



A40-WP/607
P/38
1/10/19

ASSEMBLY — 40TH SESSION

REPORT OF THE TECHNICAL COMMISSION ON AGENDA ITEM 28

(Presented by the Chairman of the Technical Commission)

The attached report on Agenda Item 28 has been approved by the Technical Commission. Resolutions 28/1, 28/2, 28/3 and 28/4 are recommended for adoption by the Plenary.

Note.— After removal of this covering sheet, this paper should be inserted in the appropriate place in the report folder.

(33 pages)

Agenda Item 28: Aviation Safety and Air Navigation Policy**Global Aviation Safety Plan**

28.1 The Commission reviewed A40-WP/51, presented by the Council, which put forward the 2020-2022 edition (third edition) of the *Global Aviation Safety Plan* (GASP, Doc 10004) for endorsement by the Assembly. The revised GASP sets forth the global strategic direction for safety and provides the framework in which regional, subregional and national implementation plans are to be developed and implemented, thus ensuring harmonization and coordination of efforts aimed at improving international civil aviation safety. The Commission recommended that the Assembly endorse the 2020-2022 edition of the GASP.

28.2 The Commission reviewed A40-WP/195, presented by Bolivia and supported by South American (SAM) States and Latin American Civil Aviation Commission (LACAC) States¹, A40-WP/325, presented by Brazil and supported by SAM States and LACAC², and A40-WP/401, presented by Peru and sponsored by SAM States and LACAC States³, regarding the 2020-2022 edition of the GASP. The Commission agreed on the need for ICAO to continue its implementation support, under the established global aviation safety programme, including tools, guidance and capacity building workshops to assist States and stakeholders to meet the GASP goals. The Commission also agreed on the need to increase collaborative endeavours through voluntary mechanisms and for States and industry entities to actively participate in their respective regional aviation safety groups (RASGs). The Commission further agreed on the need for ICAO, through the appropriate group of experts, to consider the inclusion of a common section on the importance of building States' civil aviation management capacities in forthcoming editions of the GASP. The Commission expressed support for the SAM Region Safety Plan (SAMSP), which facilitates the implementation of the goals and targets in the 2020-2022 edition of the GASP.

28.3 Information papers were provided by Argentina (A40-WP/522) and the Flight Safety Foundation (FSF) (A40-WP/460).

Global Air Navigation Plan

28.4 The Commission reviewed A40-WP/24, presented by the Council, which called for the endorsement of the sixth edition of the Global Air Navigation Plan (GANP, Doc 9750), available via the GANP Portal (<https://www4.icao.int/ganpportal>), as the strategic direction for global air navigation and included an amendment to Resolution A39-12: ICAO global planning for safety and air navigation. A40-WP/24 was supported by A40-WP/215, presented by Singapore and co-sponsored by Fiji, Japan, Marshall Islands, Nauru, Palau, Thailand, Trinidad and Tobago, the United Kingdom and the Civil Air Navigation Services Organization (CANSO), which highlighted the importance of aligning global, regional and national air navigation plans and that, like the Global Plan, regional air navigation plans

¹ Belize, Brazil, Chile, Colombia, Costa Rica, Cuba, Ecuador, El Salvador, Guatemala, Guyana, Honduras, Nicaragua, Panama, Paraguay, Peru, Uruguay and Venezuela (Bolivarian Republic of).

² Belize, Bolivia, Chile, Colombia, Costa Rica, Cuba, Ecuador, Guatemala, Guyana, Honduras, Nicaragua, Panama, Paraguay, Peru, Uruguay and Venezuela (Bolivarian Republic of).

³ Belize, Bolivia, Brazil, Colombia, Costa Rica, Cuba, Ecuador, El Salvador, Guatemala, Guyana, Honduras, Nicaragua, Panama, Paraguay, Uruguay and Venezuela (Bolivarian Republic of).

should be developed in electronic format. The Commission recommended that the Assembly endorse the sixth edition of the GANP, including its maintenance process and recommended that ICAO apply version control to further updates.

