



2016

STAKEHOLDER MEETING

Welcome



Our Energy Future

The Colorado Plan

August 2nd 2016



Xcel Energy Service Territory

- Operating in 8 states
- 3.5M Electric Customers
- 1.9M Natural Gas Customers



Renewable Portfolio

- 6545MW Wind
- 871MW Solar / Hydro / Bio/ RDF





IMAGINE A DAY when our customers have more control over their energy and can design a plan that best suits their needs.

Xcel Energy's 2016 initiatives set the stage for that day. They will provide customers with more choices for what they want and meet the energy demands of the future, all while maintaining competitive prices.

Xcel Energy will strengthen the way it provides energy to all of its customers and pave the way for an interactive, modern and efficient grid system.

POWERING TECHNOLOGY

Emerging technologies will pave the way for Xcel Energy to transform and modernize as a utility.

POWERING THE ECONOMY

A modern grid will foster cutting edge technology and efficiently deliver all types of energy to customers.

EMPOWERING CUSTOMERS

New solar offerings and comprehensive rate design will provide new renewable energy options without negatively impacting the cost to other customers.





ICT PROJECTS

Two Innovative Clean Technology (ICT) solar-to-battery projects were filed with the Colorado Public Utilities Commission in October 2015.

These pilot programs will help pave the way toward improving system efficiencies and reliability, while managing greater amounts of renewable energy.

The projects will be used to determine the commercial viability of new technologies before implementation on a larger scale.

SOLAR*CONNECT

Solar*Connect is a new program that gives customers a choice to sign up for 100% solar power.

Xcel Energy expects to offer two plans—a no obligation, premium price or a five-year evergreen contract.

Solar*Connect places customers in the driver seat and allows them to choose the solar program that best fits their needs.





PHASE II

The Phase II Electric Rate Case is the second step in implementing the case that was settled in early 2015.

Phase II addresses rate design and important tariff revisions.

This comprehensive redesign is a critical step toward a long-term strategy. It will make pricing easier, fairer and flexible enough to power new technologies.

ADVANCED GRID INTELLIGENCE AND SECURITY



Modernization of the distribution grid is inevitable. The grid of the future must facilitate two-way power flow and increase resilience and reliability. The addition of interactive customer meters will promote choice and control. New meter technology will allow Xcel Energy to monitor the system and make strategic investments along the grid to improve performance. Information gained from the ICT pilot programs and the utilization of other technologies will complement the use of advanced meters.

PLAN COMPLIANCE

The 2016 efforts will lay the foundation for Clean Power Plan compliance.

The goal is to help our state take control of its energy future by developing a durable compliance plan that protects our customers from significant cost increases, while maintaining system reliability. We have experience reducing emissions, and the most recent clean-energy projects will count toward EPA targets.

