International Civil Aviation Organization
ICAO South American Regional Office
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(Sao Paulo, Brazil, 24- 26 February 2025)

Agenda Item 3A: Environment

SUPPORT TOWARDS CAPACITY BUILDING FOR ENVIRONMENT IN THE SAM REGION

(Presented by EASA)

SUMMARY

The paper highlights the importance of international cooperation in addressing the global environmental challenges for aviation. Over the past decade, the European Union has allocated over €30 million outside of Europe to support civil aviation environmental projects globally, focusing on the development of Sustainable Aviation Fuels (SAF), the implementation of the CORSIA framework and the development of State Action Plans to reduce CO2 emissions.

In addition, this WP gives an overview of the activities conducted in the frame of the EU Latin America Aviation Partnership (EU-LAC APP II) project on each of the aspects covered.

Future efforts (2025-2027) will focus on implementing CORSIA's offsetting mechanisms and increasing SAF production, with SAF seen as a key opportunity for economic growth and job creation in partner states. Effective coordination and collaboration are essential to maximise the impact of these initiatives.

References:

- Annex 16 — Environmental Protection, Volume IV— Carbon Offsetting and Reduction Scheme for International Aviation (CORSIA)
- Environmental Technical Manual (Doc 9501), Volume IV – Procedures for demonstrating compliance with the Carbon Offsetting and Reduction Scheme for International Aviation (CORSIA)
- ICAO Global Framework for SAF, LCAF and other Aviation Cleaner Energies
- (Adopted by CAAF/3 on 24 November 2023)
- Annex 14, Volume I, Aerodrome Design and Operations
- PANS-Aerodromes (Doc 9981)
- Airport Services Manual Part 3 - Wildlife Hazard Management

***ICAO Strategic Objectives*:**	*Environmental Protection*

1. Introduction

1.1 This paper describes the European Union's (EU) efforts to support high levels of environmental protection and to promote a consistent application of international environmental standards globally. Whilst the paper is not exhaustive, it references to International Cooperation initiatives by the EU, including its Member States, institutions, and other stakeholders.

1.2 Developing and implementing sustainability standards and initiatives requires new technical skills and processes. The challenge is heightened when new areas of expertise are involved or when quick deployment across various organisations is necessary. Rapidly advancing technologies and their associated policies also require ongoing adjustments to ensure that the intended objectives are met. These challenges are particularly relevant to environmental protection initiatives in civil aviation.

1.3 International Cooperation initiatives help partner states tackle these challenges by sharing knowledge and practical experience, as well as providing resources. This collaborative approach also strengthens institutional ties and working relationships with partner states and relevant international organisations, making it an essential part of achieving environmental goals, such a 5% reduction in CO_2 emissions from Sustainable Aviation Fuels (SAF), Low Carbon Aviation Fuels, and other cleaner aviation energies by 2030, as well as net-zero CO_2 emissions by 2050.

2. Discussion

2.1 The aviation sector has a long history of using International Cooperation through technical programmes to build the capabilities of states in areas like safety, security, and air traffic management. European entities have been reliable and experienced partners in these initiatives.

2.2 In recent years, the number of technical cooperation programmes focused on environmental protection has grown, in line with the increasing ambitions of states to reduce aviation's environmental impact. Over the last decade, European Union entities have collaborated with 112 partner states and committed over €30 million outside Europe to support civil aviation environmental protection projects. At the ICAO level, these commitments have been supported by capacity-building programmes, such as ACT-CORSIA and ACT-SAF, ensuring that no country is left behind. These work by identifying the specific needs of the partner states and aviation stakeholders to develop appropriate capacity-building and training activities, such as the CORSIA Buddy Partnerships between states and examples of good practices for CORSIA implementation, frequently asked questions, publications, videos and more.

2.3 These European projects, implemented by EASA, EU Member States, European industry or directly by ICAO using European funds, have supported capacity building in several Latin American regions on numerous technical issues. There is a strong commitment to continue participating in international cooperation initiatives to promote sustainable aviation globally and a potential voluntary membership of CORSIA by several countries in the region.

2.4 The activities supported by the European projects, implemented by EASA, in relation to ICAO environmental protection initiatives are presented in Appendix A to this working paper.

2.5 An executive summary of the working paper is provided in Appendix B for consideration by the meeting and inclusion in the report.

3. Conclusion

3.1 Global environmental challenges require global cooperation to achieve shared future goals. International cooperation is a vital part of achieving a 5% reduction in CO_2 emissions from sustainable

aviation fuels (SAF), low-carbon aviation fuels and other cleaner aviation energy by 2030, as well as net zero CO_2 emissions by 2050.

