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Dear members and friends of EUROCAE,

In 2016 the General Assembly decided to change the financial structure of the organisation. 2017 was the year when we implemented it and had to show the promised improvements, benefits and efficiency gains - and I hope you agree on this - that we delivered them accordingly. This was ensured thanks to a tremendous effort by the entire organisation, the clear direction and strategy given by the Council, and facilitated by the additional revenues generated by the new membership fee structure.

In early spring we have successfully completed the move from Malakoff to Saint-Denis. Our premises being within 1/2 hour reach from Charles de Gaulle Airport and 10 minutes from Gare du Nord, make the new location optimally suited for Working Group meetings as well as very attractive for our experts. This is one of the initiatives we have undertaken in an effort to maximise the experts' time and ensure they can dedicate the effective time and energy for hands-on activities.

Many Working Groups have already taken advantage of the new and modern facilities EUROCAE is now offering, and we are looking forward that you, our members, are making best use of these modern premises. We are happy to provide you with 3 conference rooms and one large communications area for breakout sessions. Also, our offices are fully equipped with state of the art audio and video equipment, accommodating remote participation, if needed and to maximize efficiency of the Working Group meetings.

EUROCAE has reviewed and partly redesigned its internal processes to gain additional efficiency and to ensure a more effective day to day management of the organisation supported by an electronic automation tool. The new and now revamped Workspace provides the interactive and reliable platform to support the Working Group activities and to respond timely to the demands from your experts that are using it.

This year has proven once again that EUROCAE standards are in high demand from the industry, regulators and our international partners. Whereas the EUROCAE staff and resources have received a boost with the introduction of the new financial structure, the Business Plan for 2017-2018 shows the equilibrium is yet fragile. EUROCAE has to respond to the emerging and increased demand for activities while maintaining the high quality of our documents and services.

As an additional proof of the increased demand for standards, we are discussing the upscaling of activities in our portfolio, whether as new Working Groups or by adding a series of new activities to existing ones. These are record-high parallel activities we're engaged in, which are expected to increase further – always in line with the membership calls and requirements.

The fast developments in the UAS area translates into a priority on our side too, with a successful kick-off of the WG-105, which is already active in six focus areas, further detailed in an impressive portfolio of proposed deliverables. EUROCAE has also launched the European Unmanned Aircraft System Standardisation Coordination Group – EUSCG – under the umbrella of the European Commission and EASA. Under EUSCG, Standard Developing Organisations (SDOs) and regulators together develop, monitor and maintain the Rolling Development Plan (RDP) for UAS related activities.

The EUSCG will facilitate the sharing of work among the Regulators and SDOs thus avoiding the risk of overlapping developments and gaps; at the same time monitoring all relevant processes, resources availabilities and other related risks and issues in order to provide a forum to manage specific aspects and the resolution of conflicts. Another key function is to advise the EC, EASA and other organisations on standardisation matters. The EUSCG is a joint coordination and advisory group established to coordinate the UAS-related standardisation activities across Europe, essentially stemming from the EU regulations and EASA rulemaking initiatives.

This year's edition of the EUROCAE Symposium gathered a record-audience in London for two days of intense presentations and exchanges. Representatives from EASA, European Commission, ICAO, SJU, SDM, FAA, RTCA, EUROCONTROL, UK CAA and many other prominent industry leaders have participated in and benefited from top discussions ranging from Performance Based Regulations and General Aviation (GA), and Unmanned Aircraft Systems (UAS) to Performance Based Navigation (PBN), Datalink and Service Wide Information Management (SWIM).

EUROCAE also has refined the communication tools, be it the Broadcast, the NEWSblog, or the Annual Report. All these help us reinforce our brand, which is now truly recognised and appreciated by our members and partners. They support the delivery of our messages beyond the boundaries of our organisation, and enable us to broadly acknowledge the achievements of you - our experts, developing highest quality standards for aviation.

Despite these many changes and sometimes even higher costs for membership, members value the resulting benefits and activities and we see another major year of membership growth for the organisation.

In 2018, EUROCAE will further increase its role in aviation standardisation at the global level by increasing the visibility of our organisation as a recognised international standardisation body participating and proactively contributing to various international events. In particular, one of our priorities for next year is the participation to the ICAO standardisation roundtable and the increased contribution in support of ICAO provisions.

With this, please accept my expression of gratitude to you once again for supporting us in this time of change for EUROCAE, through contributing and participating actively in our standard developing activities, but also in the development of the organisation itself to prepare today for the demands of tomorrow.

I encourage you to visit us in Saint-Denis and to make best use of these facilities at your convenience. We are always happy to meet our members in person.

With best regards,

Christian Schleifer-Heingärtner
Secretary General

WG-31

Lightning

EUROCAE Working Group 31 met for the 100th time in Erlangen (Germany) in SIEMENS premises, offering a unique opportunity to get some insights in the future of aircraft electrical or hybrid propulsion.

WG-31 is focused at developing standards and guidance documents which are the reference framework to both industry and authorities for developing efficient compliance approaches for lightning protection of aircraft, including fuel tank and systems protection.

WG-31 is now split into 5 subgroups enabling strengthened collaboration with SAE AE2. Variety of the subjects addressed in the group was decisive to boost attendance in the last years. An average of about 30 members meets every 4 months for plenary sessions.

