Rural Electric Safety Achievement Program

2018 Fall RESAP Meeting

St. Louis, MO

November 14-15, 2018

2018 Fall RESAP Meeting

November 14, 2018 - 8:30am to 4:30pm

- Welcome and Introduction — Bud
- Ground-rules — All
- "Commitment to Zero Contacts" Progress Review Session — All
  - Additional Support Resources
  - SAFE app update (new features / plans) – *Federated*
  - Examples of exceptional implementation – promotional activities

Lunch Provided

- Onsite Checklist – review and recommendations — All
- Onsite Process Discussion — All
- Area Administrator Roundtable (1st session)
- RESAP Reception (5:00 – 6:30 PM – room to be announced) — All

Ground-rules

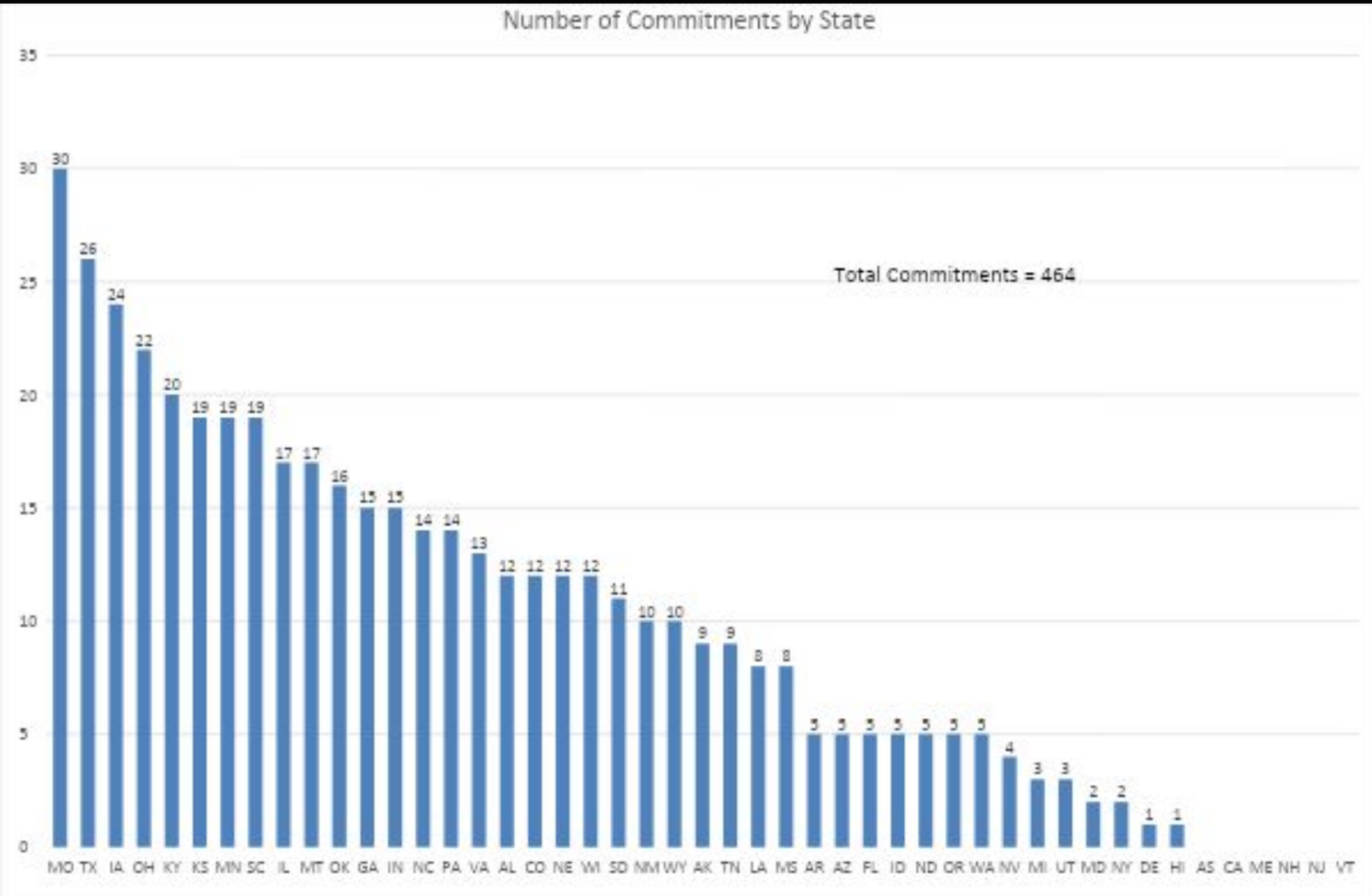
National RESAP Meeting – Ground-rules

- Actively participate – everyone's voice is important
- Seek to understand first – ask questions
- Work towards consensus
  - We seek a *significant* majority to move forward
- Constantly look for incremental improvements
- Seek strong relationships – dignity & respect

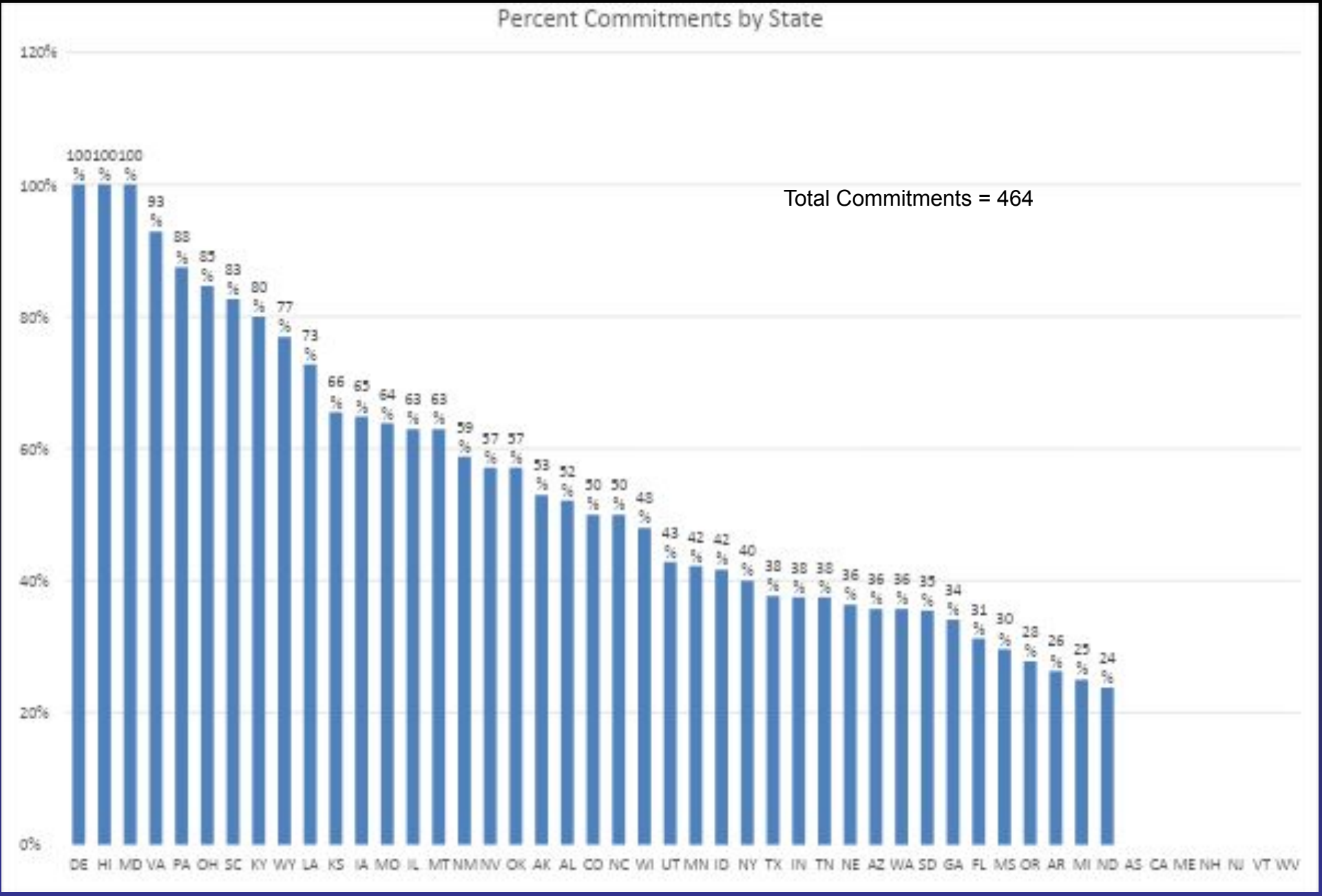
Commitment to Zero Contacts

Progress Review

Commitment to Zero Contacts – as of Nov 12th



Commitment to Zero Contacts – as of Nov 12th



Additional Support Resources

S.A.F.E. App Update

New Clearance Video

Review

Examples of Exceptional Implementation

Commitment to Zero Contacts - Board Commitments

Commitment to Zero Contacts - Employee Commitments

Statewide Example

Dwight

NRECA America's Electric Cooperatives

FEDERATED RURAL ELECTRIC INSURANCE EXCHANGE

OHIO'S ELECTRIC COOPERATIVES
Your Touchstone Energy® Cooperatives

Commitment to Zero Contacts

Ohio Implementation – Dwight Miller

QUESTIONS WE ASKED

- Desired outcome?
- Best approach to accomplish objective?
- Missing parts to accomplish objective?
- Emphasize and KISS?
- Tie everything together?
- Build sustainability?

Outcome of Questions

- Schedule July launch
- Create various documents
- Managers meeting – Goal: combat complacency and stir up after-hours observations
- Develop basic structure of emphasized items
- Develop consistent verbiage
- Create visual triggers
- Create fundamental approach of discussion among crews
- Develop short range / long range plans
- Build sustainability through meetings and weekly safety talks

Managers Meeting

- Why?
- Reasons Swiss Cheese Model
- (4) .5 – 2 Minute videos
- Program Description and Implementation Plan
- Initial Steps / Ongoing Activities

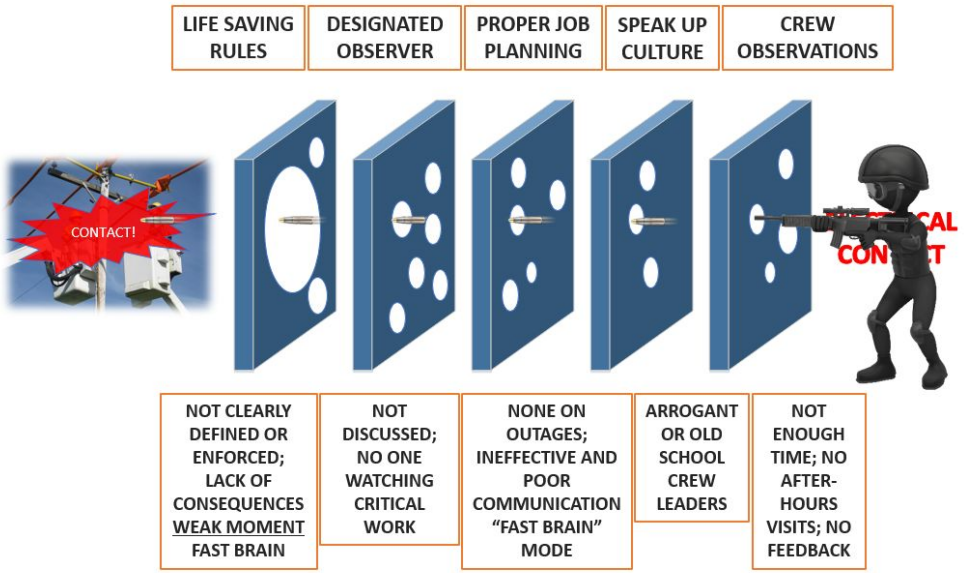
OUTCOME OF MEETING:

