

NPSTC Meeting

Thursday, July 27, 2017

Call In: (510) 227-1018 | Conference ID: 192 7086

Webinar Access Information : <https://join.me/NPSTCsupport1>

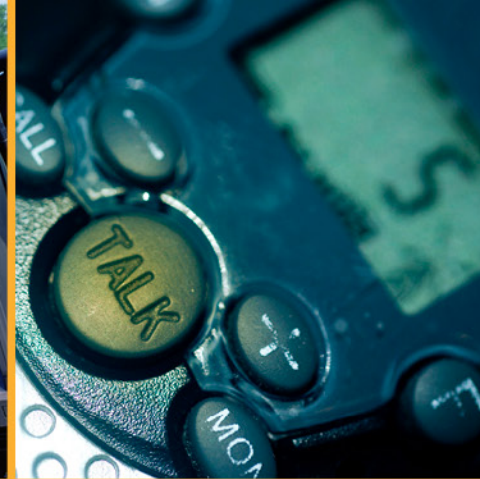
**Submit Questions Online
via support@npstc.org**

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Welcome and Opening



- Ralph Haller, NPSTC Chair
 - Call to Order
 - Roll Call via email
 - Send email to attend@npstc.org with NPSTC Meeting in subject line.
- Technical Tips
 - Webinar Access Information: <https://Join.Me/NPSTCsupport1>
 - Online participants submit questions to support@npstc.org
 - Do NOT use the Join.Me chat bubble. **Your messages will be displayed to everyone.**
 - Please mute your phone to minimize background noise. You may also press *6 to mute your line.
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Federal Partners Update

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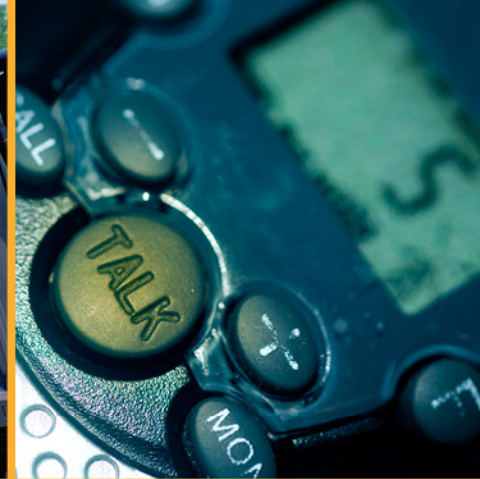
Department of Homeland Security (DHS), Office for Interoperability and Compatibility (OIC)

John Merrill, Director



Department of Homeland Security (DHS), Office of Emergency Communications (OEC)

**Dusty Rhoads, Chief of the Public Safety and National Security
Emergency Preparedness Communications Governance Branch**



Technology and Broadband Committee

Kim Coleman Madsen, Chair

Andy Thiessen, Vice Chair

Dr. Michael Britt, Vice Chair

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Public Safety Communications Research (PSCR)

**Dereck Orr,
Division Chief, NIST Public Safety Communications Research (PSCR) Division
Acting Director, NIST Communications Technology Lab (CTL)**



3rd Generation Partnership Project (3GPP) Standards

Andy Thiessen, Technology and Broadband Committee Vice Chair

3rd Generation Partnership Project (3GPP) Standards



- Release 14
 - Completed in June of this year.
- Release 15
 - Work in progress now
 - Main focus is 5G standardization
 - LMR LTE Interoperability Work Item approved
 - Technical Standard 23.283
- Release 16
 - Will start in 2018 to finalize 5G specifications
 - Public Safety work will continue in Release 16

3rd Generation Partnership Project (3GPP) Standards, *continued*



- LMR LTE Interoperability
 - 3GPP standardization will define what features and capabilities in Mission Critical Push to Talk are exposed for interconnection to LMR.
 - Work will be needed on the LMR side of the interconnection to allow this to work. TIA has established TR 8.8 to work on this from the P25 perspective.
- SA6 Working Group Update
 - Expansion of SA6 work was proposed to allow more visibility to commercial operators and may result in them commercializing some public safety services.



Public Safety Internet of Things (IoT) Working Group

Barry Fraser, Chair



Public Safety Internet of Things (IoT)



- Working Group Update
 - Examine current state of IoT.
 - Presentations planned through the end of 2017
 - Government and Industry discussions on IOT at the national and local level, at the public safety level and how commercial operators are implementing IOT networks.
 - January 2018 will begin an analysis of impacts to public safety and the development of reports.
 - Identify issues and concerns for action by the NPSTC Governing Board.
 - Advocate for best practices and technical requirements as appropriate.