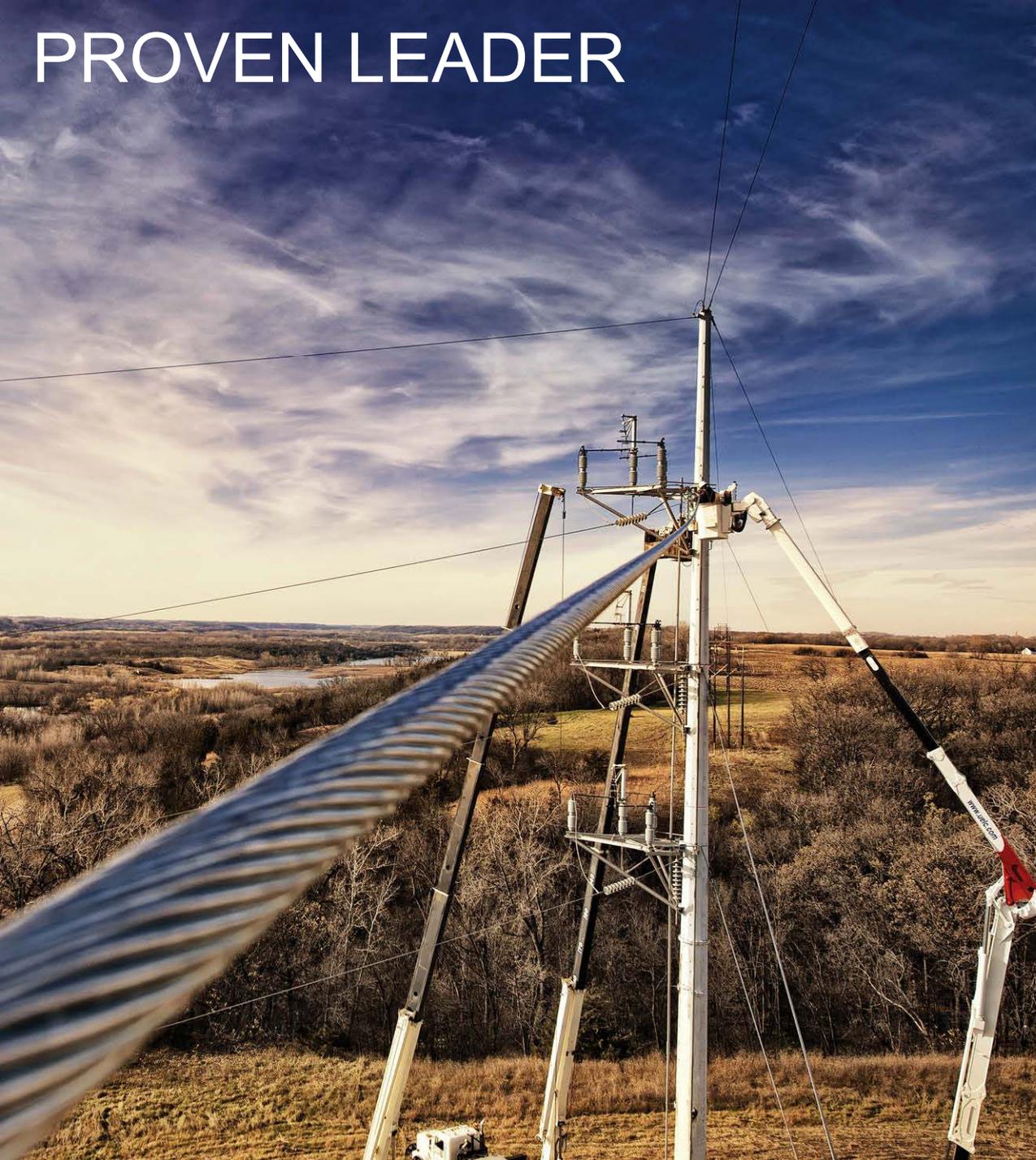


CONCLUSION

For well over a century, the electric grid has been a trusted backbone to our community. While the system has reliably powered our homes and businesses, it has also evolved into a platform to provide growth for emerging technologies, products and services which have contributed to new industry development, job growth and innovation. This has significantly changed the relationship that Xcel Energy has with its customers. Many now are simultaneously *consumers* and *producers* of energy.



PROVEN LEADER



- Nation's No. 1 utility wind energy provider for 12 years
- National top 10 for solar capacity
- Projected to exceed the state's 30% renewable energy standard by 2020
- Completion of Clean Air-Clean Jobs scheduled for 2017, on time and under budget
- Projected to reduce carbon dioxide emissions 35% by 2020 from 2005 levels
- National top 10 for energy efficiency
- One of Forbes Magazine's Most Trustworthy Companies in America
- Recognized as one of the most valuable employers for military
- More than \$25 million invested annually in Colorado communities

Thank You

DLC Stakeholders Meeting

Imran Ahmad

August 2, 2016



Powering Business Worldwide

On behalf of Eaton

**WELCOME TO THE 2016 DLC
STAKEHOLDERS MEETING!**

Some Fun Facts...

- Colorado is the only state in history, to turn down the Olympics
- Colorado contains 75% of the land in the US with over 10K feet
- Colorado has more microbreweries per capita than any other state
- Because of Denver's air and altitude, it's also easier to get drunk. Alcoholic drinks can sometimes feel 1.5 to 3 times more potent
- The latest in the season snow has ever fallen in Aurora is June 1st
- In Denver's rarified air, golf balls go about 10% farther
- Denver records an average of over 300 days of sunshine per year--more than San Diego or Miami Beach
- Denver's bright blue sky really is bluer than most other cities; due to less vapor in the air!