3.2 Collaboration with partner states has led to the successful implementation of CORSIA-Monitoring, Reporting and Verification in more than 100 states and encouraged new states to join its voluntary pilot and early phases. Technical support has helped develop or update State Action Plans for CO_2 emission reduction.

3.3 Looking ahead to 2025-2027, future efforts with partner states will likely focus on implementing CORSIA compensation mechanisms and building capacity to increase SAF production. To maximize the impact of the resources provided to partner states, it is essential to raise awareness, coordinate efforts and collaborate effectively on international cooperation initiatives.

3.4 EASA and the European Union have been present and active in the LAC region with technical cooperation projects since 2018. A continuation of technical cooperation is currently being prepared and environmental issues will be an essential part of it. It is necessary to work together to achieve the objectives of the LTAG

4. Action by the Meeting

4.1 The Conference is invited to:

a) take note of the information contained in this Document Document and in **Appendices A and B**;

b) welcome the European Union’s support for the decarbonisation of aviation and ensure that no country is left behind;

c) identify and propose areas for possible future collaboration between the EU and LAC, in order to take advantage of the opportunities offered by the ICAO CORSIA programme, especially as regards CORSIA eligible fuels and CORSIA eligible units;

d) encourage States and stakeholders, including other donors, to collaborate through the ICAO Global Framework for Sustainable Aviation Fuels (SAF), Low Carbon Aviation Fuels (LCAF) and other cleaner energy for aviation in efforts to achieve a collective aspirational global vision to reduce CO_2 emissions in international aviation by 5 percent by 2030, compared to zero use of cleaner energy.

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APPENDIX A

ACTIVITIES SUPPORTED BY EUROPEAN PROJECTS, IMPLEMENTED BY EASA, IN RELATION TO ICAO ENVIRONMENTAL PROTECTION INITIATIVES

CORSIA Implementation

1.1 European entities have played a key role in encouraging more states to participate in CORSIA during the Pilot Phase (2021-2023) and the First Phase (2024-2026) by helping them implement the Monitoring, Reporting, and Verification (MRV) process and, in some cases, by helping to develop a national regulatory framework and its implementation, in others by helping to achieve the accreditation of national verifiers.

1.2 Although CORSIA was launched in 2019, it is a mechanism that requires continuous updating and alignment with the latest edition of ICAO implementation documents/elements.

In addition, stakeholders in the aviation sector, as well as national aviation bodies, local aviation inspection bodies and candidates, and the Ministry of the Environment, in particular from the first phase of CORSIA, should "digest" all technical aspects and understand the advantages and opportunities offered by CORSIA for each State.

This work is becoming increasingly important as states are working on their roadmap to reach net-zero emissions by 2050, in line with the ICAO LTAG, and need to explore all the opportunities offered by each category of short-term (such as CORSIA) and medium- and long-term (such as SAF) measures.

In addition, the Ministry of Environment or the equivalent body of each State competent to issue the Letter of Authorisation (LoA) should participate in the requirements of CORSIA eligible emission units to take action.

1.3 During the years 2023 and 2024 and under the EASA EU LAC APP II project, 10 training sessions have been carried out regarding CORSIA obligations along the calendar proposed by ICAO. Some sessions focused on the national authorities that administer CORSIA and other sessions addressed air operators, verifiers and other agents involved. Among these activities, it worths to mention the 4-day course on CORSIA focused on verifiers, held in November 2024 in Buenos Aires (Argentina), with the aim of training verifiers in the LAC region. This course was well received by the attendees of all the authorities of the region.

1.4 Activities conducted under the EU CORSIA Africa and Caribbean and complemented by the EU LAC APP II supported Cuba to have an accredited verifier. And it is expected that in 2025 Argentina can achieve the same.

1.5 During the years 2023 and 2024, under the EASA EU LAC APP II the project experts conducted 7 specific sessions focused on reporting and communication to ICAO of emissions reported by aircraft operators and provided assistance to the CORSIA Focal Points in the integration and reporting of emissions to the ICAO CCR. All these aspects helped to improve the quality of the data reported at ICAO level and then used for ICAO statistics and calculations.

1.6 Moreover, in 2024, three webinars have been organised for CORSIA Focal Points and newly appointed experts, with the main objective of supporting them in the process of better and in-depth understanding of CORSIA. These sessions were intended to give a general overview of the compensation system and all elements of implementation.

1.7 As a result of this cooperation in Latin America, several countries such as Cuba and Uruguay voluntarily joined the initial phase of CORSIA, this being a first step for other states in the region to follow this same path.

