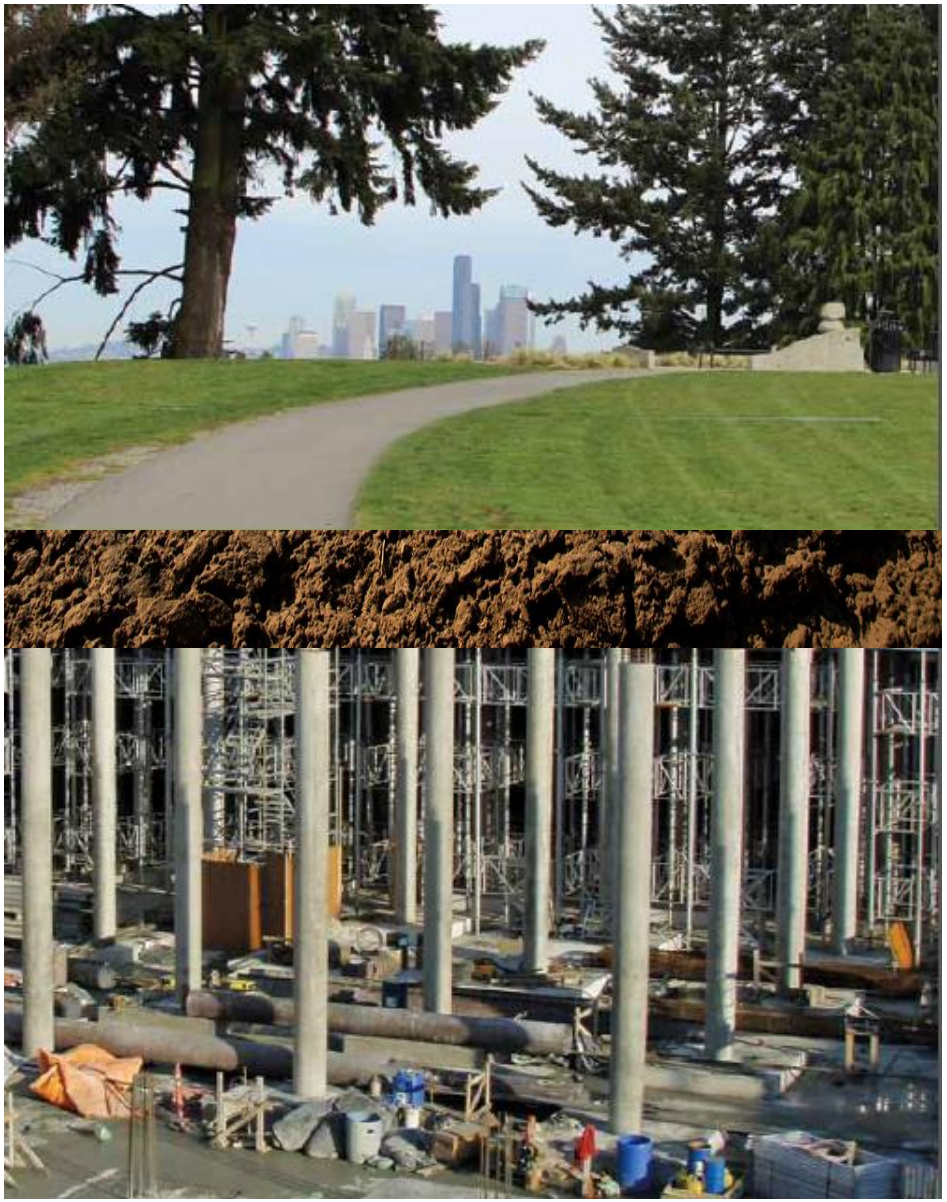
Buried Reservoirs – Invisible Systems/Visible Benefits



Beacon Hill Reservoir

- Partnership with Seattle Parks Department
- Reservoirs covered with grass and other low-maintenance plants so that communities can use the new area
- Provides 76 acres of new open space