28.5 The Commission discussed A40-WP/230, presented by Australia, which recognized the GANP as the locus for global air navigation policies, priorities and strategies. To highlight and make easily accessible these policies, priorities and strategies, the Commission agreed that ICAO should consider improving the executive summary for the next edition of the GANP for use by all States and key decision-makers. The Commission was informed that ICAO had formed a group of experts to develop and maintain future editions of the GANP in response to Recommendations 1.1/1, 1.2/1 and 4.3/1 from the Thirteenth Air Navigation Conference (AN-Conf/13).

28.6 The Commission supported A40-WP/84, presented by Finland on behalf of the European Union (EU) and its Member States⁴, the other Member States of the European Civil Aviation Conference⁵ (ECAC) and European Organisation for the Safety of Air Navigation (EUROCONTROL) and co-sponsored by Canada, Singapore and the Republic of Korea, which reinforced the sixth edition of the GANP, in conjunction with the new edition of the *Global Aviation Safety Plan* (GASP, Doc 10004), as the strategic framework to drive the digitalization and transformation of air navigation. The Commission agreed that ICAO should make use of partnerships with largescale air traffic management (ATM) modernization programmes for the development of ASBU elements and related ICAO provisions. The Commission also agreed that air navigation modernization increasingly requires operational services with a global scope. To facilitate the delivery of these global services in a cost-effective and robust manner, and to prevent their unnecessary proliferation, the Commission recommended that ICAO consider the development of key principles for the setting up and maintenance of them. The Commission agreed that, instead of defining an ASBU minimum path, ICAO should implement interregional harmonization mechanisms to ensure a balanced development of global air navigation in line with the No Country Left Behind initiative. The Commission noted the importance of ensuring consistency and complementarity between the ICAO Global Plans and other relevant policies and strategies.

28.7 The Commission reviewed A40-WP/150, presented by the United Arab Emirates, which encouraged the adoption of a globally harmonized standardization process for the modernization of air navigation systems through the aviation system block upgrades (ASBU) framework. To meet the requirements of the rapid pace of technological developments, as well as State and industry operating models, the Commission recommended that ICAO, keeping in mind the principles enshrined in the Chicago Convention, review and enhance its Standard-making processes to operate in a more agile manner, applying a cross-domain approach and promoting integrated risk management to address new initiatives and emerging issues in a timely manner. The Commission also recommended that ICAO consider the development of guidelines for technical standards versioning in support of technical standards management to secure harmonized implementation of innovative solutions.

⁴ Austria, Belgium, Bulgaria, Croatia, Cyprus, Czechia, Denmark, Estonia, Finland, France, Germany, Greece, Hungary, Ireland, Italy, Latvia, Lithuania, Luxemburg, Malta, Netherlands, Poland, Portugal, Romania, Slovakia, Slovenia, Spain, Sweden and United Kingdom.

⁵ Albania, Armenia, Azerbaijan, Bosnia and Herzegovina, Georgia, Iceland, Republic of Moldova, Monaco, Montenegro, North Macedonia, Norway, San Marino, Serbia, Switzerland, Turkey and Ukraine.

28.8 The Commission reviewed A40-WP/158, presented by the 54 Contracting States⁶, Members of the African Civil Aviation Commission (AFCAC), on system-wide information management (SWIM) and the need to incorporate requirements for global interoperability in the regional air navigation plans. The Commission noted the interoperability challenges that were viewed as main inhibitors for the exchange of information in a SWIM-enabled environment. The Commission agreed on the need for additional ICAO guidance material to support interoperability through the definition and incorporation of the requirements of the SWIM global interoperability framework layers in regional air navigation plans. The Commission also agreed that in a SWIM governance framework, coordination between involved stakeholders should be included in an effort to prevent potential security breaches and cyberattacks. In addition, the Commission noted the Africa-Indian Ocean (AFI) Region initiative to establish regional aeronautical information databases.

28.9 The Commission noted the basic building block (BBB) framework and agreed that, as highlighted in A40-WP/84, it constitutes the baseline for the modernization of any air navigation system. The Commission was informed that the BBB is considered an independent framework and not an ASBU block as it represents a baseline rather than an evolutionary step, and that implementation obligations, as well as reporting and compliance of the BBBs, do not entail additional implementation obligations or specific reporting mechanisms for States.