Unmanned Aircraft Systems (UAS)/Robotics Working Group

Dr. Michael Britt , Chair

UAS and Robotics Working Group



- Working Group Update
 - Completed Report on “Guidelines for Creating a UAS Program”
 - Approved by the Governing Board on March 31, 2017
 - UAS Aerial Communications Platform
 - This report is currently in development.
 - Examining current public safety use of aerial platforms as well as commercial operator deployments.
 - Presentation received from AT&T’s UAS Program Director on their “Flying Cow” (Cell on Wings).
 - National Council on UAS
 - Governing Board decision in March to monitor this group
 - Discussion on appointment of NPSTC representative or continue to monitor in a liaison status.



Broadband Emerging Technologies Working Group

Kim Coleman Madsen, Chair

NPSTC is a federation of organizations whose mission is to improve public safety communications and interoperability through collaborative leadership.

Broadband Emerging Technologies Working Group



- Working Group Update
 - Presentations on broadband technologies of interest to public safety:
 - March: Broadband Deployable Systems
 - April: LTE Broadband Use at the Super Bowl
 - May: NG911 Program Update
 - June: Canadian PSBN Program Update
 - July: Presentation on FirstNet.com public access portal
 - August: FirstNet Applications ecosystem
 - September: Low Earth Orbiting Satellites (tentative)
 - High level of participation on the calls indicates that public safety is interested in these topics.



LMR LTE Integration and Interoperability Working Group

Chris Kindelspire, Chair

NPSTC is a federation of organizations whose mission is to improve public safety communications and interoperability through collaborative leadership.

LMR LTE Integration and Interoperability Working Group



- Three focus areas continue to be under review:
 - Validate existing 2012 NPSTC Mission Critical Voice requirements.
 - Examine additional features and capabilities needed for LMR/LTE interoperability.
 - Monitor 3GPP Standards Process regarding LMR/LTE Interworking.

LMR LTE Integration and Interoperability Working Group *continued*



- A matrix has been completed listing all public safety technical requirements.
 - These include requirements for Devices, Consoles and general network features.
 - Consensus was achieved on which requirements are mandatory “SHALL” vs. optional “SHOULD”.
- A draft report has been circulated to the working group for feedback and edits.
 - Targeting completion in the month of August.
 - Present to the Governing Board at the September meeting.

LMR LTE Integration and Interoperability Working Group *continued*



- Monitoring the roll out of FirstNet and announcements on LMR LTE integration services.
 - FirstNet has indicated that they want to insure a standards based open environment; allowing public safety to select among multiple vendors.
 - There is no 3GPP standard today for LMR LTE integration, so non standards approaches will likely be used.
 - Motorola is AT&T's partner and will be offering these services.
 - Public Safety needs to monitor this situation to insure that there is a robust ecosystem for applications and services.
 - Interoperability between Push To Talk voice applications is important.



Radio Programming and Compatibility Requirements (Radio PCR Working Group)

Dan Robinson, Chair

Radio PCR Working Group

- Conducting final review of PAM Tool Version 6.
 - Fully compliant with current version of NIFOG.
 - Some edits to table names for better clarity.
 - Additional information in the Instructions Tab.
- DHS S&T has coordinated a review of PAM Tool Version 6 to verify compliance with appropriate federal requirements in order to post on DHS web sites.
 - That review is in progress.
- Continuing to examine a State PAM Tool implementation that will include statewide I/O resources in the spreadsheet.
 - Michigan has volunteered to examine the feasibility of this.



Video Technology Advisory Group (VTAG)

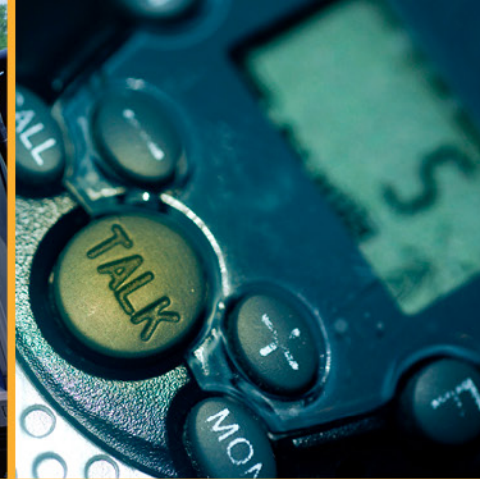
John Contestabile, Chair

NPSTC is a federation of organizations whose mission is to improve public safety communications and interoperability through collaborative leadership.

VTAG Working Group



- Meeting quarterly to assess video technology and analytics.
 - Provide input to the DHS S&T Video Quality in Public Safety (VQiPS) leadership team.
 - VQiPS recently created a charter and is actively updating membership.
 - DHS video handbook appendix to be under VTAG review shortly.
- Presentation received on emerging video and video analytics technology.
- Presentation received on NIST Video Analytics Task Group.
- Planning is ongoing for the annual VQiPS Workshop.
 - VTAG membership will be invited and participate in various panels.
 - Tentatively set for November in the greater NYC area.