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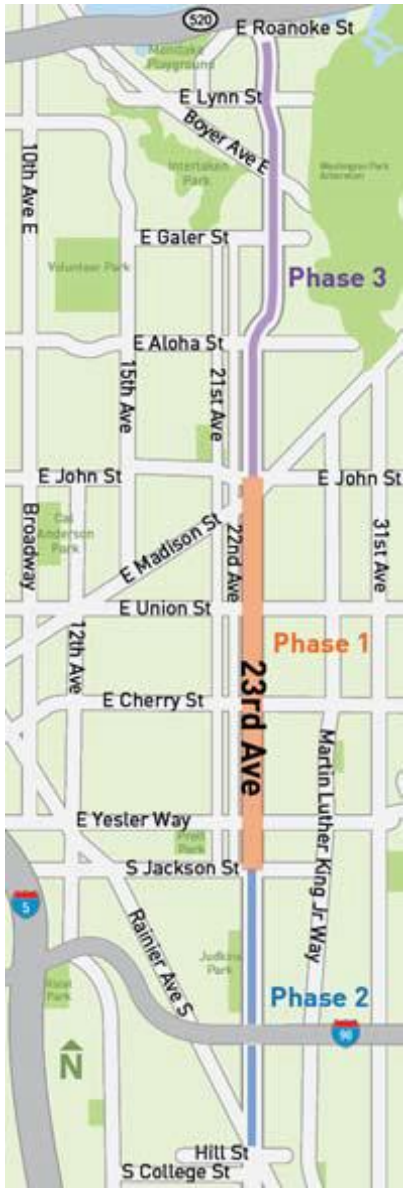
23rd Avenue Watermain Replacement



- Existing watermain unable to withstand roadway construction
- Reconstruction of 23rd Ave from 4 lanes to 3 lanes from S. Jackson St. to E. John St.
- Replace 90 year old watermain with new watermain meeting current standards
- Increased capacity and fire flow

Project Status:

- Began in Spring 2015
- Construction completion mid 2017
- Total Projected Cost: $5M

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Drainage/Wastewater System

Fully Separated System
354 total pipe miles

Partially Separated System
976 total pipe miles
553 combined pipe miles

Combined System
425 total pipe miles
350 combined pipe miles

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Combined Sewer Overflows

SPU has invested $130M in Combined Sewer Overflow (CSO) reduction since 2010

- 2 Green Infrastructure projects
- 8 Sewer System Improvements
- 6 CSO Storage projects
- 1 Flow Transfer project