One subgroup is focused at revising a corner stone document which is the ED-91. It provides guidance to establish the zones the most likely to be struck for each type of air vehicle. Based on a large worldwide survey gathering in service events, significant changes have been introduced for helicopters, winglet equipped wing tips, and wings. This document fully harmonised with the SAE ARP5414 will go into public consultation in February 2018.

On a more scientific topic, the WG-31 is paving the way to new method for detecting ignition sources into fuel tank joints when performing a lightning test. With the engagement of labs in Europe (DGA TA - France, LCEO - Spain, Cobham - UK), a fully quantitative method based on light brightness measure is being validated and standardised in relation with US labs, Japanese labs and SAE AE2. This will be the basis for updating ED-105 specifying test methods for lightning.

Other documents being on the way are the guidance material for fuel tank compliance demonstration (2019), the release of the ED-158 Certification of A/C to the indirect effects of lightning (Q2 2018) and revision of the ED-14 Section 22 for equipment test (2019).

Finally, new topics recognised essential by industry and authorities will be launched soon: Simulation in support of compliance approach, Bridging civil / military qualification methods.

WG-100
Remote and Virtual Towers

Visual tracking is one of the most promising assistance functions in a remote tower environment, particularly in a more complex traffic environment or for a future 'multiple' set up, when the controller operates more than one airport simultaneously.

It helps the operator to maintain his/her situation awareness.

For the time being the group is working on an update of the ED-240 'MASPS for Remote Tower Optical Systems' regarding a 'visual tracking' and an automatic 'PTZ following' functionality.

This update ED-240A is planned to be published in 2018.

Since ED-240A, in a first step, bases on optical sensors only, the group already anticipates the need to broaden the scope in order to address also additional sensors and to provide another MASPS update to comprehend a data fusion of optical - and radar sensors.

Such an update to ED-240A is planned as a subsequent step and could be expected by the end of 2019.

WG-101

Runway Overrun Awareness and Alerting Systems (ROAAS)

Tackling the most frequent category of accident, runway excursions

In January 2013, the European Action Plan for Prevention of Runway Excursions (EAPPRE) was released with the intent to enhance runway safety by advocating the implementation of recommendations. Several of these recommendations were aimed at the development and implementation of new technologies aimed at reducing the risk of runway overruns through flight crew alerting systems. Known generically as Runway Overrun Awareness and Alerting Systems (ROAAS), the following recommendations were given in the EAPPRE:

Recommendations in the EAPPRE for technologies reducing runway overrun risk:

Ref No.	RECOMMENDATION	OWNER
3.7.11	Develop rulemaking for the approval of on-board real-time crew alerting systems that make energy based assessments of predicted stopping distance versus landing distance available, and mandate the installation of such systems.	EASA
3.5.3	On-board real time performance monitoring and alerting systems that will assist the flight crew with the land/go-around decision and warn when more deceleration force is needed should be made widely available.	Aircraft Manu-facturers
3.4.4	The aircraft operator should consider equipping their aircraft fleet with technical solutions to prevent runway excursions.	Aircraft Operator

Despite some systems already existing on the market, there was no industry standard related to how to design, develop, test and certify these new technologies. In order to bridge that gap, at the EASA initiative, EUROCAE created a working group aimed at creating a Minimum Operational Performance Specification (MOPS) for ROAAS.

In September 2015, WG-101 was formed with the ambitious target of creating the MOPS in 18 months. There was wide industry participation from the aircraft manufacturers, equipment manufacturers, pilot groups, and regulators.

THE BEGINNING

In the beginning, progress was slow. The first question we had to tackle was, "what is a ROAAS?" and more importantly "what isn't a ROAAS?". One of the issues was that there were already several systems either already certified or currently in development, each with their own definition of what functionality a ROAAS should or shouldn't have. It took a lot of work and discussion to break down the minimum functionality a ROAAS should have in order to be effective in its design intent -- reducing the risk of runway overrun. The group decided it was essential that ROAAS:

▶ provide timely, warning level aural and visual alerts to the flight crew when there is a risk of runway overrun

▶ have, as a minimum, two modes: an In-Air mode that alerts the flight crew of overrun risk before touchdown and an On-ground mode that alerts the flight crew of overrun risk while rolling on the runway

▶ that the runway overrun risk should be based on a model of the aircraft's capability to stop and compared to the runway length remaining

DOCUMENT TAKING SHAPE

With these core functionalities defined, the group set out writing the sets of requirements necessary to ensure that ROAAS performed its intended function. The work was often broken up into sub-groups, with members working on requirements for the runway database, the system performance and the aircraft performance model.

In addition to writing the requirements, it was important to develop guidance material that would help the ROAAS manufacturer in demonstrating and verifying that the ROAAS met the requirements. In particular, extensive guidelines were written on how to demonstrate the ROAAS predicted stopping distance was representative of the actual aircraft's capability. The difficulty is that if the ROAAS model distance is too short, by the time the system triggered alerts it may be too late for the pilot to react and stop the aircraft before the runway-end. If the ROAAS model distance is too long, then the system may trigger too often with too much over-conservatism and be considered a nuisance alert by the flight crew.

