
Anchorage Water and Wastewater Utility

Anchorage: Performance. Value. Results.

Mission

Supporting the public health, safety, and economic interests of the community by providing quality water and wastewater services in a responsible, efficient, and sustainable manner.

Core Services

- Reliably treat and distribute potable water for domestic, commercial, and firefighting uses throughout the certificated service area.
- Reliably collect, treat and dispose of wastewater in accordance with laws and regulations that protect public health and the environment.

Accomplishment Goals

- Provide reliable service
- Provide safe drinking water that meets or exceeds all standards
- Protect the environment through appropriate wastewater collection, treatment, and disposal.
- Fiscal responsibility and transparency with utility finances.
- Timely, professional, and courteous interactions with customers.
- Rates that fairly reflect the cost of providing service and maintaining infrastructure
- Continuous improvement in the efficiency of our operations
- Anticipate change and be prepared for the future.

Performance Measures

Progress in achieving goals shall be measured by:

1. Compliance with all State and Federal drinking water standards
/wastewater standards
/Clean Air Act standards
2. Number of planned and unplanned water outages
3. Sanitary sewer overflows
4. Excavation and maintenance work order backlog
5. Recordable incident rate (as compared to the standard incident rate for water and wastewater utilities)
6. Number of after-hours emergency calls and responses
7. Critical Systems availability
8. Execution of capital improvement budget
9. Debt to equity ratio
10. Service affordability

Measure #1: Compliance with all State and Federal drinking water, wastewater, and clean air standards.

Compliance with all State and Federal drinking water, wastewater, and clean air standards	Goal	Second Quarter 2012	Historical Information		
			First Quarter 2012	2011 Annual	2010 Annual
Safe Drinking Water Act Compliance	100%	100%	100%	100%	100%
Clean Water Act (NPDES permit) Compliance	100%			100%	99.99%
-Asplund		100%	100%		
-Eagle River		100%	99.73%		
-Girdwood		100%	100%		
Clean Air Act Compliance (Asplund Incinerator)	100%	100%	99.98%	99.99%	99.99%

Measure #2: Number of planned and unplanned water outages (customers per month).

				Historical monthly average		
Number of planned and unplanned water outages (customers per month)	Goal (Affected customers per month)	2 nd Q 2012 (monthly average)	1 st Q 2012 (monthly average)			
				2011	2010	2009
Planned Outages						
<4 hours	<20	10	8	12	12	107
4-12 hours	<20	31	48	23	28	96
>12 hours	0	0	0	0.1	0.2	27
Unplanned Outages						
<4 hours	<20	17	94	23	30	27
4-12 hours	<50	43	45	51	50	59
>12 hours	0	2	0	9	3	15

Measure #3: Sanitary sewer overflows (monthly).

	Goal	2 nd Q 2012 (per month)	1 st Q 2012 (per month)	Historical monthly average			
				2011	2010	2009	2008
Sanitary Sewer Overflows (monthly)	<1.5	2.0	2.7	1.7	1.3	1.6	1

Measure #4: Excavation and Maintenance Work Order Backlog.

	Goal	End of March 2012	End-of-year Values			
			2011	2010	2009	2008
Exc. and Maint. Work Order Backlog	110	135	138	100	117	108

Measure #5: Number of reportable injuries and accidents (annual).

	Goal	Historical Information			
		2011	2010	2009	2008
Number of reportable injuries and accidents (annual)	<4.60%	4.4%	1.72%	4.10%	4.00%

Measure #6: Number of after-hours emergency calls and responses (monthly).