2013 Consent Decree – Integrated Approach

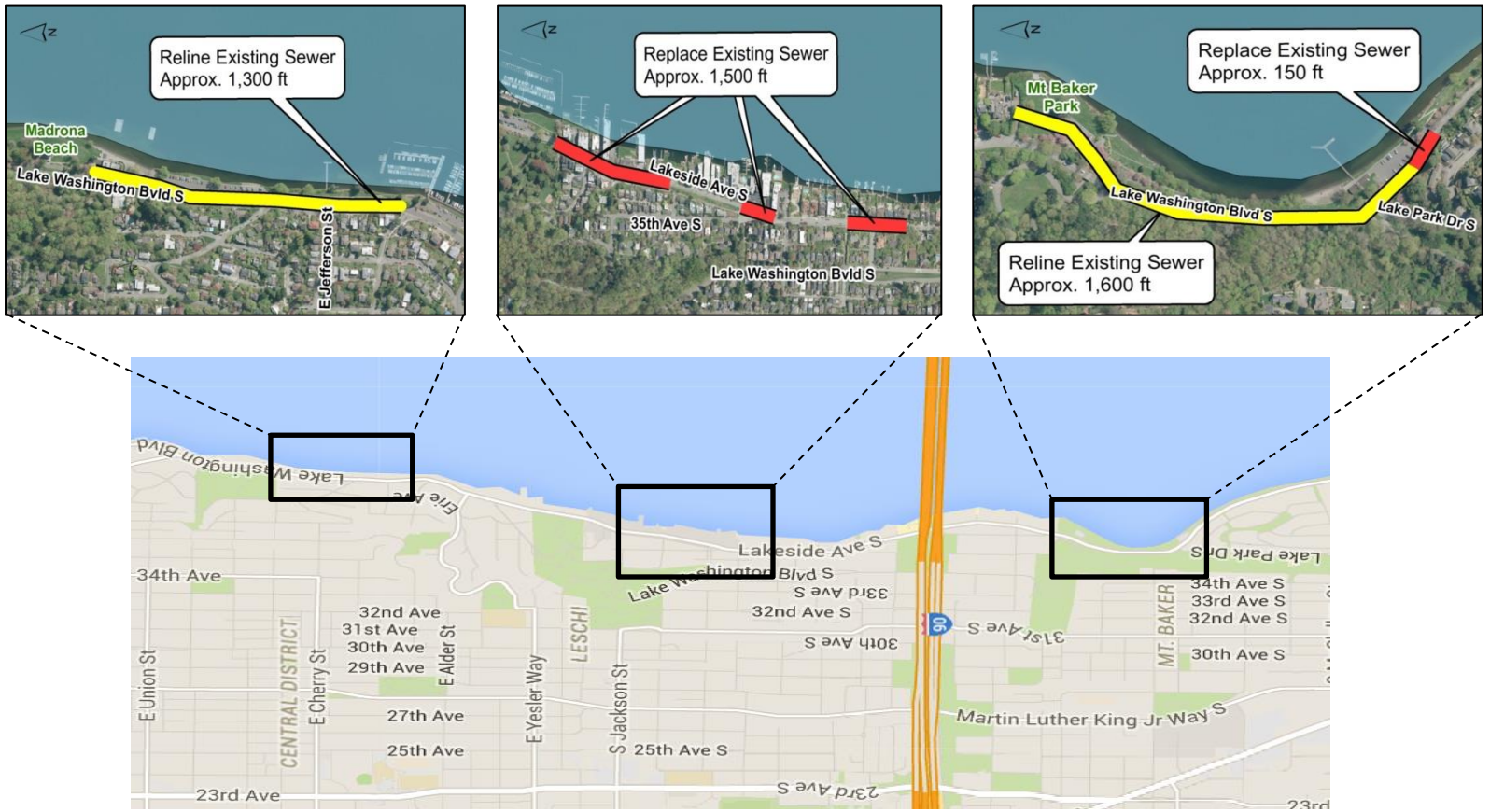
CSO Projects

- Sewer system improvements by 2020
- West Ship Canal Tunnel project with King County by 2025
- 5 storage projects by 2025
- 5 storage projects by 2030

Stormwater Projects

- Natural Drainage Partnering
- Street Sweeping
- South Park Water Quality Treatment

Leschi CSO Retrofit



- Pipe replacement/relining in lieu of future storage facilities
- Project Status: Construction 2015 Aug to 2016 Jan
- Total Projected Cost: $5.9M

