

Question	Answer	Answer's author
Can we get the questionnaire (by Peter van Blyenburgh) questions to have a look into it "the template"?	to be answered during Q&A	Damiano Taurino
I would consider openness, continuous improvement, and useful analytics a big enabler for long term acceptance & benefits. Your first response reads like the scope and task of AW-Drones is set in stone though, so no public integration of feedback loop from practical experience?	<p>Feedback is very much appreciated, and it is planned to integrate a feedback loop for the portal for registered users (this is still to come). In the meantime, you may contact us directly to provide feedback and we will incorporate this for sure.</p> <p>Also, we iterate the data we have on ourselves as explained to be up to date with ongoing processes. We have recommended which standards could be considered AMC by EASA. EASA is working on that and it is indeed expected to publish as AMC the standards on which the Agency would concur with the assessment. This will spread the application and several Authorities and stakeholders are expected to apply. Their concrete experience would then be passed to EASA which could amend the list as necessary</p>	Sebastian Cain, Filippo Tomasello
(not a Q itself) @attendant asking for GNSS standards: EUROCAE WG-105 SG-62 is developing GNSS Guidelines for UAS with the aim of being eventually accepted by EASA as AMC/GM for fulfilling OSO#13 objectives.	Yes. we are curious to see the outcome of SG/62 which we are monitoring. But current mandate is to develop "guidelines" and not MOPS. I.e. not a standard	Filippo Tomasello
When one asks EASA whether third parties need to be approved by authorities, the answer that Qualified Entities or Recognized Entities are accepted. Third parties not having any recognition would not qualify when SORA requires a third party. This was also stated in previous AW Drone presentations (Fillippo): Is EASA online to comment or anyone else?	To be answered during Q&A	Marco Ducci

<p>did you run into objections from manned aviation that didn't want to install flarm or another system?</p>	<p>Very rarely, most of the people in the manned aviation put safety above 'not being seen all the time'. Not only in relation to unmanned aviation, but also in relation to other manned aviation (as uncontrolled airspace is becoming more rare and as such more uncontrolled traffic in a smaller area)</p> <p>Yes, and of course, we listen with the greatest possible attention. AW-Drones will not recommend any mandatory carriage. This could be responsibility of DG-MOVE based on advice from EASA. Aw-Drones only assesses the available standards. It is not supposed to express opinions on airspace regulation.</p> <p>To be answered during Q&amp;A</p>	<p>Hans Schrauwen, Filippo Tomasello, Marco Ducci, Damiano Taurino</p>
<p>Does the portal allow to understand relationships between standards (similarities or superpositions i.e. standards that encompass others) or do you have this in mind for the future?</p>	<p>We are only assessing standards similarities when they are assessed against a given requirement, and this is reported in the portal.</p> <p>Yes. Each standard is assessed in terms of "coverage" of a specific OSO in SORA. In some cases, the coverage is different (e.g. "partial" versus "full"). In other cases, there indeed standards superimposed, because somehow the SDOs compete among them. In this case applicant, if national authority agrees, may use one or the other standard</p>	<p>Marco Ducci, Filippo Tomasello</p>
<p>Has EASA indicated a timeline, when they will publish their official list of standards?</p>	<p>The initial list should be published at the beginning of next year.</p> <p>No. But you may already use any standard recommended by AW-Drones for specific operations if your national CAA agrees.</p>	<p>Marco Ducci, Filippo Tomasello, Damiano Taurino</p>