FirstNet NPSBN Development

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FirstNet NPSBN Development

Kevin McGinnis, FirstNet Board Member



PSAC Update

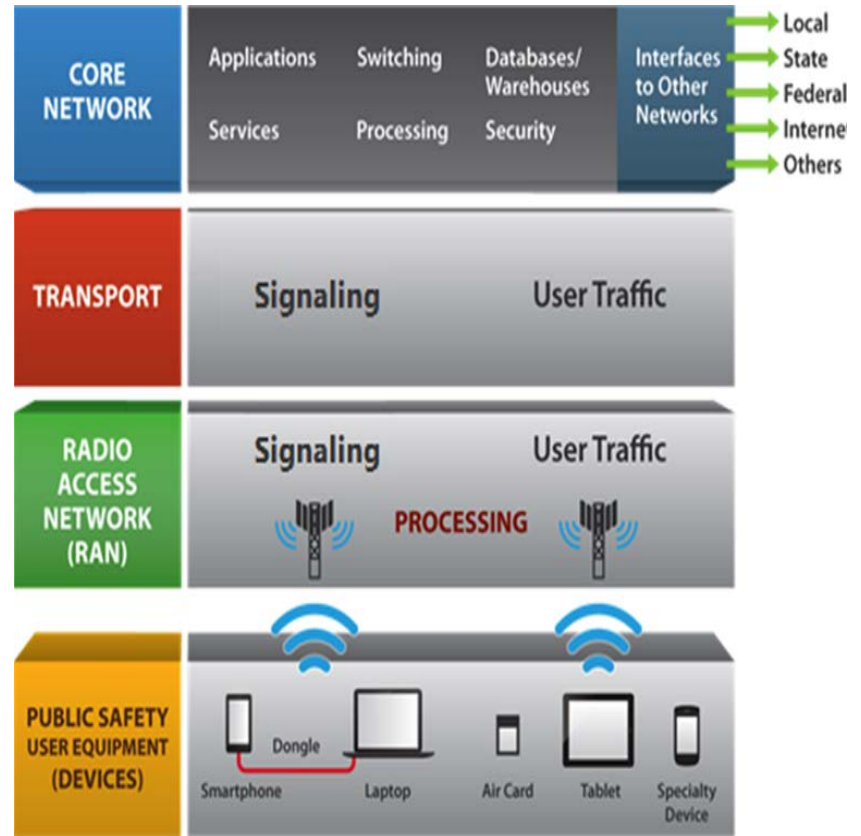
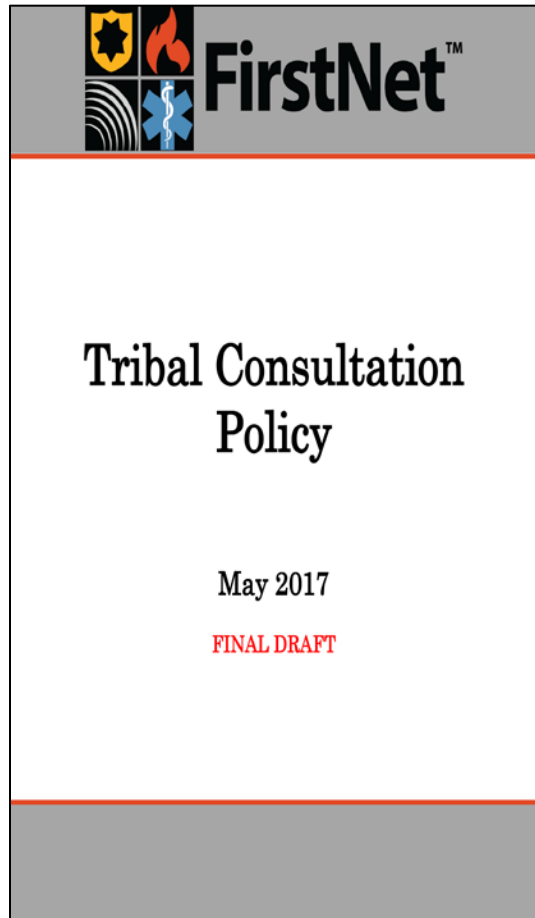
Tom Sorley, PSAC Chairman