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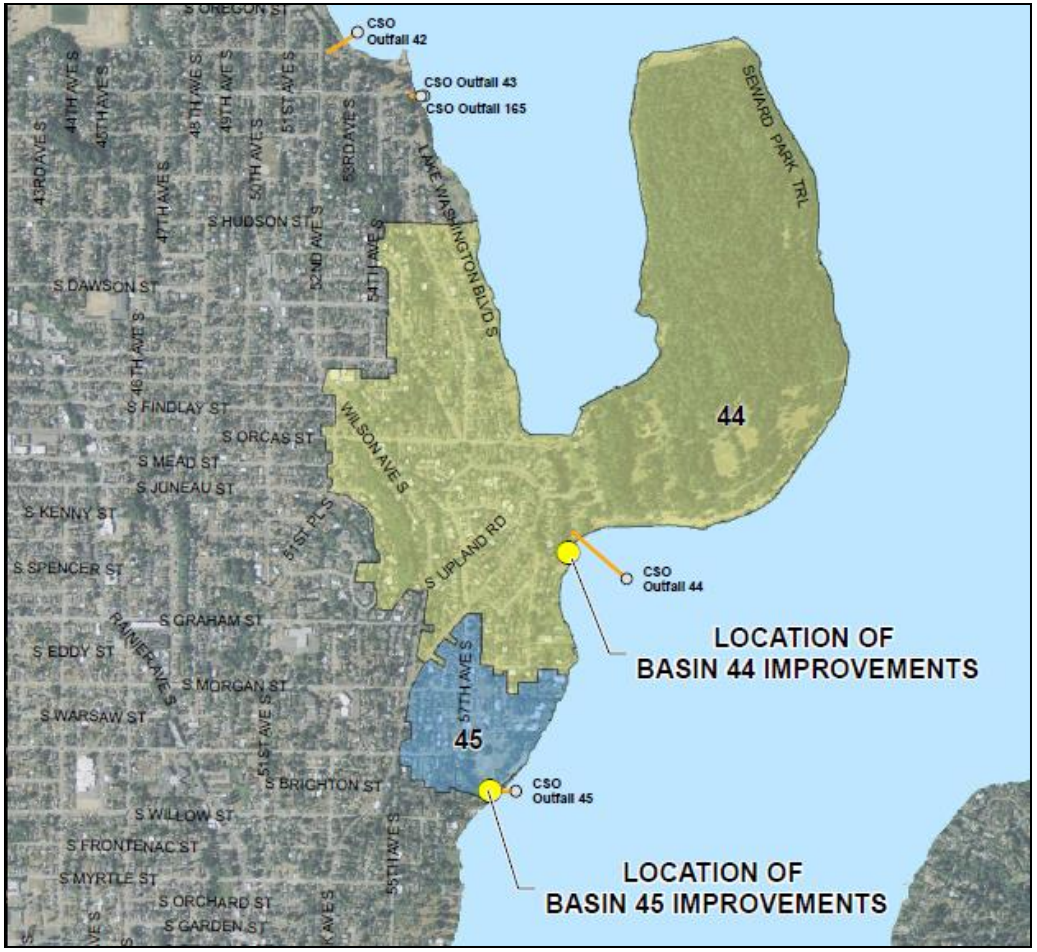
Henderson North/Seward Park CSO Reduction



Reduce overflows from two combined sewer basins to achieve regulatory compliance.

