

Update to DIAG

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UK matters:

ACE/20 and its subcommittees will meet late-May 2019.

- Membership continues to expand with recent members representing ATC's, South of England airport, ADS UAM, Legal practice etc. In discussion with other organisations including the Fire Service and Police.
 - A member of the DIAG would be welcome to attend and actively engage with ACE/20 to help to set future UK priority areas for standardization;
 - Each subcommittee still seeks to expand its membership and actively encourages those actively able to engage.
- Recent engagement with MoD who reiterated their commitment to using civilian developed standards unless there is a specific need for a NATO (STANAG) or DefStan.
- Brexit and standards. The latest update can be found using the hyperlink
 https://www.bsigroup.com/en-GB/about-bsi/uk-national-standards-body/standards-policy-on-the-uk-leaving-the-eu/

European matters:

- The European work continues to gather pace led by BNAE (France).
- A representative of Airbus D&S has been nominated and accepted as the new ASD-STAN Domain Technical Controller for ASD-STAN/D 5 Autonomous Vehicles.
- EUROCAE applied to become an Associated Body of CEN their second time recently. This was
 recently declined as ASD-STAN is the European Associated Body of CEN. A panel (of CEN BT
 Members incl. the UK) will meet with and look further into the request from EUROCAE. First
 meeting is in early April 2019.

International matters:

- EUROCAE and ASD-STAN have applied along with GUTMA to be liaison members of ISO/TC 20/SC 16.
- A liaison request from SAE International is expected.
- In June 2019, ACE/20 will host ISO/TC 20/SC 16 in London (Canary Wharf) to continue the development of the international work programme.



UK national committee structure and work programme:

1. ACE/20 UAS

- **a. Purpose:** To act as the management committee for UAS and identify potential future items of work.
- b. Scope: Under the direction of SPSC, ACE/20 is responsible for the development of national standards relating to unmanned aircraft systems (UAS) including, but not limited to, classification, design, manufacture, operation (including maintenance) and safety management of UAS operations. It is additionally responsible for co-ordinating the UK input into the European committee ASD/STAN/D5, and the international committee ISO/TC 20/SC 16. ACE/20 contributes to ACE/1 International and European Aerospace Policy and Processes.

2. ACE/20/1 UAS – General

Establishing this committee has temporarily been placed on hold

- a. Purpose: To mirror the work of ISO/TC 20/SC 16/WG 1
- **b. Scope:** ACE/20/1 is responsible for developing general requirements for UAS for civil applications in support of other standards created within ACE/20.

ACE/20/1 is also responsible for the input and mirroring of the activities of ISO/TC 20/SC 16/WG 1.

ACE/20/1 is responsible to the parent committee ACE/20.

c. Work Programme:

- i. ISO/DIS 21384-1 Unmanned aircraft systems -- Part 1: General specification
- ii. ISO/DIS 21384-4 Unmanned aircraft systems -- Part 1: Terms and definitions
- iii. ISO/DIS 21895 Categorization and classification of civil unmanned aircraft systems

3. ACE/20/2 UAS - Product manufacturing and maintenance

- a. Purpose: To mirror the work of ISO/TC 20/SC 16/WG 2 and ASD-STAN/D5/WG 8.
- b. Scope: ACE/20/2 is responsible for developing the quality and safety requirements for components of unmanned aircraft systems (UAS) to influence the design and manufacturing process the standards will include information regarding components associated with the unmanned aircraft, any associated remote control station(s), the command and control links, any other required data links (e.g. payload, traffic management information, vehicle identification) and any other system elements as may be required.

Future work may include technical specifications for the design and manufacturing of UAS components, where creating a standard will enhance UAS safety or interoperability.



ACE/20/2 is also responsible for the input and mirroring of the activities of ISO/TC 20/SC 16/WG 2 and ASD-STAN/D5/WG 8.

ACE/20/2 is responsible to the parent committee ACE/20.

c. Work Programme:

- i. ISO/CD 21384-2 Unmanned aircraft systems -- Part 2: Product systems
- ii. Harmonised standard on product and verification requirements for Unmanned Aircraft Systems intended for use in the Open category*
- iii. Harmonised standard on direct remote identification requirements for Unmanned Aircraft Systems*
- iv. Harmonised standard on geo-awareness requirements for Unmanned Aircraft Systems intended for use in the Open category*
- v. Harmonised standard on lighting requirements for Unmanned Aircraft intended for use in the Open category*

d. Published/Soon to be published

i. BS 9129 Unmanned aircraft systems (UAS) - Registration and identification

e. Proposed Panel: Counter Drone - Product manufacturing and maintenance

Proposed Scope: Responsible to ACE/20/2 is responsible for developing the standards programme counter drone activities relating to manufacturing and maintenance procedures.

4. ACE/20/3 UAS - Operations and procedures

- a. Purpose: To mirror the work of ISO/TC 20/SC 16/WG 3
- **b. Scope:** ACE/20/3 is responsible for developing the requirements for safe commercial UA operations and applies to all types, categories, classes, sizes and modes of operation of UA.

ACE/20/3 is also responsible for the input and mirroring of the activities of ISO/TC 20/SC 16/WG 3.

ACE/20/3 is responsible to the parent committee ACE/20.

c. Work Programme:

- i. ISO/DIS 21384-3 Unmanned aircraft systems -- Part 3: Operational procedures
- ii. ISO/AWI 23665 Unmanned aircraft systems -- Training for personnel involved in UAS operations

^{*}Expected to be developed by ASD-STAN/D 5/WG 8.



d. Published/Soon to be published

- i. BS 9122:2018 Qualification and approval of UAS operatives. UAS Pilot Level 1
- e. Proposed Panel: ACE/20/3/1 Counter Drone Operations and Procedures

Proposed Scope: Responsible to ACE/20/3 is responsible for developing the standards programme counter drone activities relating to operations and procedures.

5. ACE/20/4 UAS Traffic Management

- a. Purpose: To mirror the work of ISO/TC 20/SC 16/WG 4
- **b. Proposed scope:** ACE/20/4 is responsible for input and mirroring activities of ISO/TC 20/SC 16/WG 4. ACE/20/4 is also responsible for developing national standards and guidelines in the area of Unmanned Aircraft Systems Traffic Management to support national regulations provided by CAA.

ACE/20/4 is responsible to the parent committee ACE/20.

c. Work Programme:

- i. ISO/AWI TR 23629-1 UAS Traffic Management (UTM) -- Part 1: General requirements for UTM -- Survey results on UTM
- ii. ISO/AWI 23629-7 UAS Traffic Management (UTM) -- Part 7: UTM data and information transfer at interface of traffic management integration system and UAS service suppliers -- Data model related to spatial data for UAS and UTM