July 27, 2017

For Official Use Only

Working Groups Update

Early Builder Template Used to Facilitate AT&T Discussions



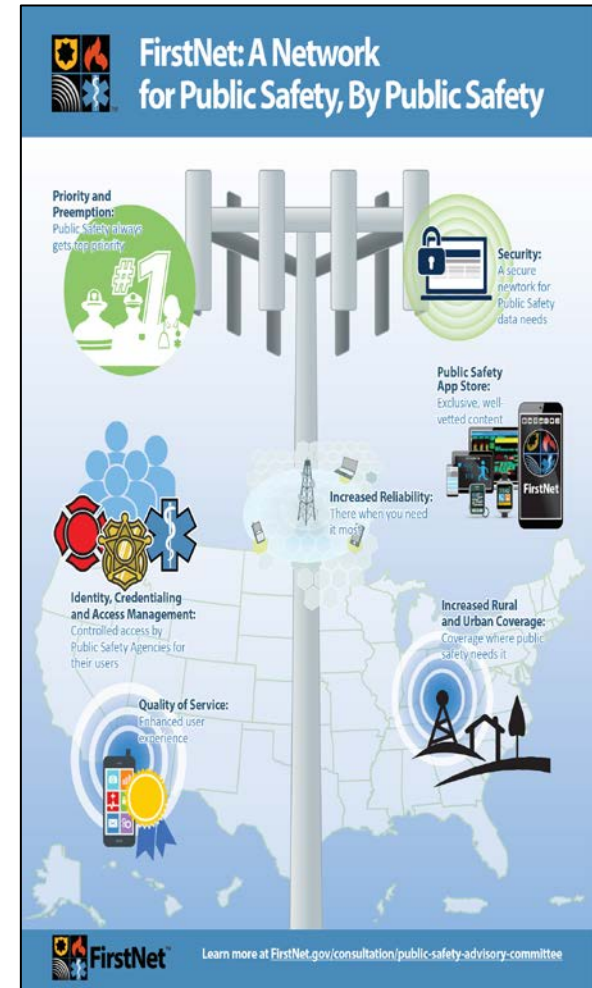
Moving to the FirstNet Network

Key differentiators of the FirstNet Network

- Priority and Preemption
- Quality of Service
- Security
- ICAM
- Public Safety Apps Store
- Increased Reliability
- Increased Rural and Urban Coverage

Checklist for Public Safety agencies

- Procurement
- Application usage policies
- Staffing requirements
- Training
- Etc.

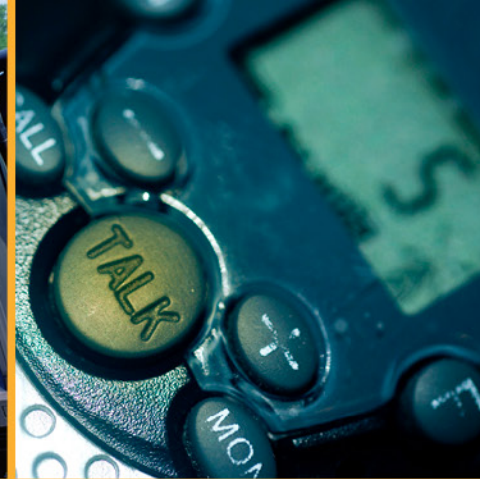


Next Work Items

- Previous Task Team Work Products
 - User Profiles
 - ICAM
 - Priority and Preemption
 - Local Control
 - Public Safety Grade
 - Preparing for Adoption

Meetings

- Tribal Working Group meeting – July 24th
- PSAC Webinar – Last week of September
- PSAC In-Person Meeting – 2nd week of December
(Location TBD)
- PSAC In-Person summer meeting – conjunction
with PSCR (San Diego)



Spectrum Management Committee

Don Root, Chair

Charlie Sasser, Vice Chair

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Committee Issue Update

Don Root, Spectrum Management Committee Chair

Spectrum Committee Update

- FCC is promoting sharing and flexibility to provide for more broadband licensed and unlicensed spectrum.
- Examples:
 - Use of dynamic spectrum sharing through a Spectrum Access System (SAS) in 3.5 GHz band
 - Grant of Higher Ground satellite license/waiver in 6 GHz microwave band
 - Potential Wi-Fi sharing under study in 5.9 GHz DSRC band
 - 4.9 GHz NPRM is rumored to contain questions on sharing
 - New draft Notice of Inquiry (NOI) on August FCC agenda re flexibility in spectrum between 3.7 GHz and 24 GHz.

Spectrum Committee Issue Update

- The Committee held two educational sessions to learn how SAS is designed and being tested at 3.5 GHz.
- NPSTC also obtained a trial membership in the Wireless Innovation Forum.
 - The Forum is the industry focal point for the design of dynamic spectrum sharing at 3.5 GHz.
 - The potential benefit of regular membership in the Forum is still being evaluated.
 - We anticipate providing a follow-up report at the September Governing Board meeting.