GREAT DISCUSSION AND HIGH ENGAGEMENT

AFTER-HOURS CREW OBSERVATIONS

"MAKE BOARDS SIGN COMMITMENT ALSO"

SAFETY BARRIERS: POOR CULTURE



Initial Steps / Ongoing Activities

Senior Leader's Guide
Initial Steps

1. Watch the video featuring John Lee, CEO of Mecklenburg EC as he explains Commitment to Zero.

2. Make the online commitment

3. Develop (or utilize existing) safety steering committee for accountability and sustainability.
   a. Make-up of committee
      i. GM / CEO
      ii. Select senior staff
      iii. Select mid-management
      iv. Safety coordinator / manager
   b. At first meeting, establish expectation of amount of time line supervisor(s) should spend in field.
      i. Address workload issues that may impede this process
      ii. Establish after-hours observations

4. Hold a kickoff meeting with employees (senior staff engagement) OR utilize Kyle Hoffman's safety meeting OR both:
   a. Define the Life-Saving Rules (LSRs) and communicate expectations:
      i. Proper Use of Rubber Gloves and Sleeves
      ii. Proper Clearance / Testing and Grounding
      iii. Proper Use of Cover-up Materials
   b. Define your expectations for employees to cultivate these rules and ideas:
      i. Speak up and Listen up
      ii. Slow down to deliberately engage "slow brain" before performing work
      iii. Perform effective job planning on ALL jobs
      iv. Appoint designated observer(s)
   c. Challenge your employees to sign the commitment
   d. Kickoff S.A.F.E. app; set up pilot or begin using

NRECA OHIO'S ELECTRIC COOPERATIVES FEDERATED RURAL ELECTRIC INSURANCE EXCHANGE

Senior Leader's Guide
Ongoing Activities

1. Verify safe work practices are being followed through crew observations:
   a. Look for discrepancies in actual work practices vs safety rules
   b. Periodically observe after-hours work
   c. Safety coaching and safety discussions vs safety cop

2. Ensure that effective job briefings are conducted on ALL jobs
   a. Supervisor occasionally observe job briefings during crew visits
   b. Verify effective job planning on all "line-down" outages and after-hours calls
   c. Utilize new Federated S.A.F.E. app which provides email confirmations

3. Monthly safety steering committee meetings should include the following ongoing activities:
   a. Ensure crew observation expectations are being met by line supervisor(s):
      i. During normal working hours
      ii. After-hours callouts
   b. Assess crew performance of LSRs, "speak up" culture, slow brain engagement, job planning, use of designated observer
   c. Actively support and follow up / promote recognition

4. Engage in safety discussions with field employees (one on one / group):
   a. Reinforce the expectations to follow the LSRs and have effective job planning
   b. Reinforce the need to deliberately activate the "slow brain"
   c. Reinforce the need for "speak-up" culture and "stop-work" authority
   d. Reinforce the need for a designated observer

Life-Saving Rules (LSRs):
1. Proper Use of Gloves and Sleeves
2. Proper Clearance / Testing and Grounding
3. Proper Use of Cover-up

NRECA OHIO'S ELECTRIC COOPERATIVES FEDERATED RURAL ELECTRIC INSURANCE EXCHANGE

OEC SAFETY & LOSS / COLT PERSONNEL

MY COMMITMENT TO SAFETY

NAME: _____

I commit to training and supporting employees of Ohio's cooperative member systems in the following work practices and ideas:

- The Life-Saving Rules:
  - Proper use of rubber gloves and sleeves
  - Proper clearance / testing and grounding
  - Proper use of cover-up materials
- To "speak up" and not accept, or walk by, a shortcut to safe work
- Slow down and perform effective job briefings on all work assignments
- Appointment of a designated observer when necessary

SIGNATURE: _____

DATE: _____

OHIO'S ELECTRIC COOPERATIVES

COLT

LINE SUPERVISOR / SAFETY PERSONNEL

MY COMMITMENT TO SAFETY

NAME: _____

I commit to fully supporting this initiative and spending adequate time in the field needed to coach and verify the following work practices and ideas:

- Our Life-Saving Rules:
  - Proper use of rubber gloves and sleeves
  - Proper clearance / testing and grounding
  - Proper use of cover-up materials
- To "speak up" and not accept, or walk by, a shortcut to safe work
- Perform effective job briefings on all work assignments
- Deliberately engage my slow brain when I get in a hurry
- Support appointment of a qualified observer when necessary
- Support "Stop Work Authority" by all employees on the crew

SIGNATURE: _____

DATE: _____

OHIO'S ELECTRIC COOPERATIVES

Co-Op Board

OUR COMMITMENT TO SAFETY

CO-OP NAME: _____

We, the Co-Op board, commit to the "Commitment to Zero Contacts" initiative and will offer the oversight, resources, and accountability needed to support the following work practices and ideas for our crews:

- Our Life-Saving Rules:
  - Proper use of rubber gloves and sleeves
  - Proper clearance / testing and grounding
  - Proper use of cover-up materials
- To "speak up" and not accept, or walk by, a shortcut to safe work
- Slow down and perform effective job briefings on all work assignments
- Appointment of a designated observer when necessary

SIGN: _____ SIGN: _____

SIGN: _____ SIGN: _____

SIGN: _____ SIGN: _____

SIGN: _____

DATE: _____

OHIO'S ELECTRIC COOPERATIVES

FIELD PERSONNEL

MY COMMITMENT TO SAFETY

NAME: _____

I commit to use the following work practices and ideas:

- Use our Life-Saving Rules:
  - Proper use of rubber gloves and sleeves
  - Proper clearance / testing and grounding
  - Proper use of cover-up materials
- To "speak up" and not accept, or walk by, a shortcut to safe work
- Perform effective job briefings on all work assignments
- Deliberately engage my slow brain when I get in a hurry
- Support appointment of a qualified observer when necessary
- Support "Stop Work Authority" by all employees on the crew

SIGNATURE: _____

DATE: _____

OHIO'S ELECTRIC COOPERATIVES

Extra Commitments

July Launch: Kyle Hoffman Safety Meeting (Crew Buy-In)

- July - September 2018 discussion based meeting with operations employees
- Commitment to Zero Contacts Initial Launch or Support
  - Kyle confirmed role with cooperative
- Topics:
  - Life-Saving Rules
  - Speak Up! Listen Up! Culture
  - Slow Brain Engagement
  - Designated Observer
  - Job Briefings (app demonstration included)
  - CEO - Signing of Commitment (if not already)
- Senior Leader Engagement Needed / Not Required

Basic Structure

- Simplified Life-Saving Rules to Gloves, Grounds, Guts
- Agreed upon 5 Principles to be used
- Decided to use the term S.A.F.E. for consistent message
- Develop Pictograms using shapes similar to Life-Saving Rules
- Develop Poster

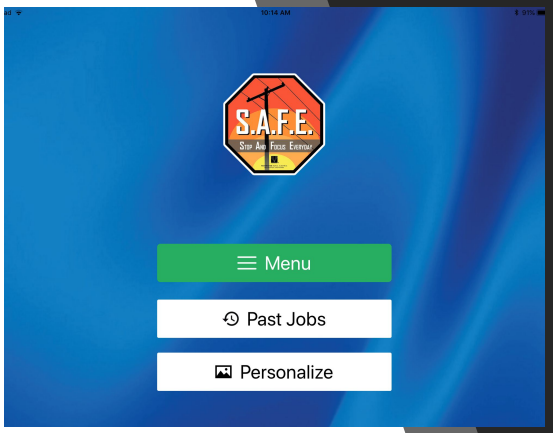
Work S.A.F.E. Rules

Work S.A.F.E. Principles

Poster

Framed and delivered to every line shop

Federated S.A.F.E. App Approach



Slow brain engagement

Action triggers

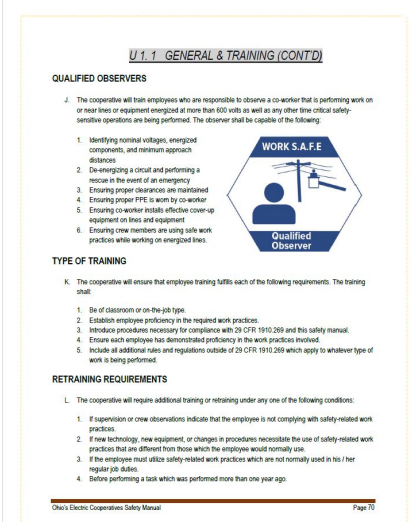
Create discussion where lacking

After hours work when job briefings are sometimes skipped

Number is increasing

Follow-Up

- Electrical Contact Accident Review
- Work S.A.F.E. Rules, Principles, and Human Performance
- Commitment to Zero Contacts V 2.0 2019
- Electrical Contact Testimonials in 2019



U 1. 1 GENERAL & TRAINING (CONT'D)

QUALIFIED OBSERVERS

J. The cooperative will train employees who are responsible to observe a co-worker that is performing work on or near lines or equipment energized at more than 600 volts as well as any other time critical safety-sensitive operations are being performed. The observer shall be capable of the following:

1. Identifying nominal voltages, energized components, and minimum approach distances
2. De-energizing a circuit and performing a rescue in the event of an emergency
3. Ensuring proper clearances are maintained
4. Ensuring proper PPE is worn by co-worker
5. Ensuring co-worker installs effective cover-up equipment on lines and equipment
6. Ensuring crew members are using safe work practices while working on energized lines.

TYPE OF TRAINING

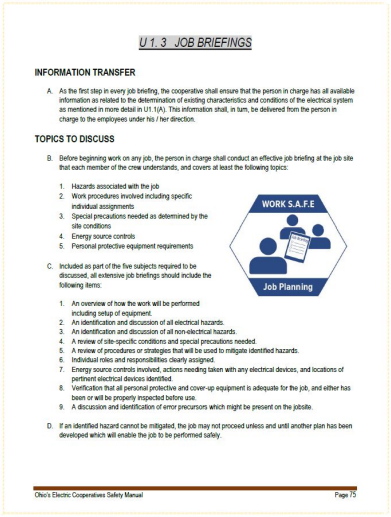
K. The cooperative will ensure that employee training fulfills each of the following requirements. The training shall:

1. Be of classroom or on-the-job type.
2. Establish employee proficiency in the required work practices.
3. Introduce procedures necessary for compliance with 29 CFR 1910.269 and this safety manual.
4. Ensure each employee has demonstrated proficiency in the work practices involved.
5. Include all additional rules and regulations outside of 29 CFR 1910.269 which apply to whatever type of work is being performed.

RETRAINING REQUIREMENTS

L. The cooperative will require additional training or retraining under any one of the following conditions:

1. If supervision or crew observations indicate that the employee is not complying with safety-related work practices.
2. If new technology, new equipment, or changes in procedures necessitate the use of safety-related work practices that are different from those which the employee would normally use.
3. If the employee must utilize safety-related work practices which are not normally used in his / her regular job duties.
4. Before performing a task which was performed more than one year ago.



