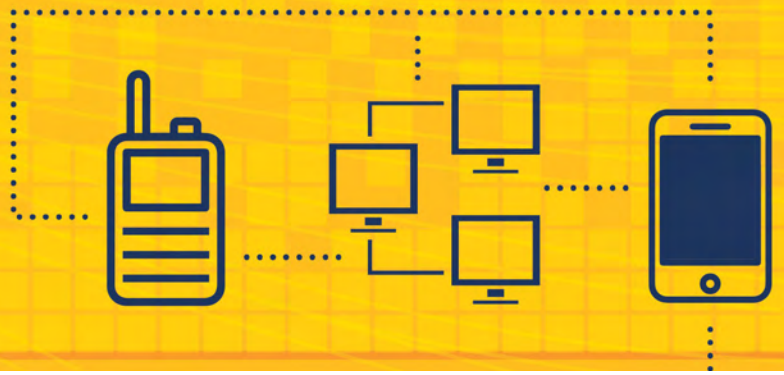
IPSC IDEAS SUMMITS 2022

July 18, 2022

COFFEE & FIRSTNET UPDATES



July 18, 2022

AGENDA

TIMES:	TOPICS:	PRESENTER:
8:30 – 9:00	Coffee, Donuts & FirstNet Updates	Angie Helminiak
9:00 – 9:30	IPSC Systems Updates	Kelly Dignin
9:30 – 10:30	Project Gold Line	Andi Baughn
10:30 – 10:40	**Break**	
10:40 – 11:10	Meet and Greet with all Vendors / Training Trivia	
11:10 – 12:00	Emerging Technology	Jon Allen
12:00 – 1:00	**Working Lunch – Fire Accountability**	
1:00 – 1:20	ICC Updates / Inventory Management	Zac Woodrum
1:20 – 1:30	**Break**	
1:30 – 2:00	Meet and Greet with all Vendors / Training Trivia	
2:00 – 2:45	Emergency Response	Tyler Clements
2:45 – 3:00	**RESPONDER INPUT, FEEDBACK, SUGGESTIONS**	

SAFE-T SYSTEM UPDATES

Kelly Dignin

IPSC Team

3 Comms Analyst
1 Microwave Specialist
1 Emergency Response Coordinator

Governance

Integrated Public Safety Commission (IPSC)

The Integrated Public Safety Commission Quarterly meetings are held on the third Tuesday of every third month. Meeting dates for 2022 are March 15, June 21, September 20, and December 13.

Enabling Code: **Indiana Code 5-26**

COMMISSION MEMBERS

Chair: Douglas G. Carter, Superintendent, Indiana State Police
Michael Crider, State Senator
Mike Diekhoff, Chief, Bloomington Police Department
Randy Frye, State Representative
Jim Fulwider, Commissioner, Montgomery County
Benjamin Hunter, Associate Vice President, Indiana University
Brian Jones, Lemay Enterprises
Mike Nielsen, Sheriff, Boone County
Michael Pavey, Special Agent in Charge, Federal Bureau of Investigation
Douglas Randall, Plainfield Fire Department
Tim Smith, Vincennes Twp. Fire Department
Vacant, Mayor,

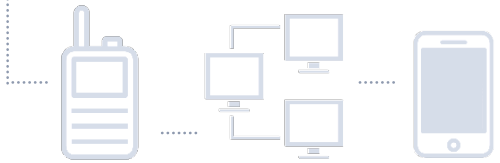
Statewide Interoperability Executive Committee(SIEC)

The SIEC serves as the formal advisory committee to the Integrated Public Safety Commission.

The SIEC has quarterly in-person meetings on the third Tuesday of every third month, at 10:00 am

CURRENT MEMEBRS

Ray Chambers - District 1 Representative
Gail Karas - District 2 Representative
Bill Grimm- District 3 Representative
William "Smokey" Anderson - District 4 Representative
Doug Burris - District 5 Representative
Darryl Brane - District 6 Representative
David Costin - District 7 Representative
Nick Klinger - District 8 Representative
Brad Meixell - District 9 Representative
Nick Adams - D10 Representative
Jeff Schemmer- PSAP Representative
Erv Faulk - State Agency Representative (ISP)
Mark Hahn - State Agency Representative (IDOC)
Lewis Hartman - State Agency Representative (IDHS)
Anthony Canaday- Indiana National Guard Representative (ING)
Mike Nichols- State Agency Representative (INDOT)
Michael Galloway -State Agency Representative (IDOH)
Sam Lashley- National Weather SRV
Jason Bradshaw- NGO (Red Cross)
Jim Jarvis- CISA



System Updates

Land Mobile Radio – 2021.1m 7.18

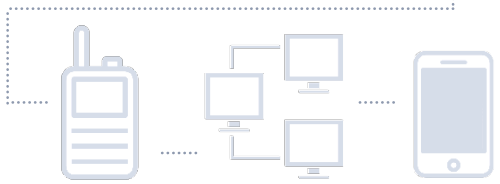
- SmartConnect calls increase from 27-200
- Certified new backroom equipment (routers, switches, servers..)

FirstNet: 65K connections and over 800 agencies

- 99.8% coverage
- Uplift/Deployable

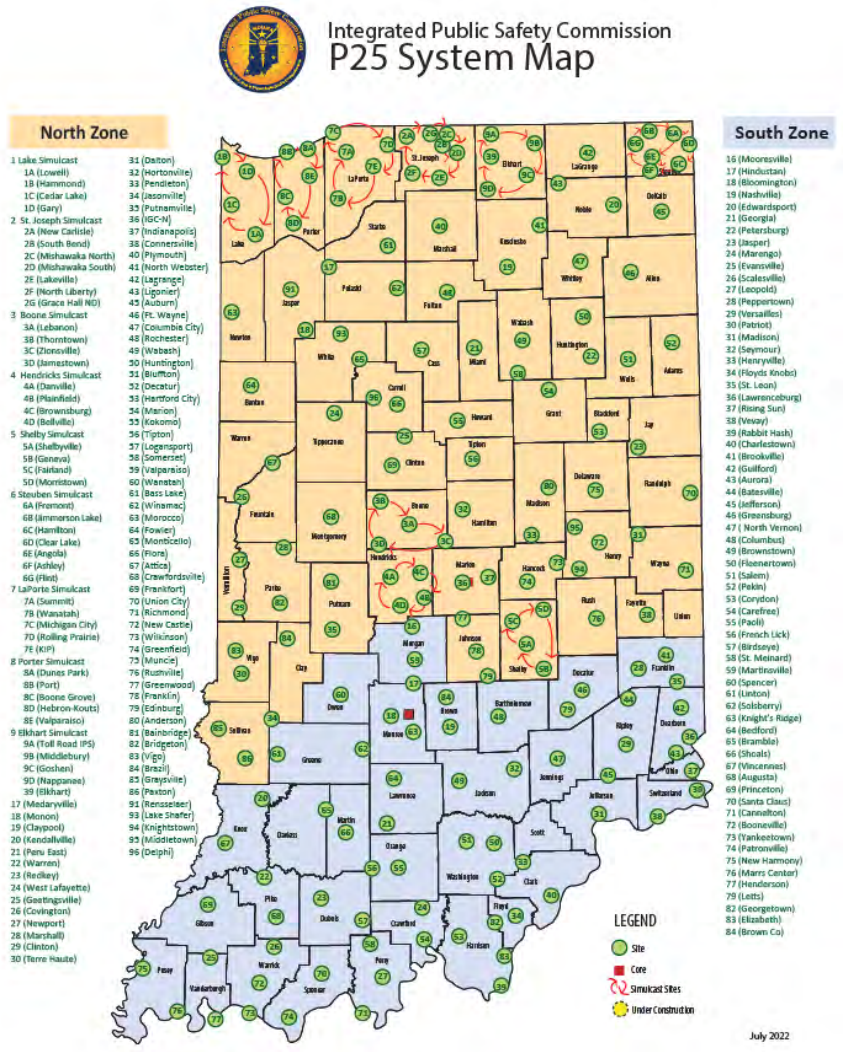
- LMR to Broadband
- Broadband to LMR
- Critical Connect

- **Data** -Caliber Public Safety Suite 10.20.3
  - Self Service password reset
  - First Alert
- **Microwave**: 54 Hop –Multiprotocol Label Switching, or MPLS



What's Next

- TDMA
- Copper to fiber
  - Availability
  - Chronic Sites
  - Key Locations
  - Simulcast



Questions?