28.10 The Commission reviewed A40-WP/156, presented by the 54 Contracting States³, Members of AFCAC, on the application of the BBB framework for aeronautical information management (AIM) and the harmonization of the aeronautical information eXchange model (AIXM) and its evolutions. The Commission agreed that ICAO should continue to promote quality-assured aeronautical information as part of the BBB framework and to support the harmonization of information exchange models and their future versions. The Commission was informed that in response to AN-Conf/13 Recommendation 3.1/1, approved by Council, these proposals were already ongoing as part of the ICAO air navigation work programme.

28.11 The Commission emphasized the importance of adopting a globally harmonized performance management process, based on collaborative decision-making, for air navigation modernization and acknowledged the six-step performance management process detailed in the sixth edition of the GANP. In this regard, the Commission supported A40-WP/212, presented by Singapore and co-sponsored by Japan, Thailand, the United States and CANSO, which highlighted the importance and benefits of a collaborative performance-based approach. The Commission agreed that ICAO should develop guidance material to facilitate the implementation, mainly by air navigation service providers, of the 19 key performance indicators (KPIs) included in the GANP as well as to encourage engagement by all stakeholders. The Commission also agreed that ICAO should continue developing the performance framework by defining KPIs in all 11 ICAO key performance areas (KPA).

28.12 The Commission reviewed A40-WP/168, presented by Saudi Arabia, which highlighted the need for a holistic guide mechanism to assist different aviation stakeholders to choose the appropriate

⁶ Algeria, Angola, Benin, Botswana, Burkina Faso, Burundi, Cabo Verde, Cameroon, Central African Republic, Chad, Comoros, Congo, Côte d'Ivoire, Democratic Republic of the Congo, Djibouti, Egypt, Equatorial Guinea, Eritrea, Eswatini, Ethiopia, Gabon, Gambia, Ghana, Guinea, Guinea-Bissau, Kenya, Lesotho, Liberia, Libya, Madagascar, Malawi, Mali, Mauritania, Mauritius, Morocco, Mozambique, Namibia, Niger, Nigeria, Rwanda, Sao Tome and Principe, Senegal, Seychelles, Sierra Leone, Somalia, South Africa, South Sudan, Sudan, Togo, Tunisia, Uganda, United Republic of Tanzania, Zambia, Zimbabwe.

ASBU elements to maximize, in a timely manner, safety, operational and financial benefits and recommended that ICAO develop a tool to assist States and regions in identifying appropriate ASBU elements. The Commission was informed that a performance-driven strategic planning tool (AN-SPA), which allowed the identification of appropriate ASBU elements for different operating environments, was publicly available on the GANP Portal and ready for validation. States, together with other aviation stakeholders, were encouraged to implement a performance management process and use the tool to assess their needs as well as to provide feedback to ICAO for validation and improvement purposes. The Commission recognized that AN-SPA would have to be further enhanced to meet specific requirements in terms of automation and data analysis. The Commission was also informed that following AN-Conf/13 Recommendation 1.2/1, ICAO enabled a capability on the GANP Portal for States to share relevant implementation information by ASBU element. States were encouraged to share their experience on the implementation of ASBU elements, including the criteria used to select specific operational improvements.

28.13 The Commission acknowledged the importance of aligning global, regional and national efforts regarding air navigation modernization. The Commission agreed that Member States, planning and implementation regional groups (PIRGs) and all members of the aviation community should be urged to continue improving the air navigation system in line with the GANP so that it could adapt to global, regional and local opportunities and challenges in a timely and orderly manner. In particular, the Commission agreed that Member States should be urged to plan, develop and conduct activities, via a collaborative decision-making process, to raise awareness of key ATM concepts. The Commission also agreed that ICAO, Member States and PIRGs should be urged to align regional and national plans with the GANP, with the ICAO regional offices and respective PIRGs facilitating and coordinating activities to achieve regional harmonization and alignment.