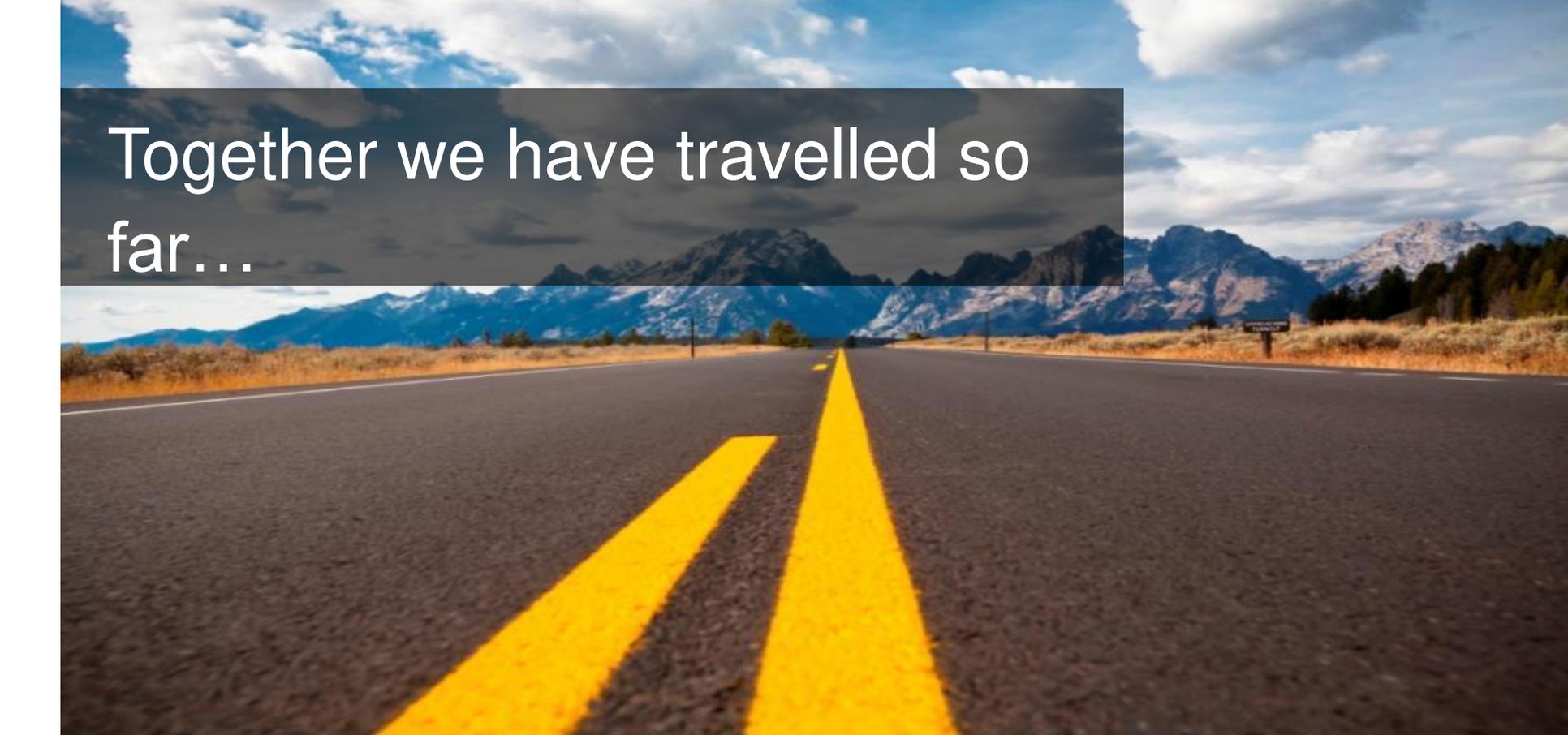


Eaton as a Stakeholder

- Eaton's mission aligns incredibly well with DLC's charter!