U 1. 3 JOB BRIEFINGS

INFORMATION TRANSFER

A. As the first step in every job briefing, the cooperative shall ensure that the person in charge has all available information as related to the determination of existing characteristics and conditions of the electrical system as mentioned in more detail in U1.1(A). This information shall, in turn, be delivered from the person in charge to the employees under his / her direction.

TOPICS TO DISCUSS

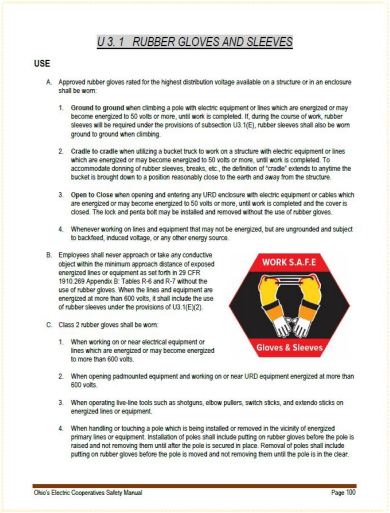
B. Before beginning work on any job, the person in charge shall conduct an effective job briefing at the job site that each member of the crew understands, and covers at least the following topics:

1. Hazards associated with the job
2. Work procedures involved including specific individual assignments
3. Special precautions needed as determined by the site conditions
4. Energy source controls
5. Personal protective equipment requirements

C. Included as part of the five subjects required to be discussed, all extensive job briefings should include the following items:

1. An overview of how the work will be performed including setup of equipment.
2. An identification and discussion of all electrical hazards.
3. An identification and discussion of all non-electrical hazards.
4. A review of site-specific conditions and special precautions needed.
5. A review of procedures or strategies that will be used to mitigate identified hazards.
6. Individual roles and responsibilities clearly assigned.
7. Energy source controls involved, actions needing taken with any electrical devices, and locations of pertinent electrical devices identified.
8. Verification that all personal protective and cover-up equipment is adequate for the job, and either has been or will be properly inspected before use.
9. A discussion and identification of error precursors which might be present on the jobsite.

D. If an identified hazard cannot be mitigated, the job may not proceed unless and until another plan has been developed which will enable the job to be performed safely.



U 3. 1 RUBBER GLOVES AND SLEEVES

USE

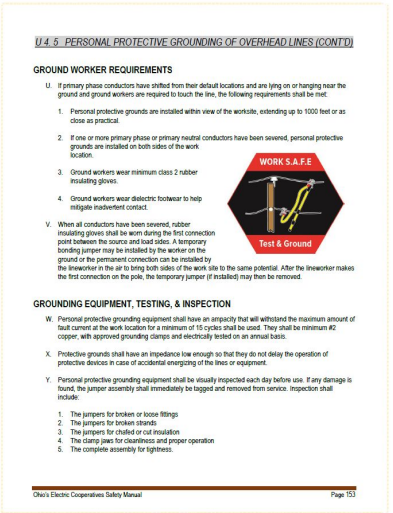
A. Approved rubber gloves rated for the highest distribution voltage available on a structure or in an enclosure shall be worn:

1. Ground to ground when climbing a pole with electric equipment or lines which are energized or may become energized to 50 volts or more, until work is completed. If, during the course of work, rubber sleeves will be required under the provisions of subsection U3.1(E), rubber sleeves shall also be worn ground to ground when climbing.
2. Cradle to cradle when utilizing a bucket truck to work on a structure with electric equipment or lines which are energized or may become energized to 50 volts or more, until work is completed. To accommodate donning of rubber sleeves, breaks, etc., the definition of "cradle" extends to anytime the bucket is brought down to a position reasonably close to the earth and away from the structure.
3. Open to Close when opening and entering any URD enclosure with electric equipment or cables which are energized or may become energized to 50 volts or more, until work is completed and the cover is closed. The lock and penta bolt may be installed and removed without the use of rubber gloves.
4. Whenever working on lines and equipment that may not be energized, but are ungrounded and subject to backfeed, induced voltage, or any other energy source.

B. Employees shall never approach or take any conductive object within the minimum approach distance of exposed energized lines or equipment as set forth in 29 CFR 1910.269 Appendix B: Tables R-6 and R-7 without the use of rubber gloves. When the lines and equipment are energized at more than 600 volts, it shall include the use of rubber sleeves under the provisions of U3.1(E)(2).

C. Class 2 rubber gloves shall be worn:

1. When working on or near electrical equipment or lines which are energized or may become energized to more than 600 volts.
2. When opening padmounted equipment and working on or near URD equipment energized at more than 600 volts.
3. When operating live-line tools such as shotguns, elbow pullers, switch sticks, and extendo sticks on energized lines or equipment.
4. When handling or touching a pole which is being installed or removed in the vicinity of energized primary lines or equipment. Installation of poles shall include putting on rubber gloves before the pole is raised and not removing them until after the pole is secured in place. Removal of poles shall include putting on rubber gloves before the pole is moved and not removing them until the pole is in the clear.



U 4. 5 PERSONAL PROTECTIVE GROUNDING OF OVERHEAD LINES (CONT'D)

GROUND WORKER REQUIREMENTS

U. If primary phase conductors have shifted from their default locations and are lying on or hanging near the ground and ground workers are required to touch the line, the following requirements shall be met:

1. Personal protective grounds are installed within view of the worksite, extending up to 1000 feet or as close as practical.
2. If one or more primary phase or primary neutral conductors have been severed, personal protective grounds are installed on both sides of the work location.
3. Ground workers wear minimum class 2 rubber insulating gloves.
4. Ground workers wear dielectric footwear to help mitigate inadvertent contact.

V. When all conductors have been severed, rubber insulating gloves shall be worn during the first connection point between the source and load sides. A temporary bonding jumper may be installed by the worker on the ground or the permanent connection can be installed by the lineworker in the air to bring both sides of the work site to the same potential. After the lineworker makes the first connection on the pole, the temporary jumper (if installed) may then be removed.

GROUNDING EQUIPMENT, TESTING, & INSPECTION

W. Personal protective grounding equipment shall have an ampacity that will withstand the maximum amount of fault current at the work location for a minimum of 15 cycles shall be used. They shall be minimum #2 copper, with approved grounding clamps and electrically tested on an annual basis.

X. Protective grounds shall have an impedance low enough so that they do not delay the operation of protective devices in case of accidental energizing of the lines or equipment.

Y. Personal protective grounding equipment shall be visually inspected each day before use. If any damage is found, the jumper assembly shall immediately be tagged and removed from service. Inspection shall include:

1. The jumpers for broken or loose fittings
2. The jumpers for broken strands
3. The jumpers for chafed or cut insulation
4. The clamp jaws for cleanliness and proper operation
5. The complete assembly for tightness.

Incorporate into new Safety Manual

OEC Weekly S.A.F.E. Talk

WEEKLY
S.A.F.E. TALK
Stop And Focus Everyday

OHIO'S ELECTRIC COOPERATIVES
Your Touchstone Energy® Cooperatives

SIF-8: BROKEN CUTOUT: FATALITY

ORIGIN OF TOPIC: IOU Accident Investigation Analysis

ESTIMATED DISCUSSION TIME: 20-30 minutes

Applicable Work S.A.F.E. Rules and Principles:

SAFETY TOPIC SUMMARY:

An IOU journeyman lineman (troubleman) was dispatched to what was suspected as a transformer outage on a 7200 volt line. Upon arrival, the lineman (lineman #1) discovered a broken cutout, realized that the pole was a climber, and requested assistance from a fellow troubleman (lineman #2) in a neighboring district. After his arrival the crew discussed how the bottom half of the cutout was broken off and how the top of the cutout was still energized but also attached, and what would be the best way to make repairs.

As they discussed the situation, they agreed that taking an outage on the line would take out too many customers, so they decided against that and planned to work it energized since the top of the cutout was still fastened to the bracket and pole, though precariously. Since they decided it was too dangerous to work it off the pole, they decided an extension ladder against the pole would be the best option.

After setting up the ladder, Lineman #1 ascended it with his full climbing gear on, including his climbers. His safety gear included a hard hat, FR clothing, and safety glasses, with his rubber gloves hooked onto his belt, ready to go if needed. His plan was to de-energize the cutout and then climb from the ladder onto the pole to replace the cutout. After climbing to the top of the ladder, placing his safety strap around the pole, and hanging the handline, he requested a 10' shotgun to untap the cutout. At this time, the ladder shifted slightly, shook the pole, and the cutout broke loose and fell off the bracket toward him. He swatted the cutout with the back of his left hand while at the same time making contact with the bottom of the transformer case with the other hand. Electricity surged through the back of his left hand and exited out the side of his right hand while he lost consciousness. Lineman #2 wasn't watching since he was connecting the shotgun to the handline when the arc occurred. Lineman #2 called 911 and then proceeded to perform a rescue by putting on his rubber gloves and climbing the ladder. After successfully removing the victim from the pole and ladder, emergency personnel arrived and he was pronounced dead at the scene.

WEEKLY
S.A.F.E. TALK
Stop And Focus Everyday
OHIO'S ELECTRIC COOPERATIVES

DISCUSSION POINTS:

1. How do the above "Work S.A.F.E." rules and principles apply? Which was needed most?
2. The company used MAD for their rubber glove rule. Were any safety rules broken?
3. What is the closest call you have ever had on a broken cutout? Did you change any work practices following the close call?
4. Talk about their job plan. Do you believe pressure of keeping outage numbers low may have swayed their decision to leave the line energized? What would you have done?
5. Do you agree with the crew's decision of using the ladder to ascend the pole?
6. What work practices do you have on your crew and your co-op to ensure that a broken porcelain cutout will not kill or burn any of your people?

IOU RECOMMENDATIONS:

- *Continue to perform thorough job briefings prior the beginning of any job.*
- *Continue to adhere to the company rubber gloving policy.*
- *Remind employees that proper securement of a ladder will provide a stable base from which to work.*
- *If a hazardous condition exists on a pole such as a broken cutout, extreme caution shall be taken. This action may include de-energizing the primary stinger with an extendo stick from the ground, or de-energizing the source at a different location before climbing the pole.*

OEC WEEKLY S.A.F.E. TALK | SIF-8

RESAP Knowledge Challenge

Select the onsite observation question that either FAILED or PARTIALLY FAILED most often during observations?