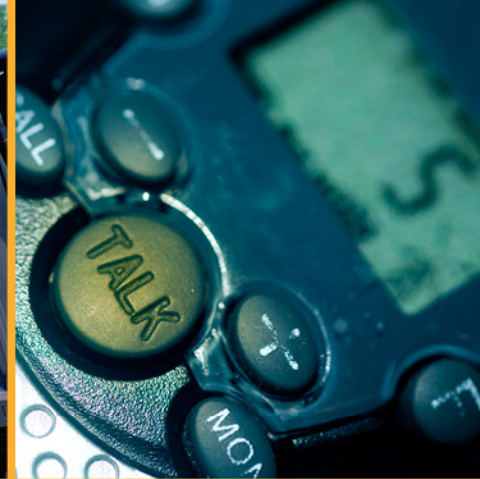
Federal Communications Commission (FCC) Filing

Charlie Sasser, Spectrum Management Committee Vice Chair

NPSTC Regulatory Filings 2017



Date Filed	Topic	Type of Filing
7/31/17	Blue Alerts	Comments (anticipated)
7/31/17	Arizona Pub Svc Co (Utility)	Comments (anticipated)
6/03/17	WRC-19/LMCC 460-470 MHz	Letter, FCC
5/24/17	Broadband Healthcare	Comments, FCC
5/01/17	700 MHz A-G Border	Comments, FCC
4/12/17	V2V Mandate & Standardization	Comments, DOT/NHTSA
3/24/17	Wilson/Cellular Boosters	Comments, FCC
3/06/17	Higher Ground	Comments, FCC
1/27/17	North Dakota on-VLAW 31	Comments, FCC
1/22/17	P25 Encryption Capabilities	Letter, DHS/OIC

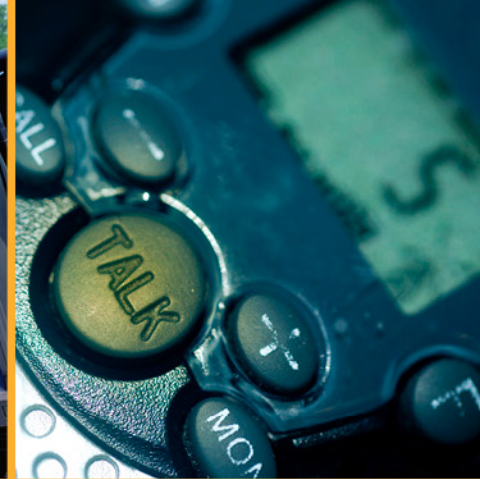


Federal Partners Update *(continued)*

Federal Communications Commission (FCC)

**Roberto Mussenden, Attorney – Advisor, Policy and Licensing
Division, Public Safety Homeland Security Bureau (PSHSB)**

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Interoperability Committee

John Lenihan, Chair
Jason Matthews, Vice Chair

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Interoperability Committee



- Committee Update
 - Ongoing monitoring of encryption issues with LMR systems.
 - Ongoing monitoring of non P25 digital LMR systems use.



Common Channel Naming

Don Root, Chair

Common Channel Naming

- Working Group Update
 - ANSI standard on Common Channel Naming was approved in January of this year.
 - Working with the National Guard to provide input on proposed name changes for all NG interop channels.
 - Examining use of “NG” prefix and assignment of a frequency band indicator.

Common Channel Naming

- New Work Item.
 - Request Governing Board approval to examine common talkgroup names for nationwide LTE interoperability talkgroups.
 - Mission Critical Push to Talk will include LTE talkgroups that will function in a similar fashion to LMR talkgroups.
 - FirstNet will enable nationwide interoperability allowing first responders to travel across the U.S. and still use their devices and applications.

Common Channel Naming

- New Work Item
 - There will need to be an equivalent to existing LMR nationwide I/O channels for mutual aid and hailing.
 - Example: LMR has 8CALL90, 8TAC91,92,93,94.
 - There will need to be an equivalent capability with MC-PTT
 - Issues to examine include:
 - How many LTE talkgroup names should be reserved for initial and ongoing operations as FirstNet expands?
 - How to coordinate flexible geographic coverage areas for these talkgroups?
 - Today, the LMR system footprint defines coverage of 8CALL90.
 - You don't want a nationwide LTE talkgroup to "light up" the entire U.S. You want it to provide a local/regional coverage footprint.

Common Channel Naming

- New Work Item
 - What naming sequence should be used for LTE talkgroups?
 - Is a band identifier necessary?
 - Should talkgroups be allocated only for Calling and Tactical assignments (allowing local flexibility) vs. more detailed assignments for LAW, FIRE, MED, GEN, Travel (found in 700 MHz narrowband channels).
 - It is recommended that a national framework be established quickly.
 - Local and state agencies will be using FirstNet Push to Talk services immediately (prior to availability of Mission Critical PTT).
 - Those agencies may start assigning LTE talkgroup names to support local, regional and statewide interoperability.
 - Need to establish a naming standard for nationwide talkgroups now to “reserve” those names.

Common Channel Naming

- Action Requested:
 - Governing Board approval to assign this project to the Common Channel Naming Working Group.



Emergency Medical Services

Paul Patrick, Chair

EMS Working Group



- Joint Working Group of NPSTC and NASEMSO
- Completed Report on Broadband Data Implications for Rural EMS
 - Approved by the Governing Board on May 17, 2017
- Paul Patrick, WG Chair, provided the keynote speech at the IEEE Connected Health Conference in Philadelphia.
- Received a presentation from the University of California Berkeley regarding research work on telemedicine and virtual display technology.
- Presentation scheduled for the University of Virginia to review their PSCR grant award on voice operated analytics for EMS.