Number of after-hours emergency calls and responses (month)	Goal	2 nd Q 2012 monthly average	Monthly Totals			
			Mar 2012	Feb 2012	Jan 2012	1st Q 2012 monthly
After-hours emergency calls	N/A	108	118	124	227	256
Number of call-out responses	N/A	27	33	32	41	35

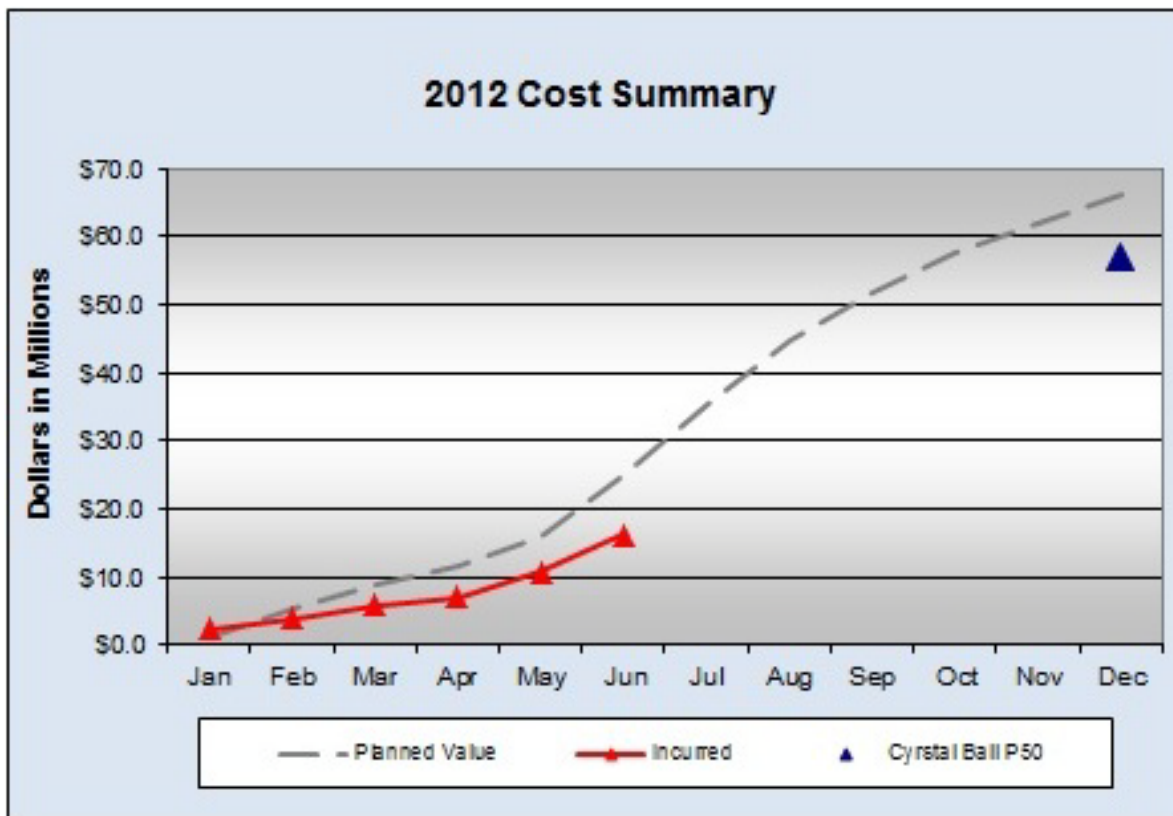
Measure #7: Critical IT systems availability (outage per month).

	Goal	2 nd Quarter 2012	1 st Quarter 2012	Historical Information			
				Dec 2011	2010	2009	2008
Critical IT systems availability (outages per month)	2	1.0	0	0	New metric – no historic data		

Measure #8: Execution of Capital Improve Budget (annual).

	Goal	Historical Information			
		2011	2010	2009	2008
Execution of Capital Improvement Budget (annual)	75% (Long term trend)	60%*	75% annual average since 1999		

*2011 CIB includes nearly \$15 Million for Girdwood WWTF which has been delayed by permitting considerations. Phase I of that work is currently out to bid (February, 2012). The attached figure shows the planned expenditure for 2012.



Measure #9: Debt to equity ratio (annual).