	To be answered during Q&A	
Where can we see the market sectors and flight missions?	to be answered during Q&A	Damiano Taurino
we will assess the needs for e conspicuity measures during the development of the AMC/GM - internally we have the relevant experts who can contribute to this discussion - we will of course aim for harmonisation, as far as possible, throughout EU - Ken (EASA)	Thanks Ken. AW Drones already listed few standards for that which may be useful at the level of AMC	Filippo Tomasello
tracking service was removed - Ken (EASA)	Noted. But it is still in ISO 23629-12	Filippo Tomasello
For the CIS USSP a modified ASTERIX, similar with the military AWCIES, could be taken into account?	to be answered during Q&A	Damiano Taurino
Inequality may be also generated by different interpretations of SORA by CAs	Indeed. But through EASA standardisation inspections, progressively the interpretations will converge	Filippo Tomasello
What happens to the Portal after the end of the AW-Drones project? Dead after the standard three years?	The portal will stay online for some years after the project, the way in will be presented afterwards will be further discussed with the Commission in order to stay available.  Definitely not our plan. We are actively looking for new funding and/or a sustainable business case to keep it alive for decades. ;-)  To be answered during Q&A	Hans Schrauwen, Damiano Taurino, Marco Ducci
We have recently been clearly told by HEMS that they don't consider FLARM as reliable enough as a measure for reliable (full) electronic conspicuity (for a variety of reasons). So, while the idea is attractive, another certifiable means, on dedicated spectrum) seems preferable.	One alternative is to equip HEMS with a transmitter based on EN 4709-002. If this gadget has a SWAP compatible with a small drone, it would also be compatible with a larger helicopter	Filippo Tomasello
Can manned aviation declare themselves unmanned (with a pilot on board) and use and rely on U-Space services?	If we follow CORUS and the ISO UTM definition, even manned aviation, when properly equipped, may access certain geographical areas where U-	Filippo Tomasello, Damiano Taurino

	<p>Space services would be provided = no need to declare to be unmanned.</p> <p>to be answered during Q&amp;A</p>	
<p>With regard to the applicability to CORUS X Y Za Zu in national airspace, do we expect class G (with elec conspicuity for GA) only in the short term? how does the U-space regulation will ease the deployment elsewhere (airports, cities)</p>	<p>Most probably, in the short term, States may implement the new classes proposed by CORUS, based on Art. 15 2019/947 and considering them "restricted" areas. Later, EASA has plans to amend the Standard European Rules of the Air (SERA; 923/2012) and the types proposed by CORUS may emerge there at Eu level.</p>	<p>Filippo Tomasello</p>
<p>Does the portal allow searching of SDOs WGs already involved and proposing new SDOs/WGs?</p>	<p>Searching: yes, not via a filter but the search function will also give the corresponding results if you enter and SDO as search term. Proposing: this is not considered at the moment as this must be done by SDO/should suggested to SDOs directly.</p> <p>If someone has SDOs and WGs activities on drones s/he's aware of (and are not covered in the portal), they can contact us and propose their integration in the portal.</p> <p>The standards are identified per SDOs (e.g. ASTM or ISO) not per Committee or Group which has developed it. AW-Drones however also lists some standards in advanced state of development, but not yet published. In this case, information on the responsible group may be traced through the EUSCG rolling plan or through the web site of respective organisation ....  filippo.tomasello@eurousc-italia.it would be pleased to support via mail, if deemed necessary</p>	<p>Sebastian Cain, Damiano Taurino, Filippo Tomasello</p>
<p>Have you heard any updates if there would be new revision of ASTM UAS Remote ID standard planned based on IETF DRIP work?</p>	<p>Not really. But in ISO we are considering ASTM and European standards for possible</p>	<p>Filippo Tomasello</p>