ED-250 DRAFT RELEASE

In July 2017, 22 months after the first meeting, WG-101 released ED-250 for public consultation. Over the next 6 weeks comments were received from across the industry. One of the most important parts of public consultation was ensuring the consistency of the overall document. After 22 months working on the document, the contents may seem clear to the group members, but would someone outside of the group be able to easily understand and follow the rational and reasoning behind the requirements.

The group last met in September 2017 in Paris for comment resolution. The quality of the comments received from industry was essential in permitting the group to make several refinements to the document to ensure clear understanding of the requirements and demonstration.

Once the comment resolution is finished, the final document will be reviewed once more by the group members and then submitted to the TAC for document approval.

CONCLUSION

ED-250 represents a major step forward for runway safety. Created by the industry, for the industry, it establishes a true baseline with which future ROAAS manufacturers can use to ease the development and design. It is expected that this will result in more ROAAS being available on the market and encourage adoption of these technologies by aircraft operators.

Note: arming and disarming of modes during transition phase is design dependent
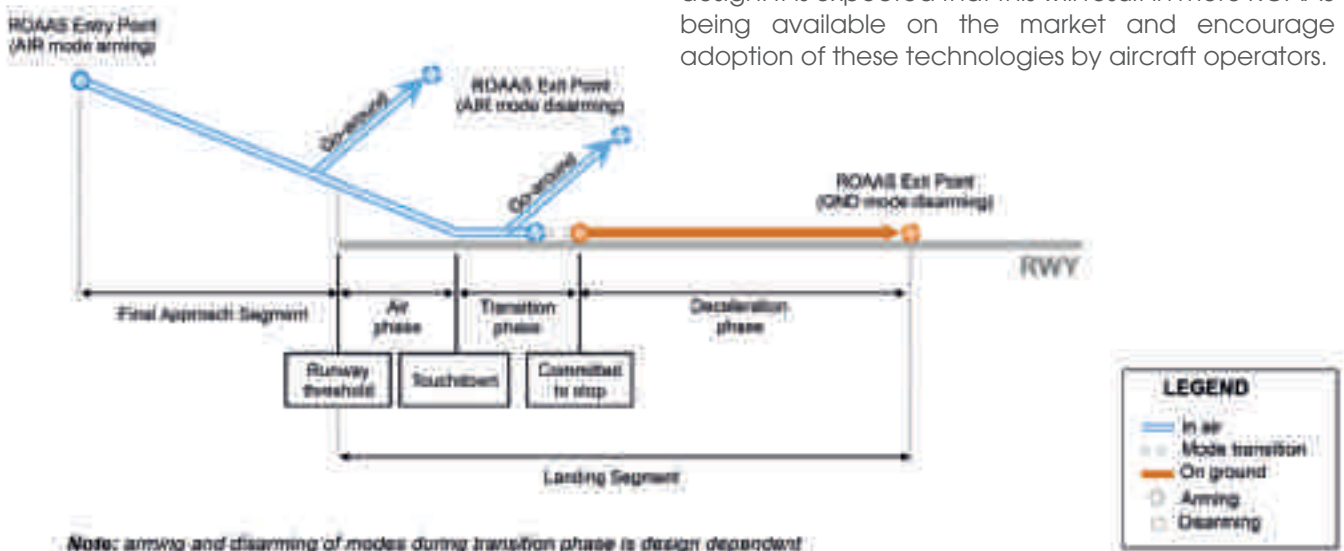
WG-105
Unmanned Aircraft Systems

Working Group 105 has been created by merging the former WG-73 and WG-93. The task of WG-105 is to develop the necessary standards to allow the safe integration of all types of UAS into all types of airspace under all conditions and for each type of operation – quite a challenging task.

The spectrum of standards covered by WG-105 is wide, just as wide as the range of aircraft used in unmanned aviation. To organise this work, WG-105 has created a structure of multiple **Focus Areas** that cover a specific aspect of standardisation. The following six Focus Areas have been identified:

▶ Focus Area 1: Detect and Avoid
▶ Focus Area 2: Command, Control, Communication (C3), Spectrum and Security
▶ Focus Area 3: UAS Traffic Management
▶ Focus Area 4: Design & Airworthiness
▶ Focus Area 5: Enhanced RPAS Automation
▶ Focus Area 6: Specific Operations Rick Assessment

In each of these areas specific standards will be developed as required to create an overall performance scheme that allows reaching the goal of WG-105: safe integration of UAS into the airspace.

To ensure that all actors in the various focus areas follow an harmonised approach, their activities are coordinated by a Steering Committee that consists of the Chairpersons of Working Group 105, its Secretary and the Leaders/Deputy Leaders of each focus teams.

While each of the focus teams is working according to an extensive work programme that is defined in the Terms of Reference (ToR) for WG-105, this article shall look at specific activities a little closer:

▶ UAS Traffic Management and
▶ Remote Pilot Station (RPS) Standardisation

UAS Traffic Management (UTM) shall put in place a set of rules, regulations and operational principles to manage the safe and seamless integration of UAS in particular in the open and specific category (as defined in the EASA NPA 2017-05) into the airspace. The scope of this activity is the standardisation of UTM services in accordance with the applicable safety and security requirements.