EMS Working Group

- Currently developing an outreach report on Mobile Personal Emergency Response Systems.
 - These devices include GPS and automatic fall detection.
 - They are the first of many sensor alerting devices that will eventually use NG911 to send data to the PSAP.



Radio IO Best Practices Working Group

Mark Schroeder, Chair

Radio Interoperability Best Practices



- Best Practice Master Report and three Best Practice Statements were approved by the Governing Board on January 24, 2017.
- Two additional Best Practice documents have been approved by the Governing Board:
 - Best Practice #4 on Interoperability Relationships
 - Best Practice #5 on Infrastructure Management
- Best Practice #6 on Channel Assignments has been completed and is ready for approval.
 - This document was included in the GB Read A Head list
 - **ACTION REQUESTED:** Governing Board approval of Best Practice #6.



Cross Border Working Group

Steve Mallory, Chair

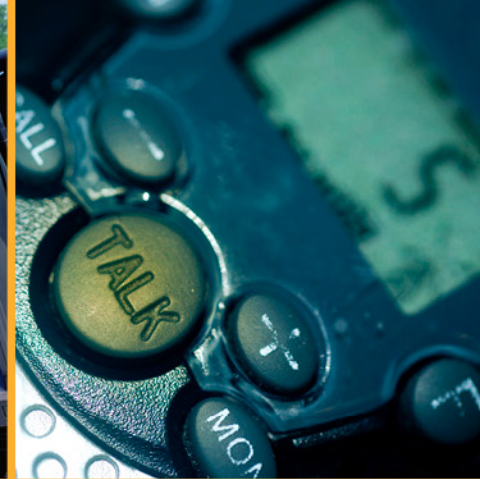
Cross Border Working Group



- Cross Border 911 Data Sharing Report
 - Provides guidance to PSAPs along the U.S. Canadian border on how to access customer account and location data that resides with a commercial carrier in the other country.
 - Also provides guidance for the management of calls which did not trigger a 911 call.
 - Draft report has been completed with assistance from public safety agencies and carriers in both the U.S. and Canada.
 - Governing Board approved distribution of the draft report to commercial carriers in the U.S. and Canada to obtain feedback.
 - Expecting completion of the report by the end of the year.

Cross Border Working Group *continued*

- Presented at the CANUS Communications Interoperability Working Group meeting in Buffalo, NY on June 21-22, with DHS OEC and Public Safety Canada.
 - Concern expressed about lack of access to nationwide interoperability channels near the Canadian border which are blocked due to use in Canada (above Line A).
 - Working with CITIG and some Canadian EMS providers to help advocate for inclusion of U.S. approved I/O channels in ambulance radios.
- Held a webinar with the FCC on Cross Border base station licensing and use of portable and mobile units.



Liaison Organization Update

Manfred Blaha, Organization Representative

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Testing Interoperable EU PPDR Broadband Communication Applications and Technology

<http://ec.europa.eu/research/participants/portal/desktop/en/opportunities/h2020/topics/sec-04-drs-2017.html>

NPSTC
2017-07-27



Manfred Blaha



PSCE – Public Communications Europe Forum President

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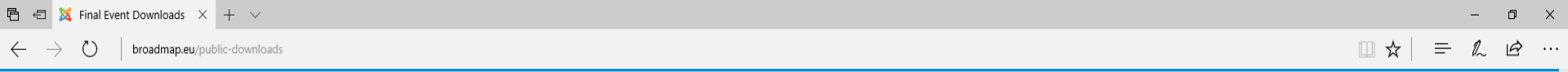
 www.facebook.com/PSCEForum

Ministry of the Interior, Austria

(Member of APCO, British APCO, EENA, TCCA)

(Chair of European „Public Safety Radiocomms. Group“)

<http://www.broadmap.eu/public-downloads>



Mapping Interoperable EU PPDR Broadband Communication Applications and Technology

Main Menu

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- [Workshop Timetable](#)
- [Partnership](#)
- [Stakeholders](#)
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- [Final Event Downloads](#)

More Activities

Please see the PSCE Europe Website
www.psc-europe.eu

Horizon 2020

This project has received funding from the European Union's Horizon 2020 research and innovation programme under grant agreement No 700380.