	harmonisations and colleagues are monitoring developments in ASTM	
Do you see AW-Drones database could link different SDOs like SDO defining performance based OSO's and technical SDO (like 3GPP) addressing those (in a iterative manner)?	AW-Drones also identifies "gaps" for which the Project believes that SDOs should do something. These gaps are reported to EUSCG for their consideration. Deciding which SDO should take action is not the role of AW-Drones	Filippo Tomasello
Is there a Conformity Assessment Body (CAB) part of the AW-Drones project?	EuroUSC Italia is a candidate Qualified Entity based on Art. 69 of EASA Basic Regulation 2018/1139. For the Notified Bodies, one should kindly consult the NANDO data base from DG DEFIS	Filippo Tomasello
Is it planned to make use of Car2Car communication for UAS operated as taxi drones in smart cities? Or is there a standard already in work which take this scenario into account?	In ISO we are considering the requirements for providers of Communication services in 23629, without duplicating standards by IEC or others (e.g. 5G). For vehicle-to-vehicle if you want to suggest any standard for the 3rd iteration, please send the reference to Damiano	Filippo Tomasello
For capacity management of U-Space, will noise be a factor, for example at a highly populated areas, other than just safety consideration?	Definitely. I would guess so. In this moment ASD-STAN is drafting EN 4709-001 which indeed contains requirements for noise emitted by a single small drone. In ISO draft 5015-2 on vertiport operations is expected to include some requirements on cumulative noise in urban areas ... if you want to suggest specific requirements on this matter, kindly send them to <a href="mailto:filippo.tomasello@european-aviation-union.eu">filippo.tomasello@european-aviation-union.eu</a>	Filippo Tomasello
Sarà possibile ricevere la documentazione visionata oggi	Certamente, sarà resa disponibile su <a href="http://www.aw-drones.eu">www.aw-drones.eu</a> al termine del Webinar.  The presentations shown today will be uploaded to the project website in a couple of weeks.	Marco Ducci, Ferraiuolo Vera
Could you provide an update on the development of standard scenarios by EASA, and the actual use of existing ones in current specific operations?	For the actual use it is still limited, and Peter said few minutes ago. Few additional Standard Scenarios have been proposed by EASA NPA 2002-	Filippo Tomasello

	03, which was however "DP"= not public. The Opinion is not yet published.	
Apparently there are more U-space Services in the SESAR roadmap than in the Regulatory proposal. Are they going to be aligned?	Yes. EASA/EC are regulating the "safety critical" U-Space services. The additional services are "safety related" or "operation support". A wider list, covering inter alia all the services listed by CORUS, is in draft ISO 23629-12.  To be answered during Q&A	Filippo Tomasello, Marco Ducci
"There were 4 Mandatory Services and 3 Optional ones... isn't the Tracking Service missing?"	Tracking services are incorporated in 'Conformance Monitoring Service'.  The tracking service falls under Network Identification Service (6)	Hans Schrauwen, Tobias Lundby
Sorry but I got two contradictory responses: one stating that tracking is within Conformance Monitoring and other stating that tracking is in the Network identification. The question is if this is to be changed in the Regulatory proposal because as of today the Opinion has 7 U-space services	In ISO 23629-12 E-ID is a pre-requisite for tracking. And the latter is a pre-requisite for Conformance Monitoring which is an "add-on" service using the tracking data (and other information). The functional architecture is covered by draft ISO 23629-5	Filippo Tomasello
In the presentation about CORUS, the Drone Aeronautical Information Management Service is described as part of the U1 Services. Are States ready to provide this service? What are the roles and responsibilities for the provision of this service and what is its scope?	DAIM is the service that collects together the information that define the geo-fences and so on. A chunk of the data comes from the existing AIM - such as restrictions of flying over prisons and so on, but other parts of the information are drone-specific. As far as I am aware, there will shortly be some acceptable-means-of-compliance and guidance material published in support of Article 15 of (EU) 2019/947 - when that material is published, we can reasonably expect implementation to follow.  Scope would be better described in the U-Space Regulation and, at the level of industry standards, in ISO 23629-7 and -12. States may not need to	Andrew HATELY, Filippo Tomasello