kdignin@ipsc.in.gov

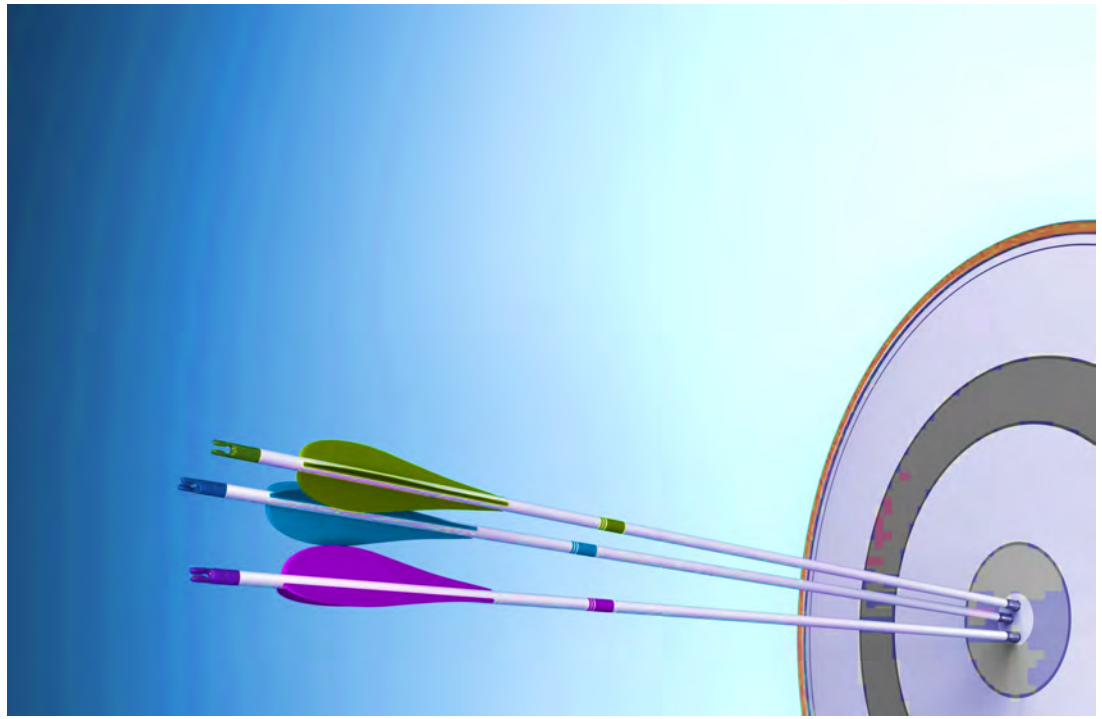
317.430.3617

Project Gold Line

Andrea Baughn

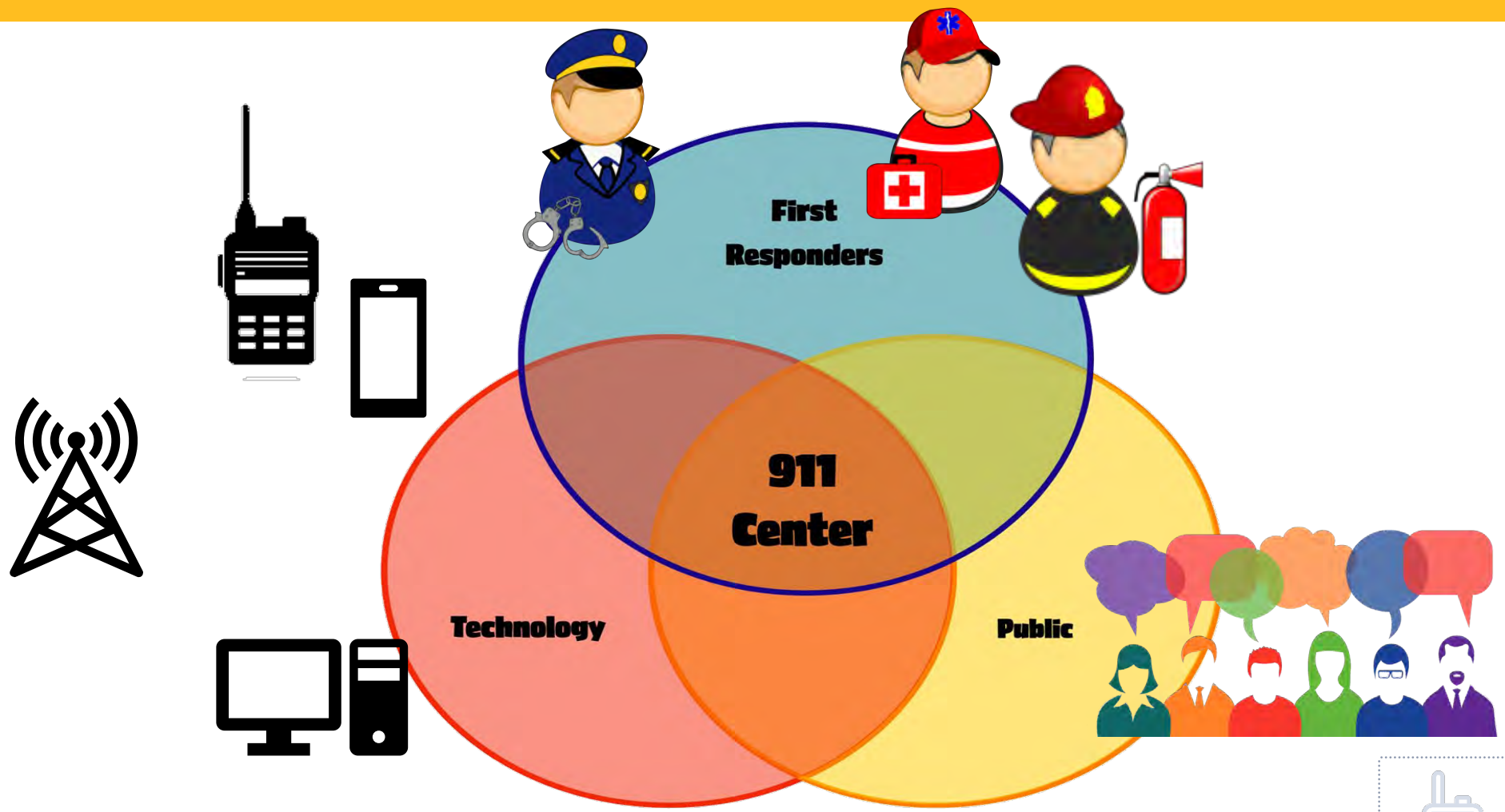
911
PROJECT GOLD LINE
IPSC
PLANNING TRAINING TECHNOLOGY

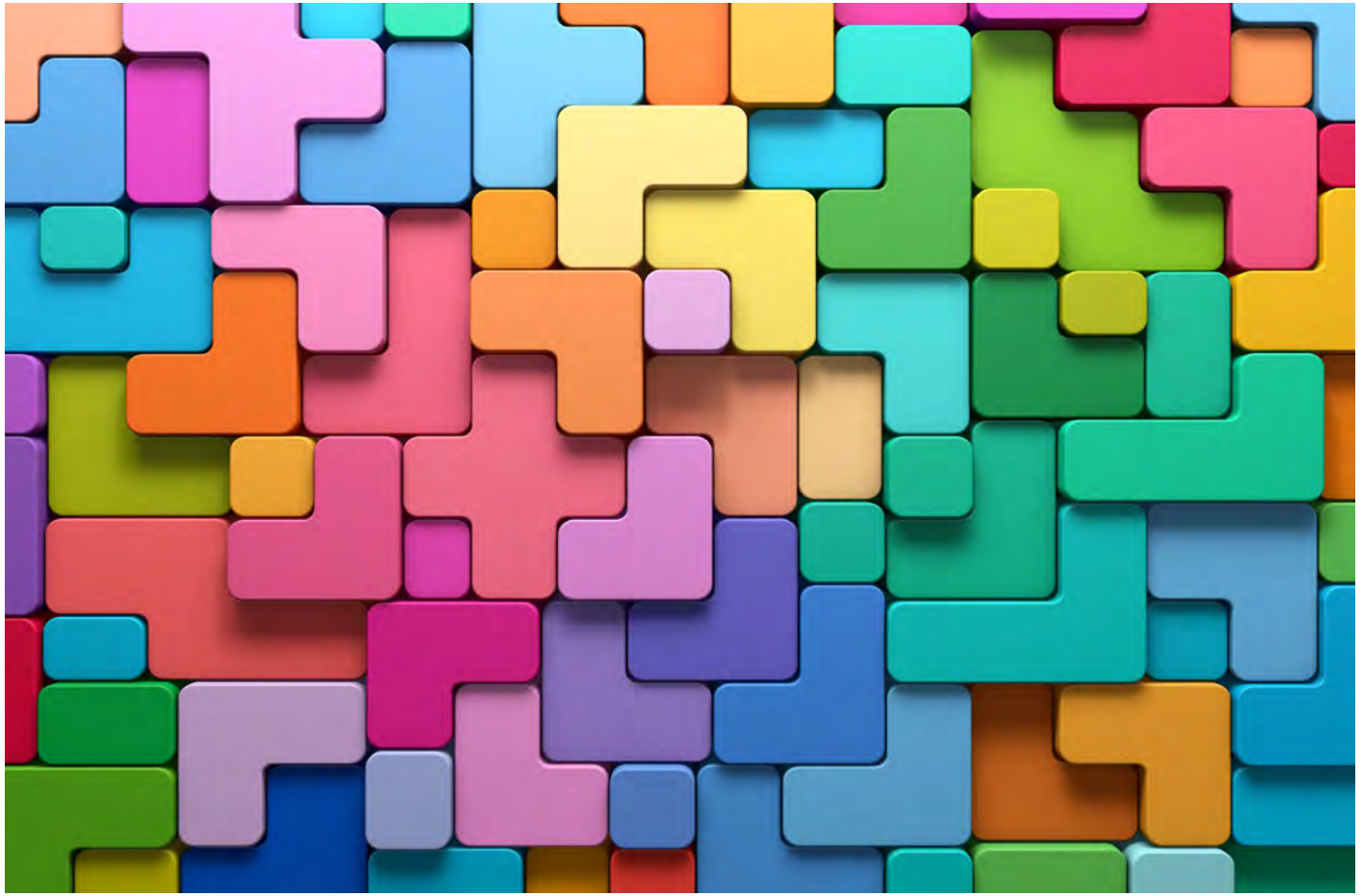
Goals



Connect to the PSAP's by assisting with **planning**, **training** and **technology** related to the radio system

