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May 1, 2013

***VIA ELECTRONIC FILING  
AND OVERNIGHT DELIVERY***

Washington Utilities and Transportation Commission  
1300 S. Evergreen Park Drive SW  
P.O. Box 47250  
Olympia, WA 98504-7250

Attn: Steven V. King  
Acting Executive Director and Secretary

**RE: Annual Service Quality Report  
WAC 480-100-393 and WAC 480-100-398**

Dear Mr. King:

PacifiCorp d/b/a Pacific Power & Light Company (PacifiCorp or Company) submits for filing its Annual Service Quality Report in compliance with WAC 480-100-393 and WAC 480-100-398 for calendar year 2012. This report conforms to the modified electric reliability monitoring and reporting plan filed in Docket No. UE-110634 and accepted by the Washington Utilities and Transportation Commission in its letter dated April 28, 2011.

PacifiCorp respectfully requests that all data requests regarding this matter be addressed to:

By Email (preferred): [datarequest@pacificorp.com](mailto:datarequest@pacificorp.com)

By regular mail: Data Request Response Center  
PacifiCorp  
825 NE Multnomah Street, Suite 2000  
Portland, OR 97232

Informal questions may be directed to Bryce Dalley, Director, Regulatory Affairs & Revenue Requirement, at (503) 813-6389.

Sincerely,

William R. Griffith  
Vice President, Regulation

Enclosures



**WASHINGTON**

**SERVICE QUALITY**

**REVIEW**

**January 1 – December 31, 2012**

**Annual Report**

**WASHINGTON**  
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## **EXECUTIVE SUMMARY**

During January 1 through December 31, 2012, PacifiCorp delivered reliable service to its Washington customers. The level of performance met baselines as well as internal targets. Also, the Customer Guarantee program continued to deliver high quality results (in fact, well above 99%) consistent with the prior year's performance. As has been noted in the past, the company's service delivered ranks very high when compared across the industry.

The company's service reliability is impacted by uncontrollable interference events, such as car-hit-pole accidents, and by significant events that exceed the normal underlying level of interruptions but that do not reach the qualifying major event threshold for exclusion from the company's underlying performance metrics. To provide a perspective on their impact during the reporting period, the significant events experienced during 2012 are listed in Section 3.2. Consideration of the root causes of these significant days is important when evaluating year-on-year performance. When the Company develops reliability improvement projects it evaluates these root causes and prepares plans that reflect the certainty of repetition of these events. The outcomes are reflective of the plans outlined in the Areas of Great Concern, shown in Section 3.6.

### **1 Service Standards Program Summary**

PacifiCorp has a Service Standards Program comprised of a number of Customer Guarantees and Performance Standards. Regular status reports regarding the program's performance are provided both internally and externally. These reports detail measures of performance that are reflective of PacifiCorp's reliability in service delivery (of both personnel and the network) to its customers. The company developed these measures after evaluating company and industry standards and practices for delivering, collecting, and reporting performance data. In certain cases, the company chose to adopt a level of performance higher than the industry norm. In other cases, PacifiCorp developed metrics and targets based upon its history of delivery of these measures. The measures are useful in evaluating historical performance and in setting future targets for performance. In its entirety, these measures comply with WAC 480-100-393 and 398 requirements for routine reliability reporting.

In UE-042131, the company applied for, and received approval, to extend the core program through March 31, 2008. During the MidAmerican acquisition of PacifiCorp, in UE-051090, the program was extended again through 2011. While the term of this program has lapsed, the Company has continued to perform all programs as performed historically. No actions have been taken by the Company to recommend any suspension or changes to the program as was extended in UE-042131.

## 1.1 PacifiCorp Customer Guarantees

<u>Customer Guarantee 1:</u> Restoring Supply After an Outage	The company will restore supply after an outage within 24 hours of notification from the customer with certain exceptions as described in Rule 25.
<u>Customer Guarantee 2:</u> Appointments	The company will keep mutually agreed upon appointments which will be scheduled within a two-hour time window.
<u>Customer Guarantee 3:</u> Switching on Power	The company will switch on power within 24 hours of the customer or applicant's request, provided no construction is required, all government inspections are met and communicated to the company and required payments are made. Disconnections for nonpayment, subterfuge or theft/diversion of service are excluded.
<u>Customer Guarantee 4:</u> Estimates For New Supply	The company will provide an estimate for new supply to the applicant or customer within 15 working days after the initial meeting and all necessary information is provided to the company.
<u>Customer Guarantee 5:</u> Respond To Billing Inquiries	The company will respond to most billing inquiries at the time of the initial contact. For those that require further investigation, the company will investigate and respond to the Customer within 10 working days.
<u>Customer Guarantee 6:</u> Resolving Meter Problems	The company will investigate and respond to reported problems with a meter or conduct a meter test and report results to the customer within 10 working days.
<u>Customer Guarantee 7:</u> Notification of Planned Interruptions	The company will provide the customer with at least two days' notice prior to turning off power for planned interruptions.

*Note: See Rules for a complete description of terms and conditions for the Customer Guarantee Program.*

## 1.2 PacifiCorp Performance Standards

<u>Network Performance Standard 1:</u> Improve System Average Interruption Duration Index (SAIDI)	The company will maintain SAIDI commitment target during the 3 year-9 month period through December 31, 2011.
<u>Network Performance Standard 2:</u> Improve System Average Interruption Frequency Index (SAIFI)	The company will maintain SAIFI commitment target during the 3 year-9 month period through December 31, 2011.
<u>Network Performance Standard 3:</u> Improve Under Performing Circuits	The company will reduce by 20% the circuit performance indicator (CPI) for a maximum of five under-performing circuits on an annual basis within five years after selection.
<u>Network Performance Standard 4:</u> Supply Restoration	The company will restore power outages due to loss of supply or damage to the distribution system within three hours to 80% of customers on average.
<u>Customer Service Performance Standard 5:</u> Telephone Service Level	The company will answer 80% of telephone calls within 30 seconds. The company will monitor customer satisfaction with the company's Customer Service Associates and quality of response received by customers through the company's eQuality monitoring system.
<u>Customer Service Performance Standard 6:</u> Commission Complaint Response/Resolution	The company will: a) respond to at least 95% of non-disconnect Commission complaints within three working days, except in Washington, where company will respond to 95% within two working days per state administrative code; b) respond to at least 95% of disconnect Commission complaints within four working hours; and c) resolve 95% of informal Commission complaints within 30 days.

*Note: Performance Standards 1, 2 & 4 are for underlying performance days, excluding days classified as Major Events.*

### 1.3 Reliability Definitions

This section will define the various terms<sup>1</sup> used when referring to interruption types, performance metrics and the internal measures developed to meet performance plans. A map of PacifiCorp's service territory is included.

#### **Interruption Types**

##### ***Sustained Outage***

A sustained outage is defined as an outage of equal to or greater than 5 minutes in duration.

##### ***Momentary Outage***

A momentary outage is defined as an outage of less than 5 minutes in duration. PacifiCorp has historically captured this data using substation breaker fault counts.

#### **Reliability Indices**

##### ***SAIDI***

SAIDI (system average interruption duration index) is an industry-defined term to define the average duration summed for all sustained outages a customer experiences in a given period. It is calculated by summing all customer minutes lost for sustained outages (those exceeding 5 minutes) and dividing by all customers served within the study area. When not explicitly stated otherwise, this value can be assumed to be for a one-year period.

##### ***Daily SAIDI***

In order to evaluate trends during a year and to establish Major Event Thresholds, a daily SAIDI value is often used as a measure. This concept was introduced in IEEE Standard P1366-2003/2012. This is the day's total customer minutes out of service divided by the static customer count for the year. It is the total average outage duration customers experienced for that given day. When these daily values are accumulated through the year, it yields the year's SAIDI results.

##### ***SAIFI***

SAIFI (system average interruption frequency index) is an industry-defined term that attempts to identify the frequency of all sustained outages that the average customer experiences during a given period. It is calculated by summing all customer interruptions for sustained outages (those exceeding 5 minutes in duration) and dividing by all customers served within the study area.

##### ***CAIDI***

CAIDI (customer average interruption duration index) is an industry-defined term that is the result of dividing the duration of the average customer's sustained outages by the frequency of outages for that average customer. While the Company did not originally specify this metric under the umbrella of the Performance Standards Program within the context of the Service Standards Commitments, it has since been determined to be valuable for reporting purposes. It is derived by dividing PS1 (SAIDI) by PS2 (SAIFI).

##### ***CEMI***

CEMI is an acronym for Customers Experiencing Multiple (Sustained and Momentary) Interruptions. This index depicts repetition of outages across the period being reported and can be an indicator of recent portions of the system that have experienced reliability challenges. This metric is used to evaluate customer-specific reliability in Section 4 Customer Reliability Communications.

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<sup>1</sup> IEEE 1366-2003 was adopted by the IEEE Commissioners on December 23, 2003. The definitions and methodology detailed therein are now industry standards.

**WASHINGTON*****CPI99***

CPI99 is an acronym for Circuit Performance Indicator, which uses key reliability metrics of the circuit to identify underperforming circuits. It excludes Major Event and Loss of Supply or Transmission outages. The variables and equation for calculating CPI are:

$$\text{CPI} = \text{Index} * ((\text{SAIDI} * \text{WF} * \text{NF}) + (\text{SAIFI} * \text{WF} * \text{NF}) + (\text{MAIFI} * \text{WF} * \text{NF}) + (\text{Lockouts} * \text{WF} * \text{NF}))$$

Index: 10.645

SAIDI: Weighting Factor 0.30, Normalizing Factor 0.029

SAIFI: Weighting Factor 0.30, Normalizing Factor 2.439

MAIFI: Weighting Factor 0.20, Normalizing Factor 0.70

Lockouts: Weighting Factor 0.20, Normalizing Factor 2.00

Therefore,  $10.645 * ((3\text{-year SAIDI} * 0.30 * 0.029) + (3\text{-year SAIFI} * 0.30 * 2.439) + (3\text{-year MAIFI} * 0.20 * 0.70) + (3\text{-year breaker lockouts} * 0.20 * 2.00)) = \text{CPI Score}$

***CPI05***

CPI05 is an acronym for Circuit Performance Indicator, which uses key reliability metrics of the circuit to identify underperforming circuits. Unlike CPI99 it includes Major Event and Loss of Supply or Transmission outages. The calculation of CPI05 uses the same weighting and normalizing factors as CPI99.

**Performance Types & Commitments**

PacifiCorp recognizes two categories of performance: underlying performance and major events. Major events represent the atypical, with extraordinary numbers and durations for outages beyond the usual. Ordinary outages are incorporated within underlying performance. These types of events are further defined below.

***Major Events***

Pursuant to WAC 480-100-393 Electric Reliability Annual Monitoring and Reporting Plan, modified February 2011, the company recognizes two types of major events in Washington:

- A SAIDI-based Major Event is defined as a 24-hour period where SAIDI exceeds a statistically derived threshold value, as detailed in IEEE Distribution Reliability Standard 1366-2003/2012<sup>1</sup>.
- A SAIFI-Based Major Event is defined as an event in which more than 10% of an operating area's customers are simultaneously without service as a result of a sustained interruption.

***Underlying Events***

Within the industry, there has been a great need to develop methodologies to evaluate year-on-year performance. This has led to the development of methods for segregating outlier days. Those days which fall below the statistically derived threshold represent "underlying" performance, and are valid (with some minor considerations for changes in reporting practices) for establishing and evaluating meaningful performance trends over time.

***Performance Targets***

The Company and Commission, in the MidAmerican transaction docket, UE05-01590, agreed to extend Service Standards through 12/31/2011. Within Washington, because performance delivered by the Company falls within industry second quartile performance levels, the Company committed that it will achieve performance by 12/31/2011 that maintains performance targets set in prior Merger Commitment Periods.

<sup>1</sup> During calendar 2013, the calculated threshold for a major event is 10.56 minutes.

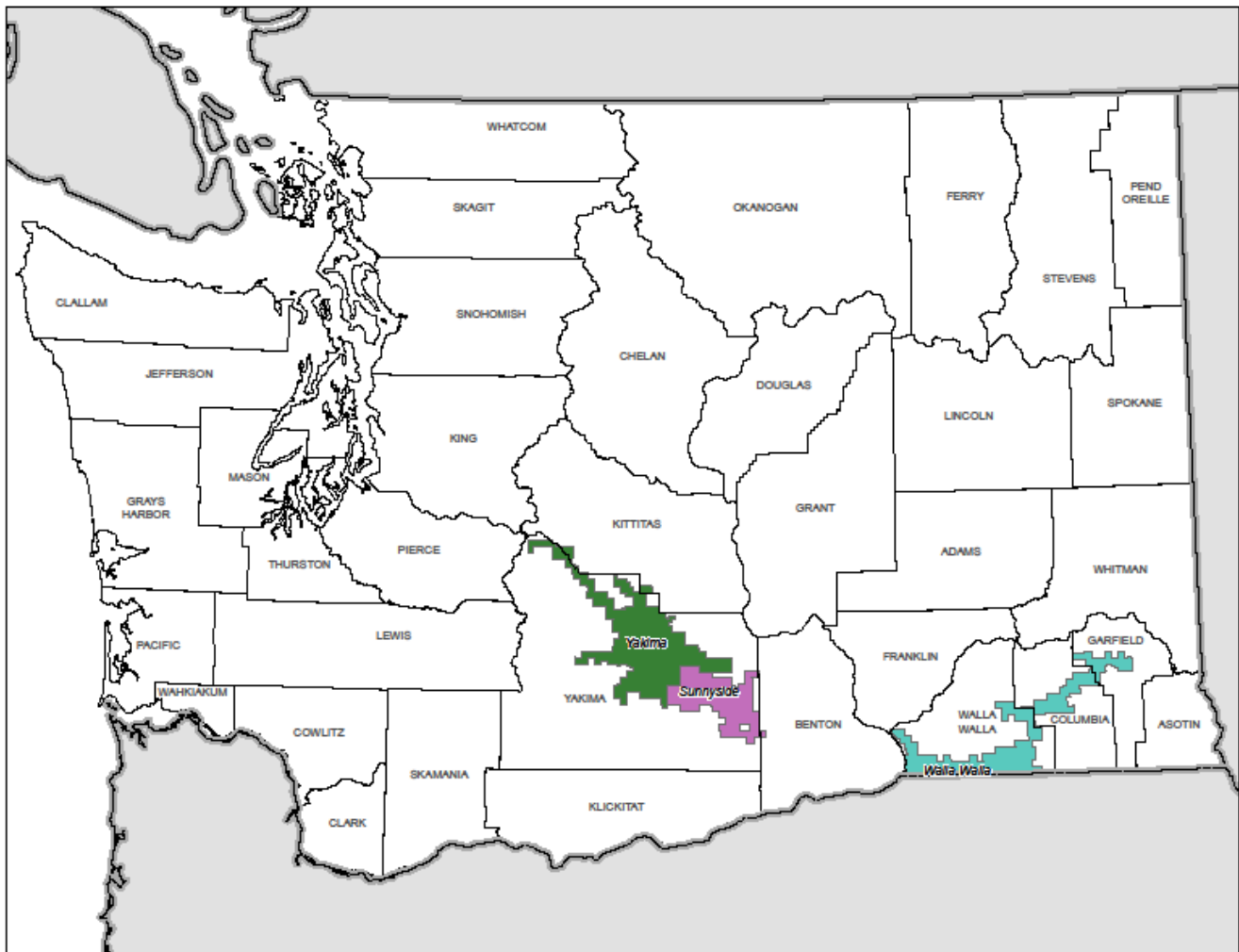


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**1.4 Service Territory**

**Service Territory Map**

Contained below is a graphic of the service territory, colored by operating area. Midway through the year Sunnyside Operating Area was migrated together into Yakima Operating Area. Next year's report will indicate this change in both Section 1.4 and in Section 3.4.