Final Stakeholder Event 6th April 2017 ▾

Category: Final Stakeholder Event 6th April 2017

Order Files by:

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Files:

[02 BroadMap Brief Introduction](#) **HOT** (0 votes)

[BroadMap Brief Introduction](#)

Presented by: David Lund

Public Safety Communication Europe Forum - PSCE

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[01 European Motivation for EU Interoperable BroadBand for PPDR](#) **HOT** (0 votes)

[European Motivation for EU Interoperable Broadband for PPDR](#)

Presented by: Christoph Castex

European Commission, DG Migration and Home Affairs

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[03 What are PCP and PPI ?](#) **HOT** (0 votes)

[What are PCP and PPI ?](#)

Presented by: Marie-Christine Bonnamour

Public Safety Communication Europe Forum - PSCE

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[04 French Roadmap to PPDR Broadband](#) **HOT** (0 votes)

[French Roadmap to PPDR Broadband](#)

Presented By: Gerard Carmona

Project News

BroadMap Final Stakeholders' Workshop: The start of a journey towards interoperable broadband radio communication systems for public safety and security

Mission accomplished for the EU-funded flagship project taking the first step towards future procurement of interoperable next generation of broadband radio communication systems for public safety and security!

[Read more ...](#)

The Success Story of BroadMap: First Step towards Interoperable Radio Communication Systems for Public Safety and Security in Europe

The EU flagship project BroadMap is coming to an end now. The one-year project, which started back in May 2016, has gathered Public Protection and Disaster Relief (PPDR) organisations from 15 European countries (Member States and associated countries) to work together to establish a common roadmap for future evolution of EU PPDR radio communications.

[Read more ...](#)

BroadMap Final Stakeholder Workshop - LAST CHANCE TO REGISTER

Future BroadBand for Europe - Final BroadMap Stakeholder Workshop - 6 April 2017, Brussels
80 participants confirmed so far to discuss the future of broadband in Europe!

[Read more ...](#)

New Policy Review Paper on Mission Critical Communication

We are pleased to announce the publication of a paper addressing the need to review EU policy regarding Mission Critical Telecommunications, taking into account requirements for public safety communications.

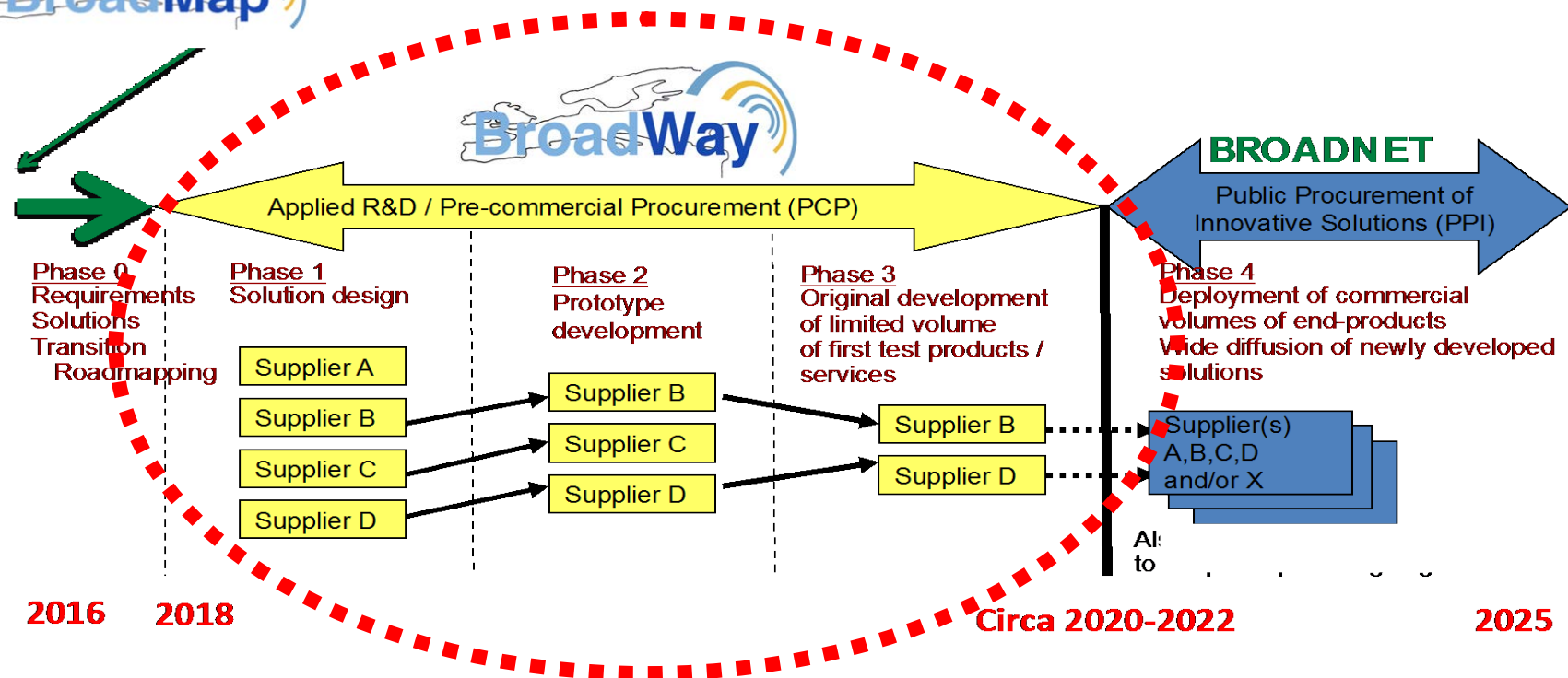
[Read more ...](#)