	"provide" the service (like AIS), but to "oversee" one or more authorised Service Providers	
FLARM is also installed in most gliders in Austria. Also some rescue helicopters and sightseeing aircraft.	indeed. if compliant with draft EN 4709-002 it could also be used on drones	Filippo Tomasello
Are you considering in your project hybrid systems e.g. a drone UAV-UGV?	No. We were directed to concentrate in the first iteration on the SORA objectives, when SAIL is low, for operations in the specific category. Now, we are progressing the second iteration for which we were instructed to focus on standards supporting U-Space. We look forward to receiving instructions, in due time, from INEA/EASA on the priorities for the 3rd iteration ... kindly liaise with these Agencies to suggest priorities.	Filippo Tomasello
The U-Space services will be available for drone which as well operate on ground?	<p>There is a service which explicitly aims to feed updated geo-awareness information to drones as they are flying. However as far as U-space is concerned, the location and nature of the client is immaterial.</p> <p>Depending on the service. For instance, GNSS serves any mode of transportation. Weather services may also serve all modes of transport. 5G COM are available also at ground level. The application of these services beyond aviation is not regulated through EASA, but it may well exist and be supported by the same industry standards</p>	Andrew HATELY, Filippo Tomasello
Any standard related to GNSS for UAS will be came out?	for Navigation System Error (NSE) at sensor level, we have also considered standards from the automotive sector. For the Flight Technical Error (FTE), i.e. the autopilot, there is still a gap, although ISO has plans. We reported the gap to EUSCG for possible action.	Filippo Tomasello, Marco Ducci

	EUROCAE WG-105 SG-62 is developing GNSS Guidelines for UAS with the aim of being eventually accepted by EASA as AMC/GM for fulfilling OSO#13 objectives.	
Concerning the electronic conspicuity, are there any regulatory study being captured in the database for general aviation flying just above VLL?	There are few studies on the EUROCONTROL web site: CORUS CONOPS, Possible new rules of the air at Very Low and Very High Level and Common Altitude Reference Systems. Kindly ask andrew.hately@eurocontrol.int if you want to know more	Filippo Tomasello
Are there also any standards available in your new portal related to "Geographical Zones"?	There is a category geo-awareness. However, it does not deal with geographical zones explicitly. If standards appear to deal with geographical zones, they would probably be linked to this keyword, currently I am not aware of standards dealing with this.	Sebastian Cain
A major problem in CRM is the misunderstanding of a directive. The unavailability of the SORA methodology in the language of each step could cause comprehension errors.	For CRM I would humbly say that we need a standard on phraseology which is not even initiated. For translation, anyone may volunteer and translate in his/her national language. But the language of professional aviators around the world is presently English	Filippo Tomasello
Since you are collecting and analyzing standardizations, and also the feasibility of possible implementations - do you also collect already available implementations and analyze them?	<p>If someone has a best practice to implement a certain standard, we are happy to look at it. It will not be published in the meta-standard as it's not in the scope of it, but it would definitely help in assessing feasibility and proportionality of a certain standard.</p> <p>No. Collecting data on issued authorisations to operate UAS in the specific category is responsibility of EASA and States, based on Art. 74 of Basic Regulation 2018/1139. I am personally convinced that part of this information should be</p>	Damiano Taurino, Filippo Tomasello



	public ... if some colleagues share this opinion, we should lobby with EC/EASA	
Is the category U1 already fully defined and ready for implementation? (or is it implemented already?)	Nicolas could perhaps answer to this question. I guess not yet.  To be answered during Q&A	Filippo Tomasello, Marco Ducci
The EC is strongly engaged in support of its "Green deal" initiative. In this context an action plan on Circular Economy was published in March this year. This document suggests that the design of new products have to be inspired by an Eco-design, in which "circular economy principles" are fully addressed. The aim is to properly consider the sustainability of the products by developing in the design at least (but not limited to) the following criteria: durability, reusability, upgradability and reparability...and others. Now the question is whether the drone standard portal is supposed to consider what was mentioned above.	Environmental impact is one of the criteria we are using to assess the standards, so this aspect will be considered to some extent although it will not be explicit from the portal where the full analysis will not be made available.  Not presently. But each product, for the CE mark, is accompanied by a single Declaration of Conformity. This Declaration, however, usually lists several legal acts and several standards. So, one may check whether the product is also compliant with environmental matters	Marco Ducci, Filippo Tomasello
Any standard for GNNS performance, including height. Which uncertainties is expected for higher latitudes (>58). Is EGNOS, v2 on schedule ?	Look for standards linked to the navigation keyword in the repository. For higher alt and EGNOS you would have to take a look at the standards directly or refer to the results of the assessment that can be found on the aw-drones website. This data is still to be incorporated into the online database	Sebastian Cain
Is not the introduction of U-space/USSP the way that Standards become irrelevant for the end-user/remote pilot - thus making the language a minor problem?	No. SORA is still required for operations in the specific category, under responsibility of the UAS operator, whether or not U-Space services are used	Filippo Tomasello
UK: gives a small amount of money to have each GA equipped	Noted. Non-EU States are free to do what they want.	Filippo Tomasello
For Unify - you mentioned the communication service for which ASTM has been developing a	Some single point of information will always be required to come from a single source (CIS), like	Andres VAN SWALM, Tobias Lundby