1. SIP plans were communicated and understood by employees…

2. At least two wheel chokes on vehicles…

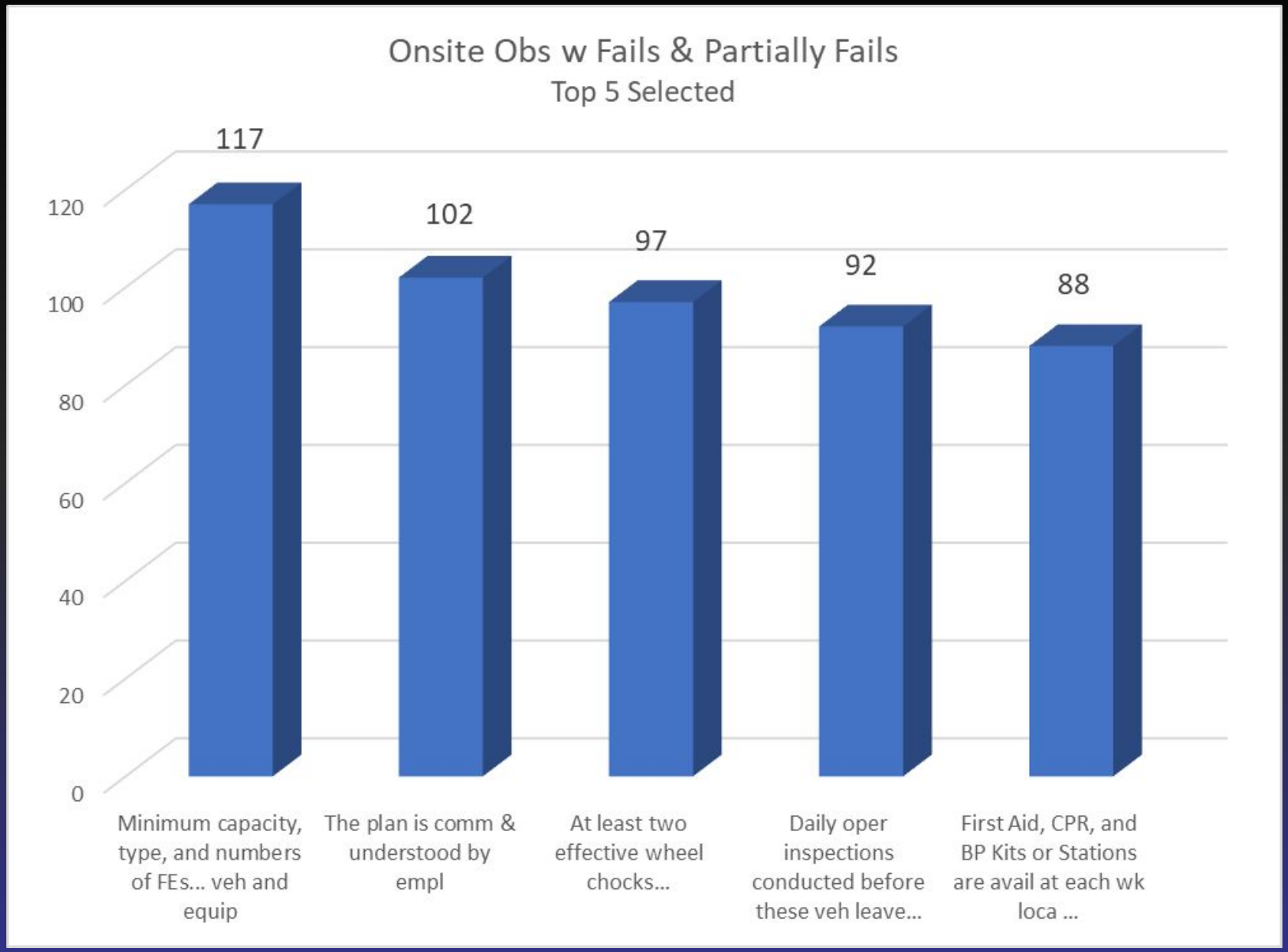
3. Correct type and number of FE on vehicles & equip…

4. Daily operation inspections on vehicles before they leave…

Select the onsite observation question that either FAILED or PARTIALLY FAILED most often during observations?

1. SIP plans were communicated and understood by employees…
2. At least two wheel chokes on vehicles…
3. Correct type and number of FE on vehicles & equip…
4. Daily operation inspections on vehicles before the leave…

Onsite Observation Team Results



Select the onsite observation question that FAILED most often during observations?

1. SIP plans were communicated and understood by employees…

2. Arc rated traffic control vests are available…

3. AED's are available on vehicles…

4. Pole yards and storage areas have gates and fences used to secure…

Select the onsite observation question that FAILED most often during observations?

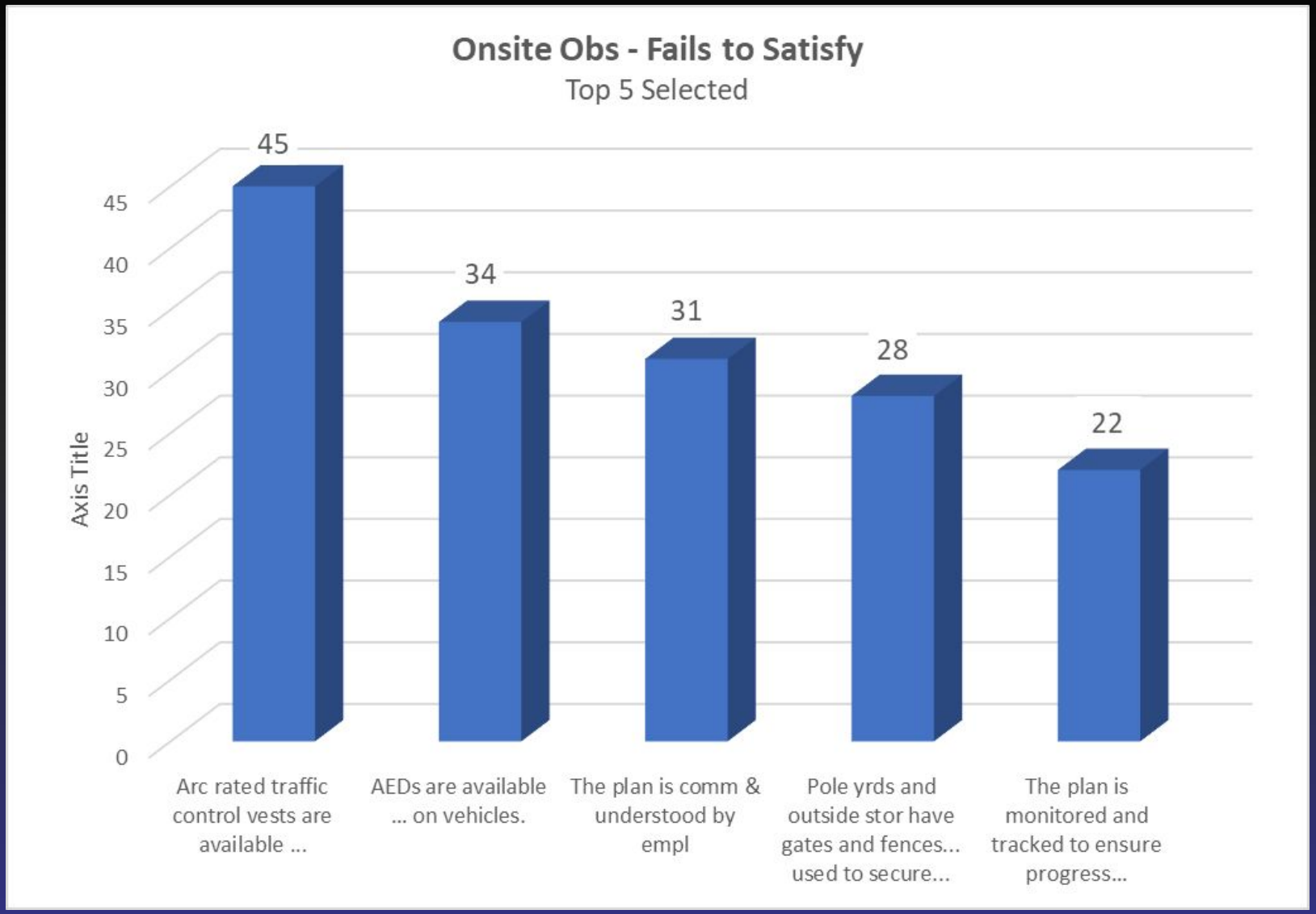
1. SIP plans were communicated and understood by employees…

2. Arc rated traffic control vests are available…

3. AED's are available on vehicles…

4. Pole yards and storage areas have gates and fences used to secure…

Onsite Observation Team Results



Choose the area selected most often by co-ops to work on in their Safety Improvement Plans?

1. Expectations and accountability for safety…
2. Employee involvement and participation…
3. Organizational safety culture…
4. Safety communication and awareness activities…

Choose the area selected most often by co-ops to work on in their Safety Improvement Plans?

1. Expectations and accountability for safety…
2. Employee involvement and participation…
3. Organizational safety culture…
4. Safety communication and awareness activities…

Safety Improvement Plan Results

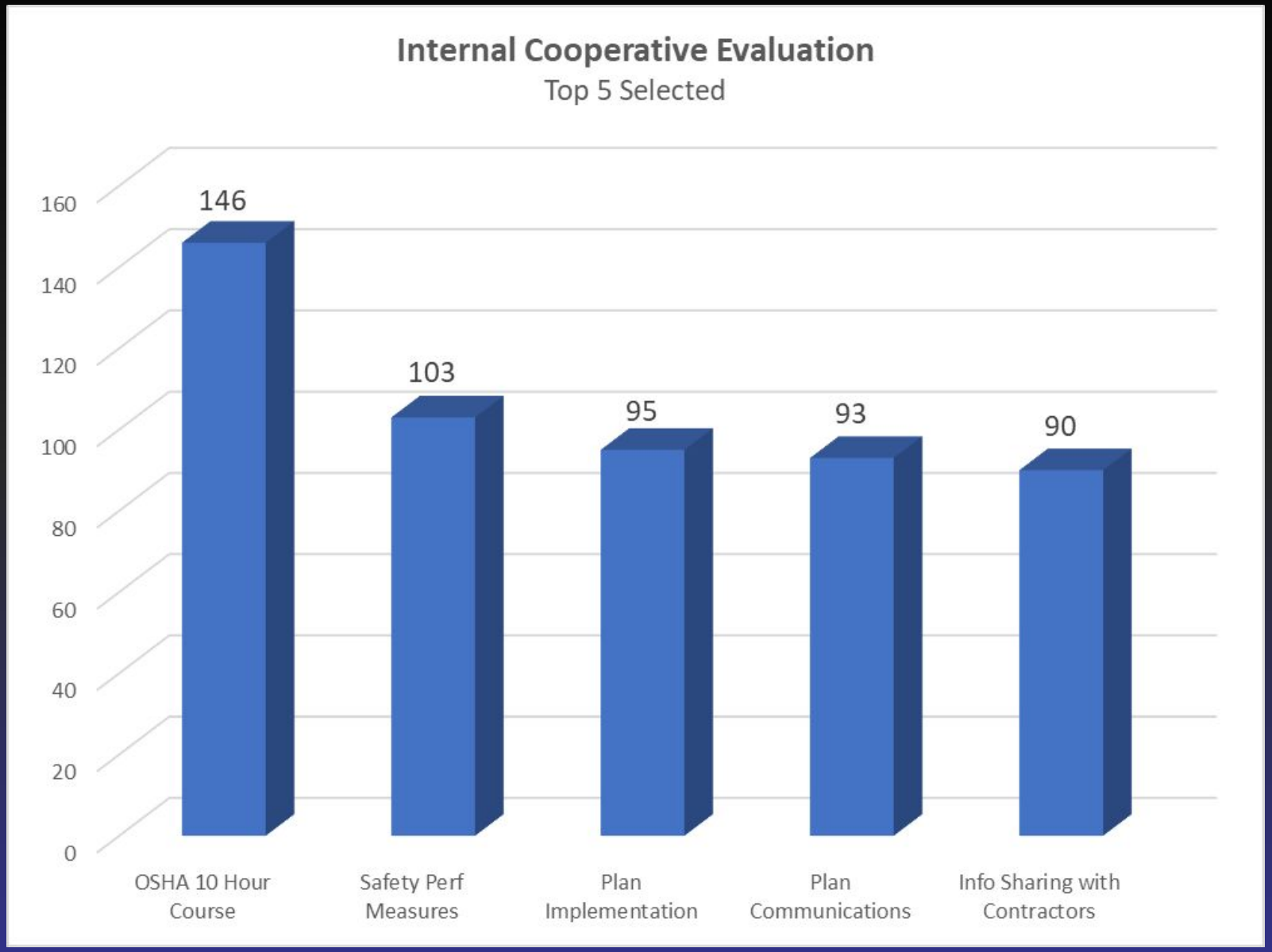
Choose the area selected most often by co-ops in their Internal Cooperative Evaluations as needing the greatest improvement?