1.8 CORSIA has now entered its second phase where, following the recovery of air traffic after the COVID-19 pandemic, it may lead to compensation obligations for aircraft operators flying between two volunteering states. CORSIA allows for offsetting by either purchasing and cancelling CORSIA emission units (EUC) or using CORSIA eligible fuels (CEF). Both options have specific criteria and rules that must be met for them to be considered eligible offsets. While CEUs and CEFs can be purchased globally, some states are looking to provide these on a domestic basis to benefit from the environmental and economic advantages of CORSIA locally, such as investment in green industries and job creation.

There have been numerous consultations during the training sessions of the EASA EU LAC APPII project, and it is a topic to which the future actions of the project will focus during the year 2025.

1.9 Additionally, and under the umbrella of the EASA EU LAC APPII project, training sessions have been held on European environmental framework, relevant for the air operators in the Latin American region: sessions on EU-ETS, ReFuel EU and the Non-CO2 report at European level have been held. A face-to-face course is scheduled in the first part of 2025.

1.10 With increasing commitments under the Paris Agreement through National Determined Contributions (NDCs), there may be more competition for CEUs in international markets. Therefore, technical cooperation is also crucial in understanding how CORSIA complements other carbon markets, creating positive synergies to achieve their goals while avoiding double-counting of emissions and cancellations.

1.11 Cooperation between European entities and partner states from 2025 to 2027 is expected to focus on the effective implementation of CORSIA and on increasing the availability of carbon projects that provide eligible units for CORSIA, as well as extending the project for development assistance projects and programs in countries where they are required.

State Action Plans for CO_2 Emissions Reduction

1.12 A good example of the value of International Cooperation programmes is the support provided to develop the first or subsequent editions of State Action Plans for reducing CO_2 emissions from international aviation. By 2024, 148 states had submitted at least the first edition of their State Action Plan to ICAO. The information provided in these plans on CO_2 emissions baselines, mitigation measures, and estimated reductions was invaluable during the discussions on the Long-Term Aspiration Goal (LTAG) at the 41st ICAO General Assembly and will be crucial in monitoring progress towards this goal.

1.13 Between 2022 and 2024, European cooperation initiatives supported or collaborated with 22 states, resulting in the submission of 14 first editions and 4 updates of state action plans to ICAO. During 2023 and under the EASA EU LAC APPII project, a training session was organised on the development and presentation of SAPs in the region.

1.14 Under the EU CORSIA project for Africa and the Caribbean, support was provided to Suriname for the development of the State Action Plan, providing training to airlines, air navigation service providers and airport operators, as well as assistance for the creation of a national working group for SAP and for the creation of a SAP baseline and the identification of possible combinations of measures to decarbonise the sector. The support contributed to Suriname submitting its National Plan to ICAO and Latin America being the first region in which all States have submitted their SAP.

1.15 Most support for state action plans comes from EU-funded projects implemented by EASA or ICAO. The approach has included training state authorities and aviation stakeholders on the use of ICAO statistical forms and methods to calculate baseline emissions, facilitating technical discussions on mitigation measures and CO2 reduction estimates, and assisting in the drafting of the final document of the State Action Plan

1.16 The use of ICAO Document 9988 and other materials has been essential to providing consistent support and tools in all partner states. While the support has been mainly technical, the most valued aspect has been to establish the State Action Plan as a collaborative and ongoing process between state authorities and aviation stakeholders.

SAF Development

1.17 The 3rd ICAO Conference on Alternative Aviation Fuels (CAAF#3) in 2023 led to Member States adopting the "Global Framework for Sustainable Aviation Fuels (SAF), Lower Carbon Aviation Fuels (LCAF), and other Aviation Cleaner Energies." As part of this framework, it was acknowledged that supporting states and industry in developing and financing SAF initiatives is vital to ensure that no country is left behind in decarbonisation efforts. The ICAO ACT-SAF Programme was established to help states develop their full potential in SAF through specific training activities, feasibility studies, and other support initiatives.

1.18 SAF presents a valuable opportunity for countries to grow their green economies and create jobs. Scaling up SAF production requires significant investments and informed decision-making. European entities are actively supporting SAF development in 42 partner states in Africa, Asia, and Latin America through various International Cooperation initiatives.

1.19 During the years 2023 and 2024, under the EU LAC APP II project, different actions related to the promotion of SAF in the region have been organized. In addition, the project participated in several meetings of GEPEJTA and RACC with respect to SAF issues and other environmental aspects. The most relevant activity has been the regional workshop organised in Asunción (Paraguay) on "Deploying the 2050 vision on SAF, LCAF and cleaner energies for aviation", where for two days experiences and perspectives on the implementation of SAF, LCAF and other clean energies were shared. The workshop brought together all relevant stakeholders in the process of implementing the SAF and aimed to promote the regional and harmonized approach, as well as to exchange information and request future activities where technical cooperation could be supportive.

