OG&E LED Street Lighting OKC Technology Demonstration

January 3, 2017



Objective

Increase the value OG&E provides to our customers by providing higher quality, controllable lighting, leading to increased customer satisfaction through reduced lighting outages, remote dimming, remote on/off, and asset management.





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What are the Benefits of Advanced LED Lighting?

- Improved efficiency and nighttime visibility
- Extended bulb life (10 years vs. 2-3 years)
- Lower Cost: Average tariff reduction of approximately 15%
- Web-based Lighting Management Suite Streetlight Vision (SLV) leverages existing Smart Grid network
 - Failure Notification
 - Control and Monitor Capability
 - GPS tracking
 - Improved Asset Management
- Potential for automated maintenance tickets leading to reduced call-ins



What is Streetlight Vision (SLV)?

 SLV is our Lighting Management System, allowing OG&E to take advantage of the technology in the Advanced Controller







What is Streetlight Vision (SLV)?

Equipment Inventory TONEY COOPER					8 🖵 🔘
Equipment Inventory 국 ×				→ • •,	÷, 🗈 🗎 🛍
✓ ♥ OG&E 20 devices	SE 31st St	SE 31st St SE 31st St			LIGHT
OKC-Pilot 20 devices		tve		Name CIMCC	N Unit 3
AP-1009F3		High Ave		07	
CIMCON Unit 3		SH		GeoZone OKC-P	
Cimcon 11				Latitude 35.43204 °	-97.49460 °
Cimcon 63				33.43204	-97,49400
Cimcon Unit 10	St			Identity Inventory	Electrical network
Cimcon Unit 2 - GPS	St			 Identity of the light 	nt point
Cimcon Unit 65				Controller ID *	AP-1009F3
Sinrise Unit 14			(())	Identifier *	STLT-55FBFC
Sunrise Unit 1 indoor demo				▼ Control System	
Sunrise Unit 10				Type of equipment *	SSN Cimcon Dim Phot
Sunrise Unit 11				Dimming group	OGE - Test-Sunrise x *
Sunrise Unit 12	SE 32nd St	0		Unique address	00:13:50:03:00:57:C3:8E
Sunrise Unit 13	5E 52110 5t	A C	Sternd St	Controller install date	false
Sunrise Unit 15		S High A			
Sunrise Unit 2 Desk Demo		S	SLV provides Coo	rdinates,	Verified
Sunrise Unit 3 indoor demo			Network Status, Er	ror Codes	
Sunrise Unit 6					
Sunrise Unit 7			Serial Numbers, MA	C Address,	
Sunrise Unit 8	Install/Provisioning Date, and				
Sunrise Unit 9				NIC SW version	v
			many more	••• NIC HW version	
3 Vame					
100 ft		Powered by Streetli	ght.Vision		



Proposed OKC Technology Demonstration

- OGE to install LED lights in two locations to showcase functionality and benefits of Advanced LED Technology
 - OGE will maintain lights for 24 months
 - Adventure District (45 lights) and Innovation District (12 lights)
- OGE will collaborate with OKC to assess the abilities of the Advanced LED System, and how it relates to maintenance, public acceptance, and energy consumption of the lighting system
- New LED Lights will roll into new lighting tariff at the end of the demonstration

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OKC Technology Demonstration (locations)

 OGE will install Advanced LED Roadway Lights and Galvanized Steel Poles



OKC Adventure District NE 50th St. ~45 Lights



OKC Innovation District NE 8th St. ~12 Lights





Lighting the Way

- Functionality of controllers
 - Network stability
 - Durability (weather)
 - Command response
- Scheduling function
 - Community feedback
 - Dimming
- Failure notifications
 - Proactive restoration capabilities





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