<p>'discovery service' standard. Do you think that this could replace certain elements of the CIS, as it would allow USSPs to communicate with one another safely and securely, without having to go via the CIS portal?</p>	<p>the geozones or manned aviation. But step by step communication amongst USSPs could make the CIS not needed anymore for most of the services.</p> <p>Yes, as the roles for CIS and USSPs are not set in stone yet, it could make sense that some communication (ex. time critical) is exchanged between USSPs rather than being routed through the CIS.</p>	
<p>With regards the UAS survey, do you have any information if any operators are (or capable of) providing weather data to their ground operations? I ask as we (the European National Met Services, EUMETNET) are interested in obtaining "opportunistic" weather data - wind/temp/humidity and atmospheric science parameters - in the low part of the boundary layer.</p>	<p>if FLARM complies with draft EN 4709-002 it would be fine also for UAS</p>	<p>Filippo Tomasello</p>
<p>What is the view on Electronic conspicuity for manned aviation flying in Class G airspace without a transponder (as an example)? Does the sharing of surveillance data fall onto the ANSP monitoring that sector?</p>	<p>Drones are mandated to carry on-board E-ID, when prescribed by Regulation 2019/947 or "geographical zones" prescribed by States based on Art. 15 of that regulation. No mandate for additional functionality on GA manned aircraft. In the future, new airspace classes may however emerge, based on the recommendations by project CORUS.</p> <p>To be answered during Q&amp;A</p>	<p>Filippo Tomasello, Marco Ducci</p>
<p>I understand AW-Drones is not assessing the technical content of the standards that are identified. That might be an issue: e.g. the "high potential" ASTM standard on remote ID is about security and not safety, that should be the main driver of requirements for U-space services</p>	<p>"even draft EN 4709-002 mainly aims at security. But the priority for AW-Drones in the 1st iteration was safety, not security, since the latter is not yet covered by SORA</p> <p>To be answered during Q&amp;A session</p>	<p>Filippo Tomasello, Marco Ducci</p>

Could you add in your portal the price of the standard and link where to shop it?	No. The price is published by the Standard Development Organisation (e.g. EUROCAE or ISO). It may change. It is easily traceable on their respective catalogues.	Filippo Tomasello, Filippo Tomasello
Peter, the survey was answering by operators flying below 500ft. What is your view about the market above 500ft? Are the 10 principal flight missions also best candidates for higher altitudes?	to be answered during Q&A	Damiano Taurino
in the future will we have many USSPs or will it be one per country? what is the orientation of EASA?	With the current federated model in mind, with relation to the open market, the vision is to have to option to have more than one USSP, also depending on the specific service(s) they will provide.	Hans Schrauwen
How do you get a LUC?	Applying to National Authority based on Part C of Annex to Commission Implementing Regulation 2019/947. Qualified Entities, including EuroUSC Italia may support if requested	Filippo Tomasello
How can I get the presentations? will they be available?	Yes, they will be made available on the project website	Marco Ducci