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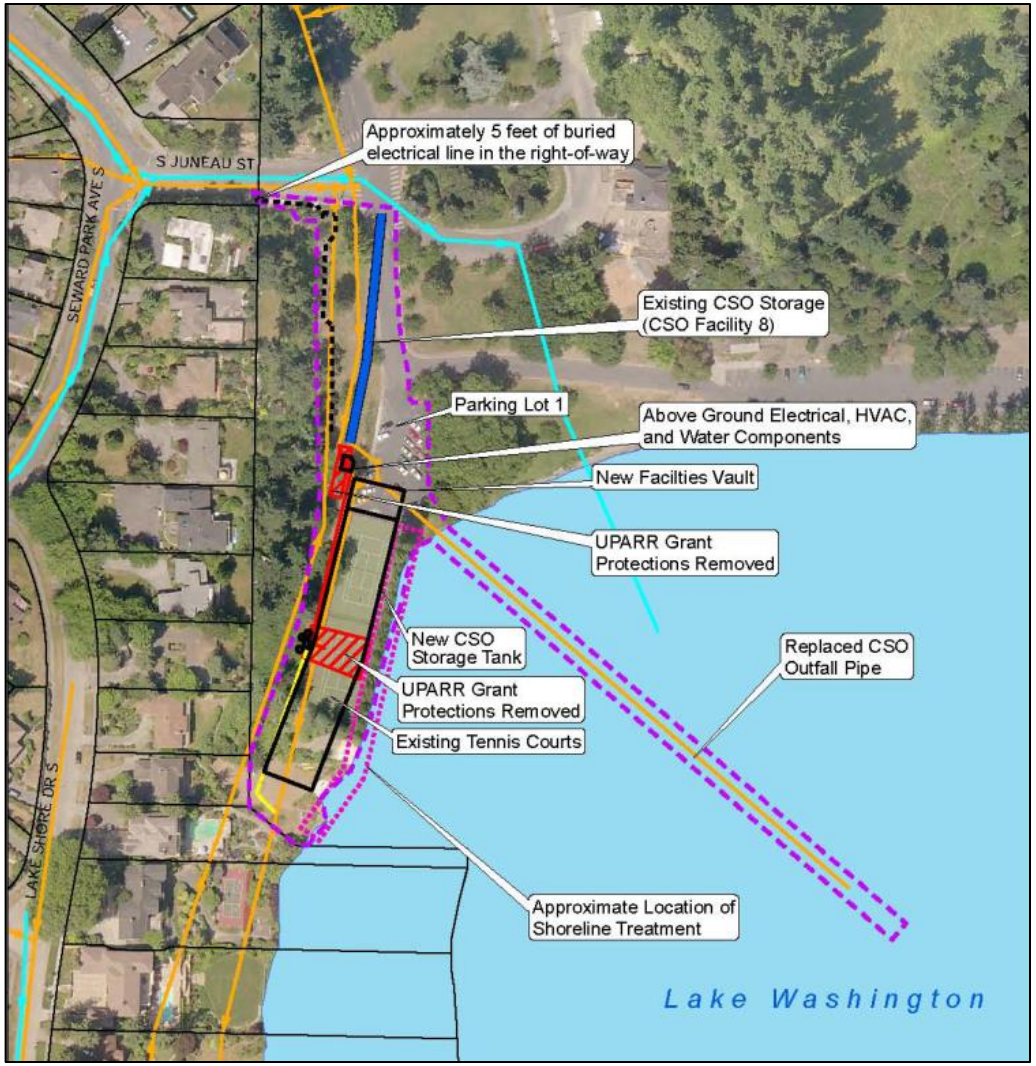
Henderson North/Seward Park CSO Reduction



- 2.65M gallon storage tank
- Replaced outfall
- Improved Shoreline and underused portion of the park
- Partnering with SCL to improve service to Park
- Project Status: Construction 2015 - 2017
- Total Projected Cost: $66.6M