Always in the Middle





Planning

Planning

- Site Trunking plans
- Emergency Communication Plans
- PACE Plans
- Radio System Info for 911 Centers

Planning

Site Trunking

- Occurs when there is a disruption in the telco service
- Dispatch is the key to mitigating radio traffic until the service is restored
- There is no one size fit's all plan for site trunking

Large Event or Incident

- Involves multiple response agencies
- Usually, IPSC is told that the radio system didn't work
- Pre-planning communication for large events and disasters will mitigate most problems

How to Plan for site trunking

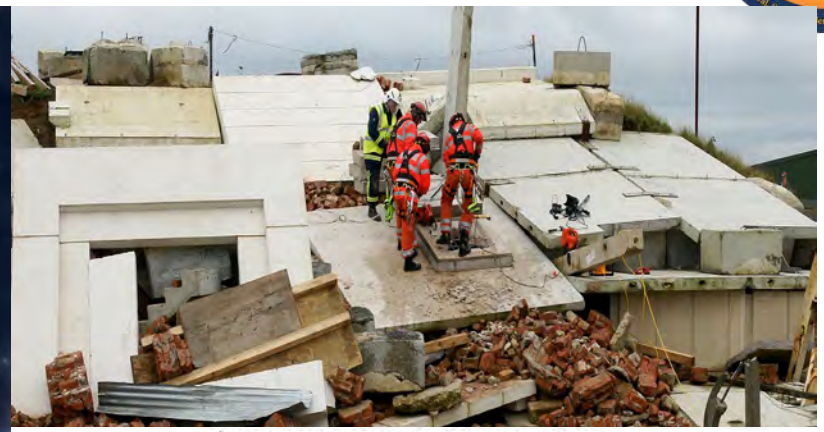
- ❑ Dispatch: Wireline or Wireless?
  - Wireline – what back up radios do you have? Consolettes?
  - Wireless – how many consolettes do you have? What tower sites can you reach?
- ❑ System: Simulcast System or Single Tower Site(s)?
- ❑ Talkgroups: What talkgroups are your priority if you have a site trunking event? This may mean consolidating to 1 PD, 1 FD, 1 EMS.
- ❑ Programming: What programming considerations are necessary for your plan to work?
- ❑ Responders: Do all the First Responders in your area know what to do if site trunking occurs?

IPSC will help

Assisting with site trunking plans is one of the **FREE** services IPSC provides to any agency using the radio system

Set up an appointment today!

How do you plan for a disaster?



INCIDENT RADIO COMMUNICATIONS PLAN (ICS 205)

1. Incident Name: WECT – Woodinville Emergency Communications Team	2. Date/Time Prepared: Date: 9/5/2018 Time: 12:00pm	3. Operational Period: Date From: 9/5/2018 Time From: HHMM Date To: 12/31/2018 Time To: HHMM

4. Basic Radio Channel Use:

Zone Grp.	Ch #	Function	Channel Name/Trunked Radio System Talkgroup	Assignment	RX Freq N or W	RX Tone/NAC	TX Freq N or W	TX Tone/NAC	Mode (A, D, or M)	Remarks
	1	Regional Net			147.34 W	None	147.94 W	100.0	A	Net and primary traffic
	2	Backup Net			147.52 W	None	147.52 W	None	A	Backup for net and traffic
	3	Winlink			223.45 W	None	223.45 W	None	D	Winlink traffic (No voice)
	4	Repeater Input			147.94 W	None	147.94 W	None	A	For monitoring incoming signals when Woodinville repeater is offline
	5									

5. Special Instructions:

6. Prepared by (Communications Unit Leader): Name: Scott Green – K7JSG Signature:

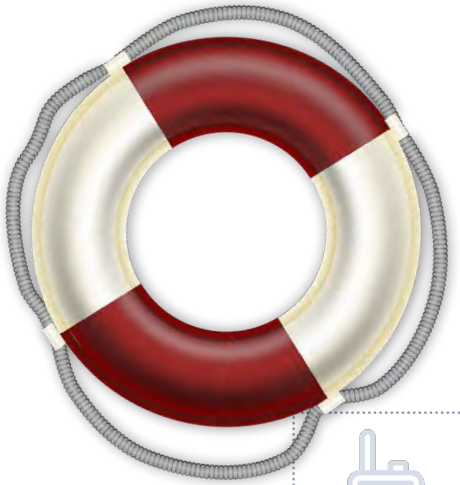
How to Plan for Events/Incidents

- ❑ What tower sites are your local talk groups are valid on?
  - How many channels at each site?
  - Channel capacity determines number of talk paths.
- ❑ System: Simulcast System or Single Tower Site(s)?
- ❑ Talkgroups: What talkgroups are your priority? This may mean consolidating talkgroups due to capacity.
- ❑ Interoperability talkgroups: Do you know how to use them?
- ❑ Dispatch:
  - How many dispatchers are needed for the Event/Incident?
  - How many dispatchers are needed for everyday 911?
- ❑ Responders: Do all the First Responders in your area know the plan?

IPSC will help

Assisting with Event/Incident plans is another one of the **FREE** services IPSC provides to any agency using the radio system. Along with **FREE** system training.

Set up an appointment today!



PACE Communication Plan

- Primary
- Alternate
- Contingency
- Emergency

IN-TERT

TERT Telecommunicator Emergency Response Taskforce

APCO International Leaders in Public Safety Communications®

NENA THE 9-1-1 ASSOCIATION

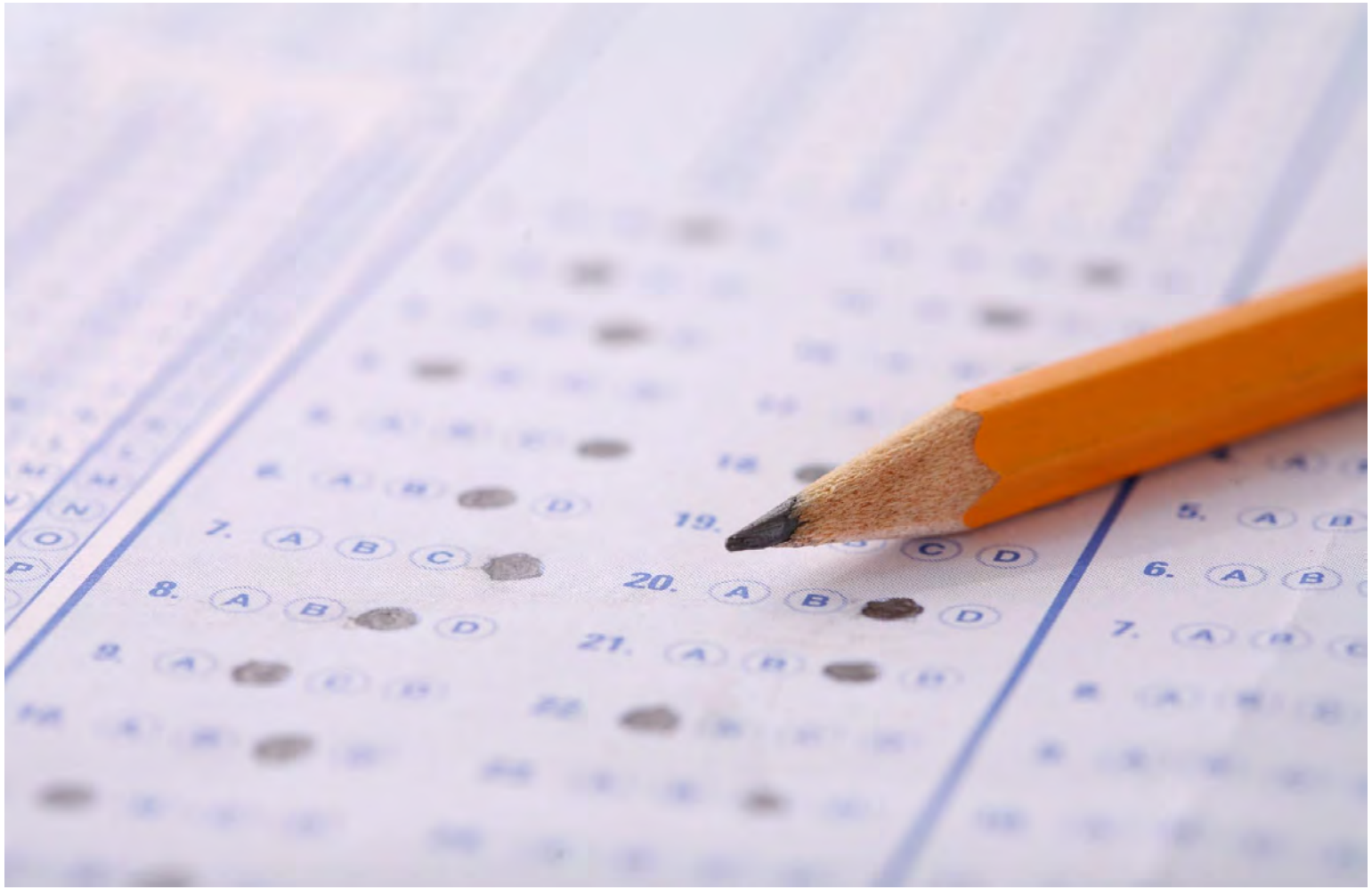
IPSC is working with APCO and NENA leadership to help re-build the IN-TERT Team.