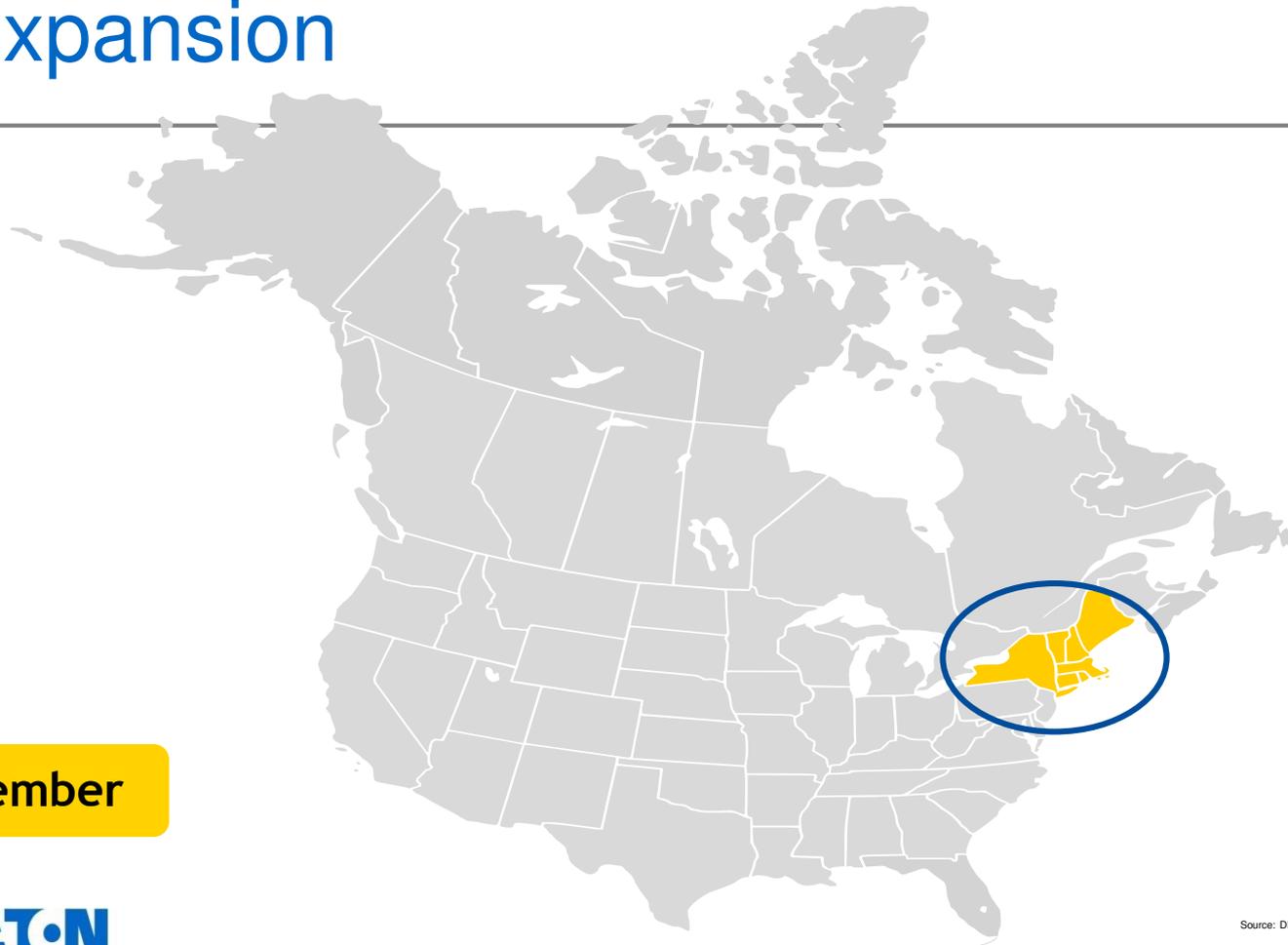
“By making power safe, efficient and reliable, we improve the quality of life for those who experience our products and services“

“The DLC is dedicated to accelerating the widespread adoption of high-performing, energy efficient commercial lighting solutions”



Together we have travelled so far...

Expansion



DLC Member



Participation

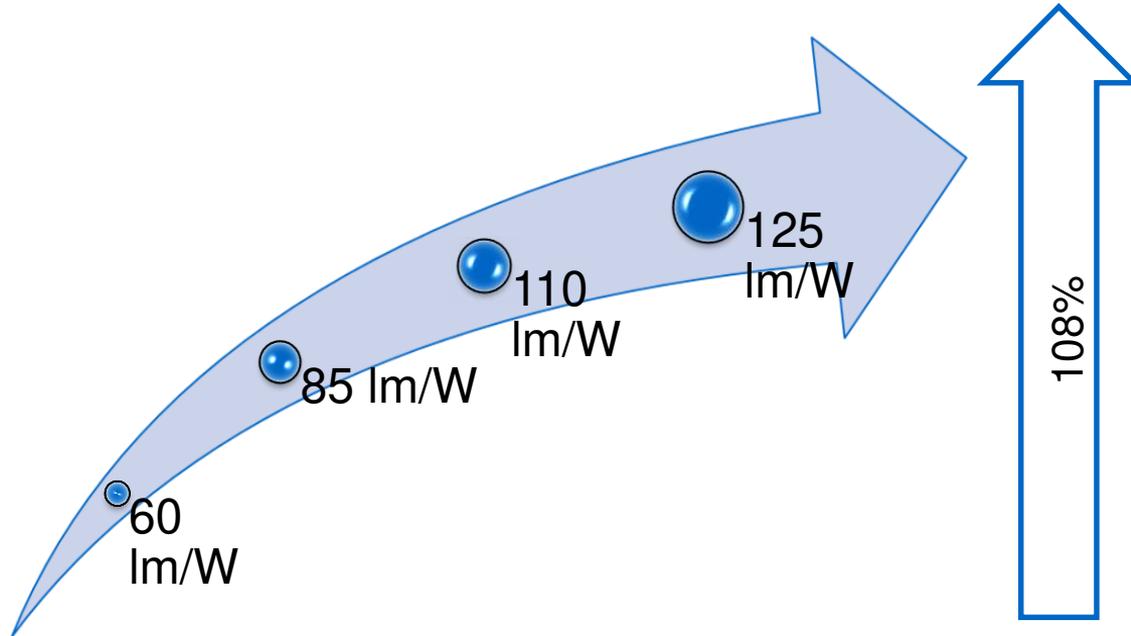
The DLC QPL:
✓ 197,985 Luminaires!
✓ 250+ Manufacturers!