This activity is in line with the U-space concept, proposed by SESAR JU for the Air Traffic Management Master Plan (ATM MP) Addendum. Standards to be developed by EUROCAE will provide a Means of Compliance (MoC) to implement the respective U-Space rules.

At the moment two functions have been identified as the main enablers for the execution of operations: E-Identification and Geo-Fencing. These two functions provide the means to know who is flying where and prevent security issues by entering airspace in which a specific aircraft is not allowed to fly in. Two activities are just being launched within the UTM Focus Area to develop standards defining the minimum requirements that have to be fulfilled for a properly functioning U-Space concept. As such they directly support the first increment of U-Space "U1 - U-Space Foundation Services".

E-Identification describes the capability to identify a flying Unmanned Aircraft (UA) without direct physical access. The scope of the EUROCAE activity in this domain covers the development of the following documents:

‣ MASPS (Minimum Aviation Systems Performance Standard) on Electronic Identification – Target Date: 11/2018

‣ MOPS (Minimum Operational Performance Specification) on Electronic Identification – Target Date: 06/2019

The difference between these two types of documents lies in their scope. The MASPS take a system oriented approach and describes the performance of the overall system and the allocation to its individual components at a high level. The MOPS takes a closer look at those individual components and describes their performance requirements to a much greater detail.

The second activity to be covered within the UTM Focus Area is Geo-Fencing, which provides the Remote Pilot (RP) with information related to the UA position and its airspace environment, and limits the access of the UA to certain areas. This capability is not only relevant for the safe conduct of UAS flight operations but also supports the protection of other airspace users and facilitates the activities of law enforcement organisations. The following deliverables are foreseen in the WG-105 ToR to be developed:

‣ MASPS (Minimum Aviation Systems Performance Standard) on Geo-fencing – Target Date: 11/2018

‣ MOPS (Minimum Operational Performance Specification) on Geo-fencing – Target Date: 06/2019

Both activities are scheduled to be **kicked off on 27 November 2017**. It is still possible to join the activities. Should you be interested in participating, please contact the Technical Programme Manager responsible for the WG-105 activities, Alexander Engel, at alexander.engel@eurocae.net.

The **Remote Pilot Station (RPS)** is a crucial element of an Unmanned Aircraft System when it comes to the safe integration of UAS operations into the airspace. RPS provides the RP with information on the position of the aircraft, its configuration and its flight performance. In addition it provides the link with Air Traffic Control (ATC), one of the basic requirements for operations in non-segregated airspace (meaning manned and unmanned aviation sharing the same airspace). Within the WG-105 Focus Area of "Design & Airworthiness" an activity has been created to develop the required standards for the RPS to achieve this Air Traffic Integration (ATI). In line with the approved ToR for WG-105, this activity will provide the:

‣ Minimum Aviation Systems Performance Specification for Remote Pilot Stations supporting IFR operations into non-segregated airspace with a target date of 06/2019.

Participation in this activity is as well still possible. Should you be interested in participating, please contact the Technical Programme Manager responsible for the WG-105 activities, Alexander Engel, at alexander.engel@eurocae.net

New Working Group: WG-107
RNP Reversion based on DME/DME

On 07 July 2017 the EUROCAE Council has approved the creation of a new Working Group WG-107 to develop standards to enable the RNP (Required Navigation Performance) Reversion based on DME/DME (Distance Measuring Equipment) positioning.

Currently, GPS is the enabling infrastructure for all PBN navigation applications, both RNAV (Area Navigation) and RNP, the latter including On-Board Performance Monitoring and Alerting (OPMA). The 12th ICAO Air Navigation Conference recognised the continued need for terrestrial-based reversion capabilities to guard against the risks associated with GNSS outages.

It calls for the assessment of new system capabilities termed "Alternative Positioning, Navigation and Timing (A-PNT)", and recognises the role of current terrestrial aids as the only available set of near term solutions.
Generally speaking, DME/DME is considered to only support RNAV applications. This leads to the perception that in case of loss of RNP capabilities based on GPS, reversion to a lower performing navigation capability and associated mitigation measures become necessary.

SESAR (Single European Sky ATM Research) has investigated the operational impact of GPS outages in light of currently available DME/DME capability in Europe, both airborne and terrestrial. SESAR also formulated a concept of an equivalent, ground-based concept to OPMA, aimed at providing a fully equivalent capability for at least RNP1 navigation applications based on DME/DME.

The objective of the newly created EUROCAE WG-107, supported by the continued associated effort in SESAR, is to provide a formally documented concept and means of compliance to allow DME/DME positioning capabilities to support RNP1 navigation applications.

In the US, some aircraft / avionics have been certified RNP-capable based on DME/DME. This is done based on FAA AC20-138 and the associated "reasonableness checks". Detailed means of compliance or test procedures are not publicly available.

While European manufactured avionics are likely to be compliant to the AC20-138 requirements as well, this has generally not been demonstrated or certified. As a consequence, some European ANSPs (Air Navigation Service Providers) feel that specific mitigation measures are needed to cater to GPS outages when implementing RNP1 navigation applications. These applications are essential to a number of airspace improvements, and many of the envisioned mitigation measures such as a conventional navigation aids-based reversionary route network are not considered to be feasible, at least in Europe's high density airspaces. Similarly, as some GPS outages in the European region (especially near areas of conflict) have been shown to be intermittent but lasting several months, capacity restrictions could be cumbersome and economically unacceptable.