We hope to fill open TERT leadership positions and then discuss with current TERT leadership options to move forward.

Feedback Needed

What type of information do the 911 Centers want to know to help make mitigating radio issues easier?

What format do you want it in?



Training

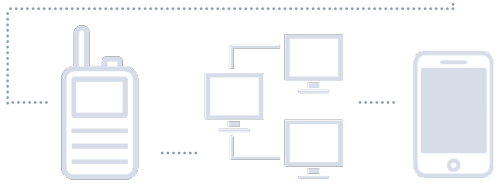
Training

IPSC/State Specific

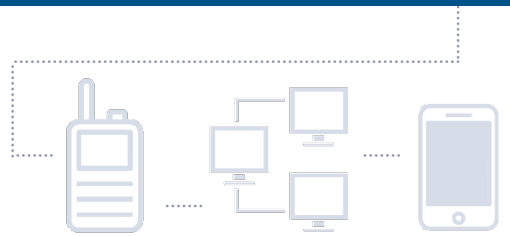
- Dispatch Pursuit Training
- Radio System Training

FEMA Type 3

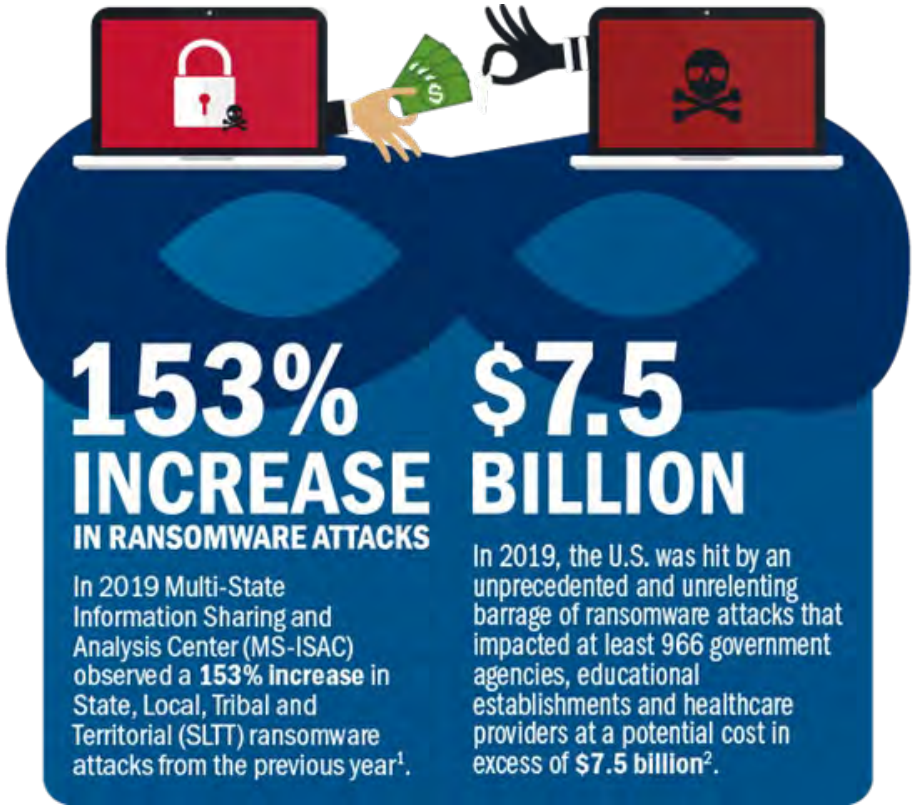
- Communication Unit Leader (COML)
- Communication Unit Technician (COMT)
- Incident Tactical Dispatch (INTD)



PUBLIC SAFETY CYBERSECURITY



Public Safety Cybersecurity Environment



Source: *Cyber Risks to Public Safety: Ransomware, 2020*

37% Noted cybersecurity disruptions had impacted their ability to communicate

81% Lack sufficient funding for cybersecurity capital investment, operating, and maintenance costs

95% Did not anticipate sufficient cybersecurity funding beyond their current budget cycle

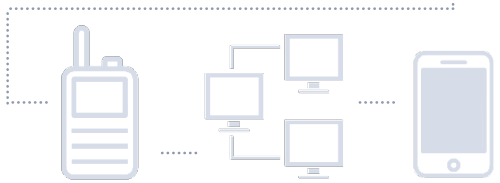
Source: *SAFECOM Nationwide Survey, 2018*

Cybersecurity for Public Safety

- Greater information sharing and improved interconnectivity enhances response operations, but also increases vulnerability to cybersecurity threats, such as malicious software, denial-of-service attacks, and unauthorized data access

- Public safety organizations have unique drivers that influence their cybersecurity architecture

- Traditional cybersecurity solutions may not provide adequate protection against cyber threats or account for mission needs



PUBLIC SAFETY CYBERSECURITY DRIVERS

- Cyber incidents have become one of public safety's greatest operational risks
- Public safety needs modernization of systems and customization of cybersecurity assessments and solutions to meet public safety's unique requirements

ALL-HAZARDS ENVIRONMENT WITH 24/7/365 OPERATION

DECISION-MAKING IMMEDIACY AND FLEXIBILITY

ON-DEMAND COORDINATION WITH DIVERSE PARTNERS

INTERCONNECTED SYSTEM VULNERABILITIES MITIGATED

CYBERSECURITY TRAINED STAFF

DIVERSE OWNERSHIP WORKING TOGETHER

LEGACY EQUIPMENT UPDATED

PRIME TARGET CRITICALITY AND RESILIENCY REALIZED

SITUATIONAL RISK TOLERANCE

LOCATION ACCURACY

SENSITIVE RESPONSE DATA SECURE

PUBLIC EXPECTATIONS EXCEEDED

INTERCONNECTED VARIETY OF TECHNOLOGIES

100% CALL/SESSION ANSWERING

DYNAMIC AUTHORITY ENVIRONMENT

ARCHITECTURES AND STANDARDS MEET MISSION

RESILIENT INFORMATION TECHNOLOGY

REGULATORY AND LEGISLATIVE DIFFERENCES RESOLVED

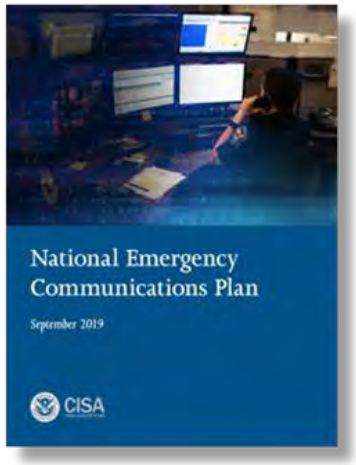
DEFEND TODAY,
SECURE TOMORROW

Governmental Agencies
(Federal, State, Local, Tribal, Territorial)

Incident Response and Coordination

Governmental Agencies
(Federal, State, Local, Tribal, Territorial)

Interoperable Communications Capabilities



- Governance
- Standard Operating Procedures
- Technology
- Training & Exercises
- Usage

Notifications, Alerts & Warnings

Reporting, & Requests for Assistance

Public, NGOs, Private Sector

Public Information Exchange

Public, NGOs, Private Sector

NECP Cybersecurity Objectives

- Objective 6.1: Develop and maintain cybersecurity risk management
- Objective 6.2: Mitigate cybersecurity vulnerabilities
- Objective 6.3: Determine public safety-specific, standards-based cyber hygiene minimums and fund ongoing risk mitigation

Interoperability Continuum

- Inventory and Management of Physical and Software Assets, Personnel, and Access Levels
- Routine Threat, Risk, and **Vulnerability Assessments**
- Develop and Implement Security and Cybersecurity Protocols
- Proactive Security and **Continuous Monitoring Capabilities**
- Regular and Sustained Security and Cybersecurity Capabilities
- Effective **Response, Mitigation, and Support Recovery Capability** in Place

Cybersecurity Markers & Readiness Levels

Initial
63%

- Public safety communications network owners are aware of cybersecurity assessment availability and value

Defined
29%

- Initial plus, Conducted assessment, conducted risk assessment.

Optimized
9%

- Defined plus, Availability of Cyber Incident Response Plan

Foundational

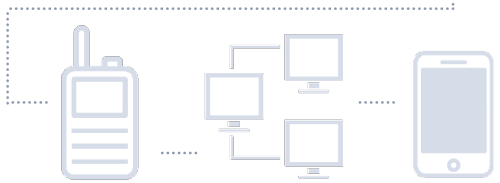
- Services and resources that are available and recommended to all users regardless of capability.

Intermediate

- Services that require users to have some experience developing and implementing security policies and procedures either on their own or through previous CISA engagements.