1. SIP plan implementation…
2. Information sharing with contractors…
3. Safety performance measures…
4. OSHA 10 hour course…

Choose the area selected most often by co-ops in their Internal Cooperative Evaluations as needing the greatest improvement?

1. SIP plan implementation…
2. Information sharing with contractors…
3. Safety performance measures…
4. OSHA 10 hour course…

Internal Evaluation Results



Choose the onsite observation question that FAILED the most of the observations shown below?

1. Pole loading procedures call for the use of slings &/or pole lifting tongs that are…
2. Protective chaps issued and/or available…
3. Noise hazard assessments are completed…
4. Vehicle ground cables are individually marked with a…

Choose the onsite observation question that FAILED most of the observations shown below?

1. Pole loading procedures call for the use of slings &/or pole lifting tongs that are… (19)
2. Protective chaps issued and/or available… (16)
3. Noise hazard assessments are completed… (15)
4. Vehicle ground cables are individually marked with a… (15)

Choose the onsite observation question that FAILED most of the observations shown below?

1. Storage, management and disposal of PCB contaminated fluids… are consistent with appropriate regs…
2. SIP is organized and structured appropriately…
3. Cranes and overhead lifting devices are inspected… by a certified inspector…
4. SIP is monitored and tracked to ensure progress…

Choose the onsite observation question that FAILED most of the observations shown below?

1. Storage, management and disposal of PCB contaminated fluids… are consistent with appropriate regs… (15)
2. SIP is organized and structured appropriately… (19)
3. Cranes and overhead lifting devices are inspected… by a certified inspector… (15)
4. SIP is monitored and tracked to ensure progress… (22)

Onsite Checklist

Review & Recommendations

Process Overview

- Regional Teams

Team 1

- John Dvorak IA
- Lidia Jacobson MN
- Mark Patterson SD

Team 3

- Michael Kelley AL
- Gerald Gordon MS
- Mike Williams TX

Team 2

- Joe McElroy MI
- Dwight Miller OH
- Joe Selnekovic PA
- Troy Dahl WI
- Thomas Maddalone ID

Team 4

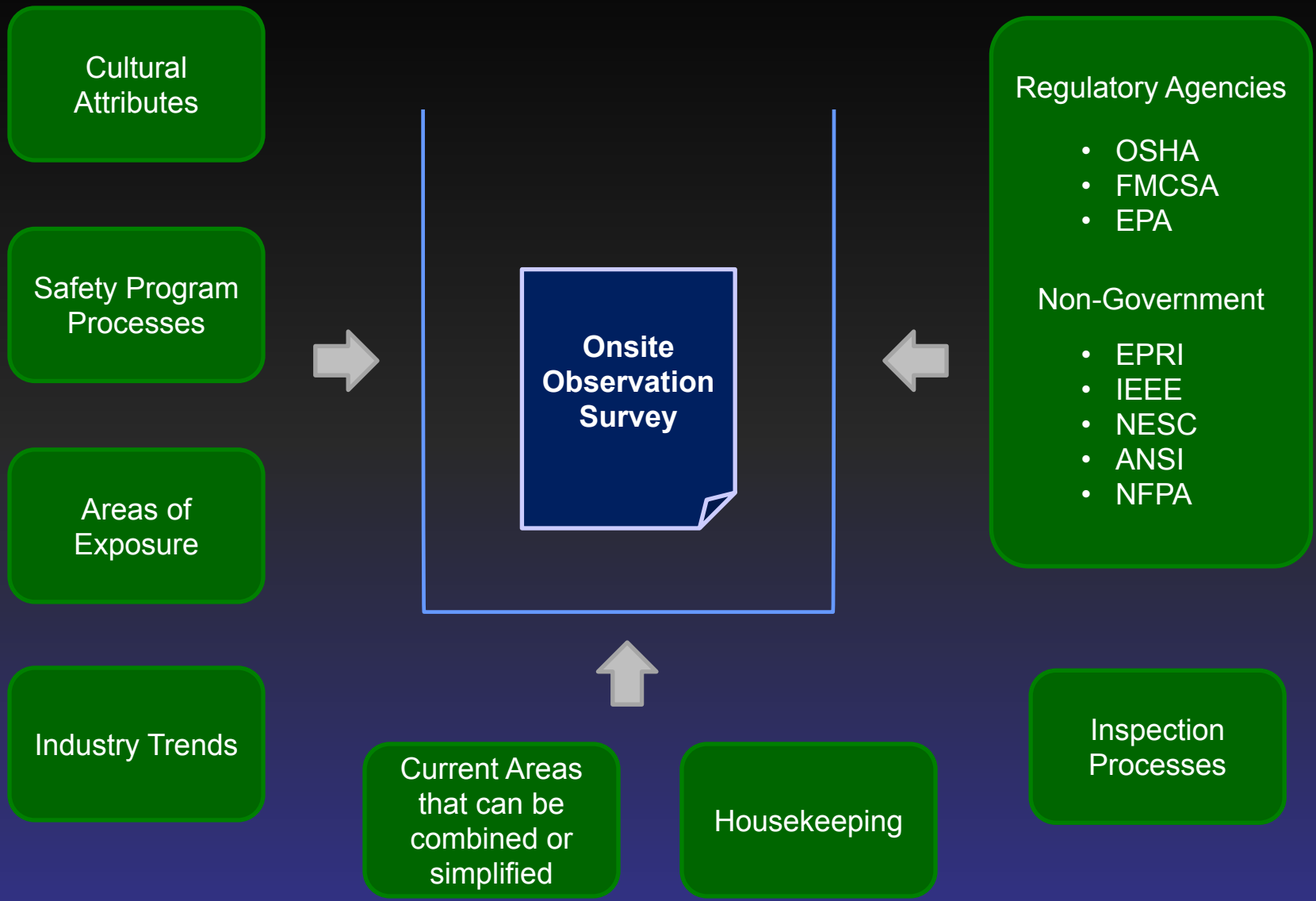
- Mark Mosley FL
- Dale Kishbaugh CO
- Warren Higgins TX

Discuss process issues

Objectives:

- Ensure RESAP onsite survey is concise, clear and up-to-date as possible
- Ensure onsite observation process is efficient and meaningful

Focus Areas for Review



Subject Matter Experts

Desired Outcomes for Today

1. Review team summary recommendations

2. Agree on best modifications to implement for 2019

3. Agree on implementation schedule, along w communication needs

Group Evaluation Approach

- Efficient use of time
- We will not eat the elephant in one bite
- Beginning a journey by finding the most important opportunities in this moment

Individual Review	1. ID 4 changes you would advocate as most important 2. ID any changes for the “Not Now Bin” 3. ID any clarifications or questions needed 4. Remaining recommendations would be OK
Open Group Discussion	1. Openly discuss clarifications and questions as a group
Break-out Review	1. Each person share the 4 changes they advocate 2. Each person share the changes that should go to the “Requires Follow up Bin” 3. After discussion prioritize the top 10 most important for the Group
Group Review and Prioritization	1. Each break-out group shares their top changes 2. Roll up recommendations 3. Prioritize changes

Options for Future Consideration

Possible Options:

1. Conduct a centralized meeting annually for volunteer task team members to invest quality time in a deeper dive and more concise recommendations
   - ✔ February or July??

2. Consider use of safety professional organizations to help support ongoing evaluation
   - ✔ Provides additional resource & promotes buy-in

3. Utilized subject matter experts to advise team in areas as directed
   - ✔ Helps advance team progress in specific target areas

RESAP Onsite Process

Discussion

Should we build an app?

Site Audit Pro - Example

SALEM ELECTRIC COOPERATIVE
RESAP OBSERVATION 6/26/18

Tuesday, June 26, 2018

Prepared For:

44 Issues Identified

Possible Attributes

- Concise / Clear
- Focused
- Ties visuals with explanations
- Includes team evaluation by section
- Simplifies data entry – providing more time for discussion and observation

ISSUE 1

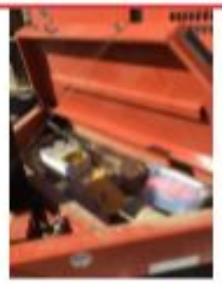
Improper Pole Tongs

Section 2

24. Pole loading procedures call for the use of slings and/or pole lifting tongs that are inspected prior to use. Pole lifting tongs are rated with proper lifting capacity, employs a closed or locking keeper and a trip line designed to keep personnel out of loading area while loading and unloading poles.

ISSUE 2

Release cable Is Frayed



ISSUE 3

Awesome Housekeeping And Storage

Nice storage on Vac. Ear plugs on equipment, great job!

ISSUE 4

Wooden Wire Reels Are Rotting

Section 6

5. Pole yard/outside storage materials are properly stored off the bare ground, with related materials stored together, and identified by unit markings or marked storage areas.

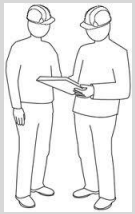
Consideration for Streamlining the Process

Teams use survey as their reference guide

Onsite Obs Survey

Foundational Guide for Co-ops & Teams

Co-op Safety Committees & Professionals



Onsites & Statewides - coaching & guidance

Onsite Observation Team

Teams use app

Observe Positives & Opportunities

Teams take pictures

Record Sections & Notes

Upload to Server when Connected

RESAP Servers

Review & Finalize Report

Onsite Report

RESAP Online System

Questions

Area Administrator Roundtable

(first session)

Special Recognition

Reception

5:00 – 6:30pm: Dinner on you own

2018 Spring RESAP Meeting

November 15, 2018 – 8:00am to 12N

▪ Discussion Items & Concepts	All	
▪ Area Administrator Roundtable (second session)	All	
▪ Review & Input Session (CLCP, RESAP & Safety Summit)		Perron
▪ G&T SIF Initiative Update	All	
▪ RESAP Process Status Review & Discussion	All	
▪ Summarize Outcomes & Next Steps	All	

Discussion Items & Concepts

How do we Lead?

- Open
- Interested questioning attitude
- Committed to learning

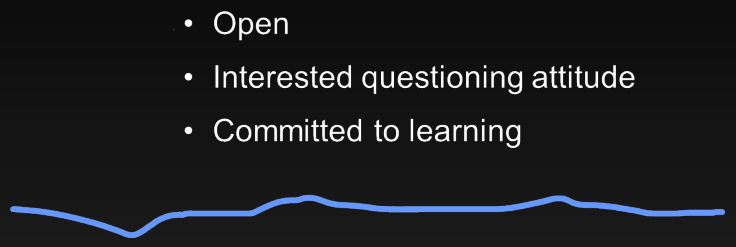
- Closed
- Defensive
- Committed to being right

- Is our goal to be right or to influence others?

