Republic of Serbia's achievements on environmental protection in air traffic

Legal aspects

- Serbia is a candidate country for European Union, and therefore user of IPA (Instruments for Pre-Accession Assistance)
- Civil Aviation Directorate of the Republic of Serbia (CAD RS) was part of the Twinning Project ”Creation of a monitoring, reporting and verification system for the successful implementation of the EU Emissions Trading System” from 2013th to 2016th, which was funded by IPA
- Serbia participated in EU ETS since its beginning until the ‘stop the clock’ decision
- Verification body for Serbian air traffic operator for EU ETS is Germany’s DEHSt

- CAD RS is also a member of ‘Negotiation Group 27’
- Serbia agreed to voluntarily participate in CORSIA from the beginning of this project, together with all the others ECAC member states through Bratislava declaration
- Law on climate change is expected to come into force by the end of 2019, and its bylaws (among them those regarding CORSIA) in 2020

Action Plan on CO2 reduction

- Republic of Serbia was among the first 30 countries to publish its Action Plan on CO2 reduction in 2012
- Updated version was published in July 2019
- While writing the Action Plan, we had in mind the ICAO guide on what the Action Plan should include
- Main chapters of Serbia's Action Plan are: Civil aviation in Serbia, Structure of the aviation sector, Traffic performance at the two main airports in Serbia, Membership in international organizations, Regional coordination and projects, Actions taken on supranational level and throughout Europe (including EU ETS and CORSIA), and Actions on national level in Serbia

Civil aviation in Serbia

- In charge of civil aviation in Serbia are Ministry for Transport and CAD RS
- CAD RS is was founded by the Government and it is

a public agency entrusted with the tasks of regulation, oversight, auditing and inspection, certification, licensing and record keeping in the civil aviation in the Republic of Serbia, as well as cooperating with the international aviation organizations

- Air Navigation Service Provider for both Serbia and Montenegro is SMATSA

Membership in international organizations

- Republic of Serbia is member of:
  - ICAO
  - ECAC
  - ECAA
  - Eurocontrol
  - JAA

Regional coordination and projects

- Serbia signed the ECAA agreement in 2006, and it was ratified in 2009.
- Serbian ANSP – SMATSA cooperates with those of Albania, Slovenia, North Macedonia, Hungary and Bulgaria (regarding implementation of SES)
- The Republic of Serbia has an active role in ISIS programme (Implementation of the Single European Sky in the South East Europe), within which CAD RS has leading role in the projects of Transposition and Capacity Building of National Supervisory Authorities.

- in February 2015 was elaborated and adopted Regional Programme “HARMONIZED AND OPTIMIZED USE OF REGIONAL AIRSPACE WITH ENHANCED AIR TRANSPORT CONNECTIVITY IN THE SEE”, which focuses on the increase of air traffic safety and ATM capacity, decrease of CO2 and noise emissions by shortening route length and fuel burn.
- Programme participants are Albania, Hungary, Montenegro, North Macedonia and Serbia

National actions in Serbia

- Republic of Serbia, through various actions, aims at
  - limiting CO2 emissions,
  - informing the aircraft operators, ANSP and airport operators on new internationally promoted technologies,
  - encouraging involvement of national stakeholders in international and national projects aiming at reducing GHG emission in civil aviation,
  - meeting the objectives of the aircraft operators by participating in the EU ETS scheme and CORSIA

- Problems: lack of human, financial and technical resourses

Republic of Serbia and CORSIA

- Serbia agreed to voluntarily participates in CORSIA since its beginnings
- National air operator – AIR SERBIA, falls under the requirement of MRV in the CORSIA programme
- EMP of AIR SERBIA was received in February 2019, and approved in April 2019
- CORSIA will be introduced in Serbian legal system through bylaws of the Law on climate change (expected to come into force by the end of 2019)
- According to the draft of the law, all decisions will be under Ministry for environmental protection, while CAD RS will be technical support.

Other actions in Serbia

- In order to reduce fuel consumption, best practices are used both in ground operation and during the flight.

- In ground operation:
  - Loading the aircraft so that the position of the center of gravity in flight is as backward as possible, thus ensuring a minimum fuel consumption;
  - Transmission of flight schedules as close as possible to take-off time

- Best practices and procedures during the flight are used:
  - Use of optimal cruise level;
  - Extending the studies regarding the impact of applying some CDA (Continuous Descent Approach) procedures at all airports with significant traffic volume;
  - Minimum landing flaps, where possible;
  - Take-off with FLEX method/Assumed Temp/Derate for the engines protection and as low consumption as possible on long-term;
  - Accelerating at a more economical “Enroute climb” speed, under level 100 where possible.

Optimization of the route network

- The constant improvement and optimization of the route network is regular working practice
- SEAFRA (South-East Axis Free Route Airspace) project brings together four countries – Bosnia and Herzegovina, Croatia, Montenegro and Serbia
- The idea of such large-scale free route airspace was initiated to improve safety and efficiency, as well as environmental protection by reducing fuel consumption.

Improvement of aircraft fleet

- By the end of 2015, Air Serbia has improved its aircraft fleet by replacing older aircrafts type B737-300 (though not all) with more fuel efficient and technologically improved type A319/320 and A330. Also, in previous years, operator Air Serbia replaced ATR72-200 with ATR72-500. Current fleet of Air Serbia consists of ATR72-500, A319/320, A330, B737-300 aircraft type.
- This is contributing to reducing fuel consumption and will have significant contribution in reducing CO2 emission and other environmental benefits attributed to new technologies.

THANK YOU