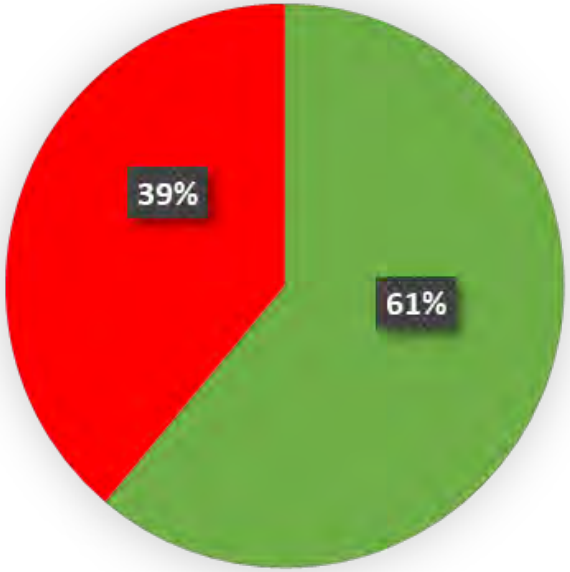
Advanced

- Services that, because of their expansive scope and technical complexity, require pre-existing capabilities and programs already in place within an organization that can be leveraged as prerequisites for receiving that service.



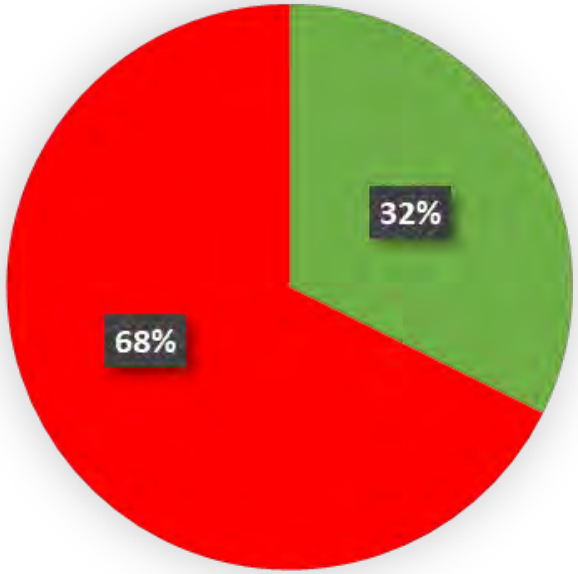
Ransomware Readiness Assessments

Basic



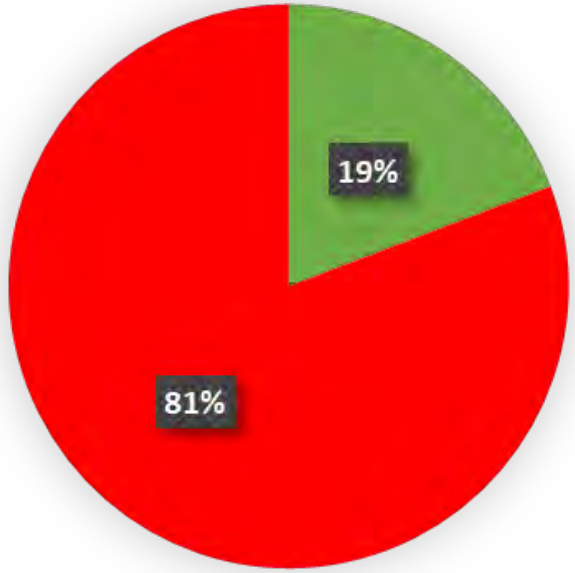
18 Practices

Intermediate



17 Practices

Advanced

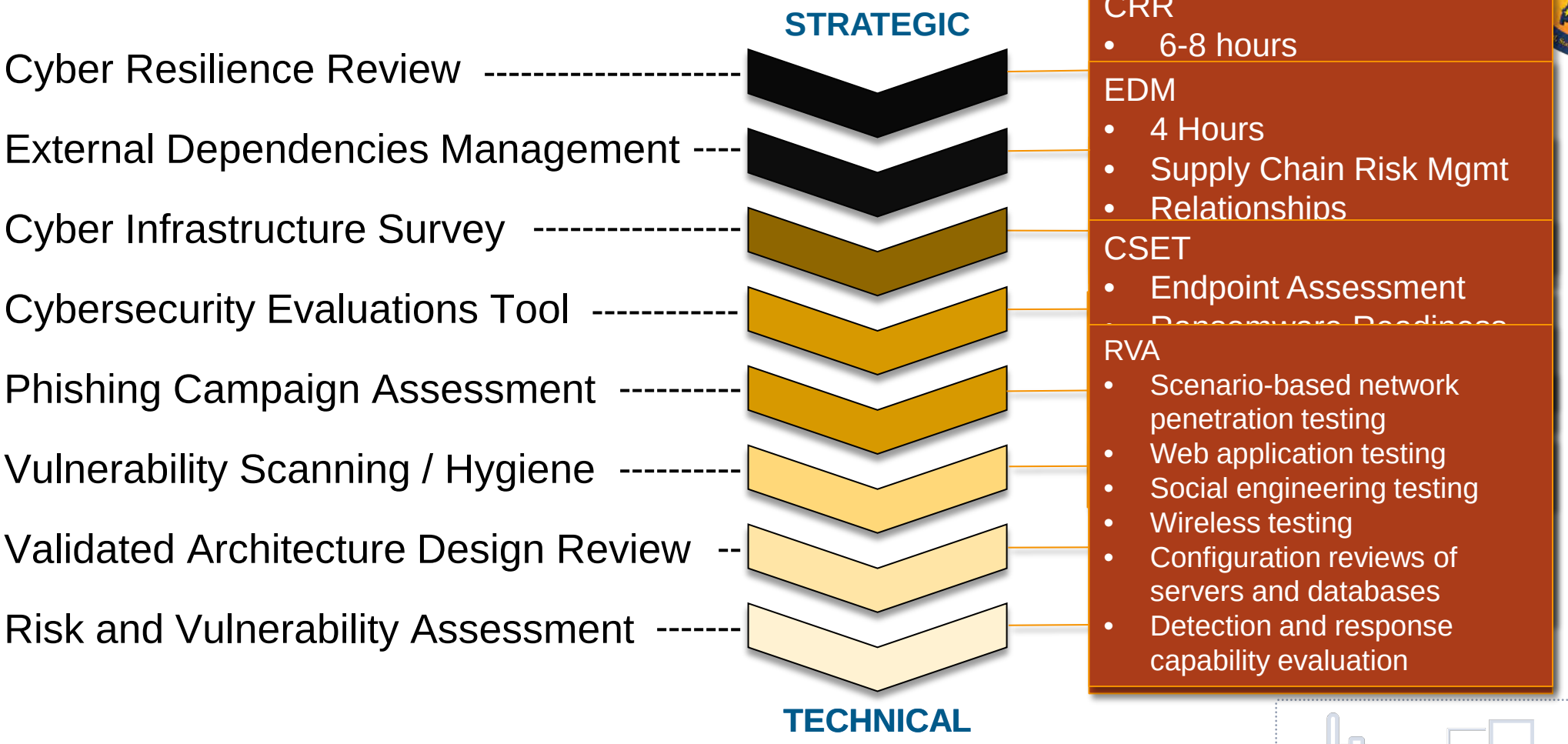


13 Practices

CISA Services

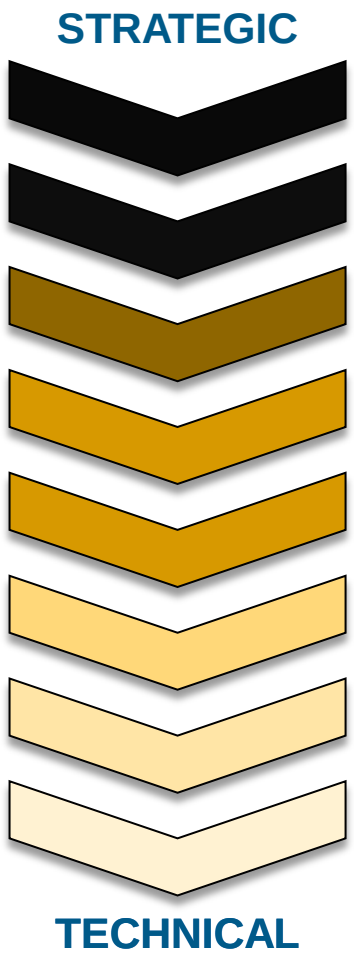
- PSAP Ransomware Readiness Assessment
- Cyber Infrastructure Survey
- Cyber Resilience Review
- Cyber Hygiene Vulnerability Scanning
- CISA Tabletop Exercises Packages
- Interoperable Communications Technical Assistance Program

CISA Assessments and Services



Cyber Protective Visits (CPV) – To determine additional services

Interoperable Communications Technical Assistance Program (ICTAP)



9-1-1/PSAP/LMR Cyber Awareness	29 Completed, 4 In Work, 1 Pending
PSAP Ransomware Poster	26 States
PSAP TDOS Poster	New Offering
9-1-1/PSAP/LMR Cyber Assessment	1 Completed, 3 In Work, 5 Pending
NG911 Self Assessment (SAFECOM)	
Information Technology Service Unit Leader (ITSL)	
Communications-Focused Exercise (Cyber)	1 Completed (Gremlins in the Gears)

https://www.911.gov/projects/ng911-self-assessment-tool/

SAFECOM® NATIONWIDE SURVEY

INFLUENCE THE FUTURE OF EMERGENCY COMMUNICATIONS!