1.20 The first stage of the support on SAF implementation involves raising awareness, exchanging best practices, and developing technical capabilities on SAF. The second stage supports the development of local capabilities for SAF production.

1.21 EU-funded projects have been conducting SAF workshops and webinars worldwide, and have also funded the so-far only ICAO-conducted SAF Feasibility Studies under the ACT-SAF programme, for Zimbabwe, Côte d'Ivoire, Rwanda, the Dominican Republic, Trinidad and Tobago, Kenya and Burkina Faso. Work is ongoing for an additional 10 SAF Feasibility Studies in India and Africa, with 3 of them expected for completion by the end of 2024, and further opportunities can be considered in the Asia-Pacific region. Beyond feasibility studies, European entities' technical cooperation initiatives have brought stakeholders together to develop a shared understanding of SAF, its potential within their state, and their role in its development. This includes the entire SAF value chain, from production pathways to techno-economic analyses, readiness studies, and policy dialogues.

1.22 The support has been tailored to each state's specific potential for SAF production, whether that involves activating particular feedstocks, leveraging existing refining capabilities, or using renewable energy sources. The most valuable contribution has been facilitating a shared understanding of SAF among potential actors, including different government departments and non-aviation stakeholders like the gas and oil industry and feedstock producers.

1.23 In addition, under the coordination of ICAO and in cooperation with SRVSOP, the EASA EU LAC APPII project is available to contribute to the progress of the region in the implementation of the SAE, including in its work plan for 2025 a series of preliminary studies in several countries of the region.

1.24 Support under the current project (ending in the summer of 2025) could be designed following the same approach as described above, where national working groups are set up with the different actors involved to facilitate the exchange build capacity to reach a common knowledge and understanding to contribute to the development or updating of an FAS policy, and to assess the possibility of carrying out further feasibility studies for the implementation of FAS. These studies could be included in the work plan of the next cooperation project that the European Union and EASA are preparing.

1.25 This collaborative effort provides a standardized toolkit that helps partner states and stakeholders combine needs and resources more effectively, enabling more efficient cooperation, even with multiple and simultaneous partners. This coordination is vital to maximize the impact of resources dedicated to increasing FAS production worldwide.

1.26 EASA and the EU also provide technical expertise and actively contribute to the ICAO Committee on Aviation Environmental Protection (CAEP) through the Fuel Task Group. The involvement allows to support, among other things, the development of accounting methodologies on the use of SAF, LCAF and other aviation cleaner energies for international aviation or analysing and approving life cycle values for new fuel sources and pathways.

Environmental Management Systems for Airports

1.27 It is also worth noting the efforts made regarding wildlife management in airport environments. This is another aspect of operational safety, but since environmental teams in many countries also deal with wildlife issues, several sessions have been held in Latin American countries, with the aim of sharing best practices in wildlife control and management, as well as other aspects, such as local and regional regulations, wildlife committees, among others.

The experts of the EU LAC APP II organized In January 2025 a regional workshop on wildlife management in the aerodrome area, where experts from the region met to discuss the management of the Airport Environment: identification of problems and on the search for solutions and on the management (reporting, recording and first analysis) of wildlife incidents and the improvements that could be provided in the process.

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APPENDIX B

Executive Summary for consideration for inclusion in the Conference Report

International Cooperation by the European Union to support Global Sustainability Commitments

European Union international cooperation to support global sustainability commitments

The document highlights the importance of international cooperation and capacity-building activities to address global environmental challenges within the aviation industry. Over the past decade, the European Union has allocated more than 30 million euros outside Europe to support civil aviation environmental projects globally, focusing on the development of sustainable aviation fuels (SAF), the implementation of the CORSIA framework and the development of state action plans, to reduce CO2 emissions.

The document describes the activities carried out during the last two years 2023-2024 in the framework of the technical cooperation project between the European Union and the LAC region and emphasizes future initiatives in the short (under the EU LAC APP II project), medium and long term (under the project under development), aimed at expanding the production of sustainable aviation fuel (SAF) and improving CORSIA's compensation mechanisms. The SAF is identified as a key opportunity for both environmental sustainability and economic growth in partner states, and EU support and cooperation play a crucial role in knowledge sharing, capacity building and support for SAF feasibility studies and other capacity building activities.

Effective coordination and international collaboration are considered essential to maximize the impact of these sustainability efforts. The document invited the Conference to take note of the information contained therein, to welcome the support provided by the European Union to support the decarbonisation of aviation and ensure that no country is left behind, to invite other donors to join this effort and to work to raise awareness, coordinate efforts and collaborate effectively on international cooperation initiatives on environmental sustainability.

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