## 2 CUSTOMER GUARANTEES SUMMARY

### customer *guarantees*

January to December 2012

*Washington*

Description	2012				2011			
	Events	Failures	%Success	Paid	Events	Failures	%Success	Paid
CG1 Restoring Supply	87,172	0	100%	\$0	72,806	0	100%	\$0
CG2 Appointments	1,737	5	99.7%	\$250	1,830	4	99.8%	\$200
CG3 Switching on Power	3,606	7	99.8%	\$350	3,428	4	99.9%	\$200
CG4 Estimates	224	8	96.4%	\$400	231	3	98.7%	\$150
CG5 Respond to Billing Inquiries	358	1	99.7%	\$50	715	0	100%	\$0
CG6 Respond to Meter Problems	151	1	99.3%	\$50	382	0	100%	\$0
CG7 Notification of Planned Interruptions	1,708	4	99.8%	\$200	2,945	14	99.5%	\$700
	<b>94,956</b>	<b>26</b>	<b>99.9%</b>	<b>\$1,300</b>	<b>82,337</b>	<b>25</b>	<b>99.9%</b>	<b>\$1,250</b>

Overall guarantee performance remains well above 99%, demonstrating PacifiCorp's continued commitment to customer satisfaction.

Customer Communications: The Customer Guarantee program was highlighted throughout the year in customer communications as follows:

- performance reports are included in June's billing statements
- the program is highlighted in Voices
- the program is highlighted in the company's newsletter
- each new customer is mailed a welcome aboard pamphlet that features the program and how to file a claim
- Pacific Power's website features the program with information for our customers

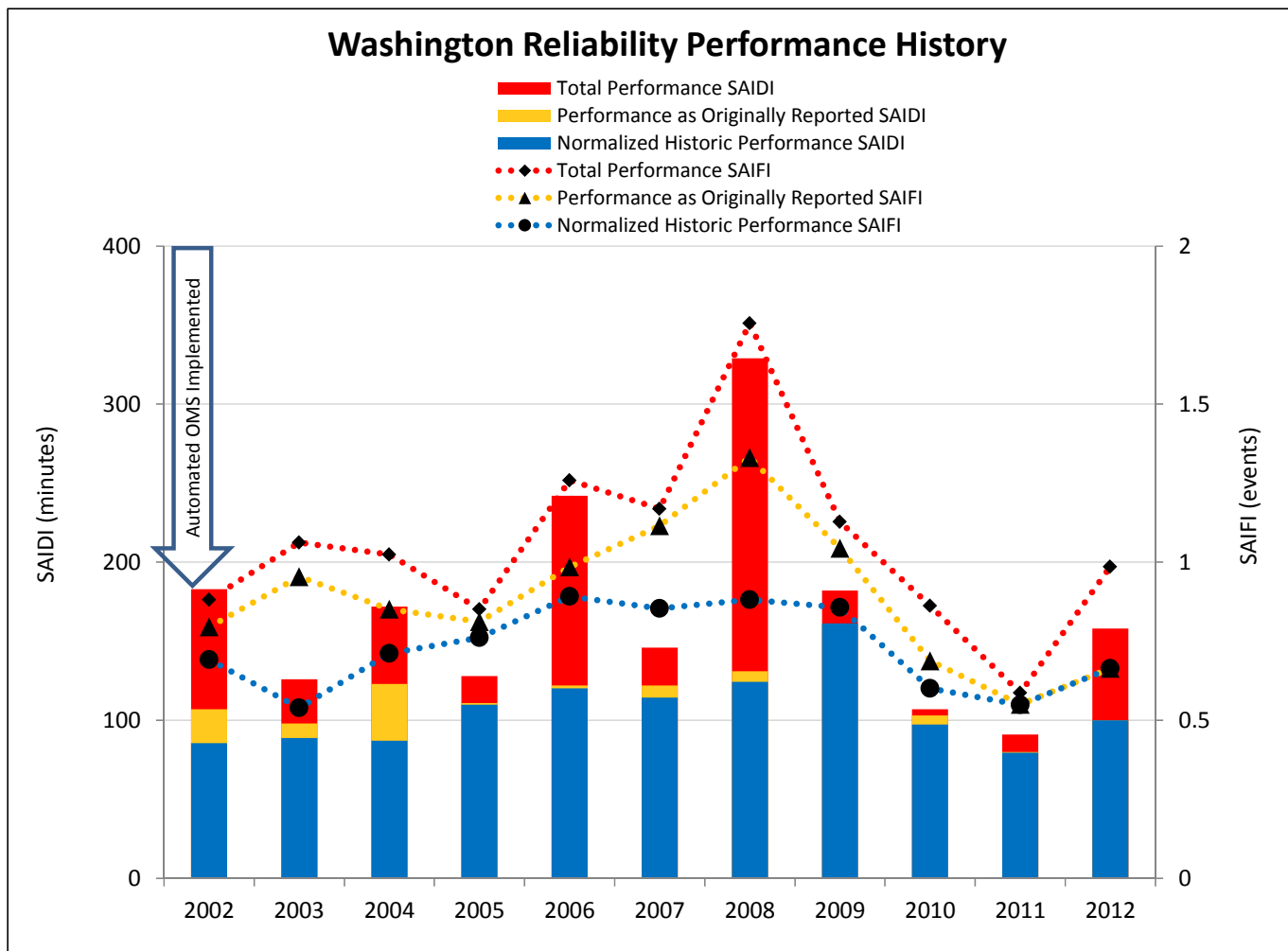
(Major Events are excluded from the Customer Guarantees program.)

### 3 RELIABILITY PERFORMANCE

During the reporting period, the company's reliability compared favorably to its baseline performance level as established in 2003. The year's "Major Events Excluded As Reported" SAIDI performance of 100 minutes was much better than the approved SAIDI baseline of 150 minutes, while the year's "Major Events Excluded As Reported" SAIFI performance of 0.664 events was also much better than the approved SAIFI baseline of 0.975 events. Various reliability metrics are shown below providing a historical perspective.

#### 3.1 Multi-Year Historical Performance

Year	Major Events Included <sup>1</sup>		SAIDI Based Major Events Excluded 2.5 beta		SAIFI Based Major Events Excluded 10% Op Area		Major Events Excluded As Reported <i>(2.5 beta effective 2005)</i>		Normalized Historic Performance <sup>2</sup>		5 Year Rolling Average Performance	
	SAIDI	SAIFI	SAIDI	SAIFI	SAIDI	SAIFI	SAIDI	SAIFI	SAIDI	SAIFI	SAIDI	SAIFI
2002	183	0.881	86	0.691	109	0.726	107	0.795	86	0.691	99	0.741
2003	126	1.062	91	0.933	89	0.539	98	0.954	89	0.539	97	0.761
2004	172	1.024	87	0.712	119	0.726	123	0.851	87	0.712	93	0.736
2005	128	0.851	110	0.810	121	0.761	111	0.812	110	0.761	103	0.808
2006	242	1.259	120	0.980	187	0.891	122	0.985	120	0.891	112	0.879
2007	146	1.169	122	1.116	114	0.853	122	1.115	114	0.853	115	0.943
2008	329	1.756	127	1.323	124	0.881	131	1.331	124	0.881	122	1.019
2009	182	1.128	161	1.042	162	0.857	161	1.044	161	0.857	129	1.057
2010	107	0.862	107	0.862	97	0.601	103	0.688	97	0.601	128	1.033
2011	91	0.587	80	0.549	91	0.587	80	0.55	80	0.549	119	0.946
2012	158	0.986	100	0.664	100	0.664	100	0.664	100	0.664	115	0.855



### 3.2 System Average Interruption Duration Index (SAIDI)

During the reporting period, the company delivered reliability results better than internal goals and baseline for both outage duration (SAIDI) and outage frequency (SAIFI); the performance compared to baselines is identified in Section 3.1 above. While outage response (CAIDI) results are not part of the Company’s baseline performance metrics, the Company reports on them annually. During 2012, these results did not meet internal targets. This is observed most significantly in Yakima area where terrain and access issues contribute to response time; this is a long-standing trend in operating area metric performance. Annual CAIDI statewide in Washington for 2012 was 151 minutes excluding major events and 160 minutes including major events. (The annual CAIDI results for Washington operating areas are exhibited in a table under subsection 3.4 Operating Area Metrics.)

During the year, there were two SAIDI-based major events: lightning July 8-9 and loss of substation November 26. There was one SAIFI-based major event: September 17 due to loss of supply. These events excluded 57.3 minutes from underlying SAIDI. (As noted in the Definitions section of this report, the company records two major event types and reports reliability metrics reflecting results under both methods.)

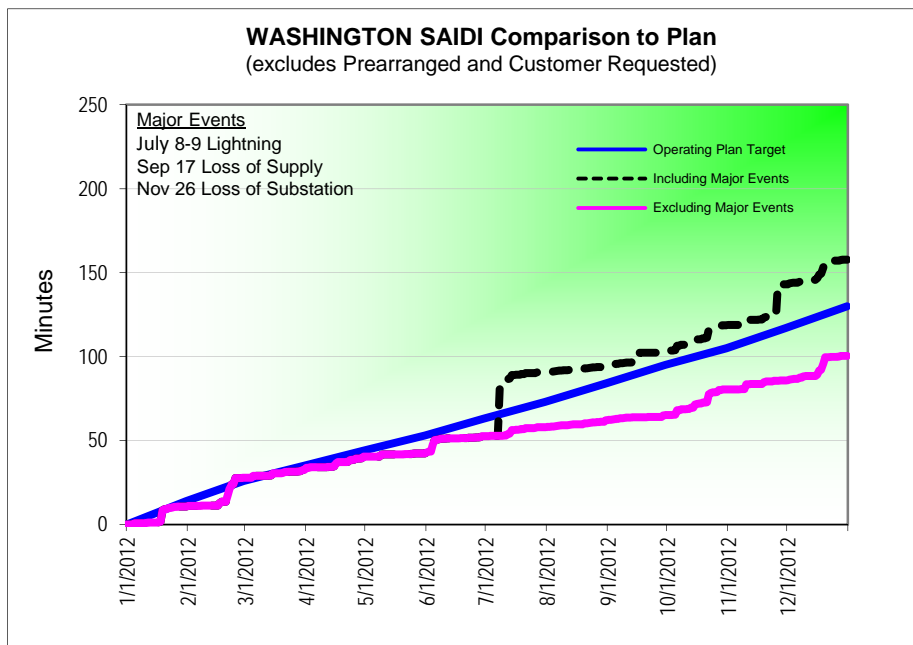
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During the period, there were thirteen significant event days<sup>1</sup> (daily underlying SAIDI of 2.16 minutes or more). These thirteen days account for 48 SAIDI minutes, representing 48% of the total underlying SAIDI results for the year.

SIGNIFICANT EVENT DAYS		
DATE	PRIMARY CAUSE	SAIDI
01/19/2012	Non-preventable Tree (Ice)	6.8
02/21/2012	Non-preventable Tree (Wind)	3.8
02/22/2012	Non-preventable Tree (Wind)	4.1
02/23/2012	Wind	2.4
02/25/2012	Wind	3.6
06/04/2012	Animal	4.2
06/05/2012	Pole Fire	2.8
10/06/2012	Vehicle Interference	2.7
10/22/2012	Pole Fire	4.8
11/10/2012	Vehicle Interference	2.9
12/17/2012	Snowstorm	2.2
12/19/2012	Wind	3.7
12/20/2012	Wind	3.7
TOTAL		47.8

January 1 through December 31, 2012	
2012 Internal SAIDI Goal = 130	SAIDI Actual
Total Performance	158
SAIDI-based Major Events Excluded	100
SAIFI-based Major Events Excluded	100

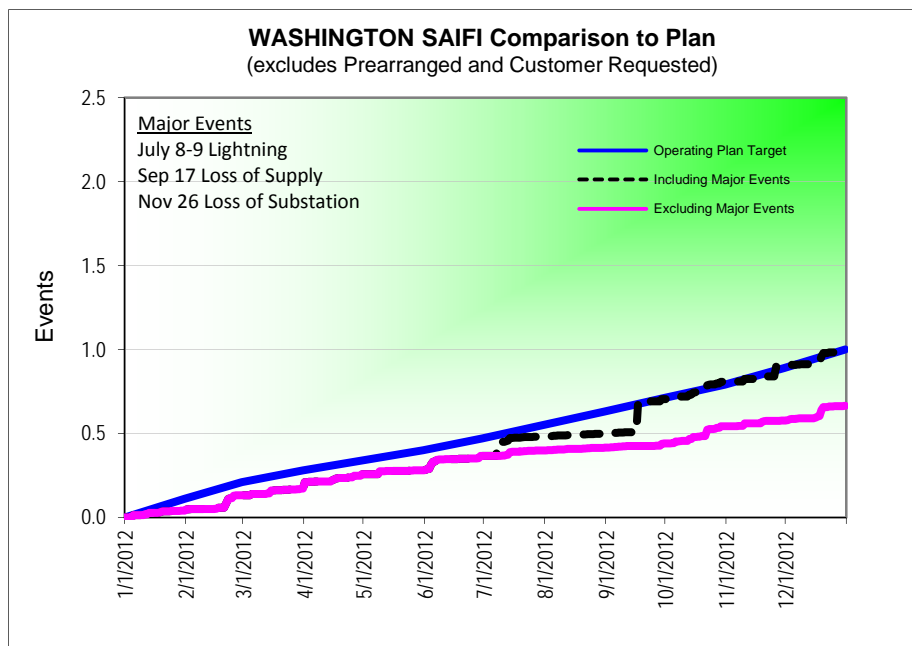
<sup>1</sup> On a trial basis, the Company established a variable of 1.75 times the standard deviation of its natural log SAIDI results.