Fundamentally, GPS requires OPMA primarily because GPS satellites will not necessarily shut down their signals in a timely manner when not meeting some aviation-specific performance requirements. Conversely, DME transponders implement executive monitors that do cause radiation to cease, however, the performance of these monitor capabilities has not been expressed or quantified in a way that is directly compatible with GNSS-based PBN.

An analysis conducted by EUROCONTROL, Airbus and other partners (SESAR 15.3.2 D12) has concluded that RNP1 performance can be ensured based on DME/DME, provided that the ground transponder can be relied on for part of the integrity budget. Without such reliance, the on-board reasonableness checks cannot detect all identified possible faults.

Fortunately, current equipment readily meets this integrity requirement despite not being specified in Annex 10. This is a consequence of two past developments. First, it is related to the Precise DME (DME/P) developments triggered by MLS some decades ago. Second, since DME has been introduced as a replacement for ILS Marker Beacons, ILS-requirements have been added to terminal (low power) DME/N, and the associated core modules have been generally kept the same by the manufacturers also for the high power en-route DME/N. This can be seen in the DME transponder specification of the FAA (FAA-E-2996), which includes requirements in reliability, integrity and continuity. Consequently, the effort at the EUROCAE-level would also include a harmonisation effort with FAA-E-2996.

In order to provide a clearly documented means for ANSPs to offer an RNP reversion mode based on DME/DME positioning, WG-107 is tasked to write a MASPS (Minimum Aviation Systems Performance Standard) that explains the overall concept, and describes the various system elements and allocations to both the ground and the airborne segment. The MASPS is envisioned to be a standalone document, while ensuring consistence with ED-75D (MASPS: Required Navigation Performance for Area Navigation). For the airborne functions, the concept is to define an acceptable means of compliance to RNP navigation specifications, in line with current aircraft performance.

Thus aircraft manufacturers remain free to apply either the documented concept or claim equivalent performance. This would specifically ensure that current DME-based RNP approvals (for example some Boeing aircraft approved by the FAA) would remain valid.

For the ground functions, WG-107 shall improve or upgrade ED-57 (Minimum Performance Specification for Distance Measuring Equipment (DME/N and DME/P) (Ground Equipment)) to take credit for current equipment performance. This could then lead to two different performance levels for DME/N transponders, where one level remains aligned with the DME/N only requirements of Annex 10, and another which incorporates the integrity performance requirements for DME/P but applies them to DME/N in a way that is similar to FAA-E-2996. The SESAR analysis concluded that to achieve "RNP equivalent" performance, the on-board monitoring functions would benefit greatly from a shared integrity burden for certain faults which are well catered for by current ground segment capabilities.

The Kick-Off meeting for WG-107 is scheduled for 13 and 14 November 2017 at the EUROCAE offices at Saint Denis. Participation in the activity is still possible. If you are interested contact the responsible Technical Programme Manager Alexander Engel: alexander.engel@eurocae.net

EUSCG

European UAS Standards Coordination Group (EUSCG)

Unmanned Aircraft Systems (UAS) is the most rapidly emerging and developing aviation sector which includes very large aircraft which resemble in size and complexity manned aircraft, but also very small consumer electronics products. All of these categories could be used in the same air space as Commercial Air Transportation, General Aviation and Aerial Work. Therefore, it is very important to ensure a harmonised approach to seek integration of UAS both at regulatory and operational levels in the existing aviation framework.

Standardisation is one of the processes that allows this harmonised approach to be implemented. Currently there are multiple organisations active in developing such standards at different levels.

This increases the risk of gaps and overlaps in the various standardisation activities. Considering the successful example of the EASCG which coordinates the standardisation activities in the area of ATM, it was decided to put in place a similar arrangement in the area of UAS – the European UAS Standards Coordination Group (EUSCG).

It had its Kick-Off Meeting on the 1st of June 2017 at the EUROCAE offices in Saint Denis, France.

19 experts from the European regulators (European Commission and EASA), Standard Developing Organisations (SDOs) and UAS manufacturer and operation representation met to discuss the Terms of Reference of the Coordination group with the goal to define a way to streamline standards developing activities in Europe.

The EUSCG is a joint coordination and advisory group established to coordinate the UAS-related standardisation activities across Europe, essentially stemming from the EU regulations and EASA rulemaking initiatives. The EUSCG provides a link to bridge the European activities to those at international level.

The EUSCG work ensures a better coordination and monitoring of the relevant activities affecting standardisation:

▸ rulemaking activities under EASA responsibility,

▸ update to ATM Master Plan by including UAS provisions,

▸ standardisation activities executed by the relevant standardisation bodies, including a significant part of the EUROCAE work programme.

The main deliverable of the EUSCG is the European UAS Standardisation Rolling Development Plan (RDP) which will be progressively updated to reflect the current situation. It will also provide a method for the identification and discussion of overlaps and gaps, and as a basis for feedback to contributing organisations, to improve overall coordination of standards development.