Take the SAFECOM Nationwide Survey later this year

For more information,
visit www.cisa.gov/safecom/sns
or email sns@cisa.dhs.gov

CISA REGION 5

Jim Jarvis
Emergency Communications Coordinator
Cybersecurity and Infrastructure Security Agency (CISA)

James.Jarvis@cisa.dhs.gov
(202) 834-0631

Project Goldline

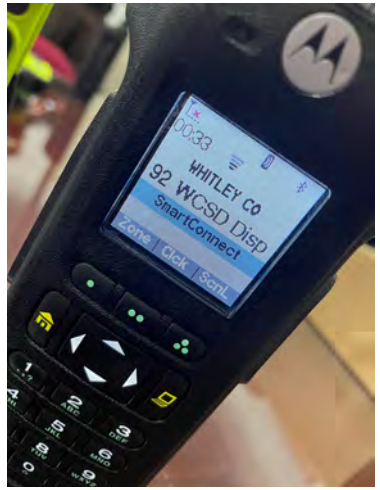
SAFE-T Emerging Technology

Jon Allen

Critical Connect

Radio – WiFi

- APX Devices
- SmartConnect
- WiFi Enabled

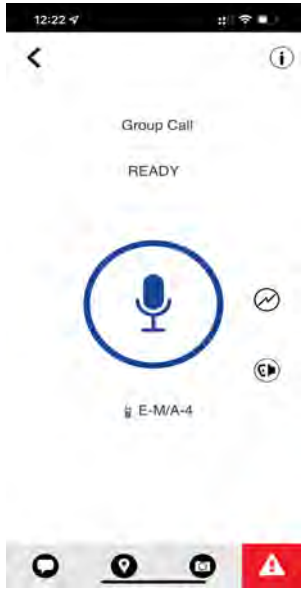


Radio – LTE

- APX Next
- VZW / FN

Radio – Wave

- IOS/Android
- Private PTT
- LMR Interop



Auto Site Roam

- Motorola
- EF Johnson
- Harris

FirstNet EPTT

- IOS / Android
- Private PTT
- LMR Interop
- TG Scanning

- Not all TGs

P25 Two Tone Paging

- System configuration
  - Talkgroup
  - Control Channels
  - Critical Sites

Caliber Public Safety

CAD

- Situational Awareness
- Advanced Mapping & AVL
- Embedded CIS
- Auto-Send
- Data Sharing

MOBILE

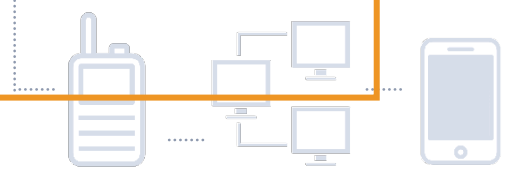
- Real-time updates
- CJIS queries
- Robust mapping
- **PocketCop**
- **PcoketRescue**
- Data Sharing

First Alert

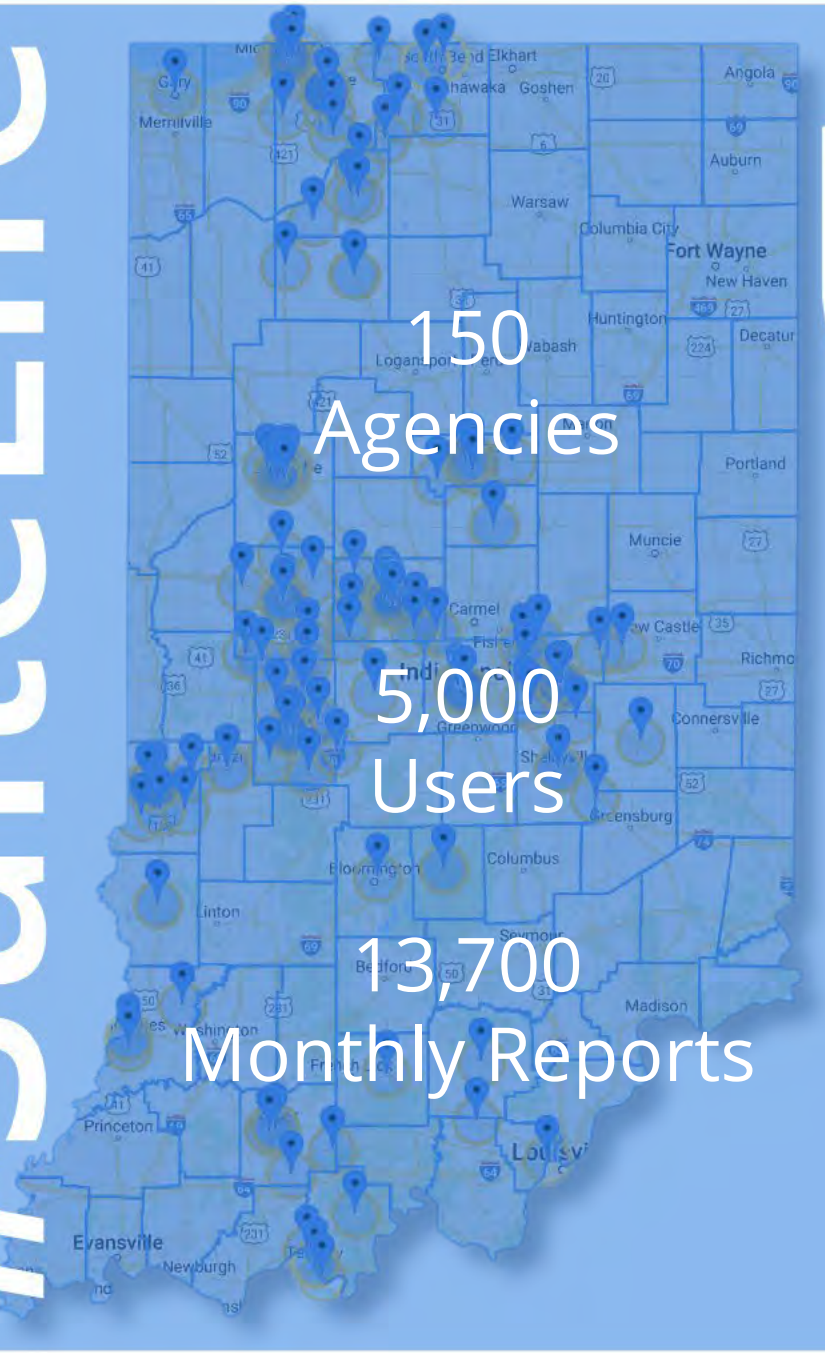
- IOS/Android
- CAD Creation
- 2-way chat
- Data Sharing

WebCAD

- Browser based application
- EMS/Fire/LE/ EOC



#SuiteLife



150
Agencies

5,000
Users

13,700
Monthly Reports

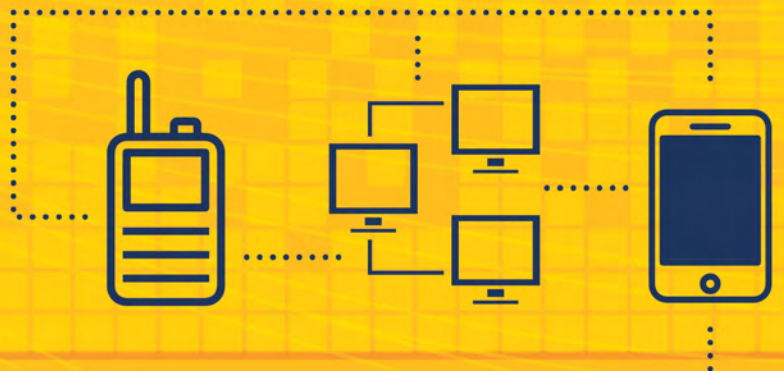
Caliber
PUBLIC SAFETY
Protecting Tomorrow-Today.™

JOIN THE CALIBER FAMILY

Technology Working Group

- The Technology Working Group focuses on the coordination of technical work necessary to build & enable the architecture, frameworks, standards & technologies as it relates to public safety land mobile radio.

WORKING LUNCH
FIRE ACCOUNTABILITY



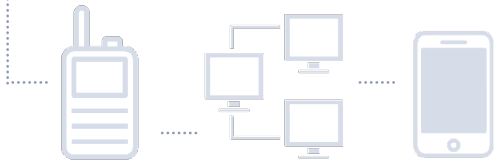
July 18, 2022

ICC Updates / Inventory Management

Zac Woodrum

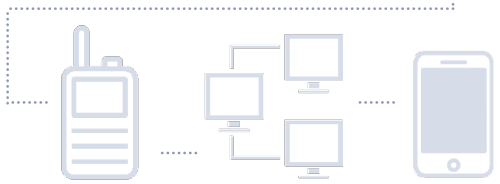
Challenge

- Think of one question, comment, or concern.
- Write that down.
- We will address those at the end of this presentation.