### 3.3 System Average Interruption Frequency Index (SAIFI)

Like outage duration, outage frequency was better than baseline and internal goal in 2012.

January 1 through December 31, 2012	
2012 Internal SAIFI Goal = 1.000	SAIFI Actual
Total Performance	0.986
SAIDI-based Major Events Excluded	0.664
SAIFI-based Major Events Excluded	0.664



### 3.4 Operating Area Metrics

Washington operating area performance for the reporting period is listed in the table below.

January 1 – December 31, 2012	Including Major Events			Excluding SAIDI-based Major Events			Excluding SAIFI-based Major Events		
	SAIDI	SAIFI	CAIDI	SAIDI	SAIFI	CAIDI	SAIDI	SAIFI	CAIDI
SUNNYSIDE	221	1.17	189	94	0.78	122	94	0.78	122
WALLA WALLA	162	1.04	156	155	0.99	157	155	0.99	157
YAKIMA	137	0.91	240	82	0.51	162	82	0.51	162

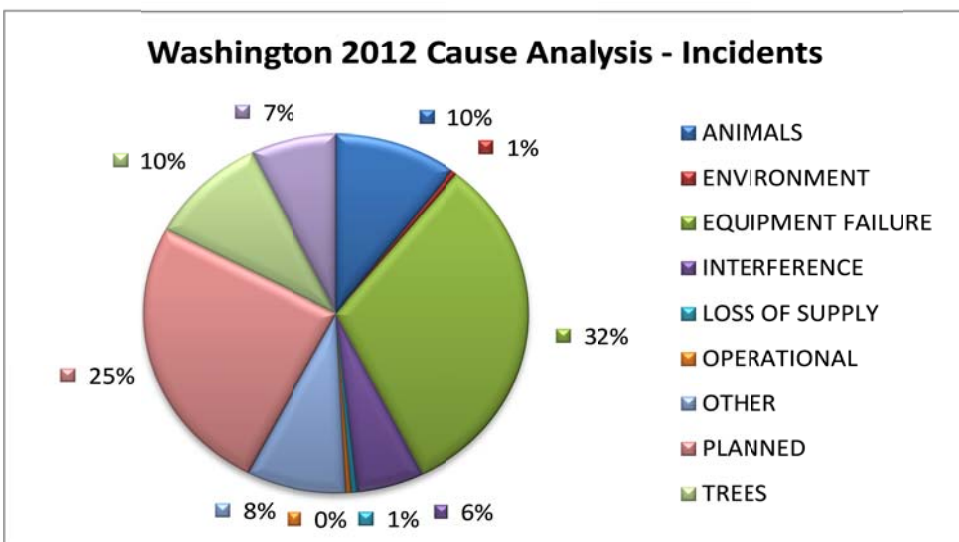
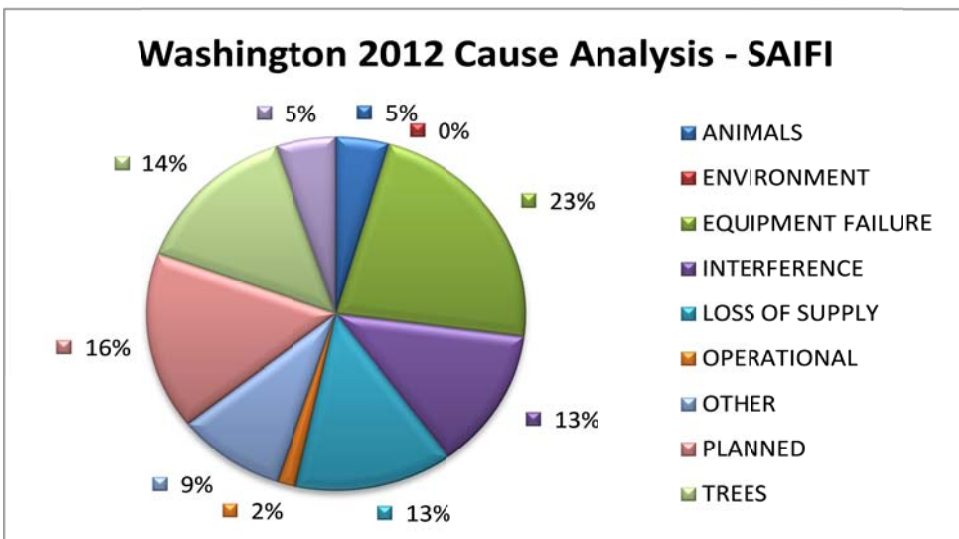
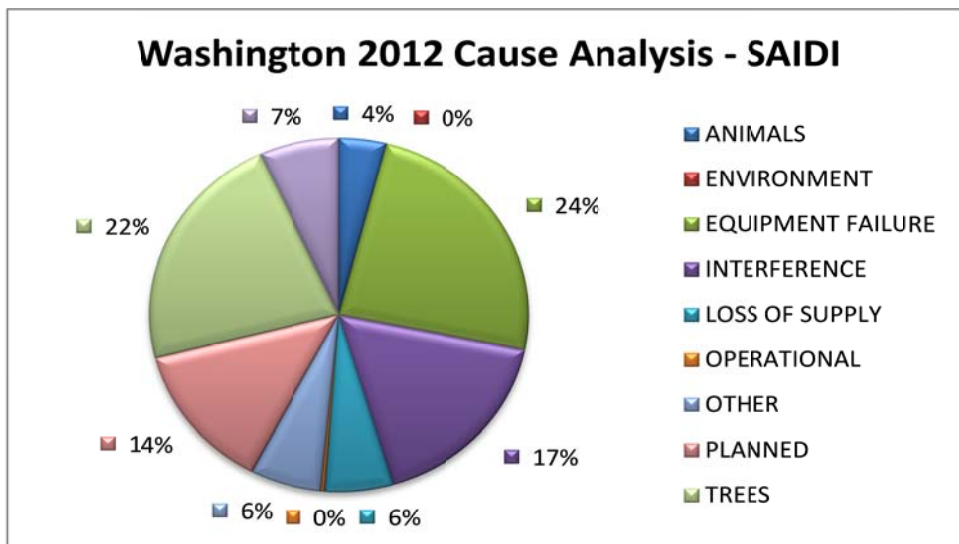


### 3.5 Cause Code Analysis

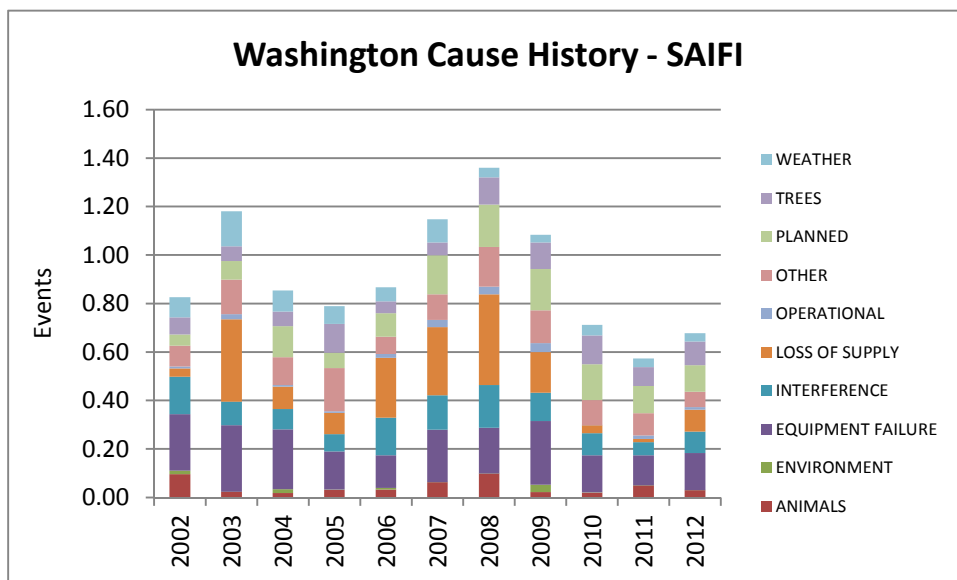
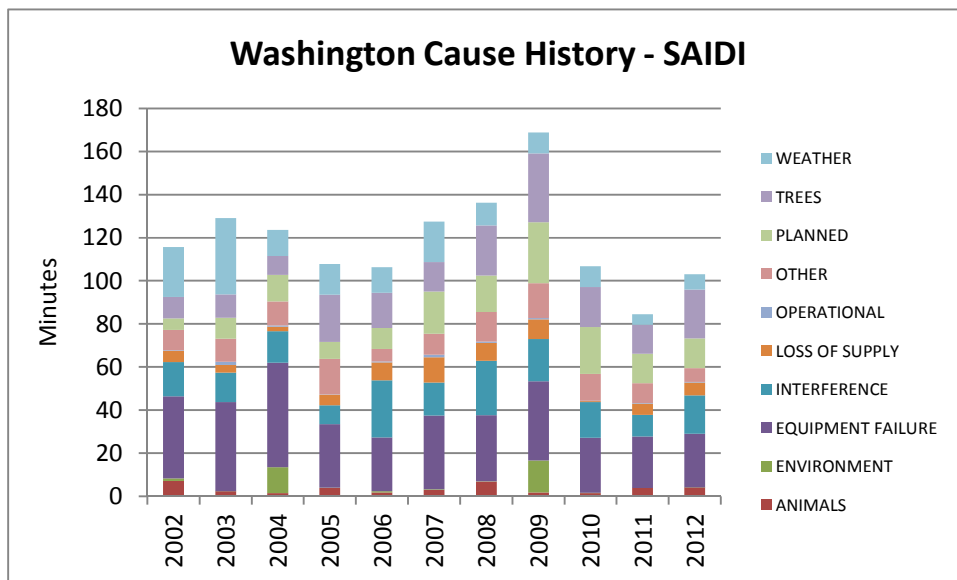
The table and charts below break out the number of incidents, customer hours lost, and sustained interruptions by cause code. Customer Minutes Lost is directly related to SAIDI (average outage duration); Sustained Interruptions is directly related to SAIFI (average outage frequency). Certain types of outages typically result in high duration, but are infrequent, such as Loss of Supply outages. Others tend to be more frequent, but are generally shorter duration. The pie charts depict the breakdown of performance results by percentage of each cause category. Following the pie charts, a cause category table lists the direct causes with definitions and examples. Thereafter is a historical view of cause codes, as they summarize to annual SAIDI and SAIFI performance.

Direct Cause Category	Direct Cause	Customer Minutes Lost for Incident	Customers In Incident Sustained	Sustained Incident Count
ANIMALS	ANIMALS	118410.852	1535	113
	BIRD MORTALITY (NON-PROTECTED SPECIES)	15429.204	193	106
	BIRD MORTALITY (PROTECTED SPECIES) (BMTS)	369596.216	1944	9
	BIRD NEST (BMTS)	38953.645	226	6
	BIRD SUSPECTED, NO MORTALITY	13515.083	192	32
ENVIRONMENT	FIRE/SMOKE (NOT DUE TO FAULTS)	3677.684	35	12
EQUIPMENT FAILURE	B/O EQUIPMENT	927697.799	6044	361
	DETERIORATION OR ROTTING	890645.783	5353	375
	OVERLOAD	19630.466	45	7
	POLE FIRE	1517769.071	9142	80
INTERFERENCE	DIG-IN (NON-PACIFICORP PERSONNEL)	10912.066	46	19
	OTHER INTERFERING OBJECT	20849.05	198	4
	OTHER UTILITY/CONTRACTOR	26658.75	169	12
	VANDALISM OR THEFT	16366.683	90	17
	VEHICLE ACCIDENT	2312135.732	11284	92
LOSS OF SUPPLY	FAILURE ON OTHER LINE OR STATION	0	0	0
	LOSS OF SUBSTATION	283295.367	3597	3
	LOSS OF TRANSMISSION LINE	514345.749	8680	10
OPERATIONAL	FAULTY INSTALL	66.033	1	1
	IMPROPER PROTECTIVE COORDINATION	210.8	3	1
	INCORRECT RECORDS	247.817	4	4
	INTERNAL CONTRACTOR	458.466	2	2
	INTERNAL TREE CONTRACTOR	34735.45	199	1
	PACIFICORP EMPLOYEE - FIELD	14087.233	1262	3
OTHER	OTHER, KNOWN CAUSE	16493.067	123	23
	UNKNOWN	837052.154	8369	194
PLANNED	CONSTRUCTION	12501.133	477	111
	CUSTOMER NOTICE GIVEN	338068.846	1708	223
	CUSTOMER REQUESTED	13420.984	182	100
	EMERGENCY DAMAGE REPAIR	1272453.994	10779	191
	INTENTIONAL TO CLEAR TROUBLE	188667.882	1523	23
	TRANSMISSION REQUESTED	31881.2	156	1
TREES	TREE - NON-PREVENTABLE	3034913.906	12802	254
	TREE - TRIMMABLE	33066.173	232	6
WEATHER	ICE	5872.066	24	3
	LIGHTNING	388713.927	2591	124
	SNOW, SLEET AND BLIZZARD	347044.738	621	17
	WIND	210432.226	1488	42

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Cause Category	Description and Examples
<b>Environment</b>	Contamination or Airborne Deposit (i.e., salt, trona ash, other chemical dust, sawdust, etc.); corrosive environment; flooding due to rivers, broken water main, etc.; fire/smoke related to forest, brush or building fires (not including fires due to faults or lightning).
<b>Weather</b>	Wind (excluding windborne material); snow, sleet or blizzard; ice; freezing fog; frost; lightning.
<b>Equipment Failure</b>	Structural deterioration due to age (incl. pole rot); electrical load above limits; failure for no apparent reason; conditions resulting in a pole/cross arm fire due to reduced insulation qualities; equipment affected by fault on nearby equipment (i.e. broken conductor hits another line).
<b>Interference</b>	Willful damage, interference or theft; such as gun shots, rock throwing, etc.; customer, contractor or other utility dig-in; contact by outside utility, contractor or other third-party individual; vehicle accident, including car, truck, tractor, aircraft, manned balloon; other interfering object such as straw, shoes, string, balloon.
<b>Animals and Birds</b>	Any problem nest that requires removal, relocation, trimming, etc.; any birds, squirrels or other animals, whether or not remains found.
<b>Operational</b>	Accidental Contact by PacifiCorp or PacifiCorp's Contractors (including live-line work); switching error; testing or commissioning error; relay setting error, including wrong fuse size, equipment by-passed; incorrect circuit records or identification; faulty installation or construction; operational or safety restriction.
<b>Loss of Supply</b>	Failure of supply from Generator or Transmission system; failure of distribution substation equipment.
<b>Planned</b>	Transmission requested, affects distribution sub and distribution circuits; company outage taken to make repairs after storm damage, car hit pole, etc.; construction work, regardless if notice is given; rolling blackouts.
<b>Trees</b>	Growing or falling trees.
<b>Other</b>	Cause Unknown.