Connecting Europe Facility – EU invests in future broadband

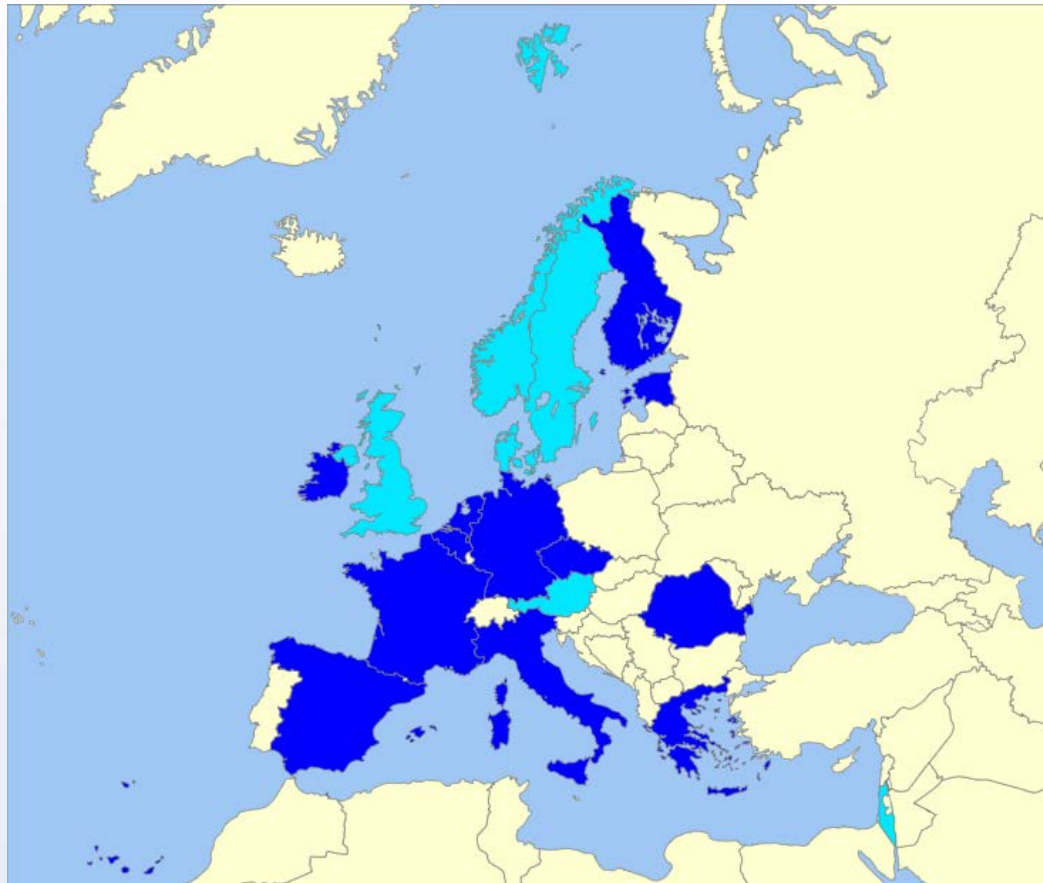
The availability of high-speed broadband Internet and access to



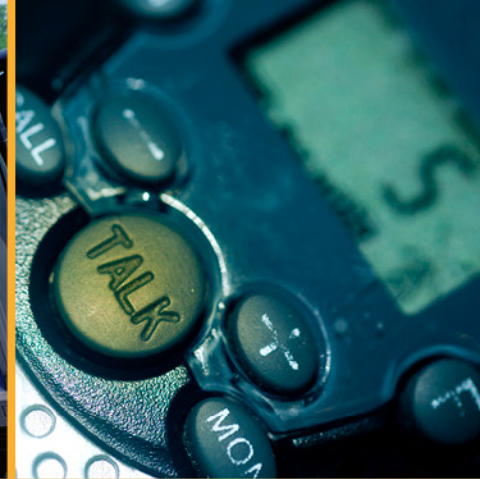
Purchasing Pilots for Cross-Organisational, Cross-Border (land/sea/flight) PPDR BB scenarios



Buyers and practitioners



Thank you for your support, we will keep you updated....



Save the Date | Adjourn

In Person Meeting | Wednesday, September 6, 2017 | OCTO in Washington, DC

Teleconference Meeting | January 16, 2018

In Person Meeting | March 9, 2018 | IWCE in Orlando, FL

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