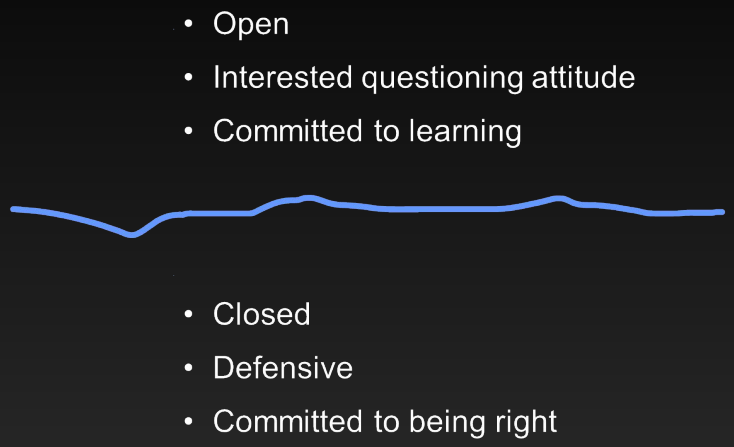
- Can winning a debate influence people to change?

- When people lead below the line – what do we normally do?

  ✔ What should we do?



- What is the most important question every cooperative leader should ask?



- What does protecting the life and welfare of my employees require of me?

Area Administrator Roundtable

(second session)

Review and Input Session

Perron

CONTINUING SAFETY EDUCATION - 2019

Linking Safety Learning Events

NRECA
America's Electric Cooperatives

2019 Program Plans

- Provide Impactful Continuing Education for CLCPs & Other Safety Leaders
- Support RESAP
- Link Themes & Topics from Past Safety Leadership Summits

2019 Program Plans

- May 15-17, 2019
- Support Safety Leaders' Efforts to Partner with Leadership & Collaborate / Facilitate Safety Teams & Committees

Example Agenda Topics

- How to Confirm/Gain/Sustain Commitment from Leaders
- Influencing Across and Through the Organization
- Collecting and Communicating Meaningful Safety Performance Data
- Team/Group Processes for Data Analysis, Problem Solving and Decision Making

TOOLS

- Example Charters, Logistics, Mechanics
- Communication & Behavioral Assessments
- Example Data Sets & Tools for Collecting, Displaying, Communicating
- 5 Why's, Fishbone Diagram, Brainwriting/Brainstorming, Affinity Process, Multi-Voting, Ranked Voting, Decision Matrix, etc.

Activity

- **What Challenges Do You Experience or Notice?**
  (aka: What Should We Cover in Class?)
  - **Co-op Leadership**
  - **Safety Professionals**
  - **Safety Committees/Teams**

How You Can Help

- **Participate**
- **Encourage Others to Enroll**
- **Provide Ongoing Insight & Ideas**

2020 Safety Leadership Summit

- April 15 – 17, 2010
- Orlando, FL

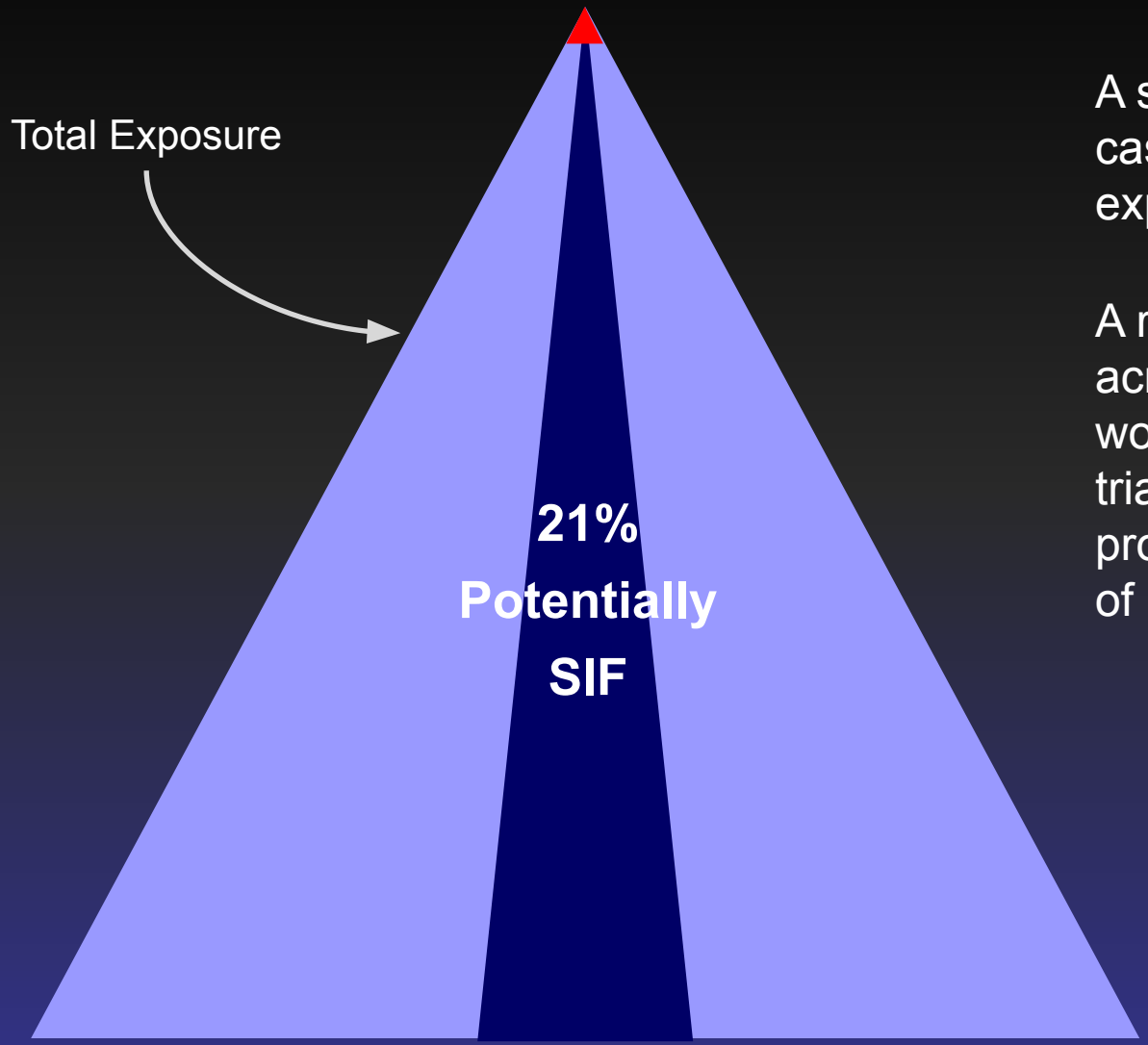
2020 Safety Leadership Summit

- Themes
- Topics
- Formats
- Activities/Characteristics
- Specific Speakers

G&T SIF Initiative Update

The traditional safety triangle is not predictive of SIF events!

SIF Research Findings



A subset of all reported cases will have SIF exposure

A reduction of injuries across the base or working outside the SIF triangle will not have a proportionate reduction of SIF's

Current Findings

- Don’t expect SIF prevention by working outside of the SIF triangle
- Recordable injury rates are misleading when it comes to SIF exposure
- Many organizations have a significant SIF blind spot

Participating G&T's

1. Arkansas Electric Cooperative
2. Associated Electric Cooperative
3. Basin Electric
4. Big Rivers Electric
5. Brazos Electric Power
6. Cooperative Energy
7. Dairyland Power
8. East Kentucky Power
9. Great River Energy
10. Hoosier Energy
11. KAMO Power
12. Northeast Power
13. NW Electric Power Cooperative
14. Oglethorpe Power
15. Old Dominion Electric
16. PowerSouth Energy
17. Seminole Electric
18. Sho-Me Power Electric
19. South Texas Electric Cooperative
20. Sunflower Electric Power
21. Western Farmers Electric
22. Wolverine Power

Data provided for analysis

SIF Exposure

- Life-Threatening Injury or illness
- Life-Altering Injury or Illness
- Fatality

- Realistic possibility
- Meets agreed upon SIF decision tree criteria

- High-risk situation which could have resulted in a serious or fatal injury

Few "Actuals" + Many "Potentials" = SIF Exposure

SIF Determination - Example

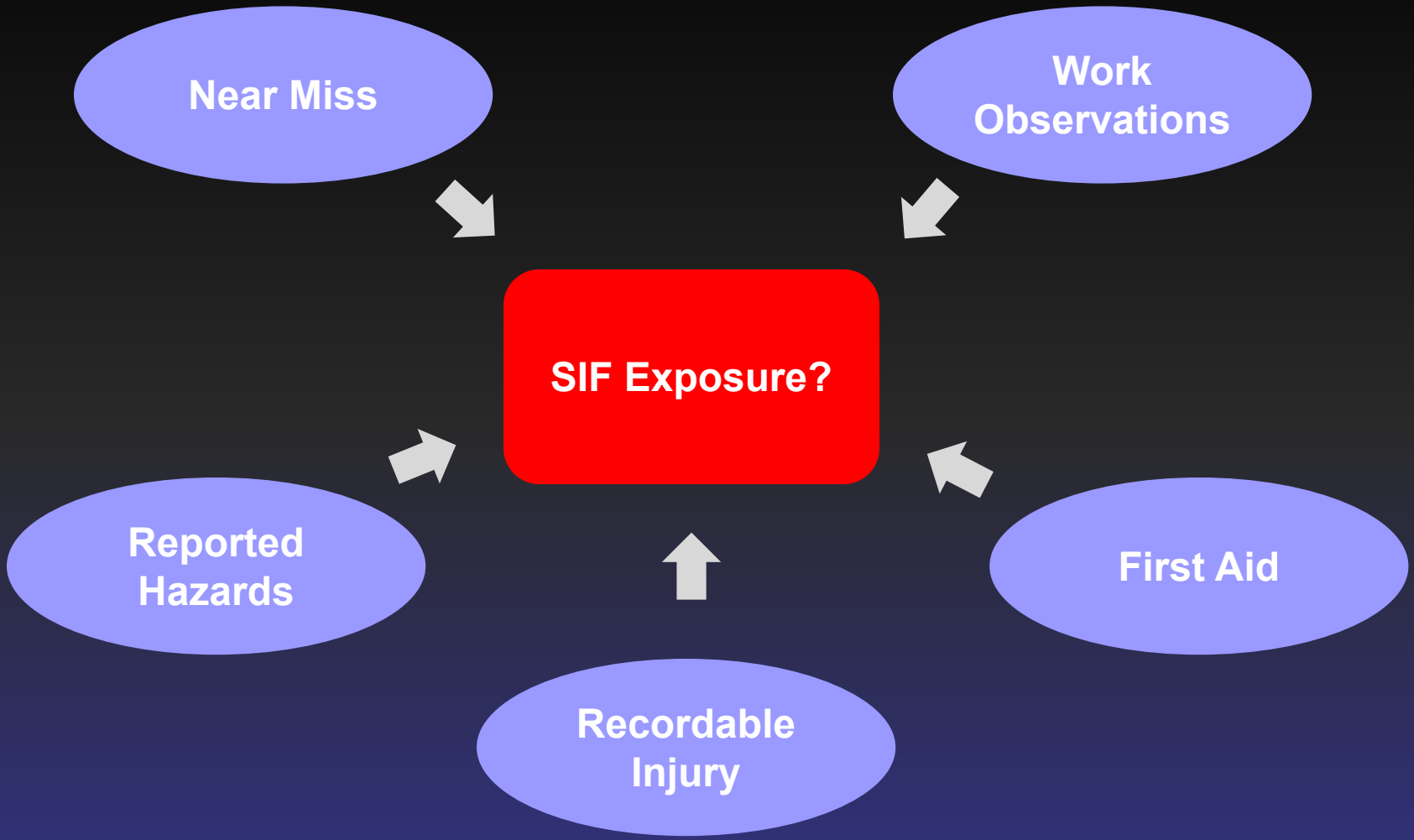
Lost Time Injury

Employee steps on ice, slips and strains back.