			Historical Information		
Debt to Equity Ratio (annual)	Goal	2011	2010	2009	2008
Water Utility (2010)	75/25	70/30	70/30	71/29	72/28
Wastewater Utility (2010)	75/25	68/32	69/31	68/32	66/34

Measure #10: Service affordability (annual).

			Historical data			
Service Affordability (annual)	Goal	2012	2011	2010	2009	2008
Water Utility	-	0.8	0.7	0.7	0.7	0.6
Wastewater Utility	-	0.6	0.6	0.5	0.5	0.5
Combined	<2.0	1.4	1.3	1.2	1.2	1.1

Performance Measure Methodology Sheet
Anchorage Water and Wastewater Utility

Measure #1: Compliance with all State and Federal drinking water, wastewater, and clean air standards
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Type

Effectiveness

Accomplishment Goals Supported

- Provide reliable service
- Provide safe drinking water that meets or exceeds all standards
- Protect the environment through appropriate wastewater collection, treatment, and disposal.

Definition

Number of required regulatory measurements indicating conditions are out of compliance with current standards, divided by total number of required regulatory compliance points for the time period. If measurements are taken daily, but the data are averaged for comparison to a standard on a weekly basis, only the weekly report constitutes a compliance point. If separate standards exist for monthly and weekly averages, they are distinct compliance points.

Data Collection Method

All samples collected are compared with the State or Federal regulatory standards and any violations are noted and reported in accordance with permit stipulations.

Frequency

The percent compliance measurement will be calculated quarterly, using running totals for the calendar year.

Measured By

The Treatment Division will prepare a report from the water quality and laboratory databases that identifies any samples or reportable incidents that do not meet regulatory standards.

Reporting

The Treatment Division Director will update the report quarterly from the water quality and laboratory databases. The information will be displayed in tabular **form**.

Used By

The Treatment Division Director and General Manager will use the information to gain a clearer understanding of performance of AWWU's treatment facilities and determine if changes in system operation or maintenance are required.

Performance Measure Methodology Sheet
Anchorage Water and Wastewater Utility

Measure #2: Number of planned and unplanned water outages
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Type

Effectiveness

Accomplishment Goal Supported

- Provide reliable service
- Provide safe drinking water that meets or exceeds all standards
- Protect the environment through appropriate wastewater collection, treatment, and disposal.
- Timely, professional, and courteous interactions with customers.
- Continuous improvement in the efficiency of our operations
- Anticipate change and be prepared for the future

Definition

A water outage is defined as a disruption in service to a service connection. A service connection serves one customer, although multiple people may be affected by the disruption in service to a residence or a business.

Data Collection Method

A tally is kept through each calendar month of the number of customers who experience planned and unplanned water service disruptions for a range of durations listed below. The outage is as reported to AWWU and confirmed by observation or analysis in the field.

Frequency

The measurement will be recorded at the beginning of each month for the preceding month.

Measured By

Number of customers who do not have water service for the following durations:

- Less than 4 hours
- Between 4 hours and 12 hours
- Greater than 12 hours

Disruptions are counted for planned activities (customers are given advance notice in writing) and unplanned (emergency) activities.

Reporting

The Strategic Asset Services Section will create a monthly report that will be show water outages numerically and graphically.

Used By

The O&M Division, Customer Service Division, and Strategic Asset Services Section and the General Manager will review these data monthly to evaluate adequacy of operation and maintenance approaches, customer service response and pipe condition.

Performance Measure Methodology Sheet
Anchorage Water and Wastewater Utility

Measure #3: Sanitary Sewer Overflows (monthly).
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Type

Effectiveness

Accomplishment Goals Supported

- Provide reliable service.
- Timely, professional, and courteous interactions with customers.
- Protect the environment through appropriate wastewater collection, treatment, and disposal.
- Continuous improvement in the efficiency of our operations
- Anticipate change and be prepared for the future.