**WASHINGTON**
**3.6 Areas of Greatest Concern**

During 2013, reliability enhancement efforts continue to focus on improved system hardening and protection. Through history this has included replacement of hydraulic reclosers, upgrades of substation breakers and/or relays and coordination of circuit protection devices, such as fuses and reclosers. The company regularly finds some of its most cost-effective reliability improvements can be achieved by focusing on circuits that do not appear to be well coordinated, which it finds through data mining of its outage reporting data. Additionally, it has continued its circuit hardening efforts by strategic deployment of circuit inspection, pole and/or crossarm replacement and vegetation hot-spotting. Along with circuit hardening and protection efforts, it has reviewed opportunities for localized activities such as feeder ties and cable replacement activities. In this year's set of areas of greatest concern, the company has identified transmission improvements that will increase distribution system performance by installing an auto sectionalizing scheme and fault indicators on the 69kV local transmission source for this feeder. This will improve the reliability on circuits 5W305, 5W342, 5W323, 5W306 and 5W324. Finally, the implementation of a web-based notification tool, which alerts when interrupting devices (such as substation breakers, line reclosers or fuses) have exceeded proscribed performance thresholds has helped to promptly focus field investigative activities; this new capability has delivered substantial improvements to customers.

The table below lists reliability projects identified and currently underway for Washington's Areas of Greatest Concern; these circuits will be subsequently reported as Program Year 14 circuits in Section 3.7.

<b>Circuit</b>	<b>Actions</b>	<b>Status</b>	<b>Target Date</b>
5Y458 Chestnut	Replace relays on 5Y458 at Orchards Sub (Engr CY13; Constr CY14)	Pending	12/31/2014
5Y600 South	Replace relays on 5Y600 at Wenas Sub (Engr CY13; Constr CY14)	Pending	12/31/2014
5Y302 Bonneview	Replace relays on 5Y302 at Grandview Sub (Engr CY13; Constr CY14)	Pending	12/31/2014
5Y658 Cougar	Add 2 Reclosers 3-phase and Fuse Coordinate	Pending	12/31/2013
5W324 City	Install auto sectionalizing scheme, switch 3W38; need PT and voltage relay; fault indicators;	Pending	12/31/2013

### 3.7 Reduce CPI for Worst Performing Circuits by 20%

On a routine basis, the company reviews circuits for performance. One of the measures that it uses is called circuit performance indicator (CPI), which is a blended weighting of key reliability metrics covering a three-year time frame. The higher the number, the poorer the blended performance the circuit is delivering. As part of the company's Performance Standards Program, it annually selects a set of Worst Performing Circuits for target improvement. The improvements are to be completed within two years of selection. Within five years of selection, the average performance is to be improved by at least 20% (as measured by comparing current performance against baseline performance). Program Years 1-5 and 9-11 have previously met their targets (as filed and approved) so no longer appear in the table below.

WASHINGTON WORST PERFORMING CIRCUITS	BASELINE	Performance 12/31/2012
PROGRAM YEAR 13:		
DONALD 5Y330	90	n/a
FORNEY 5Y94	207	n/a
PRESCOTT 5W305	94	n/a
STEIN 5Y164	156	n/a
TERRACE HTS 5Y10	114	n/a
TARGET SCORE = 106	132	n/a
PROGRAM YEAR 12:		
Freeway 5Y356	106	54
Pomeroy 5W342	97	73
Sheller 5Y314	131	78
Park Feeder 5W306	128	110
Campbell 5Y184	114	126
TARGET SCORE = 92 <b>GOAL MET</b>	115	88
PROGRAM YEAR 8:		
Zillah 5Y245	114	77
Gurley 5Y358	87	38
Stone Creek 5W19	135	55
Nile 4Y1	760	367
Highland 5Y93	247	98
TARGET SCORE = 215 <b>GOAL MET</b>	269	127
PROGRAM YEAR 7:		
West 5Y149	210	93
Granger 5Y357	116	32
Russell Creek 5W121	149	28
Tampico 5Y380	140	111
Gore 5Y100	56	48
TARGET SCORE = 107 <b>GOAL MET</b>	134	62

WASHINGTON

WASHINGTON WORST PERFORMING CIRCUITS	BASELINE	Performance 12/31/2012
PROGRAM YEAR 6:		
Nile 4Y1	383	367
Forney 5Y94	246	193
Harrah 5Y202	220	41
Windward 4W22	233	25
Ferndale 5W106	227	68
TARGET SCORE = 210 <b>GOAL MET</b>	262	139

### 3.8 Restore Service to 80% of Customers within 3 Hours

The Company targets restoring power to 80% of its customers within 3 hours, however during 2012 this target was not met, mostly due to the impact of certain significant events that resulted in longer than-desired restoration.

WASHINGTON RESTORATIONS WITHIN 3 HOURS					
January 1 through December 31, 2012					73%
January	February	March	April	May	June
79%	60%	84%	85%	85%	71%
July	August	September	October	November	December
66%	60%	79%	80%	71%	66%

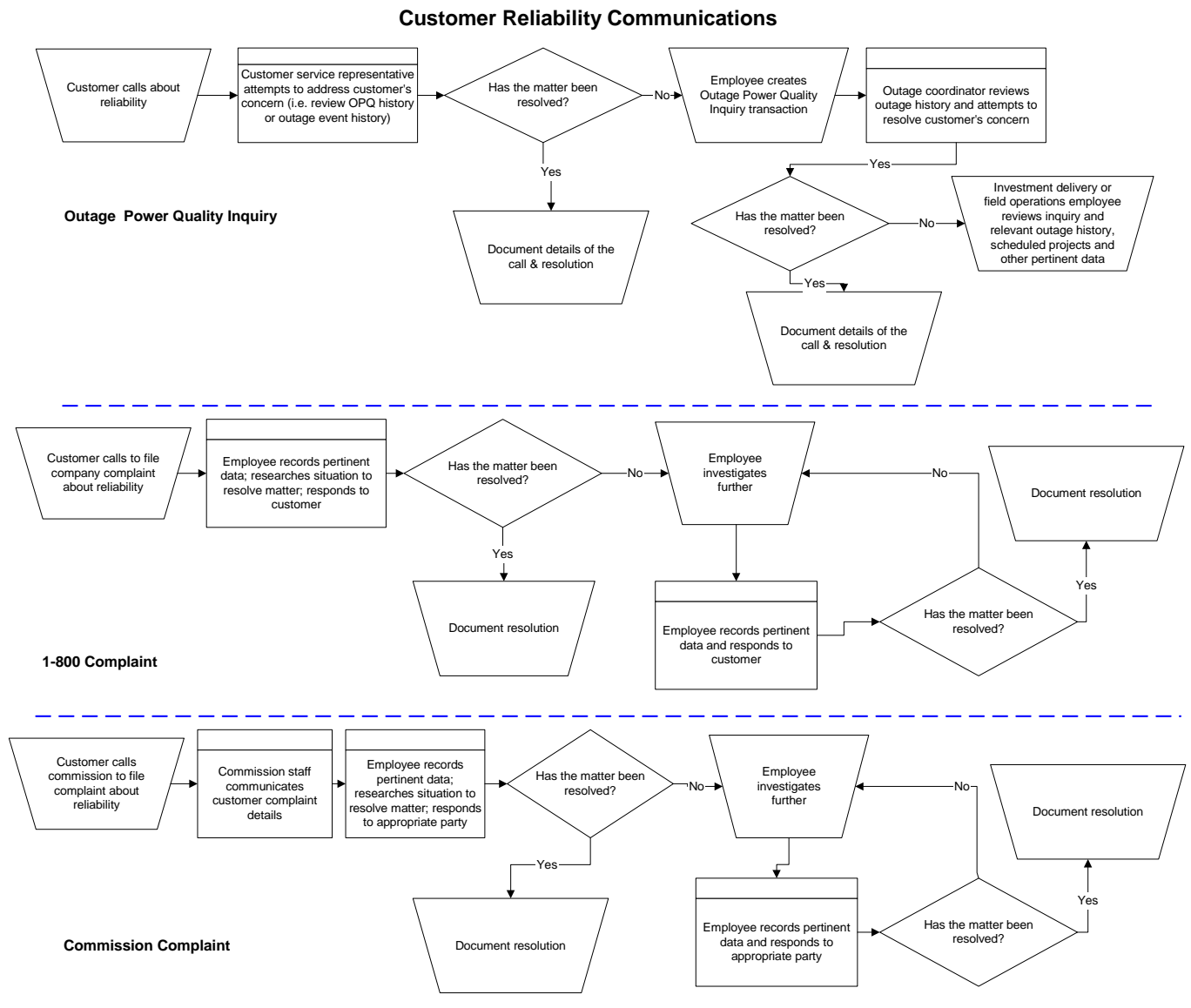
### 3.9 Telephone Service and Response to Commission Complaints

COMMITMENT	GOAL	PERFORMANCE
PS5-Answer calls within 30 seconds	80%	80%
PS6a) Respond to commission complaints within 3 days	95%	100%
PS6b) Respond to commission complaints regarding service disconnects within 4 hours	95%	100%
PS6c) Resolve commission complaints within 30 days	95%	100%

## 4 CUSTOMER RELIABILITY COMMUNICATIONS

### 4.1 Reliability Complaint Process Overview

The company's process for managing customers' concerns about reliability are to provide opportunities to hear customer concerns, respond to those concerns, and where necessary, provide customers an opportunity to elevate those concerns.





## 4.2 Customer Complaint Tracking

Listed below are the various avenues available to a customer to resolve concerns about reliability performance.

- **Customer Reliability Inquiry**

The company records customer inquiries about reliability as Outage Power Quality transactions in its customer service system, referred to as “OPQ” transactions.

- **Customer Complaint**

If a customer’s reliability concerns are not met through the process associated with the OPQ transaction, a customer can register a 1-800 complaint with the company. This is recorded in a complaint repository from which regular reports are prepared and circulated for resolution.

- **Commission Complaint**

If a customer’s reliability concerns are not met through the process associated with a 1-800 complaint, a customer can register a complaint with the Commission. This is recorded by the Commission staff and also by the company in a complaint repository. Regular reports are prepared and circulated for resolution of these items.

## 4.3 Customer Complaints Recorded During the Period

Listed below, by the recording source, are reliability-related customer complaints if any were received for Washington services during the reporting period.