Lost Time Injury

Employee trips on removed guard rail, catches self to avoid possible elevated fall, strains back.

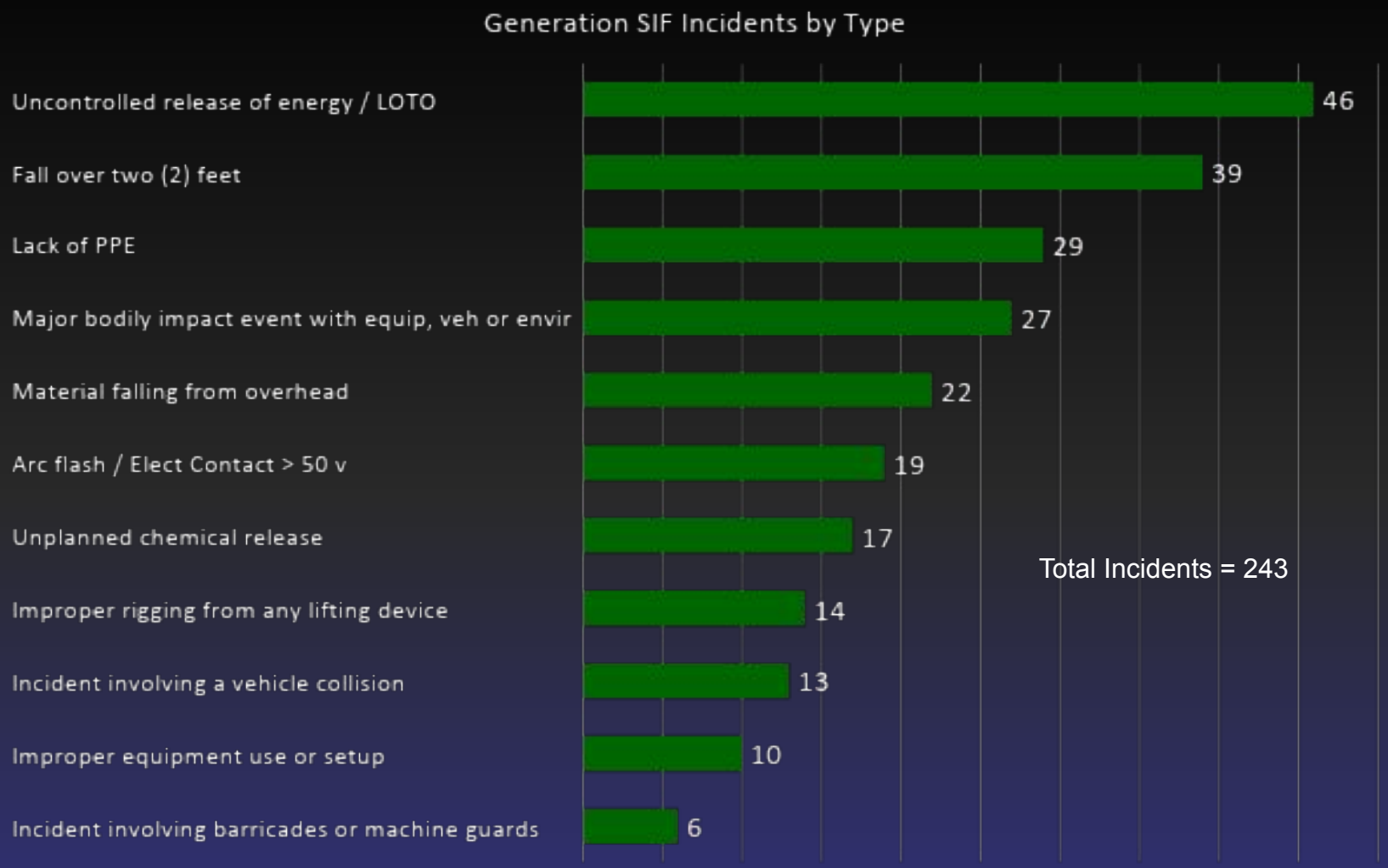
SIF Data Collection Model



SIF Exposures

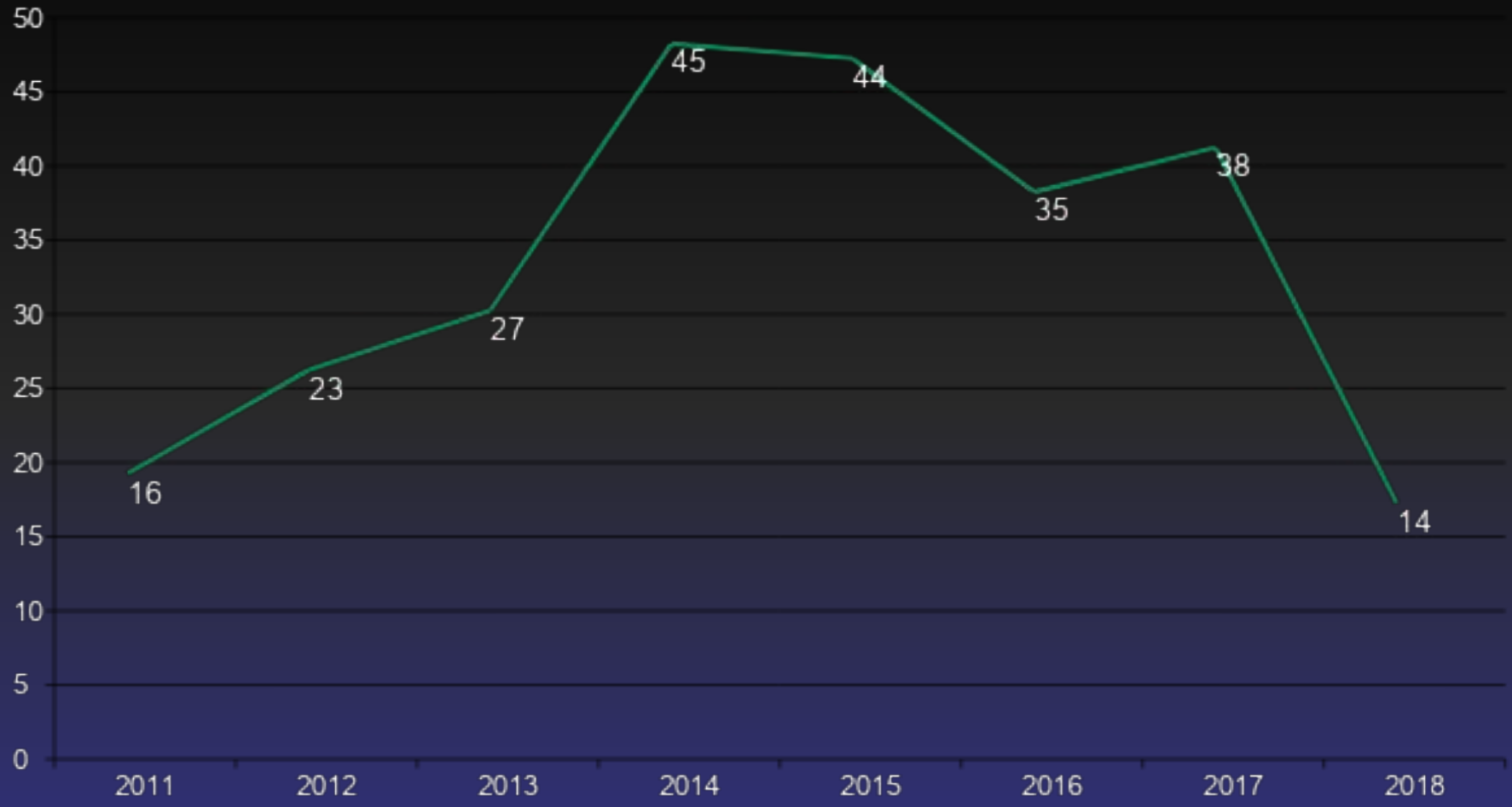
1. LOTO / clearance procedures
2. Lack of PPE
3. Arc flash or arching of equipment.
4. Electrical contact over 50 volts
5. Fall over two (2) feet
6. Improper rigging from a power industrial truck, crane, hoist or any lifting device.
7. Improper equipment use or setup, including mobile equip., dozer, truck, PIT, man lifts, scrapers, etc.
8. Uncontrolled release of energy (steam, hydrogen, mechanical, etc.)
9. Any unplanned ammonia, chlorine, acid or sodium hydroxide release
10. Uncontrolled confined space or hazardous atmosphere exposure
11. Major bodily impact event with equipment, vehicles or environment (mobile equipment, material, fall, etc.)
12. Explosion or flash fire (visible or audible)
13. Material falling from overhead (piping, welding rods, tools, hoses, etc.)
14. Working under a suspended load
15. Collapse, engulfment or cave-in of earth, rock, coal or water.
16. Incident involving a vehicle collision
17. Incident involving barricades or machine guards
18. Incident involving lack of fall protection equipment