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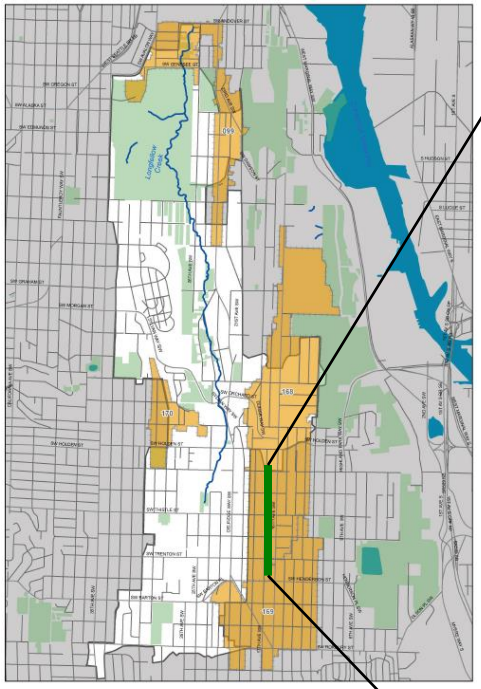
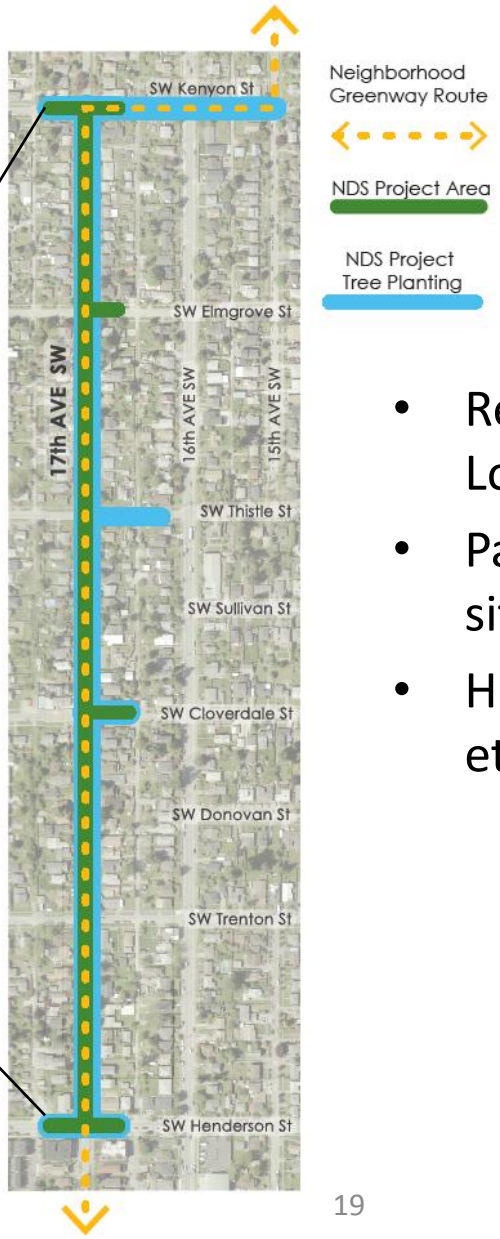
Delridge Natural Drainage System (NDS)





Longfellow Creek and its basin, Southwest Seattle, South Delridge Neighborhood (Duwamish River in the upper right).

- Reduce CSO overflows into Longfellow Creek
- Partner with SDOT on outreach, site selection and design
- Historically underserved and ethnically diverse community

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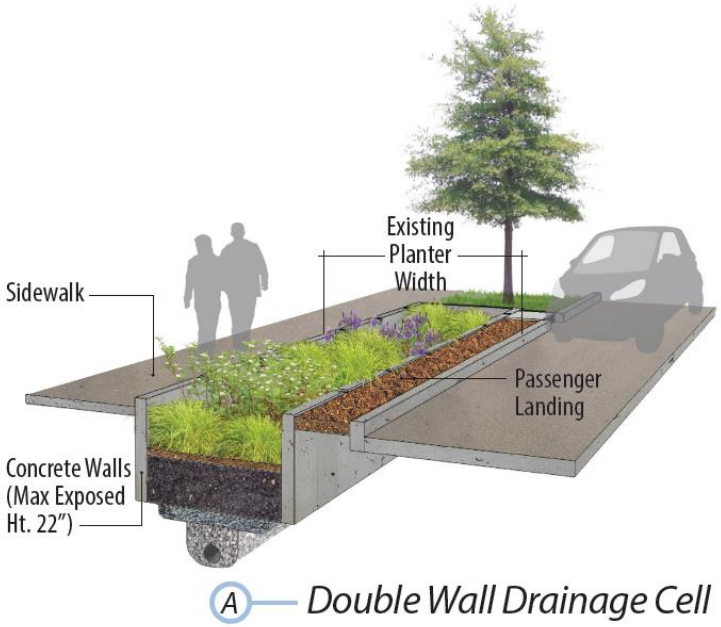
Delridge Natural Drainage System (NDS)



- Challenge: Locate roadside raingardens within a completely developed street
- Project Status: Construction 2015 Fall to 2016 Spring
- Total Projected Cost: $6.1M

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SPU's Improved Project Delivery

CIP Accomplishment Rate

2010	2011	2012	2013	2014	Projected 2015
72%	**85%**	**74%**	**81%**	**91%**	**96%**

SPU continues to improve ability to keep projects moving and spend according to plan.

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