- **Informal Complaints (800 Customer Assistance Line - CAL)**

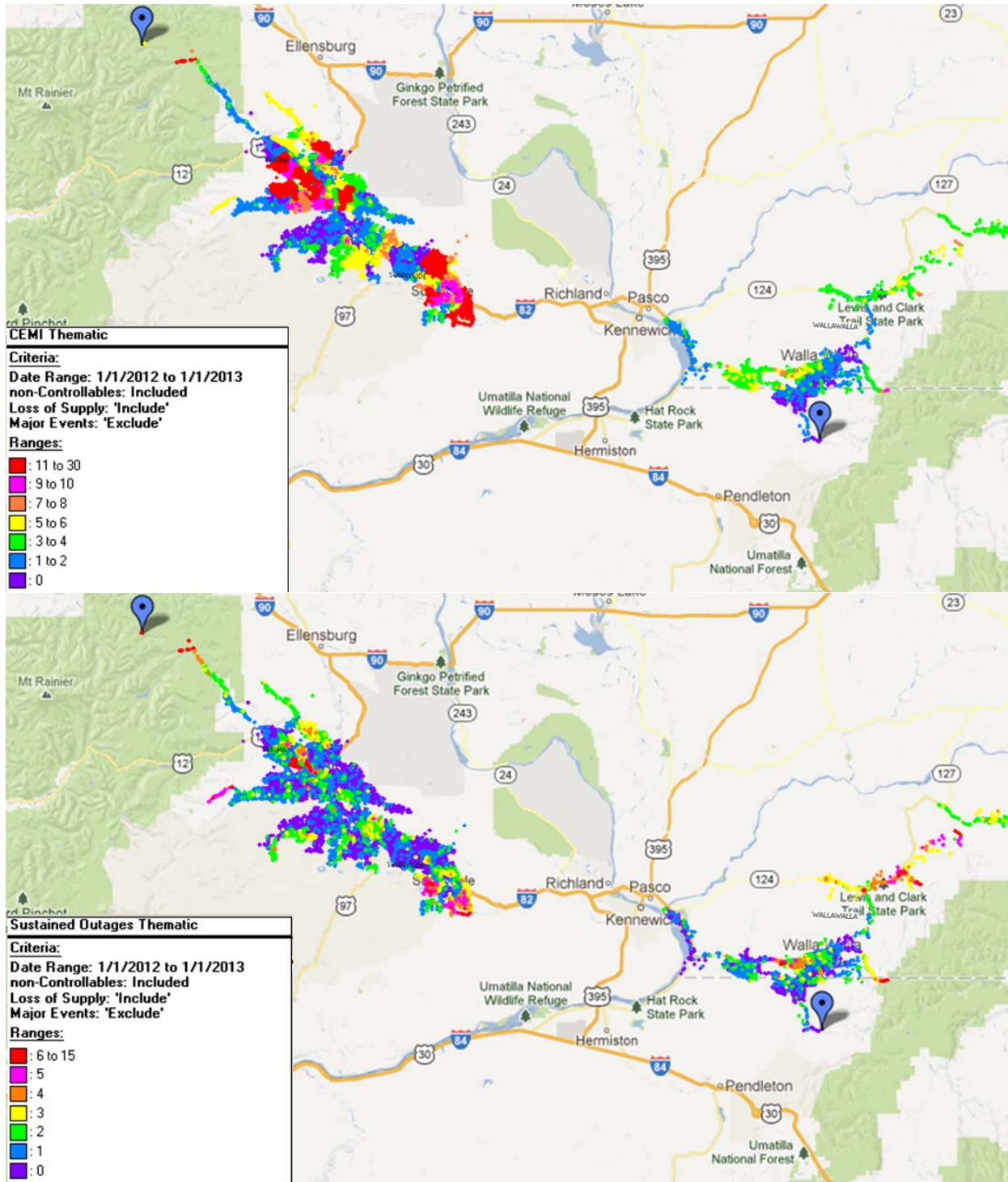
There were no Informal Complaints received by the company in the reporting period.

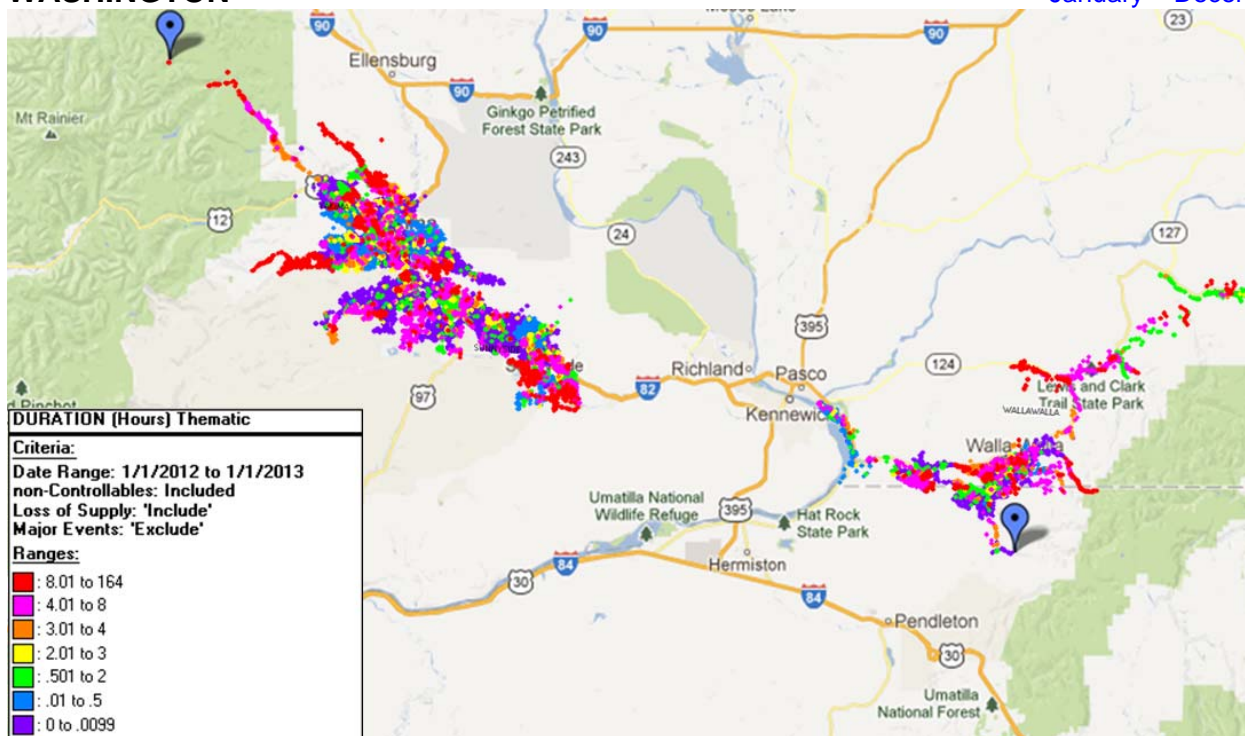
- **Commission Complaints**

There were no Commission Complaints in the reporting period.

## **5 WASHINGTON RELIABILITY RESULTS DURING 2012**

To geospatially display reliability results, the Company has developed its GREAT tool which blends circuit topology with outage history and uses a variety of industry metrics (differentiated by color) to indicate areas where reliability analysis should be targeted. In the subsequent plots, two important reliability indicators are depicted. In each plot thumbnails are used to orient the graphic. First, plots with customers experiencing multiple interruptions (CEMI) are shown. This measure shows how many sustained and momentary outages a given service transformer has experienced. The greater the color intensity, with red as the most severe, the more interruptions the transformer has had. Note that this depiction exceeds the requirements of the reporting rule, but is helpful to the Company in selecting areas of reliability concern. Second sustained interruptions are shown. This measure shows how many sustained outages a service transformer has experienced, which is aligned with the requirements of the reporting rules. Third, service transformer-level SAIDI is shown. While technically SAIDI is a “system-level” metric, the local application of this metric can be revealing in determining service transformers that have had long cumulative durations of outages during the period. As explained previously, the greater the color intensity, the longer the outage duration during the period. (Major events, customer requested and prearranged outages are excluded from underlying results.)

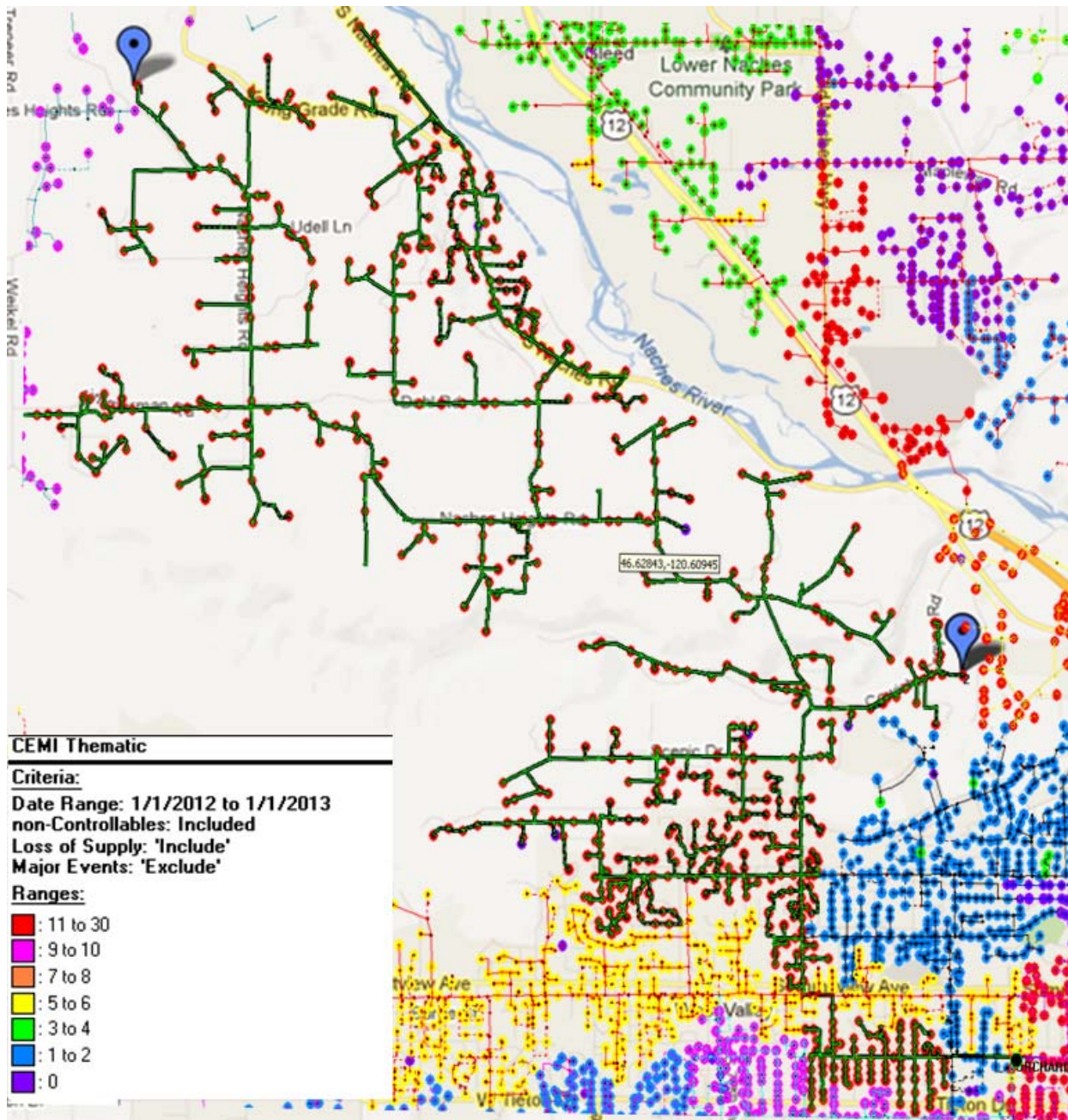
**WASHINGTON**
**5.1 State Reliability**