28.14 The Commission reviewed A40-WP/450, presented by Colombia and sponsored by LACAC Member States⁷, which analysed the linkage of the national air navigation plan, the maintenance management system (MMS) and the safety management system (SMS) to achieve a high-performance, scalable and integrated air navigation system. The Commission agreed that the seamless interaction of these three instruments would allow appropriate, timely and cost-effective decisions on the essential services and operational improvements outlined in the BBB and ASBU frameworks, respectively, and therefore recommended that ICAO develop guidance material on interlinkages among national air navigation plans, MMS and SMS as part of the interconnection of GANP and GASP.

28.15 The Commission reviewed A40-WP/203, presented by CANSO, on concepts to improve safety, predictability and operational efficiency, taking a holistic approach to new technology and the integration of ATM modernization initiatives into existing systems, while building cyber-resilience and ensuring robust performance measurement. The Commission agreed that, as outlined in the GANP, States should be urged to take a collaborative and concerted effort to: provide for air navigation; promote the enhancement of ATM infrastructure; and ensure interoperability and harmonization of ATM systems to avoid airspace fragmentation.

28.16 The Commission discussed A40-WP/191, presented by the International Air Transport Association (IATA), which highlighted shortcomings in ATM infrastructure and identified three key

⁷ Aruba, Belize, Bolivia, Brazil, Chile, Costa Rica, Cuba, Ecuador, El Salvador, Guatemala, Honduras, Jamaica, Mexico, Nicaragua, Panama, Paraguay, Peru, Dominican Republic and Venezuela (Bolivarian Republic of).

areas as critical for any infrastructure improvement. The Commission agreed that States should be urged to implement, following a proper operational assessment and prioritization applying a performance-based approach, the necessary infrastructure components to support the existing and projected volumes of traffic in alignment with the GANP. To meet this expected growth in demand, the Commission agreed that States should also be urged to engage in partnership with all aviation stakeholders to identify and address infrastructure challenges in a timely manner.

28.17 An information paper provided by the Republic of Korea (A40-WP/378) was noted.

28.18 In light of the discussion, the Commission agreed to submit, for adoption by the Plenary, the following resolution to supersede Assembly Resolution A39-12:

Resolution 28/1: ICAO global planning for safety and air navigation

Whereas ICAO strives to achieve the goal of a safe and orderly development of civil aviation through cooperation among Member States and other stakeholders;

Whereas to realize this goal, the Organization has established Strategic Objectives, including objectives for safety and for capacity and efficiency;

Recognizing the importance of global frameworks to support the Strategic Objectives of ICAO;

Recognizing the importance of effective implementation of regional and national plans and initiatives based on the global frameworks;

Recognizing that further progress in improving the global safety, capacity and efficiency of civil aviation is best achieved through a cooperative, collaborative and coordinated approach in partnership with all stakeholders under the leadership of ICAO; and

Noting the approval by the Council of the ~~second~~ **third** edition of the Global Aviation Safety Plan (GASP) and of the ~~fifth~~ **sixth** edition of the Global Air Navigation Plan (GANP);

The Assembly:

1. *Endorses* the ~~second~~ **third** edition of the Global Aviation Safety Plan (GASP) and the ~~fifth~~ **sixth** edition of the Global Air Navigation Plan (GANP) as the global strategic directions for safety and air navigation, respectively;
2. *Resolves* that ICAO shall implement and keep current the GASP and the GANP to support the relevant Strategic Objectives of the Organization, while ensuring necessary stability;
3. *Resolves* that these global plans shall be implemented and kept current in close cooperation and coordination with all concerned stakeholders;
4. *Resolves* that these global plans shall provide the frameworks in which regional, subregional and national ~~implementation~~ plans will be developed and implemented, thus ensuring consistency,

harmonization and coordination of efforts aimed at improving international civil aviation safety, capacity and efficiency;

5. *Urges* Member States to develop sustainable solutions to fully exercise their safety oversight and air navigation responsibilities which can be achieved by sharing resources, utilizing internal and/or external resources, such as regional and subregional organizations and the expertise of other States;

6. *Urges* Member States to demonstrate the political will necessary for taking remedial actions to address safety and air navigation deficiencies, including those identified by Universal Safety Oversight Audit Programme (USOAP), through the application of GASP, and the GANP objectives and the ICAO regional planning process;

7. *Urges* Member States, the industry and financing institutions to provide the needed support for the coordinated implementation of the GASP and GANP, avoiding duplication of efforts;

8. *Calls upon* States and invites other stakeholders to cooperate in the development and implementation of regional, subregional and national plans based on the frameworks of the GASP and GANP;

9. *Instructs* the Secretary General to promote, make available and effectively communicate the GASP and the GANP; and

10. *Declares* that this resolution supersedes Resolution ~~A38-2~~ A39-12 on ICAO global planning for safety and air navigation.