The preliminary structure and content of the RDP was approved during the 2nd EUSCG meeting on 6 September 2017. It is expected to approve the first version of the RDP during the 3rd Meeting of the EUSCG which will be hosted by the European Commission on 17th November 2017 in Brussels, Belgium.

More information on the EUSCG and the latest version of European UAS Standardisation Rolling Development Plan will soon be available on a dedicated website, very similar to the European ATM Standards Coordination Group EASCG.

Collaborating to conquer

Guenter Martis, Europe Region Director, Civil Air Navigation Services Organisation (CANSO), reflects on how CANSO Members are helping EUROCAE to shape European aviation's digital future.

Digitisation continues to transform the aviation industry, changing fundamentally how air traffic management, airlines and airports all operate.

Indeed, the potential to bring the ATM industry to higher levels of automation, accelerate the implementation of new technology, reduce fragmentation, reduce cost of ownership of systems and improve the overall air transport system performance have all been key drivers towards enhanced digitisation.

But as pace of change accelerates, so too must the standards that govern safe and efficient operations. Each link within the aviation value chain has a part to play in ensuring the secure digital integration.

As part of its 'Digital Transport Days', the European Union is calling for the aviation industry to address the challenges of digitisation in air transport. As the global voice of air traffic management, CANSO recognises the importance of standardisation in ensuring the digital integration of ATM services and aircraft systems. Standardisation ensures the interoperability of communication protocols and formats used in the transmission, storage and processing of data.

CANSO Members represent 85 percent of global air traffic and are proactive in developing and implementing industry standards and best practice worldwide. They actively contribute to the development and validation of standards by participating in working groups that generate industry standards (EUROCAE, RTCA, ETSI/ CEN-CENELEC, and EUROCONTROL) and collaborating with national

standards bodies on the harmonisation between national requirements and European and International Standards bodies. In addition, they have an important part to play in the validation of standards within an operational environment and verification that the standards have been utilised appropriately to provide compliance with the legislative and regulatory requirements.

CANSO has also continuously monitored the development of standards through its participation in the Technical Subgroup of the Industry Consultation Body (ICB TSG) and more recently in the European ATM Standards Coordination Group (EASCG).

To help address the growing need for standards with the transition to performance-based regulation; increasing interoperability between ATM systems; and the deployment of the Single European Sky ATM research (SESAR) initiative and the ATM Master Plan, CANSO joined EUROCAE in June 2017[1].

On 10 October 2017, CANSO also signed a Memorandum of Understanding with EUROCAE on to solidify this cooperation.
This partnership strengthens the individual contributions of CANSO Member organisations to EUROCAE and ensures effective coordination on the development

Credits: Deutsche Flugsicherung

[1] https://www.canso.org/canso-and-eurocae-commit-jointly-develop-standards-air-traffic-management-issues-including

IAOPA

In April this year at the AERO in Friedrichshafen, IAOPA and EUROCAE, Michael Erb, Craig Spence and Christian Schleifer agreed on a two-year programme to work on a strategy to involve the General Aviation community in the standard development process.

and implementation of aviation industry standards – the essential enablers in achieving an efficient, connected and sustainable aviation industry.

In practice, CANSO will provide the experience and expertise of ANSPs in the development and revision of standards and will help to identify effective and efficient solutions that can be widely and consistently applied. A key area of focus will be the safe integration of unmanned aircraft systems (UAS) in all types of airspace and cyber-security.

This new partnership is thus an important step forward for both organisations and a significant leap for the development of a modern ATM structure and an effective digital air transport network that will ensure a safe, seamless and efficient aviation in Europe. Such collaboration and cooperation within the industry is vital to ensuring a strong future for aviation in the region, and an important lesson for the aviation community worldwide.

For more information about CANSO and the ATM industry's role in transforming global ATM, please visit www.canso.org.

In the meantime, these words were filled with actions on both sides. Just lately, on 30 September 2017 Christian Schleifer-Heingärtner, EUROCAE Secretary General, was invited to present EUROCAE, its current work programme and the standard developing process at the 137th IAOPA European Regional Meeting hosted by AOPA-Spain in Madrid.

The presentation triggered a very interesting and lively discussion among the participants, which has shown that there is a clear need to raise the voice of IAOPA in several areas where EUROCAE is developing standards to complement the regulatory frame.

As a result of this IAOPA regional meeting, Christian Schleifer-Heingärtner and the IAOPA leadership team committed to strengthen the cooperation between EUROCAE and IAOPA supported by a Memorandum of Understanding (MoU).

This MoU is currently under development, making sure that EUROCAE supports IAOPA in making best use of the limited resources available and supports IAOPA in keeping a close communication line for an efficient selection process. This MoU will pave the way for the next steps to take, welcoming IAOPA as a member and IAOPA experts joining EUROCAE working group activities and developing standards.

Both organisations are optimistic on the outcomes of the collaboration and are looking forward uniting their resources for the benefit of aviation community.

IFATCA - The International Federation of Air Traffic Controllers' Associations

The International Federation of Air Traffic Controllers' Associations - IFATCA for short - was founded in 1961 by 12 European associations of Air Traffic Controllers: Austria, France, Luxembourg, Belgium, Germany (F.R.), Netherlands, Denmark, Iceland, Norway, Finland, Ireland and Switzerland.