**WASHINGTON**


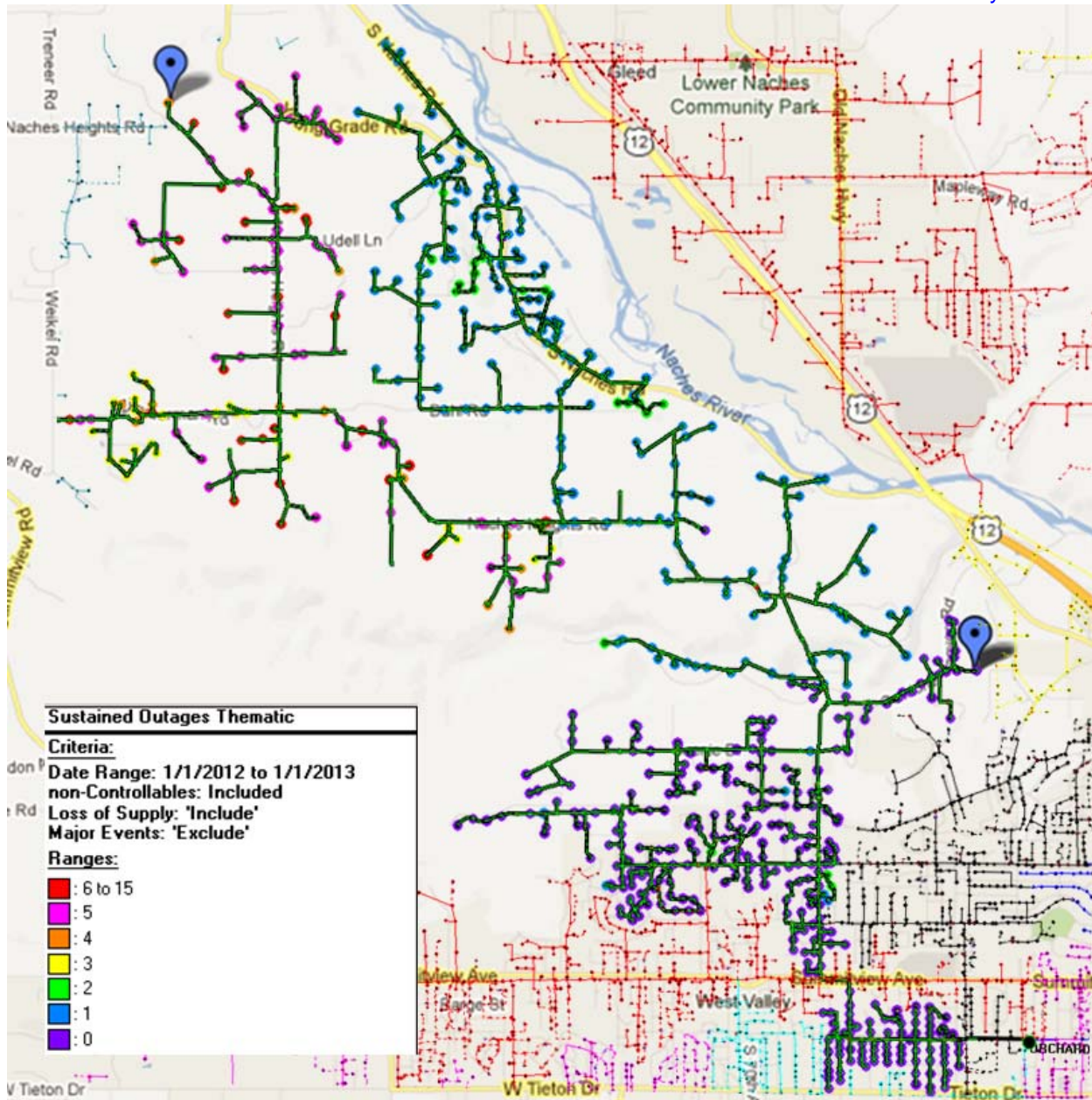


**WASHINGTON**

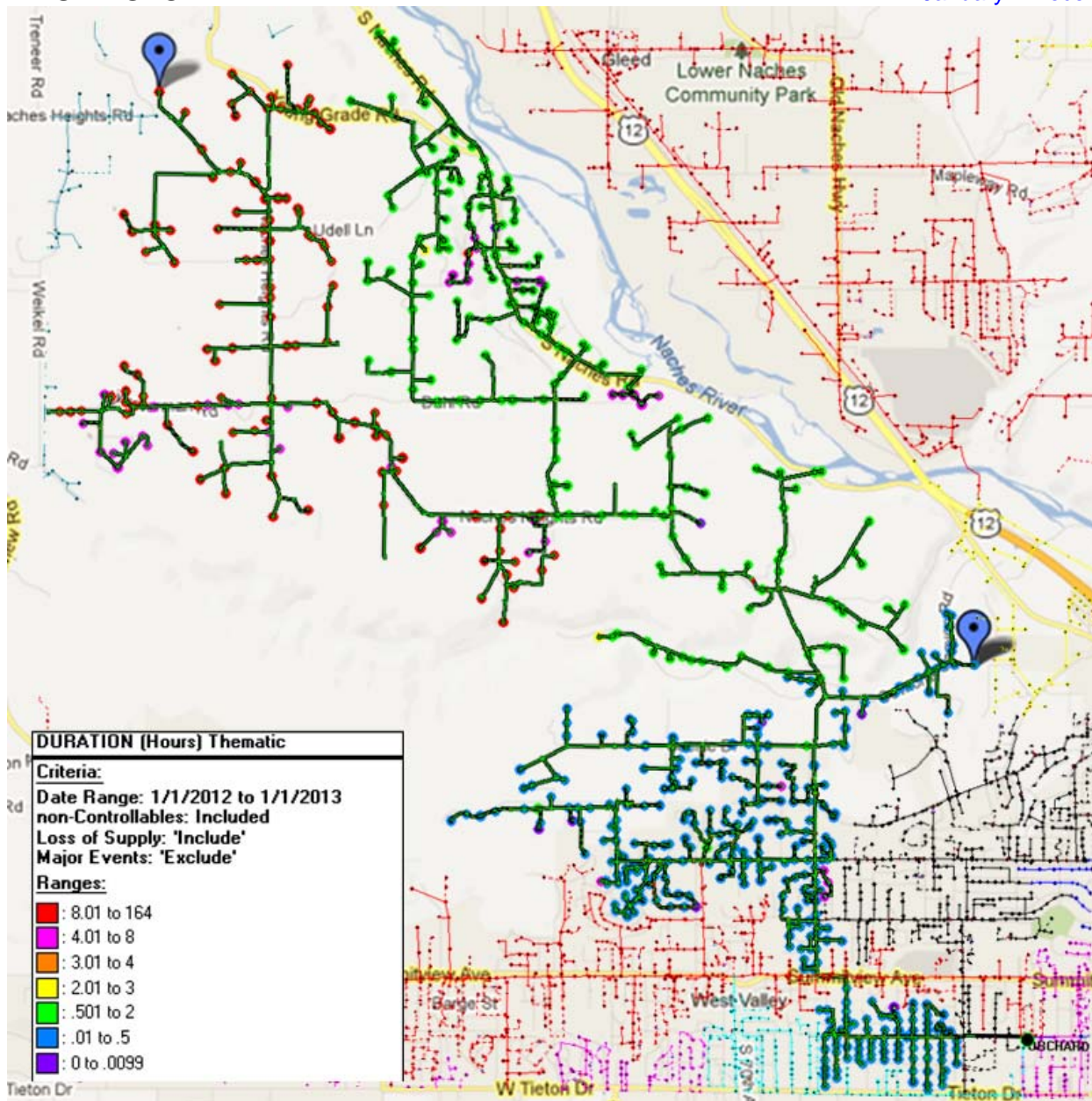
**5.2 5Y458 Chestnut Feeder**

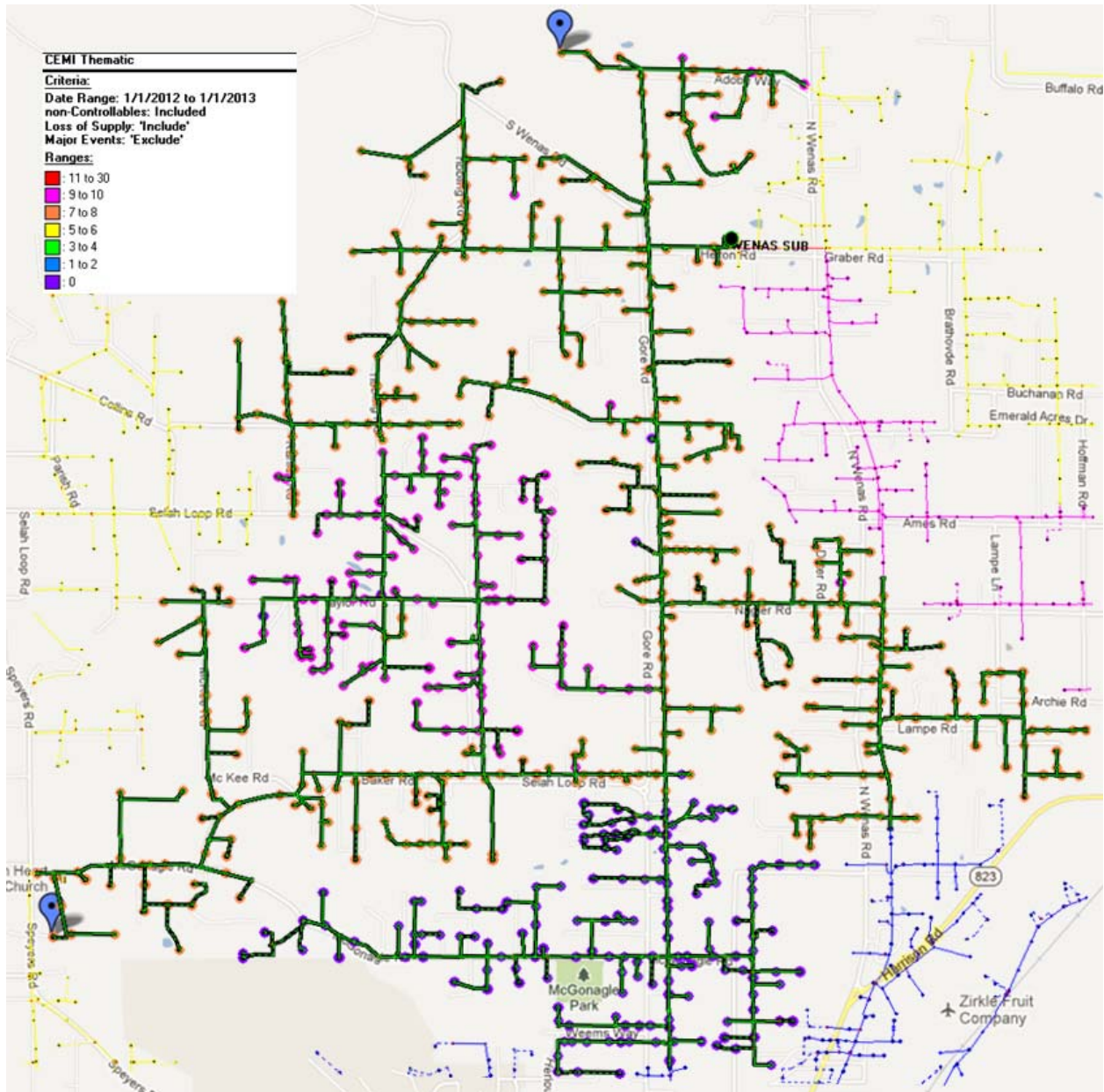


**WASHINGTON**



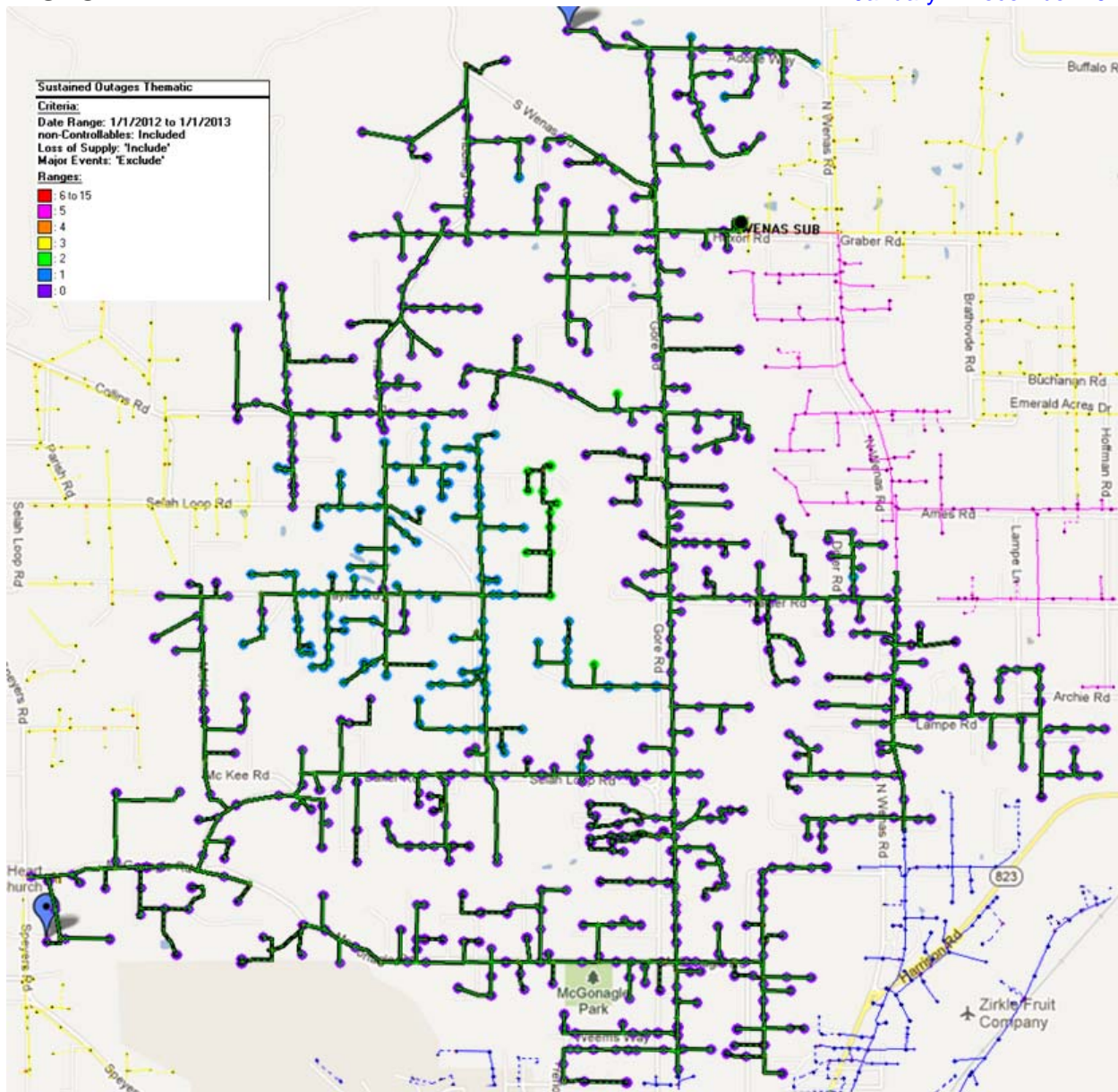


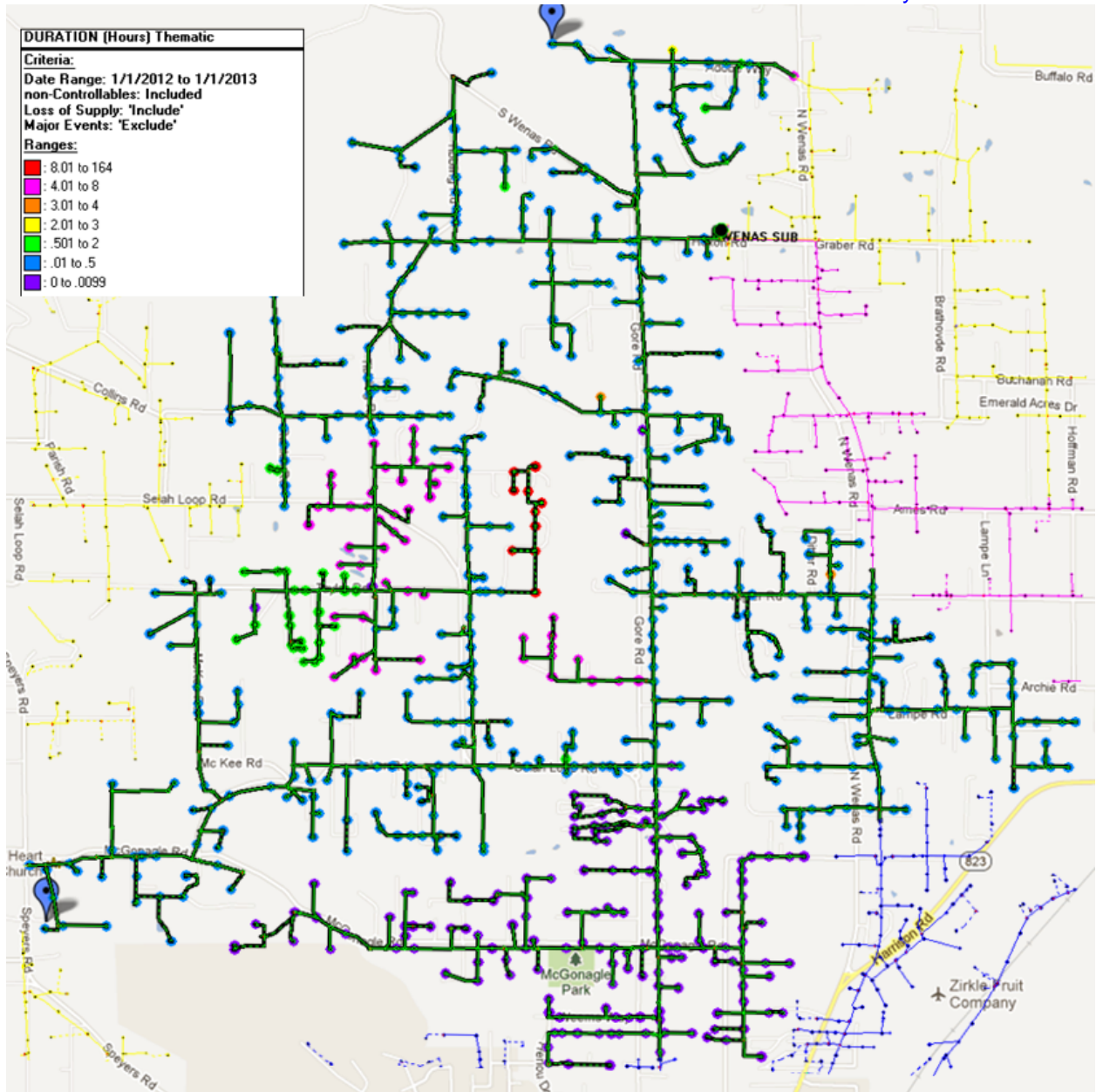