ICC Updates

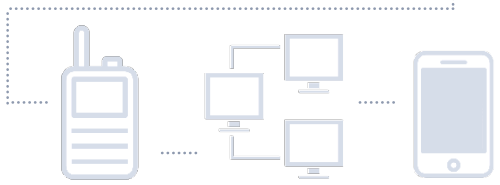
- Staff Introductions
- Opening a 4th position in the ICC soon
- ICC Operating Hours
  - 7a-10p, Monday-Friday (Closed on Holidays)
  - Phone line is 24/7
- ID Requests and TDMA Capability



ICC Stats

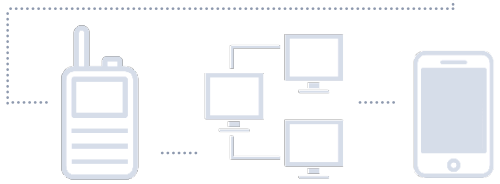
- Total Active IDs: 95,927
- New IDs in 2022: 3,731

- Total Talkgroups: 2,424
- Talkgroups with Critical Connect Access: 17

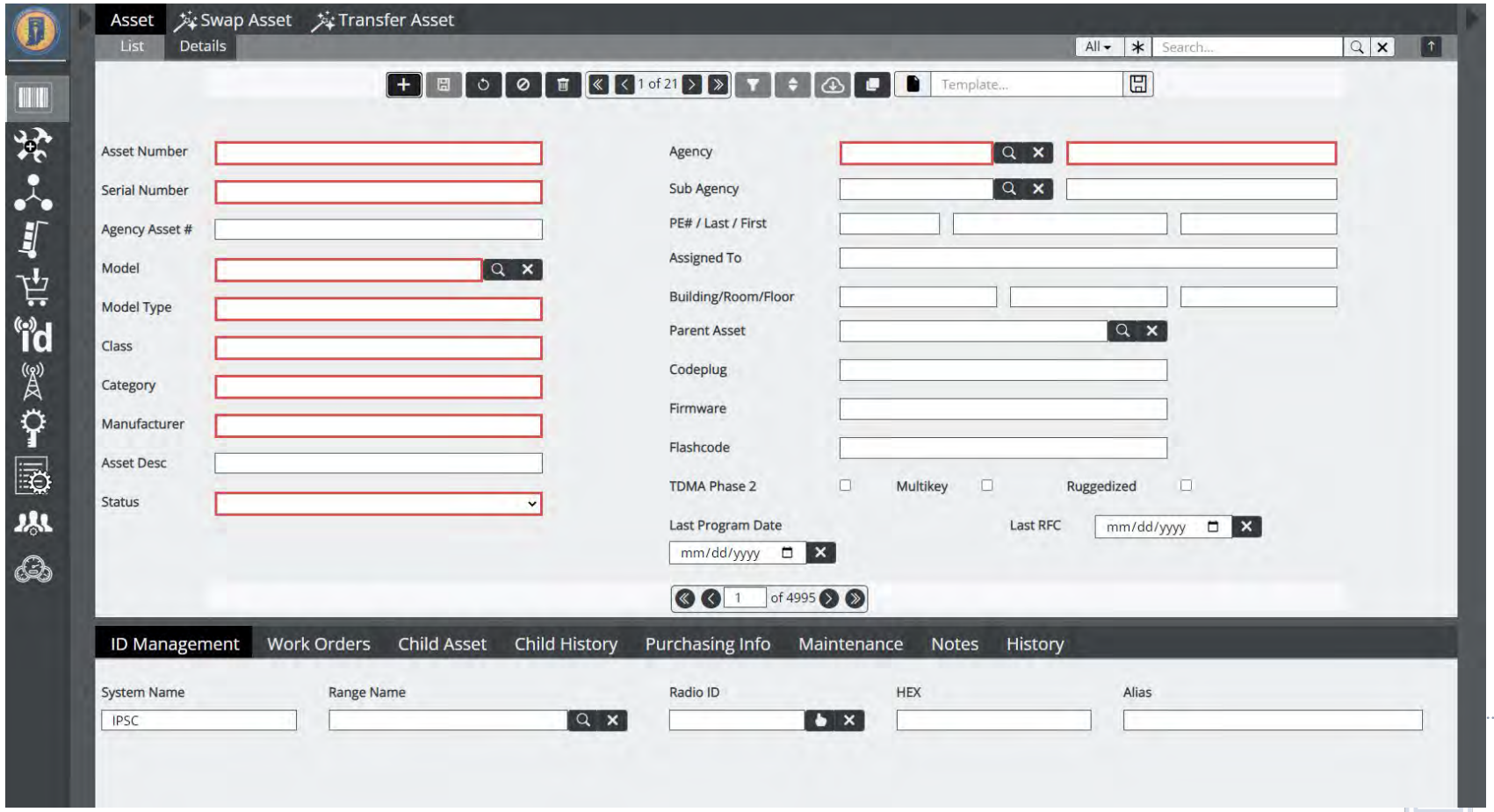


Creating a New ID

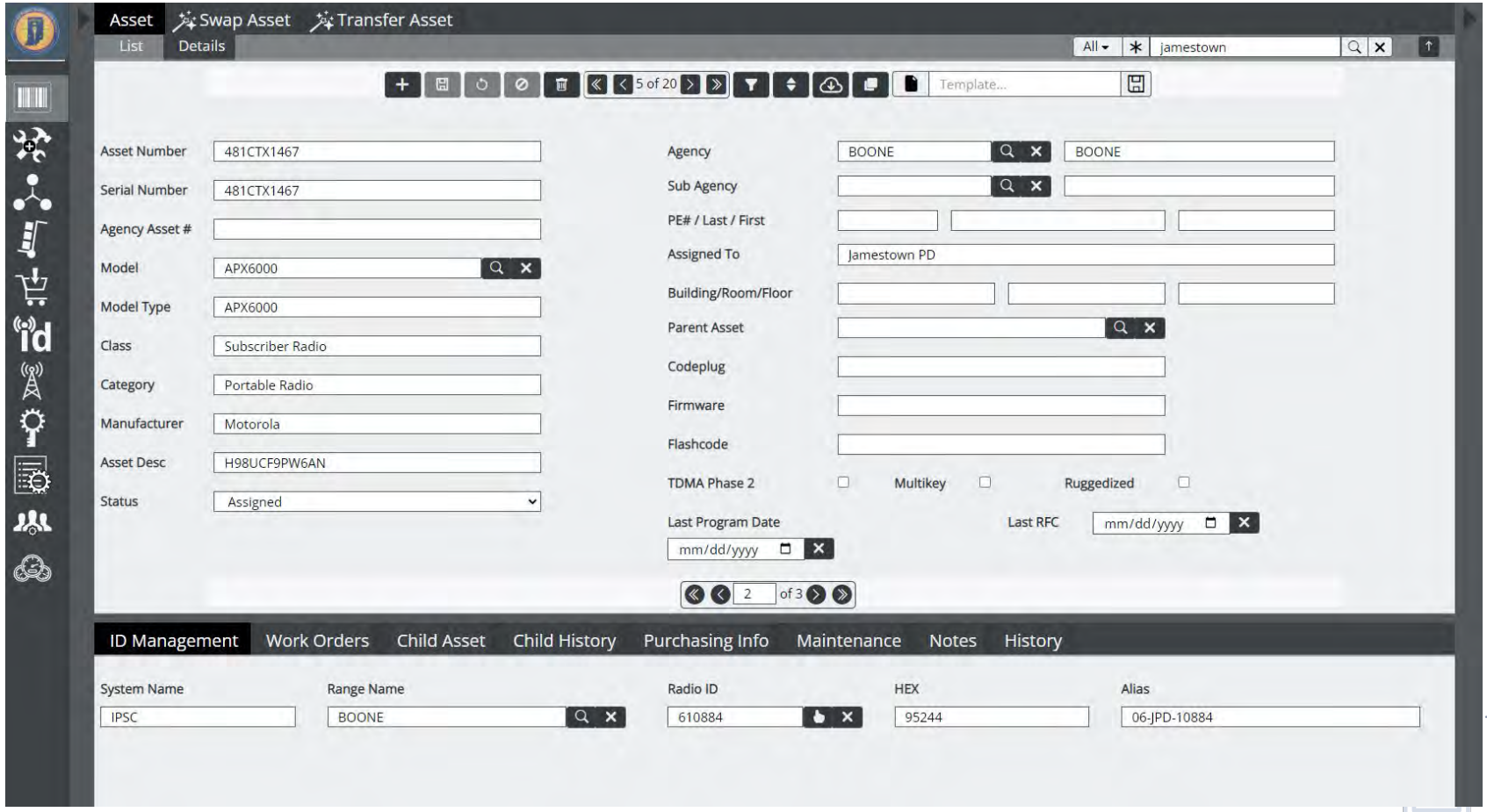
- Needed Information
  - Serial Number
  - Make and Model
  - Requesting Agency
  - Must be TDMA capable



Needed Information

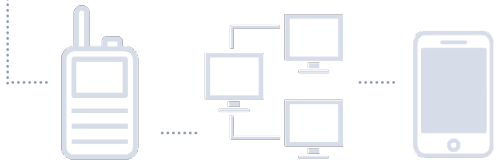


Complete Record



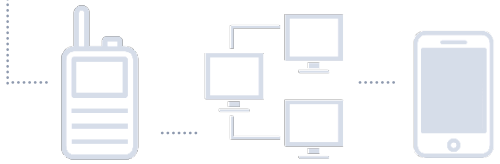
Inventory Management

- An average county has 500-1000 active IDs on the system.
- The cost of the most common radio on the IPSC system: $5,515.43
- Without accurate information, we cannot place or remove inhibits. Must have ID and Serial Number.



