Anti-UAS Defense by Police and Security Agencies (AMBOS)

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Ethical and Legal Aspects

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Topics

I. New Risks and New Responses

II. Anti-UAS Defense and Fundamental Rights

III. Constitutional Requirements

IV. Legislative Response necessary
New Risks and New Responses

- New potential risks for civil security (Terrorist Attacks)
  - IS and other groups
  - September 2013 – Angela Merkel (Dresden)
  - April 2015 – Residence of PM Japan
  - January 2015 – US White House

- AMBOS – Anti-UAS defense system
  - Detection (radio, acoustic, electro-optics/infrared, radar)
  - Verification / Threat analysis
  - Intervention (Jamming, HPEM-Waves, net launcher)
Anti-UAS Defense and Fundamental Rights
Relevant Fundamental Rights in a Nutshell

Detection, Multi-sensor Data Fusion, Verification

- Right to informational self-determination/ Right to data protection / Privacy
- Freedom of assembly
- Freedom of telecommunications

Intervention

- Protection of life and limb
- Freedom of assembly
- Property
- Freedom of expression and information
- Professional freedom (telecommunications service providers)
Detection and Verification
1. Fundamental Right to Data Protection

- Freedom to choose which personal data to disclose and use
- Protection of unlimited collection, recording, storage and use of personal data by government
- **Any** data collection by government = **possible intrusion upon fundamental rights**
  - Radio-sensor
  - Acoustic-sensor / microphones
  - Electro-optic/-infrared-sensor - video-live-stream
  - Radar-sensor – if similar to video or photo
2. Freedom of Assembly

- Acoustical und visual data of participants

- Who has reason to be afraid that participation could be registered and assessed – could possibly adjust behavior or be discouraged to take part

- Police surveillance = potential intimidation
AMBOS = Intimidation?
Intervention
1. Life and Physical Integrity

- Crash of UAS caused by means of defense – **bodily harm** for bystanders

**Problems:**

- Government’s **duty to protect** human beings against illegal attacks vs. Government’s **duty not to harm** them while executing state powers
- Situation / threat cannot be fully assessed completely due to **lack of time**
- Uncertainty regarding real existence of a “danger” (in a legal sense)
- Stigma of false assessment by police
- Decision-making under **high time constraints** for police officers
2. Freedom of Expression and Information

**Jamming / HPEM-Waves**

- Interrupting use of mobile internet / Wi-Fi
- Possible damage to communication devices
- Length of interruption relevant from legal point of view
- Demarcation to Freedom of Assembly to be discussed
3. Property

- Damage to UAS owner (who also might be harmless or uninformed of problem or legal limitations)
- Damage to third party’s property
Constitutional Requirements on Anti-UAS defense by Police
Anti-UAS Defense by Police in Germany

- Any (technical) means of police is intrusion upon constitutional freedom
- Any such intrusion needs specific precise, clear statutory basis
- Any statutory provision has to adhere to principles of proportionality
- Any use of statutory provision by police also has to adhere to principles of proportionality
Anti-UAS-Defense and Principles of Police Law in Germany

- Detection needs to take place before “danger” (in a legal) sense is manifest / evident

- Technical surveillance has massive impact on constitutional freedoms, especially in field of freedom of assembly

- The more intense the intrusion upon constitutional freedoms – the ‘higher’ the legal threshold for police intervention is

- Negative effects on life and limb of bystanders are a major legal problem
Feel free to contact

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