**WASHINGTON**


**5.3 5Y600 South Feeder**




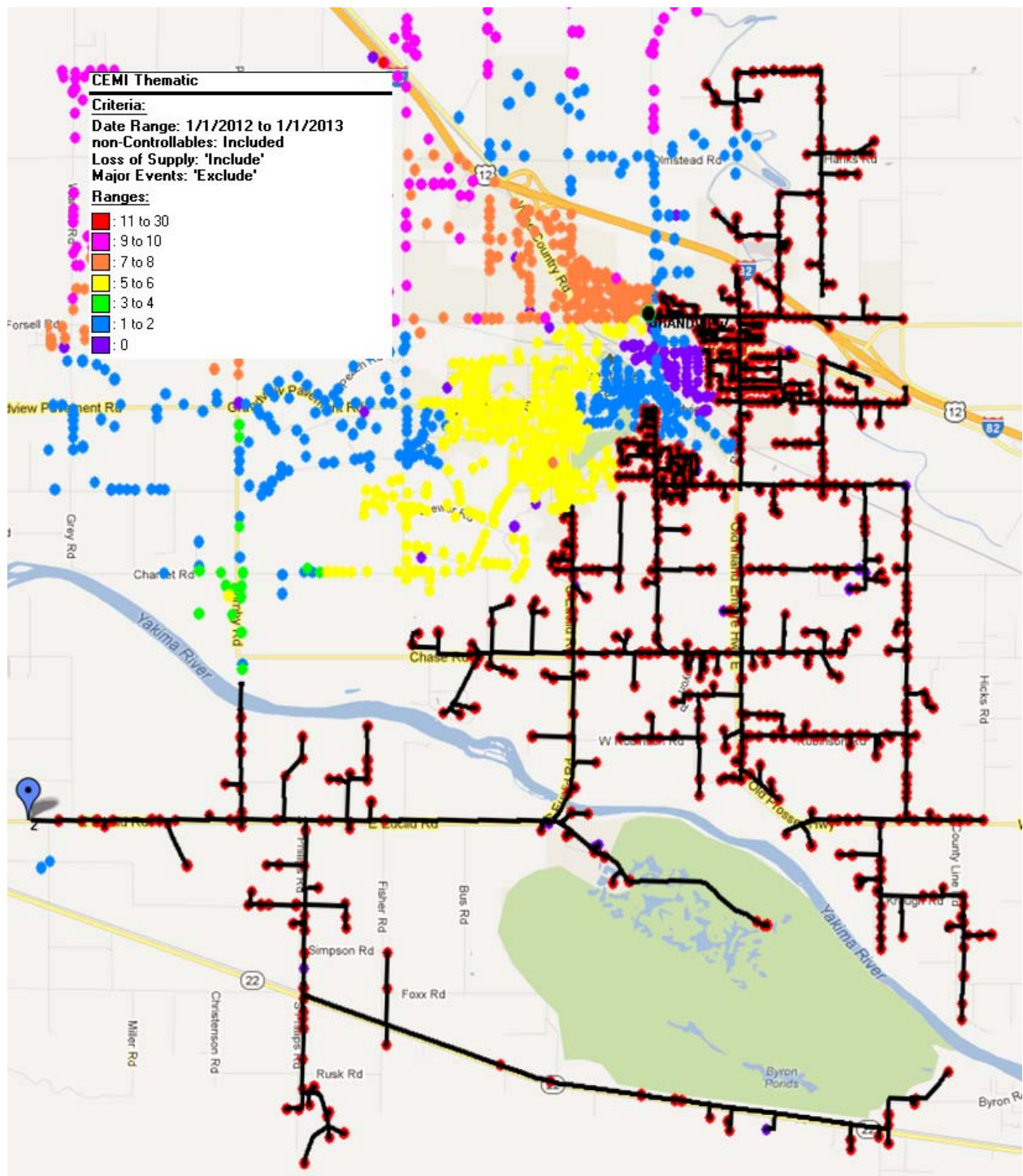
**WASHINGTON**

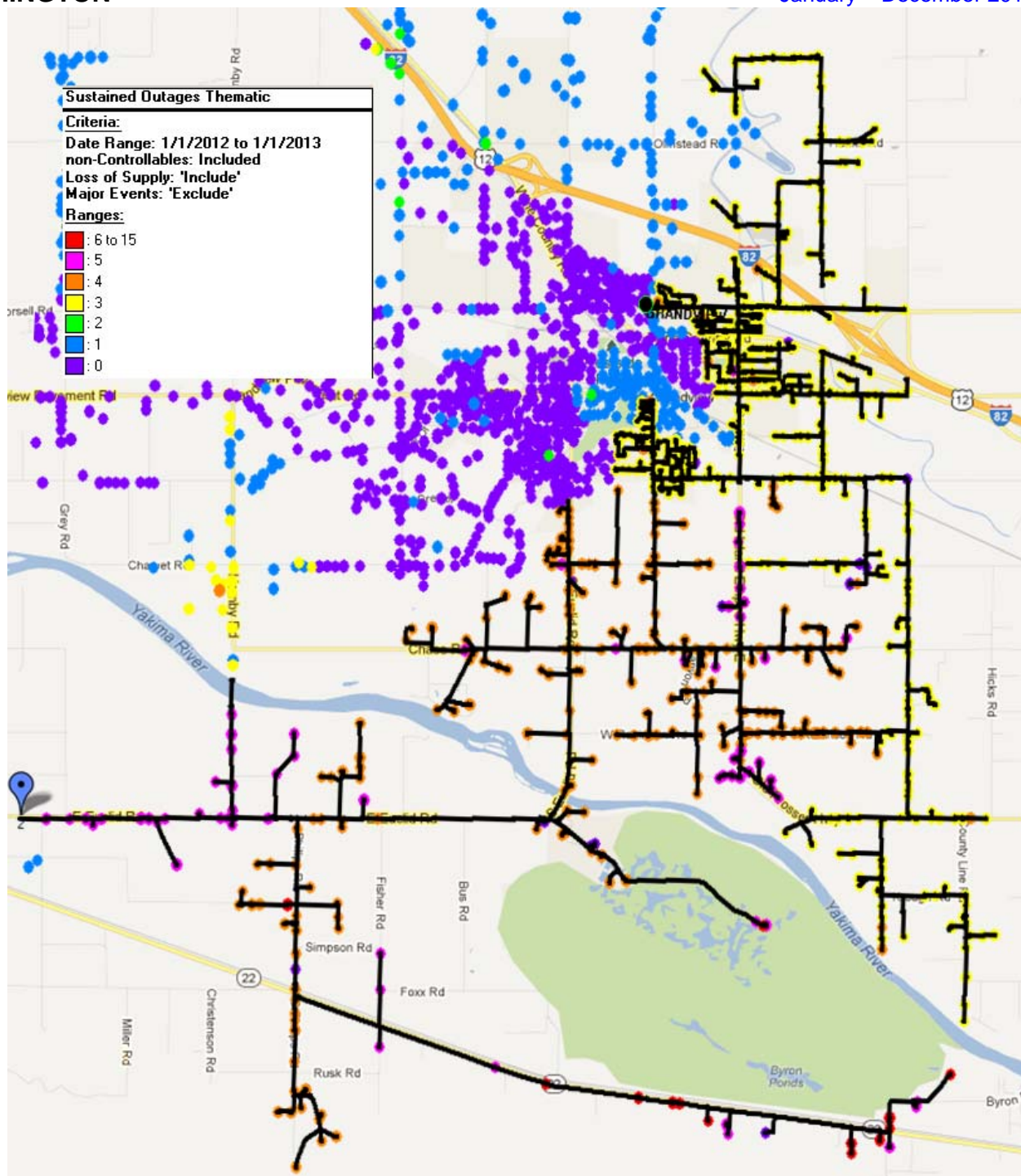


**WASHINGTON**


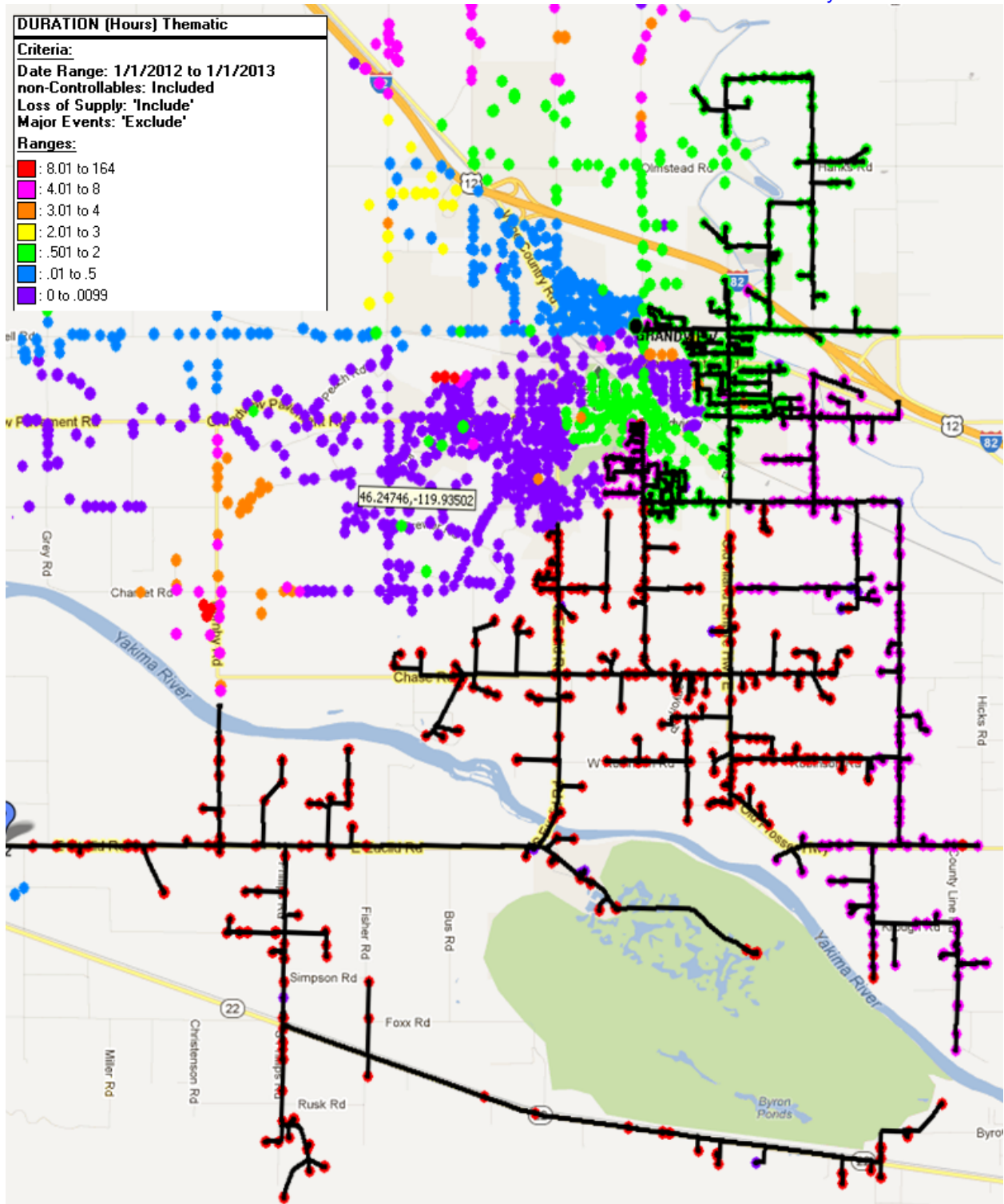


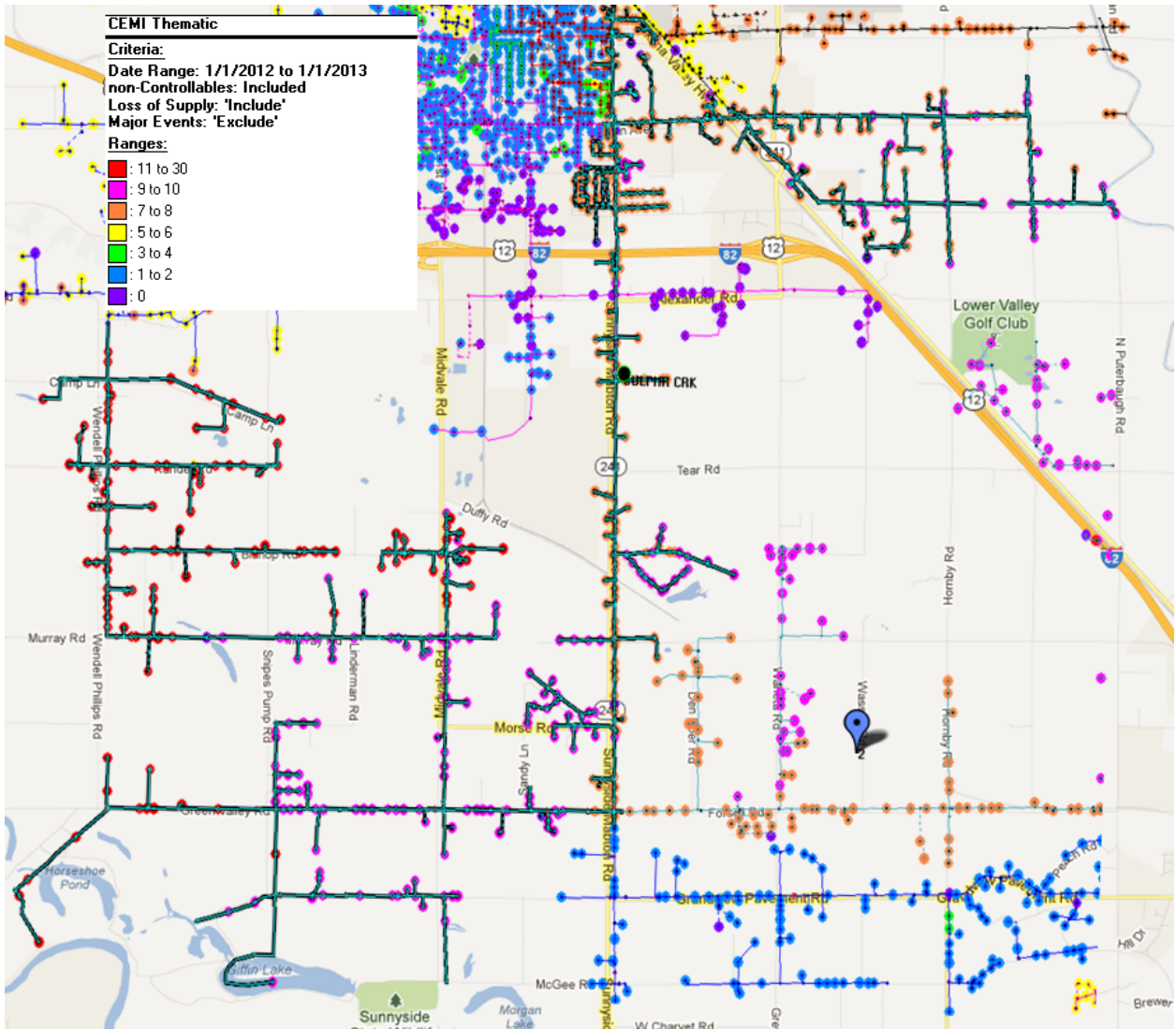
**WASHINGTON**  
**5.4 5Y302 Bonneview