What To Do With Old Radios

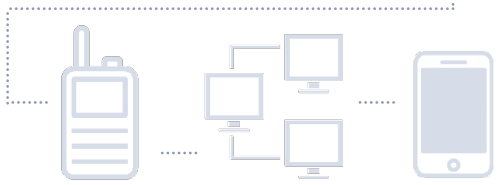
- Trading IDs vs Cache Radios
- Buying radios from a public market
- Invites opportunities for malicious activity



APCO/FCC Frequency Coordinator

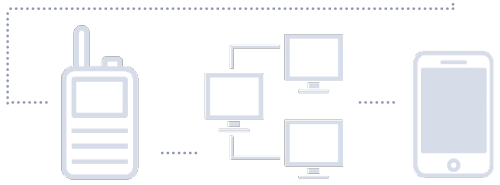
- Zac Woodrum, Supervisor
  Appl Syst. Analyst/Prog Senior
  APCO Local Advisor

  IPSC Connection Center (ICC)
  Integrated Public Safety Commission
  100 N Senate Avenue, N825
  Indianapolis, IN 46204
  Phone: 317-234-1540
  Email: zwoodrum@ipsc.in.gov



How to Contact the ICC

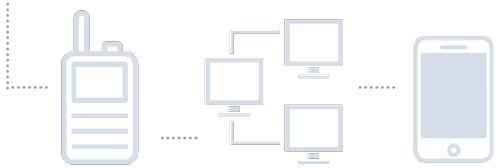
- Phone: 317-234-1540
  - 24x7 phone line
- Email: icc@ipsc.in.gov
  - Radio ID requests
  - Event Talkgroups
  - Radio or System Issue Reporting

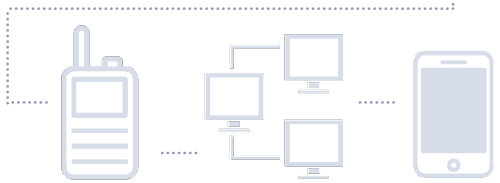


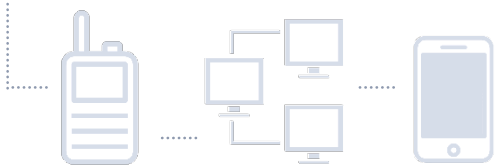
Questions?

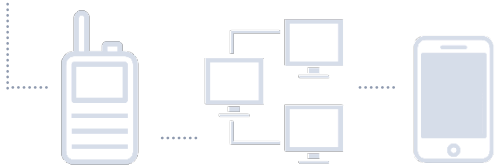
Training & Outreach

Mike Watkins









Emergency Response

Tyler Clements,

Division Director

Indiana - Cell on Wheels (COW)

- Deployable Cell Tower
- FirstNet Cellular & wi-fi coverage
- Cellular range – up to 2 miles (updated)
- High Speed Satellite Internet
- Wi-fi range up to 1000'
- NEMA 4 compliant (weatherproof) self-HVAC
  - Operates -22° to 122°
- Single person rapid deployable < 7 / < 14 min
- ADA doorway capable, elevators
- Helicopter (sling-load) delivery capability
- Critical Response Tool w/ 60 hr runtime
- Trailer hitch deployable (large SUV, small truck)
- Surface wire grounding, lightning protection

on Display in parking lot

Indiana - Cell on Wheels (COW)

FIRSTNET™ Built with AT&T

verizon wireless

106TH INDY 500 MAY 29, 2022

PRESENTED BY GAINBRIDGE

Indiana - Cell on Wheels (COW)

Deployment – Cases

1 Cyber Attacks

2 Fiber Cuts

3 Other infrastructure down time.

Indiana - Cell on Wheels (COW)

Deployment Protocol

Wi-Fi Enhancement

LTE Band-14 Augment

Satellite Backhaul

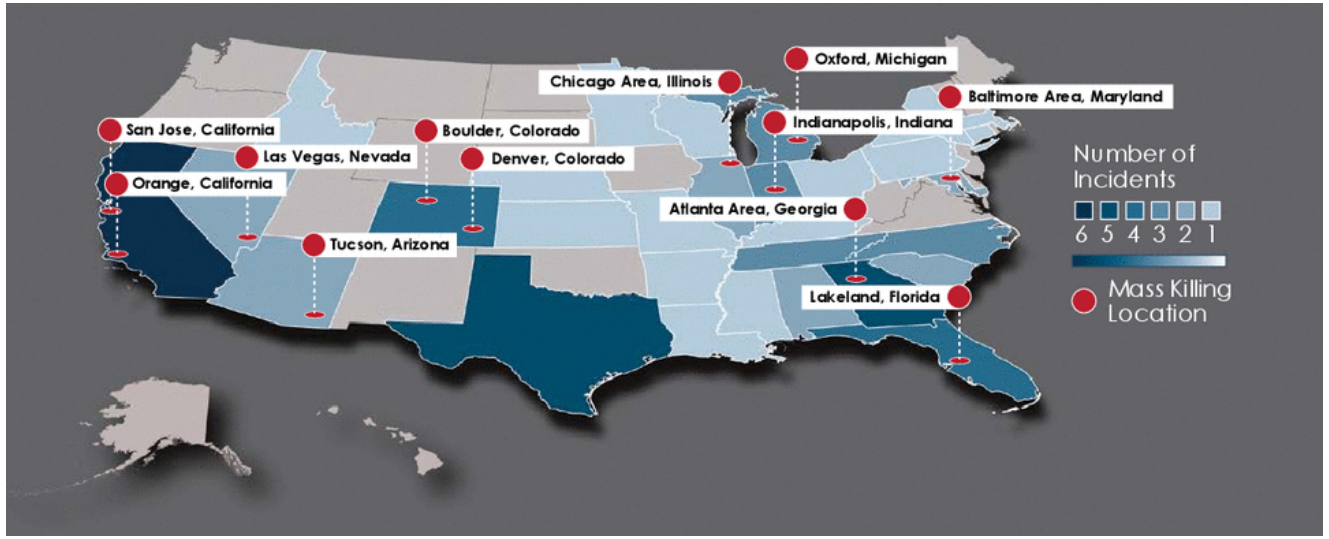
- To -

Tactical Comms. – Active Shooter

61 Shootings in 2021 designated as Active Shooter Incidents

FBI

Creating A Strategic Tactical Communications Plan



Tactical Comms. – Active Shooter

1st Due

POLICE
FIRE
EMS
EMA / DHS

Arriving

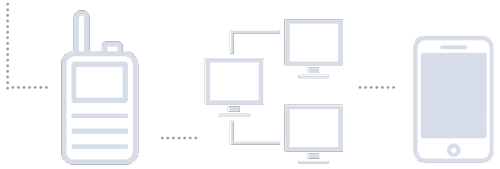
AIR EMS
SWAT +
Mass Casualty
INVESTIGATIONS

Requested

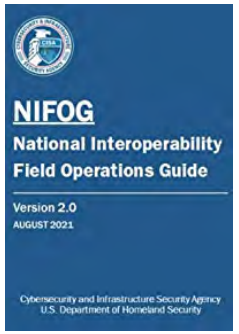
EMS Transport
STAGING
MOBILE CMD
REHAB

+ MA response

TALKGROUPS



Tactical Comms. – Active Shooter



INCIDENT RADIO COMMUNICATIONS PLAN (ICS 205)

1. Incident Name:	2. Date/Time Prepared:	3. Operational Period:
Tactical Template - Active Shooter	Date: 07/15/2022 Time: 1645	Date From: 07/15/2022 Date To: 07/16/2022 Time From: 0900 Time To: 0900

4. Basic Radio Channel Use:

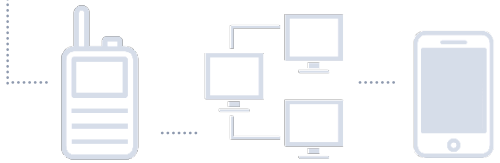
Zone Grp.	Ch. #	Function	Channel Name/Trunked Radio System Talkgroup	Assignment	RX Freq N or W	RX Tone/NAC	TX Freq N or W	Tx Tone/NAC	Mode A, D or M	Remarks
		DISPATCH	<local TG>	COMMAND	SAFE-T P25 Trunked System					COMMAND - PSAP
		TACTICAL	7 LAW 61 D	POLICE	On-File					Direct - Police
		TACTICAL	7 LAW 62 D	SWAT	On-File <dependent on Loc. Some SWAT stay on PD >					Direct - SWAT / EOD
		TACTICAL	7 FIRE 63 D	FIRE / EMS	On-File					Direct - FIRE & EMS
		TACTICAL	<local reg. MA>	STAGING	On-File					Staging Area Manager
		GROUND-to-AIR	<local reg. MA 4>	AIR MEDICAL	On-File					Landing Zone - AIR EMS
		TACTICAL	7 LAW 81 D	TRAFFIC	On-File					Direct - LE Traffic Control

Encryption permitted on most 7TAC Talkgroups

System Talkgroups (IC) vs. Non-recorded

** Non-Exclusive SAMPLE plan – dependent on area, policies & protocols currently in place*

IC – multiple radio monitor | IC area comms. w/ business or school comms



New Appearance for MIRS

To Learn more or request local meeting:

tyclements@ipsc.in.gov

Indiana Auxcomm Program

Disaster Communications Coordinator

- Hiring Process finalizing – position to be filled 1-2 weeks
  - Introduction & Contact to be shared (EMA, ARRL, ARES, RACES)
  - Working to attend local meetings, events
- Support Equipment added
  - SHARED RESOURCES (SHARES) [DHS/CISA] High Frequency (HF) Radio Program
    dhs.gov/shares
  - Tactical VHF Kits
  - Program rollout (position task book, credentialing + more)
  - Training Delivery – Indiana Auxcomm course, October

RESPONDER INPUT, FEEDBACK, SUGGESTIONS

Integrated Public Safety Commission