Definition

Total number of wastewater overflows onto the ground or wastewater back-ups into customer residences if caused by an obstruction in an AWWU sewer main, manhole, or cleanout. Overflows or backups that occur due to on-property blockages do not count.

Data Collection Method

The reportable number of sanitary sewer overflows is what is reported in writing to the EPA Region X office within a week of each occurrence.

Frequency

The measurement will be recorded each month for the previous month.

Measured By

Data collection is by direct observation by AWWU staff.

Reporting

The O&M Division will create a monthly report displaying overflow data numerically and graphically.

Used By

The O&M Division, Customer Service Division, and Strategic Asset Services Section and the General Manager will review these data monthly to evaluate adequacy of operation and maintenance approaches, customer service response and pipe condition.

Performance Measure Methodology Sheet
Anchorage Water and Wastewater Utility

Measure #4: Excavation and Maintenance Work Order Backlog
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Type

Effectiveness

Accomplishment Goal Supported

- Provide reliable service.
- Provide safe drinking water that meets or exceeds all standards.
- Protect the environment through appropriate wastewater collection, treatment, and disposal.
- Timely, professional, and courteous interactions with customers.
- Continuous improvement in the efficiency of our operations
- Anticipate change and be prepared for the future.

Definition

Total number of physical problems with horizontal plant (water mains, valves, service lines, key boxes, sewer mains, manholes, or cleanouts) requiring an excavation to repair or replace the respective asset.

Data Collection Method

The O&M Division maintains a list of prospective excavation projects.

Frequency

The number of projects in the current backlog will be recorded quarterly.

Measured By

Number of Maximo excavation work orders in “Approved” status at the end of the reporting period.

Reporting

The O&M Division will create a quarterly report displaying overflow data numerically and graphically.

Used By

The O&M Division, Customer Service Division, and Strategic Asset Services Section and the General Manager will review these data monthly to evaluate adequacy of operation and maintenance approaches and staffing levels, customer service response and pipe condition.

Performance Measure Methodology Sheet
Anchorage Water and Wastewater Utility

Measure #5: Number of reportable injuries and accidents
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Type

Effectiveness

Accomplishment Goal Supported

- Provide reliable service
- Continuous improvement in the efficiency of our operations
- Anticipate change and be prepared for the future.

Definition

Number of OSHA recordable incidents multiplied by 200,000 (# defined by OSHA as 100 employees working full-time for a year) divided by number of hours worked by all employees. Compare Recordable incident rate to standard industrial rate (SIR) for water and wastewater utilities.

Data Collection Method

Accident and near-miss reports

Frequency

Beginning of each month

Measured By

Safety Program Manager, Employee Services Division.

Reporting

The Employee Services Division will maintain an accident and near miss report on a monthly basis. Data will be compiled, summarized, and reported annually.

Used By

The Safety Manager, all Division Directors and the General Manager will use hazardous situations.

Performance Measure Methodology Sheet
Anchorage Water and Wastewater Utility

Measure #6: Number of after-hours emergency calls and responses
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Type

Effectiveness

Accomplishment Goal Supported

- Provide reliable service
- Timely, professional, and courteous interactions with customers.
- Continuous improvement in the efficiency of our operations
- Anticipate change and be prepared for the future.

Definition

Calls received at the Eklutna Water Treatment facility, outside of normal work hours which require a call-out response from an AWWU First Responder.

Data Collection Method

Track total number of calls received after hours and number of calls requiring a call-out response, as documented on the After-hours Callout log each month.

Frequency

The measurement will be performed at the beginning of each month.

Measured By

The Treatment Division will prepare a report each month from the After-hours Callout log outlining the number and type of calls by industry standards (water break, sewer plug, broken hydrant, customer request, etc.)

Reporting

The Treatment Division will create and maintain a monthly report in tabular form. As this is a new metric, no goal has been established.