Feeder**





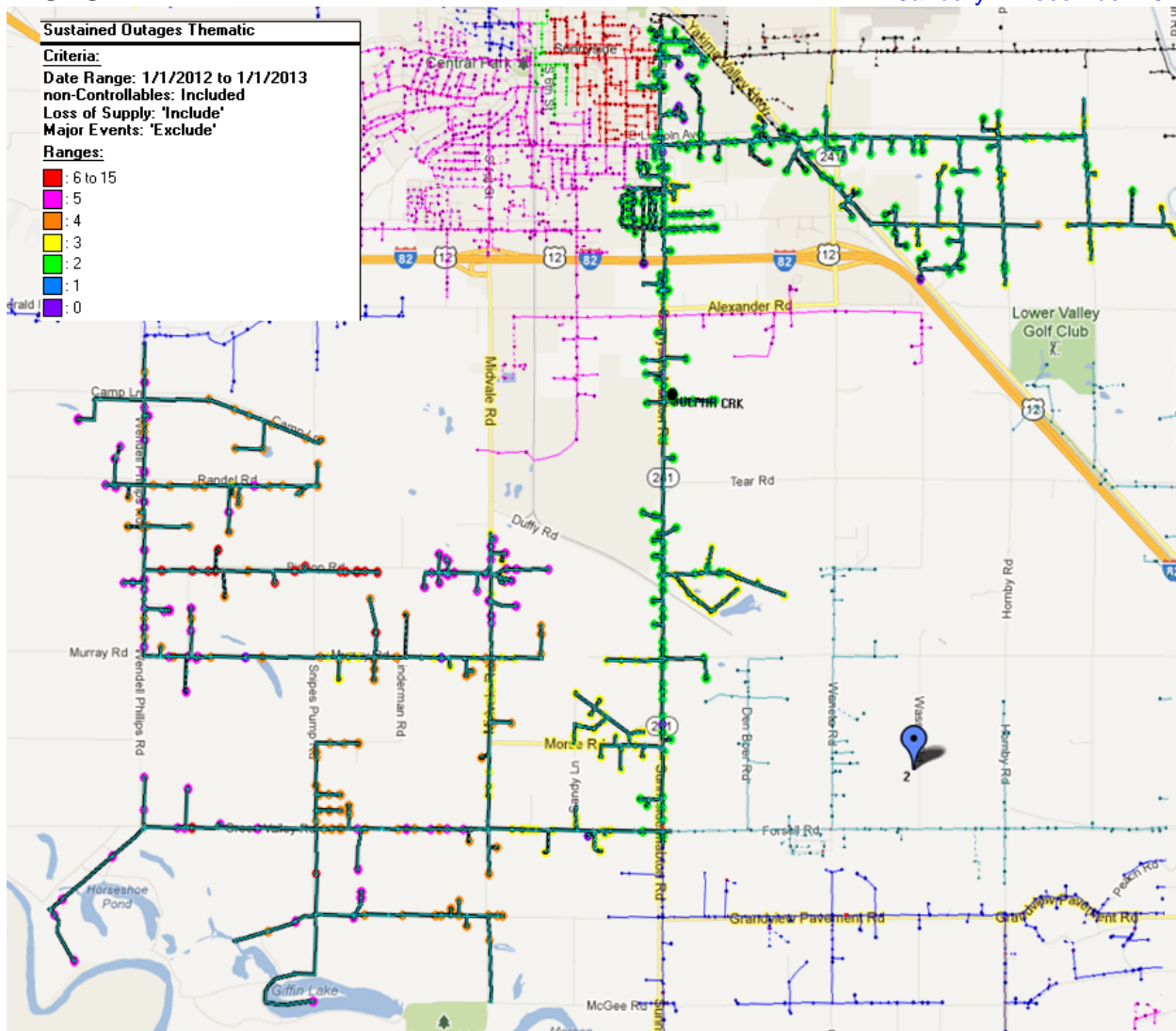


**WASHINGTON**


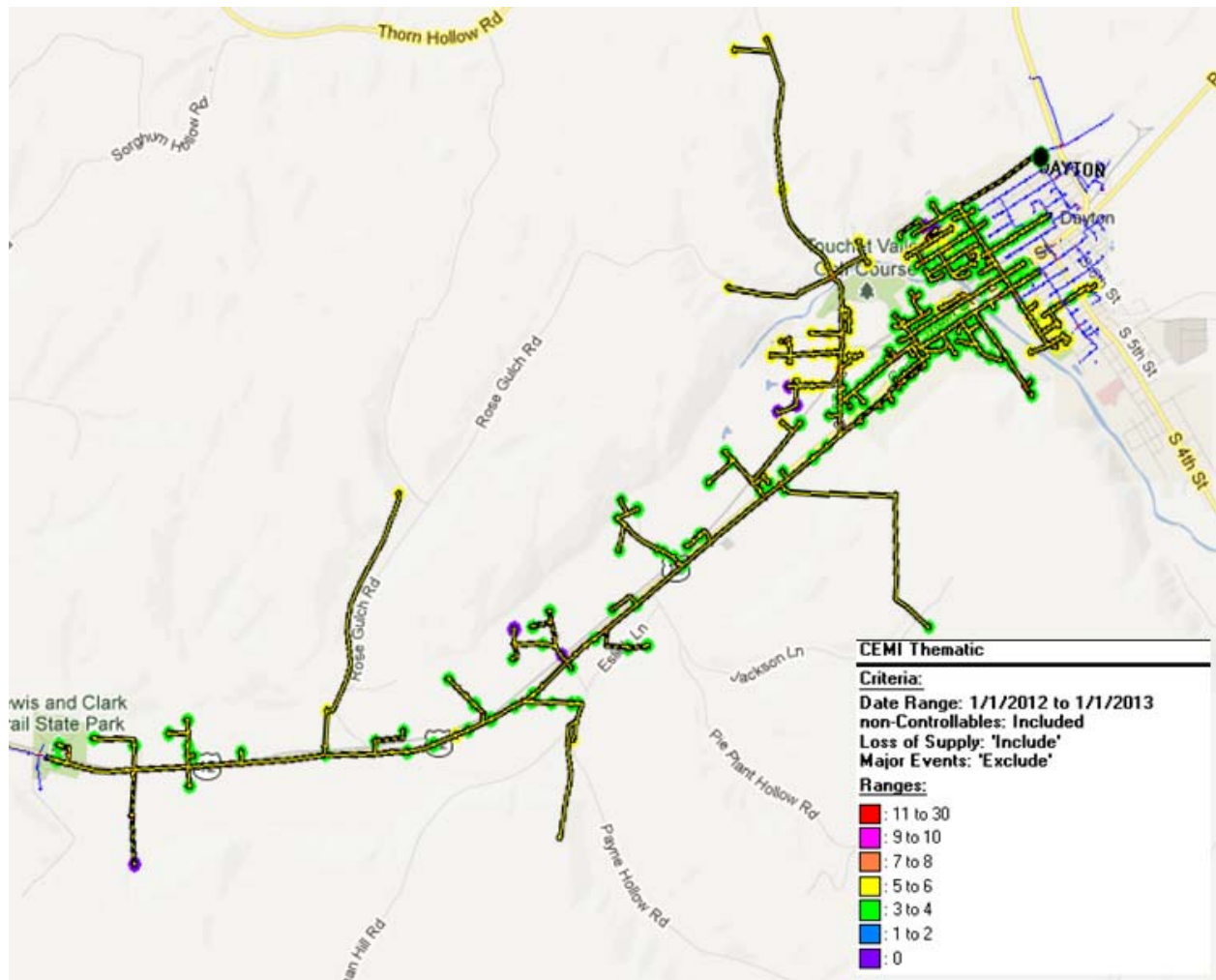
**WASHINGTON**
**5.5 5Y658 Cougar Feeder**




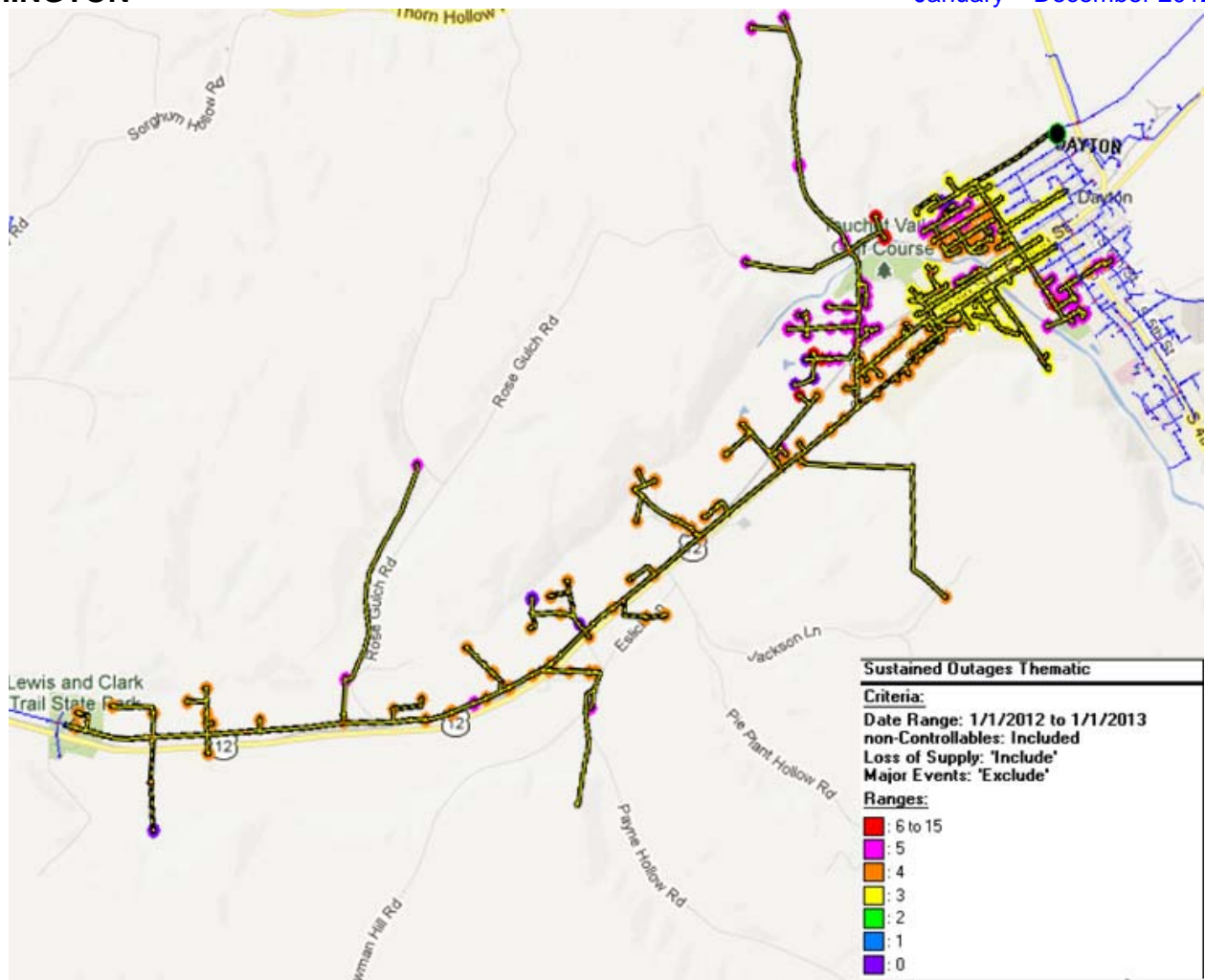
**WASHINGTON**





**WASHINGTON**
**5.6 5W324 City Feeder**


**WASHINGTON**



**WASHINGTON**