Among its principal objectives are promotion of safety, efficiency, and regularity in international air navigation; encouraging and upholding a high standard of knowledge and professional efficiency among air traffic controllers; and striving for a worldwide Federation of Air Traffic Controllers' Associations. It's important to realise that IFATCA is independent and non-political. IFATCA is also not a union: its focus is on the professional aspects of the air traffic controller profession.

Over the years, the Federation's membership has grown to around 130 members associations from countries across the globe. As such, it represents more than 50,000 air traffic controllers world-wide. It has established a permanent office in Montreal, Canada, which gives it proximity to ICAO and our sister Federation representing airline pilots - IFALPA. Much of IFATCA's effort is focused on monitoring and contributing to ICAO's work. Operational and technical expertise is made available serving the interest of the overall aviation safety. At the same time, the Federation maintains strong links to regional bodies, such as EUROCONTROL, EASA and the European Commission.

An important aspect of the Federation is that it is largely based on voluntary effort, from mostly active air traffic controllers. This provides a unique and valuable perspective during the development of new procedures, systems and facilities. The member associations of the Federation discuss and adopt policies developed by two of its standing committees: a Technical and Operations Committee (TOC) and the Professional and Legal Committee (PLC). Each Standing Committee consists of between 6–10 representatives from member associations (MAs). The creation or revision of policy is of particular importance as it is IFATCA policy that MAs will refer to when addressing subjects at home within their own professional/technical/industrial areas. MAs can also register differences with such policy if they can't or won't comply (either willingly or not).

Representatives use these policies at ICAO, EUROCONTROL, IFALPA and other major aviation forums when issues affecting Air Traffic Control are discussed. Since its inception IFATCA has contributed to various high-level reference documents on topics such as the future of Air traffic Management, The evolution of the profession of Air traffic controller, fatigue management and training for example.

Another important aspect of the Federation is the exchange of information on professional problems and developments among our member associations. The changing nature of present Air Traffic Management (ATM) systems involves many facets ranging from the status of the Air Traffic Services (ATS) providers to the reduction of separation standards to the shortage of air traffic controllers. IFATCA considers that the best way to address the challenges, aviation and in particular ATM faces, is by cooperation among all the actors involved. Such cooperation requires pragmatism and compromise by all involved, which IFATCA strives to achieve at all levels.

Modernisation of the EUROCAE IT infrastructure

From the website and continuing with the e-shop and the Workspace, EUROCAE has reshaped the image of the organisation and of the capabilities to provide swift and effective access to wealth of our resources.

The new website is bringing a lively image of EUROCAE and the many activities our organisation is undertaking and the international engagement we are leading.

The e-shop is now bringing at your fingertips all documents and services EUROCAE offers, for a fast and hassle-free experience.


Finally, the new Workspace provides an interactive and secure platform for the Working Groups to conduct their activities and exchange information. Based on Microsoft Sharepoint, the Workspace is easily accessible from anywhere, anytime. To have the best experience using the EUROCAE portal, we encourage you to use a Microsoft account to sign in. Another practical advantage of having this system is that you can choose your own username and password. We are finalising the transition from the old to the new Workspace, so you should expect that all the Working Groups to be available on this new and modern platform as of early 2018.

At the same time, we would like to ensure you continue to be informed and to have full access to all the relevant Working Group activities, including the upcoming meetings and the ongoing project documents. For this, if you have not yet registered, we encourage you to do so before the end of December 2017 at https://register.eurocae.net/.