The screenshots show search results for various luminaire models, including:

- Model No.: AF-350W-5-40**
Brand Name: Epheus
Manufacturer: Eaton (Formerly Cooper Lighting)
TEST DATA: Light Output 40,784 lm, Efficacy 111.1 lm/w, Wattage 367 W, CCT 3,712 K
- Model No.: 22ALHG-LD4-20-R-UHV-L830-CD1-U-SV1**
Brand Name: Metalux
Manufacturer: Eaton (Formerly Cooper Lighting)
VIEW DETAILS: Indoor Luminaires | Troffer
2x2 Luminaires for Ambient Lighting of Interior Commercial Spaces
TEST DATA: Light Output 1,893 lm, Efficacy 92.8 lm/w, Wattage 20.4 W, CCT 2,997 K
- Model No.: 22ALHG-LD4-20-R-UHV-L830-CD1-U-SV1**
Brand Name: Metalux
Manufacturer: Eaton (Formerly Cooper Lighting)
TEST DATA: Light Output 1,893 lm, Efficacy 92.8 lm/w, Wattage 20.4 W, CCT 2,997 K
- Model No.: 22ALHG-LD4-45-R-UHV-L830-CD1-U-SV1**
Brand Name: Metalux
Manufacturer: Eaton (Formerly Cooper Lighting)
TEST DATA: Light Output 3,903 lm, Efficacy 81.2 lm/w, Wattage 46.9 W, CCT 2,997 K
- Model No.: 22ALHG-LD4-44-5DL-UHV-850-CD1**
Brand Name: Metalux
Manufacturer: Eaton (Formerly Cooper Lighting)
TEST DATA: Light Output 4,666.96 lm, Efficacy 94.65 lm/w, Wattage 49.28 W, CCT 4,883 K



Efficiency



2x2 Example



52% Energy Reduction!

258 Billion kWh

2015 US Commercial Lighting use

1B kWh Reduction



Remove emissions of Boston to Philadelphia traffic jam (163K cars)!



Offset as much CO₂ as forest size of NY metro area over 9 years



Cancel out 1.7B lbs of CO₂



Electricity use of homes for one year: 117,052

But there is so much more to
do...





Sounds Like a Challenge...How do
we get there?

There is Help...

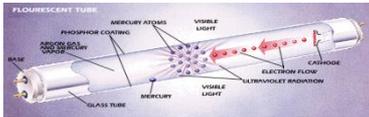
Technology



**250...300+ lm/W
efficiency!**

Innovation

Fluorescent Tube

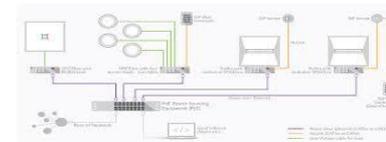
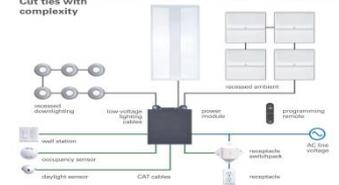


LED Tube



Distributed Low Voltage Power (DLVP)

Distributed Low-Voltage Power System
Cut ties with complexity



Power over Ethernet (PoE)

Integration



The Challenge for us...

- Understand, anticipate and pro-actively respond to the technology changes
- Not to settle...continue reaching for the top...safety, reliability and of course efficiency
- Continue engaging, debating, collaborating, and challenging each other

Something I am sure we will do throughout this gathering and subsequently!

EATON

Powering Business Worldwide