Used By

The Treatment Division, O&M Division, Customer Service Division, Strategic Asset Services Section and the General Manager will review this data annually to assess customer response and proper system operations and maintenance.

Performance Measure Methodology Sheet
Anchorage Water and Wastewater Utility

Measure #7: Critical IT systems availability

Type

Effectiveness

Accomplishment Goal Supported

- Provide reliable service
- Provide safe drinking water that meets or exceeds all standards
- Protect the environment through appropriate wastewater collection, treatment, and disposal.
- Continuous improvement in the efficiency of our operations
- Anticipate change and be prepared for the future.

Definition

Measure effectiveness of IT System & Network Support on production systems. Success will be determined by counting the number of preventable outages affecting multiple users compiled on a monthly basis.

Data Collection Method

Outages will be monitored by the IT Division and recorded on an IT log register.

Frequency

Outages will be recorded at the beginning of each month for the preceding month.

Measured By

Data will be compiled by the IT Help Desk based on reported and verified system outages.

Reporting

The IT Division will create and maintain a monthly report in tabular form.

Used By

The IT Division Director and the management team will use the report to monitor and adjust IT support services and evaluate effectiveness of IT services.

Performance Measure Methodology Sheet
Anchorage Water and Wastewater Utility

Measure #8: Execution of Capital Improvement Budget
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Type

Efficiency

Accomplishment Goal Supported

- Provide reliable service
- Fiscal responsibility and transparency with utility finances.
- Rates that fairly reflect the cost of providing service and maintaining infrastructure
- Continuous improvement in the efficiency of our operations
- Anticipate change and be prepared for the future.

Definition

The ratio (as a percent) of capital project dollars expended through the fiscal year divided by the planned expenditure for the year as indicated in the approved Capital Improvement Budget.

Data Collection Method

Project Managers input % complete data and expected completion dates for each project named in the capital improvement budget.

Frequency

Estimates of the completeness (% complete) of all ongoing projects will be reported through the AWWU Engineering Division Project Management group annually.

Measured By

The Engineering Division will keep track of this information using the ERP tracking and reporting system.

Reporting

The information will be displayed numerically and graphically in monthly reports.

Used By

The Engineering Director and General Manager will use this data to gauge progress on use of capital project funds.

Performance Measure Methodology Sheet
Anchorage Water and Wastewater Utility

Measure #9: Debt to Equity Ratio

Type

Effectiveness

Accomplishment Goal Supported

- Fiscal responsibility and transparency with utility finances.
- Anticipate change and be prepared for the future.

Definition

The relative percentages of assets that are funded by debt and equity, respectively.
The total of debt funding and equity funding equals 100%.

Data Collection Method

The calculation is performed by comparing debt and equity to assets annually.

Frequency

The measurement will be calculated annually upon completion of the Utility's audited financial statement.

Measured By

The Finance Division will calculate this ratio from financial statement data.

Reporting

The Finance Division manager will create and maintain an annual report. Trend information will be displayed in a table.

Used By

The information will be used by the Finance Division Director, General Manager, Board and Administration to help evaluate debt financing levels.

Performance Measure Methodology Sheet
Anchorage Water and Wastewater Utility

Measure #10: Service Affordability

Type

Efficiency

Accomplishment Goal Supported

- Rates that fairly reflect the cost of providing service and maintaining infrastructure while remaining affordable.
- Continuous improvement in the efficiency of our operations.
- Anticipate change and be prepared for the future.

Definition

Ratio of the annualized single family residential water and sewer bill to the median annual household income.

Data Collection Method

Annualized single family bill is the combined monthly residential water and sewer bill times 12; median annual household income is as reported by the U.S. Census Bureau.

Frequency

The measurement will be performed annually as new rates are implemented.

Measured By

The calculation will be prepared and reported by the Finance Division.

Reporting

The Finance Division manager will calculate the index annually or whenever a rate change takes effect.

Used By

The results will be used by AWWU management, the Board, the Administration and the public as a measure of service affordability.