Our Saint-Denis headquarters: much more than just a space
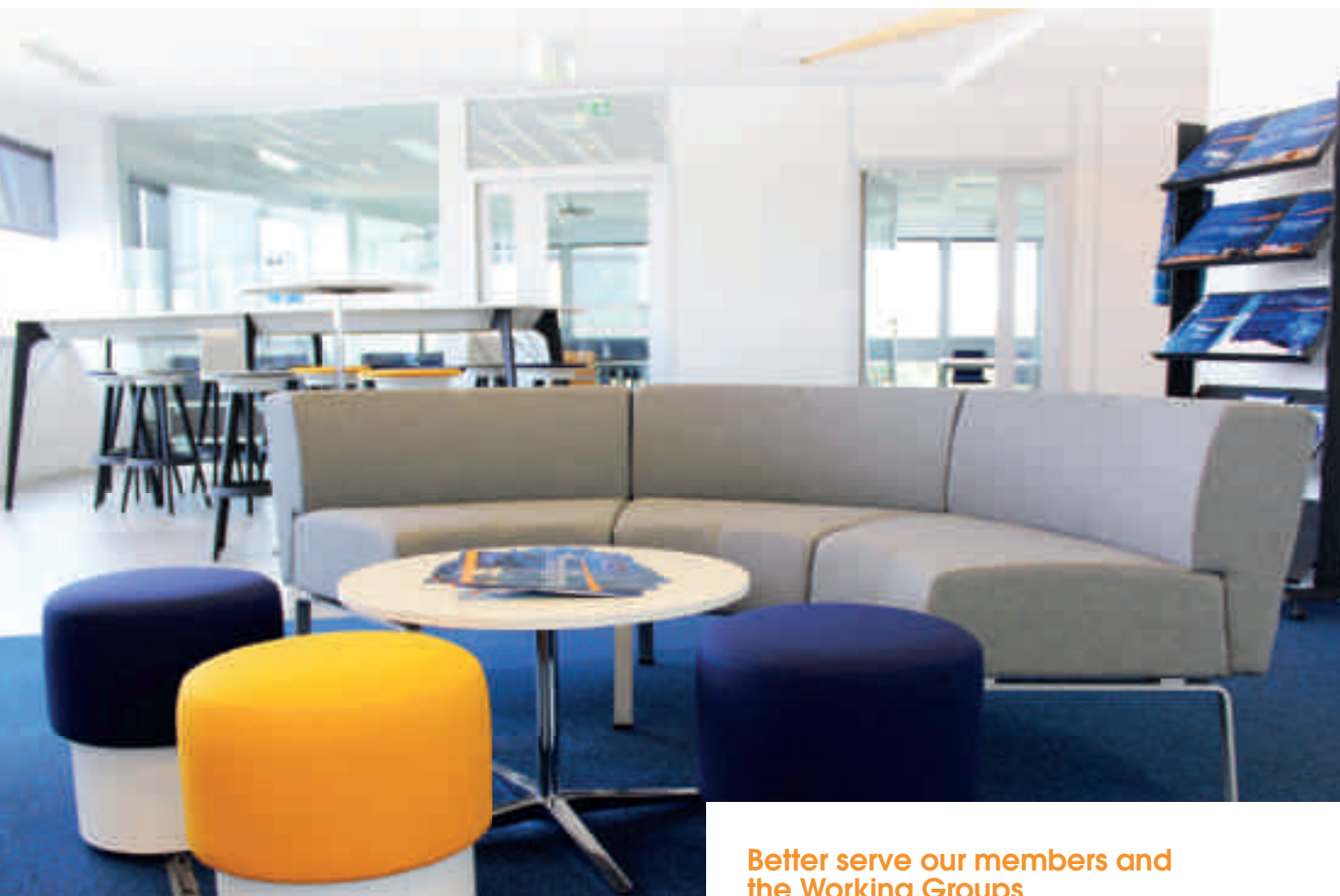
Better serve our members and the Working Groups

EUROCAE is happy to offer top new headquarters for the use of Working Group meetings in a conducive and state-of-the-art environment.

Located at a convenient distance from Charles de Gaulle airport and close to the centre of Paris, these new EUROCAE premises have been designed to offer friendly and efficient facilities for meetings through a spatial environment made for teamwork.

All Working Groups members have a priority access to our **expansive meeting rooms** with secure high speed internet and audio conference facilities.

The new space features **three fully equipped meeting rooms** and an open area that could be easily used for break-our sessions.

Moreover, meeting rooms 1 and 2 can be configured to host up to 50 participants, whereas meeting room 3 is ideal for up to 20 people.

All along your meeting, a staff member is available at the **reception desk** to provide information and will be happy to assist you in any way.

A **Business corner** providing a quiet desk to read, print and communicate is also available.

A **kitchen** equipped with tea and coffee machines as well easy cooking facilities will make lunch breaks smooth, in a relaxing atmosphere while fostering inter-active team spirit or brainstorming.

Beside the Business corner, if you are looking for a place to relax or to fo-cus, away from the busy activity, you can enjoy our **Wing chairs**. It is an ide-al place to facilitate meetings that require concentration, focused work or recreation. There you can share your thoughts or rest your mind.

Parking spots are available upon a first-come, first-served basis.

We encourage you to make best use of these facilities. Booking any of these rooms is quick and easy: you could do so with a simple email to the Technical Programme Manager responsible for the WG or the EUROCAE Secretariat (eurocae@eurocae.net).

Latest publications

EUROCAE Documents (ED) are developed by Working Groups bringing together renowned experts in their area, and following a well-established process. They are often developed jointly with our international partners and recognised worldwide for their high quality and as state of the art technical specifications.

These EDs can be system or equipment performance specifications, safety and performance requirements, interoperability requirements, technical specifications or guidance material. Some documents are dedicated to the airborne side, others to the ground side (mainly CNS and ATM), while others cover common air and ground requirements.

EDs are widely referenced as a means of compliance to regulatory documents by EASA, EUROCONTROL, the European Commission and ICAO.

Recent publications:

▸ **ED-238** - Operational Services and Environment Definition (OSED) for Traffic Awareness and Collision Avoidance in Class A, B and C Airspace under Instrument Flight Rules

▸ **ED-137/1C** - Interoperability Standards for VoIP ATM Components - Volume 1: Radio

▸ **ED-147A** - ATM Validation Platforms Interoperability Specification

▸ **ED-245** - MASPS for Installation of Fuel Cell Systems on Large Civil Aircraft

▸ **ED-242** - MASPS for AMS(R)S Data and Voice Communications Supporting Required Communications Performance (RCP) and Required Surveillance Performance (RSP)

▸ **ED-243** - Minimum Operational Performance Standards for Avionics Supporting Next Generation Satellite Systems (NGSS)

▸ **ED-246** - Process Specification for Wireless On-board Avionics Networks

You can find all the EUROCAE publications at: www.eurocae.net