Generation SIF Incidents by Type



- 19% Uncontrolled release of energy / LOTO
- 16% Falls > two feet

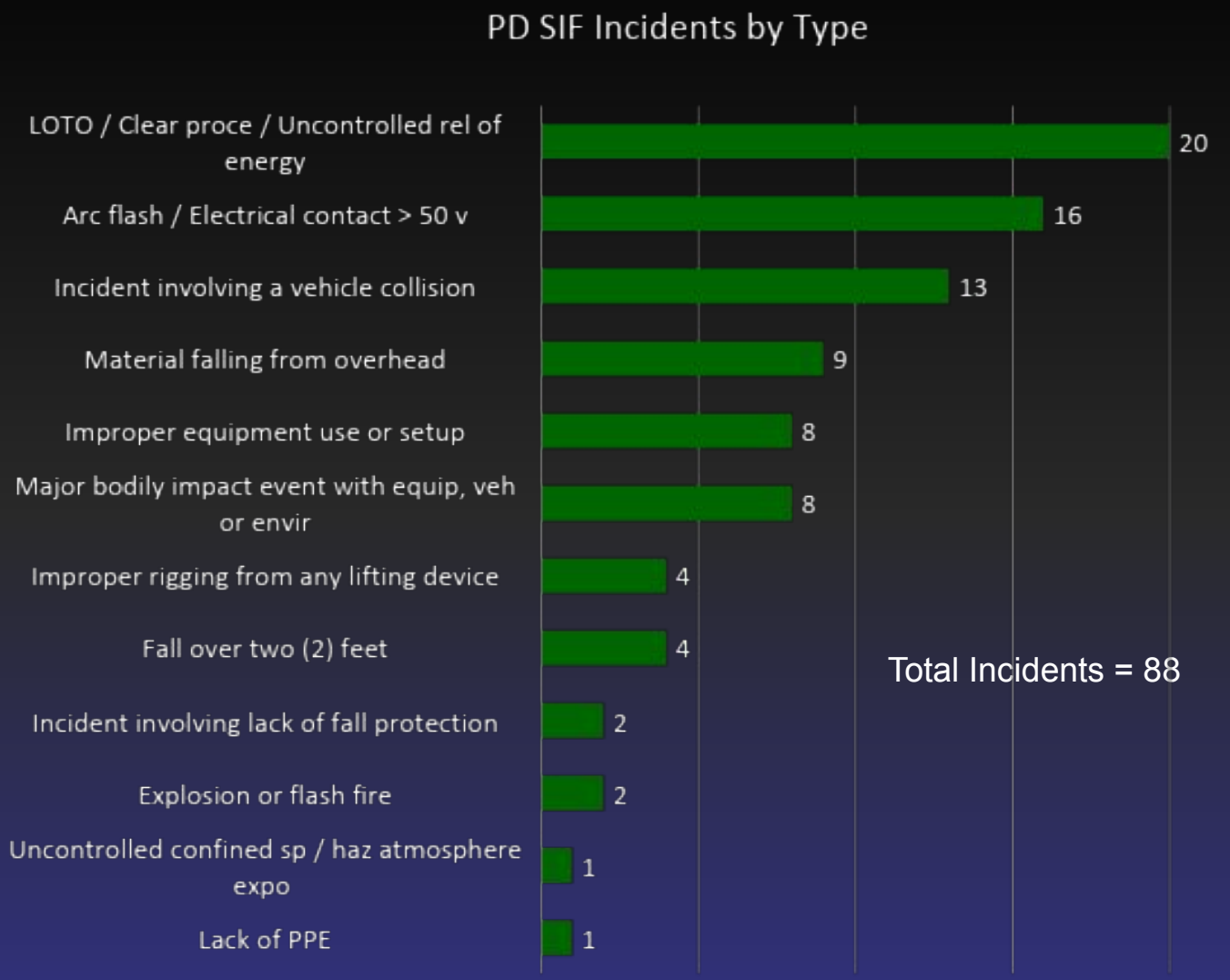
Total Generation SIF Incidents Over Time



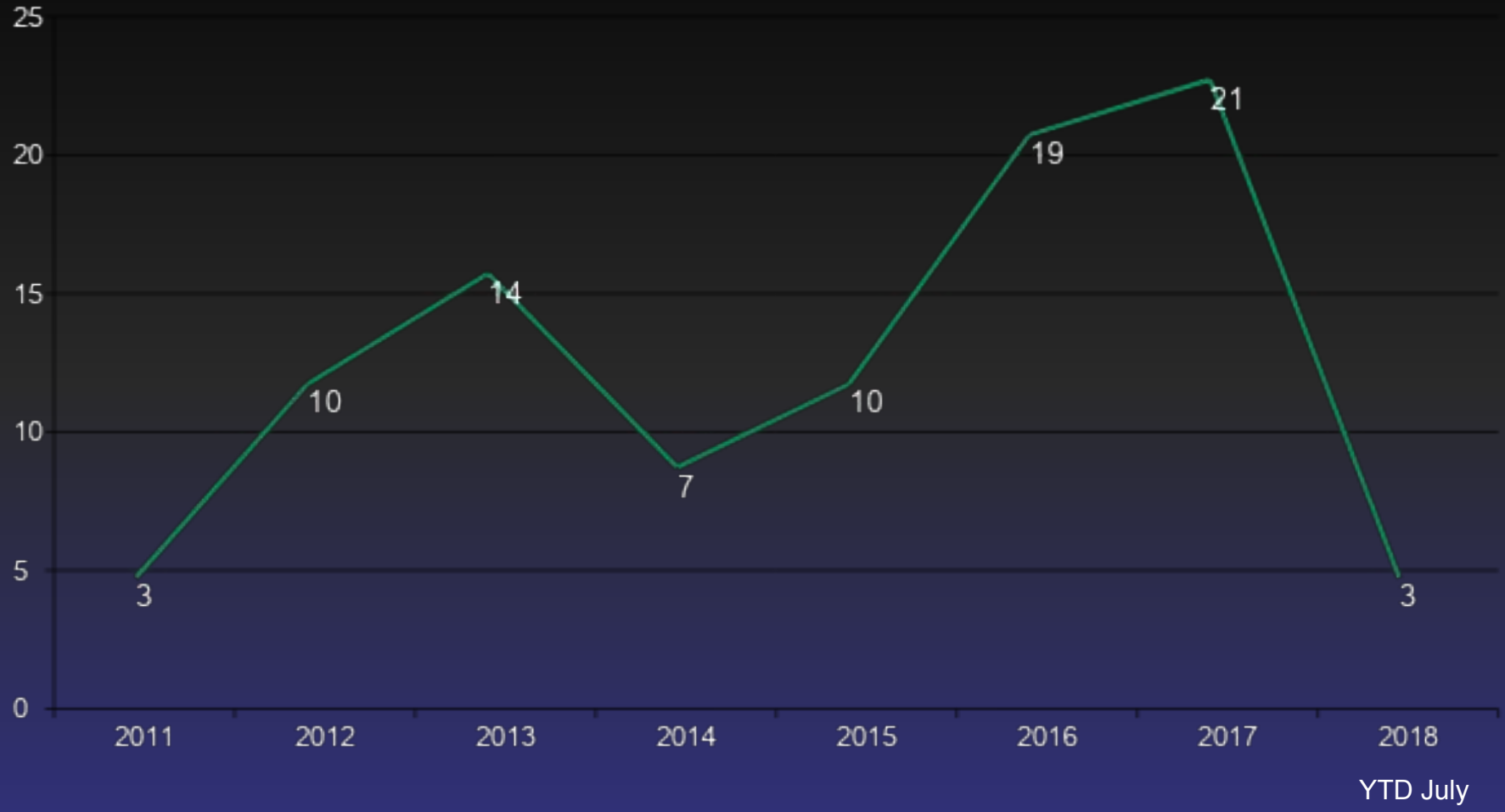
YTD July

PD SIF Incidents by Type

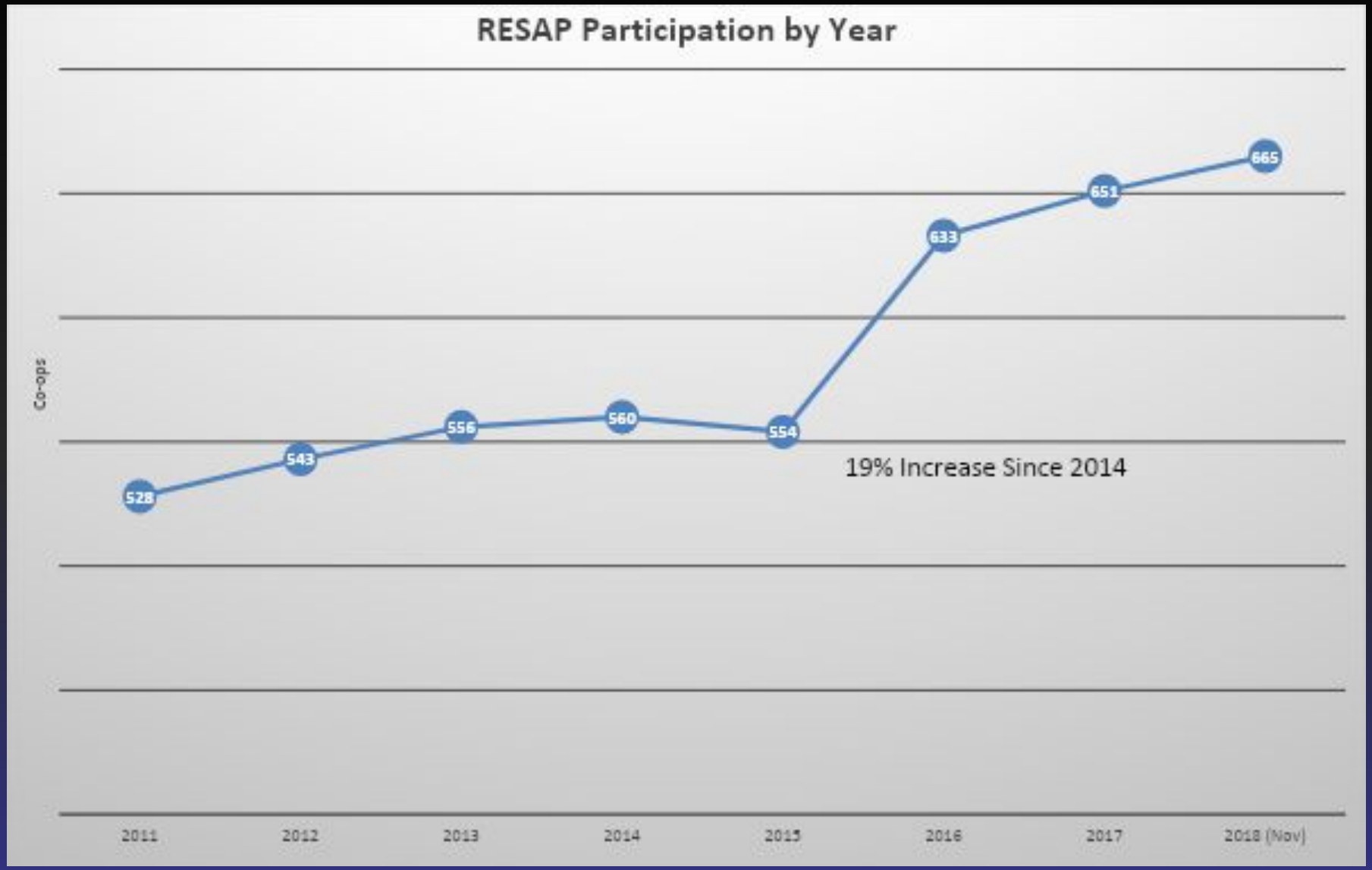
- 23% LOTO / Uncontrolled release of energy
- 18% Arc Flash / Electrical Contact



Power Delivery SIF Incidents Over Time



RESAP Process Review


RESAP Participation by Year
Co-ops
528
543
556
560
554
633
651
665
19% Increase Since 2014
2011
2012
2013
2014
2015
2016
2017
2018 (Nov)

Current Dashboard Status

LC	SHC	APM	Onsite	SIP
Green - 203	Green - 204	Green - 548	Green - 174	Green – 230
Red – 54	Red – 54	Red – 117	Yellow - 41	Yellow - 346
21% Late	21% Late	18% Late	Red – 44	Red – 86
			17% Late	13% Late

Follow up Review

Follow up Issues

1. Roll up a draft of RESAP checklist changes agreed upon
2. Add two additional days to Spring Meeting to review and recommend RESAP checklist modifications
3. Review possible system modifications that could provide for an exception RESAP reporting process
4. Update user guides referenced in the system
5. Simplify download approach for online Clark County video
6. Will make every effort to post Clearance video next week
7. Create a list of required / needed safety documents

Questions / Comments?