ETSI ACTIVITIES ON DRONES
(UNMANNED AIRCRAFT SYSTEMS)

Presented by Michael Sharpe
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ETSI & CEPT: TOGETHER BUILDING A LARGE UNIFIED EUROPEAN MARKET
Individual National Administrations (48) commit to implement CEPT/ECC Decisions

European Standards transposed in (48) National Standards Organisations
LEGAL CERTAINTY IN THE EUROPEAN UNION

Radio Spectrum Decision

EC European Commission

ECC Electronic Communications Committee

THE REGULATORY ENVIRONMENT
How does it work?

Memorandum of Understanding


ETSI European Telecommunications Standards Institute

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ETSI PRODUCES

European Standards (EN)
• including Harmonised Standards under the Radio Equipment Directive (RED)

Technical Reports (TR)
• Including System Reference Documents

Also:
* ETSI Standards
* ETSI Guides
* Technical Specifications
* Group Reports & Specifications
* Special Reports

See CEPT 2017 Spectrum-management workshop
Amended EASA Regulation in its final stages of adoption.

Certified drones/UAS expected to be covered by the amended EASA Regulation

- Spectrum management in ITU, in liaison with ICAO
- Equipment standards in EuroCAE

Expected to modify RED to clarify that it covers non-certified drones/UAS.
OPTIONS FOR UAS/DRONES IN ETSI

- Use of Mobile Networks (MFCN) (see separate presentation)
- Non-MFCN-based solutions: need frequencies & standards for:
  - Command/Control,
  - Payload (where necessary)
  - Electronic Identification/Geofencing (where required by UAS category)
NON-MFCN-BASED SOLUTIONS FOR UAS/DRONES

- Identify technical characteristics (ETSI System Reference Document)
- Sharing studies in CEPT based on ETSI SRDoc lead to agreed sharing conditions
- Agreed sharing conditions form the basis of CEPT/ECC Decision (EC Decision if needed) & ETSI Harmonised Standard under RED

- ETSI TR 103 373 under development in TC ERM TG AERO
  - very few contributions from industry
  - little progress
  - activity being screened for closure
WHY SO LITTLE PROGRESS ON TR 103 373?

- No demand from industry?
  - Is the MFCN solution sufficient?

- Lack of awareness of the development of the SRDoc in TG AERO?
  - This workshop should help to address the issue

- Still uncertain over the application of RED and the prototype EASA Regulation?
  - Still under discussion in EP/Council, but appears stable

- Are harmonisation measures seen as beneficial, or “more rules”?
Enables innovative ideas to become a market success

Benefits for Supplier:
• bigger market; share development costs;
• increased probability of acceptance

Benefits for Purchaser:
• lever competition between multiple vendors;
• economy of scale; drive down costs

Benefits for Investor:
• Increased benefits; reduced risks
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