

RIGA DECLARATION
ON REMOTELY PILOTED AIRCRAFT (drones)
"FRAMING THE FUTURE OF AVIATION"

Riga - 6 March 2015

Today Europe is taking a decisive step towards the future of aviation. The European aviation community gathered in Riga to exchange views on how, and under which conditions, drones can help create promising new opportunities in Europe, offering sustainable jobs and new prospects for growth both for the manufacturing industry and for future users of drones in all sectors of society. Drones offer new services and applications going beyond traditional aviation and offer the promise to perform existing services in a more affordable and environmentally friendly way. They are a truly transformational technology.

The Latvian Presidency of the Council of the European Union, European Commission representatives, Directors General of Civil Aviation of the EU Member States, data protection authorities and leaders of manufacturing industry and service providers confirmed the importance of joint European action, building on the orientations given in the EC Communication on opening the Remotely Piloted Aircraft Systems (RPAS) market.¹

The aviation community stressed the necessity for European regulators to ensure that all the conditions are met for the safe and sustainable emergence of innovative drone services. At the same time regulations must help the industry to thrive and adequately deal with citizens' concerns.

¹ COM(2014)207 on a New era for aviation - Opening the aviation market to the civil use of remotely piloted aircraft systems in a safe and sustainable manner. See also the EESC opinion TRAN/553 of 15 October 2014.

The aviation community established the following principles to guide the regulatory framework in Europe:

1. Drones need to be treated as new types of aircraft with proportionate rules based on the risk of each operation.

The provision of drone services must not be less safe than is accepted from civil aviation in general. The incremental integration of drones in the aviation system must not reduce the level of safety presently achieved in civil aviation. Although no-one is on board the drone, people in other aircraft or on the ground could get hurt in case of an accident or an unscheduled landing. The way safety is regulated must be proportional to the operational risk involved.

Rules should be *simple and performance based*, to allow a small start-up company or individuals to start low-risk, low-altitude operations under minimal rules and to develop, with light-touch risk-based regulation, similar to the modern product safety regulations applied in other sectors. Higher risk operations would be gradually subject to more stringent regulations or operational limitations. At the other end of the spectrum, where the operational risk is highest, such as with large drones operating alongside manned aircraft, the regulation will need to be quite similar to that applying to manned aviation, with strict standards on the design, manufacturing, maintenance and operation of drones, as well as on the training of drone pilots and maintenance personnel.

2. EU rules for the safe provision of drone services need to be developed now.

Safety rules, including on remote pilot and operator qualifications, should be developed at the European level by the European Aviation Safety Agency, building on the experience developed in the EU Member States. The essential requirements should be *harmonised at the global level* to the maximum extent possible, and full use should be made of the established cooperation in the Joint Authorities for Rulemaking on Unmanned Systems (JARUS) and at

ICAO, and should be completed by international industry standard setting bodies. Important efforts need to be put into resourcing these activities, especially JARUS, in order to ensure that the progressive risk-based approach is consistent with what is done in the rest of the world.

This basic regulatory framework should be put in place without delay, in order to help the private sector to take well-informed investment decisions, and to provide a basic set of rules for the many operators who are increasingly eager to begin providing services. The *European Aviation Safety Agency* should consult stakeholders by the middle of 2015 on the regulatory framework for the operations of drones and on concrete regulatory proposals for low-risk operations. *By the end of 2015*, the Agency will use the results of the consultation to propose a position on these matters. The proposal for the revision of the basic European Safety Regulation, which the European Commission has announced for 2015, should contain the necessary new provisions and essential requirements for the progressive risk-based regulation of drones, based on the Agency's recommendations.

3. Technologies and standards need to be developed for the full integration of drones in the European airspace.

The success of drone activities and safety regulations also depends on the financial effort to develop and validate key missing technologies and the ensuing required standards. Both industry and public authorities stressed the need for *adequate investment* in the technologies that are required to integrate drones into the aviation system – the SESAR programme. CleanSky and other initiatives should complete the SESAR investments. That would create spin-off benefits for traditional aviation and so frame the future of flying.

4. Public acceptance is key to the growth of drone services.

The respect of *citizens' fundamental rights*, such as the right to privacy and the protection of personal data, must be guaranteed. Many drone services involve data-gathering such as filming, etc. The responsible authorities, such as the national and European Data Protection Authorities, should develop the necessary guidelines and monitoring mechanisms to ensure the full respect of existing protection rules, including in relation to drones. Rules need to clarify what is acceptable and what is not, and they require to be properly enforced.

Drones may cause nuisances and negative externalities, such as *noise*. These nuisances need to be addressed, possibly at the local level, to maintain public acceptance.

Drones also pose potential *security* risks. The design of drones can and should take into account those risks by using methods such as cyber-defence or geofencing. However, the malicious use of drones cannot be entirely prevented by design or operational restrictions. It is the task of the national police and justice systems to address those risks.

5. The operator of a drone is responsible for its use.

When a drone service is delivered in prohibited airspace, in an unsafe manner, or for illegal purposes, the authorities should be able to act and hold the operator accountable. Where lacking, this will need to be clarified in national law. Moreover, in order to enforce responsibility, it will be necessary for drones to have at all times an *identifiable owner* or operator. The regulator should seek the least bureaucratic way to achieve this. For instance, the mandating of electronic identity chips on drones – “IDrones” – as is today envisaged in some states, could be formalised through a safety rule, which would contribute to the effective implementation of privacy and security requirements. Standardised web-portals in the Member States for the

registration of operators and their operations could be another solution. The involved authorities need to work closely together.

Drone accidents will happen. Member States should clarify the applicable *insurance* and third-party liability regime and monitor the compensation mechanisms for potential victims. The establishment of compensation funds to cover victims of accidents caused by uninsured drone users, as used in the motor insurance sector, could be envisaged. *Reporting* on drone incidents should be integrated into the overall incident reporting requirements. Systematic and coherent incident reporting will improve safety and will be instrumental for insurance companies in their risk analysis on which third party liability insurance premiums are based.

To allow a short reaction time, the development of drone services and drone technologies needs close monitoring. To this end, the EU should establish an easy access for SMEs to information required for drone manufacturing and service provision, together with an observatory to keep track of the growing number of operations in Europe and the evolution of innovation. This monitoring will permit informed decisions relative to the establishment of priorities for future legislation. It will also help regulators to learn from experience and verify that the rules are fit for purpose, namely to ensure that new technologies and drone services can develop in full respect of the required high levels of safety, security, privacy and environmental protection. An annual progress report should be published.

The European aviation community gathered in Riga today is committed to working together on the basis of these principles to allow businesses to provide drone services everywhere in Europe as from 2016 onwards.