APPENDIX A

Global Aviation Safety Plan (GASP)

Reaffirming that the primary objective of the Organization continues to be the improvement of safety and an associated reduction in the number of accidents and related fatalities within the international civil aviation system;

Recognizing that safety is a responsibility involving ICAO, Member States and all other stakeholders;

Recognizing the safety benefits that can be drawn from partnerships between States and industry;

Recognizing that the High-level Safety Conference (2010) reaffirmed the need for the ICAO safety framework to continuously evolve to ensure its sustained effectiveness and efficiency in the changing regulatory, economic and technical environment;

Noting that the expected increase in international civil aviation traffic will result in an increasing number of aircraft accidents unless the accident rate is reduced;

Recognizing the need to maintain the public's confidence in air transport by providing access to relevant safety information;

Recognizing that a proactive approach in which a strategy is established to set priorities, targets and indicators to manage safety risks is of paramount importance to the achievement of further improvements in aviation safety;

Recognizing that regional aviation safety groups have been implemented by ICAO, taking into account the needs of the various regions and building on the already existing structures and forms of cooperation;

Noting the intent to apply the safety management principles in the GASP to enhance safety by focusing action where it is most needed;

Noting the development of the global aviation safety roadmap, as an action plan to assist the aviation community in implementing the safety initiatives presented in the GASP, through a structured, common frame of reference for all relevant stakeholders; and

Noting the need to assist Member States in implementing safety management principles and mitigate risks on identified operational issues;

The Assembly:

1. *Stresses* the need for continuous improvement of aviation safety through a reduction in the number of accidents and related fatalities in air transport operations in all parts of the world, particularly in States where safety records are significantly worse than the worldwide average;

2. *Stresses* that limited resources of the international aviation community should be used strategically to support States or regions whose safety oversight maturity is not at an acceptable level;

3. *Urges* Member States to ~~support the GASP objectives by implementing the safety initiatives outlined therein~~ implement national aviation safety plans consistent with the GASP to continually reduce fatalities and the risk of fatalities;

4. *Urges* Member States, regional safety oversight organizations (RSOOs), regional aviation safety groups (RASGs) and international organizations concerned to work with all stakeholders to ~~set priorities, targets and indicators consistent with the GASP objectives goals with the view to reduce the number and rate of aircraft accidents~~ implement regional aviation safety plans consistent with the GASP to continually reduce fatalities and the risk of fatalities;

5. *Urges* States to fully exercise safety oversight of their operators in full compliance with applicable Standards and Recommended Practices (SARPs), and assure themselves that every foreign operators flying into their territory receives adequate oversight from its own State and take appropriate action when necessary to preserve safety; and

6. *Encourages* ICAO to continue the development of the global aviation safety roadmap, as required.

APPENDIX B

Global Air Navigation Plan (GANP)

Whereas the enhancement of the safety, capacity and efficiency of aviation operations is a key element of the ICAO Strategic Objectives;

Having adopted Resolution ~~A38-12~~A40-xx, a consolidated statement of continuing ICAO policies and associated practices related specifically to air navigation;

Recognizing the importance of GANP as an operational strategy and part of the basket of measures ~~for environmental protection~~ to achieve ICAO's global aspirational goals on CO₂ emissions; and

Recognizing that many States and regions are developing new ~~air navigation generation~~ plans for their own air navigation modernization;

The Assembly:

1. *Instructs* the Council to use the guidance in the Global Air Navigation Plan (GANP) to develop and prioritize the technical work programme of ICAO in the field of air navigation;
2. *Urges* the Council to provide States with a standardization roadmap, as announced in the GANP, as a basis for the work programme of ICAO;
3. *Calls upon* States, planning and implementation regional groups (PIRGs), and the aviation industry to utilize the guidance provided in the GANP for planning and implementation activities which establish priorities, targets and indicators consistent with globally-harmonized objectives, taking into account operational needs;
4. *Calls upon* States to take into consideration the GANP guidelines ~~for the implementation of as an efficient-operational measure for environmental protection~~ improvements as part of their national strategy to reduce the environmental impact, including CO₂ emissions, from international aviation;
5. *Calls upon* States, PIRGs, and the aviation industry to provide timely information to ICAO, and to each other, regarding the implementation status of the GANP, including the lessons learned from the implementation of its provisions;
6. *Invites* PIRGs to use ICAO standardized tools or adequate regional tools to monitor and, in collaboration with ICAO, analyse the implementation status of air navigation systems;
7. *Instructs* the Council to publish the results of the analysis on the regional performance dashboards and in an annual global air navigation report including, as a minimum, the key implementation priorities and accrued environmental benefits ~~estimated using CAEP recognized methods~~ associated with the implementation of the operational improvements outlined in the ASBU framework; and
8. *Urges* States that are developing new ~~generation~~ air navigation plans, for their own air navigation modernization, to coordinate with ICAO and align their plans so as to ensure regional and global compatibility and harmonization; and

9. *Instructs* the Council to continue developing the GANP, keeping it current with evolving technology and operational requirements.

Safety Management Policy

28.19 The Commission reviewed A40-WP/52, presented by the Council, proposing updates to Assembly Resolutions A38-3 and A38-4 related to the protection of safety information. The Commission recalled that those Assembly Resolutions instructed the Council, inter alia, to take such steps as may be necessary to ensure meaningful progress toward the development of new and/or enhanced provisions for the protection of safety information in Annex 13 — *Aircraft Accident and Incident Investigation*, Annex 19 — *Safety Management*, other Annexes as appropriate, and related guidance material. Accordingly, in 2016 the Council adopted new amendments to Annexes 13, 19 and Annex 6 — *Operation of Aircraft*. The Commission agreed that the proposed updates to the Assembly Resolutions reflect those Annex amendments and are aligned with relevant ICAO guidance material.

28.20 In light of the above, the Commission agreed to submit, for adoption by the Plenary, the following resolutions to supersede Assembly Resolutions A38-3 and A38-4.

Resolution 28/2: Protection of certain accident and incident investigation records

Whereas the primary objective of the Organization continues to be that of ensuring the safety of international civil aviation worldwide;

Whereas it is essential that cognizance be taken that it is not the purpose of the investigation of accidents and incidents to apportion blame or liability;

Recognizing that it is essential that all relevant information be made available to the accident investigators investigation authorities to facilitate the establishment of the causes and/or contributing factors of accidents and incidents in order to enable preventative action to be taken;

Recognizing that the prevention of accidents is essential to safeguard the continued confidence in air transport;

Recognizing that public attention will continue to focus on States' investigative actions, including calls for access to accident and incident records;

Recognizing that the protection of certain accident and incident records from inappropriate use purposes other than accident or incident investigation is essential to ensure the continued availability of all relevant information to accident investigators investigation authorities in future investigations;

Recognizing that the use of information, derived from accident investigations, for disciplinary, civil, administrative and criminal proceedings is generally not a means to maintain or improve aviation safety;

Recognizing that the measures taken so far to ensure the protection of certain accident and incident records may not be sufficient, and noting the issuance by ICAO of legal and other guidance to assist

~~States in this regard~~ new and enhanced provisions for the protection of accident and incident investigation records in Annex 13 — *Aircraft Accident and Incident Investigation*;

~~Recognizing that the legal guidance in Attachment E to Annex 13, and in Attachment B to Annex 19, will continue to assist many States in the development and implementation of means to protect certain accident and incident records from inappropriate use~~ the need to incorporate into national laws the protection of accident and incident investigation records listed in Annex 13 in order to ensure that the determination of the competent authorities designated by Member States has legal standing and to facilitate the administration of the balancing test by such authorities;

~~Considering that a balance needs to be struck between the need for the protection of safety information accident and incident investigation records and the need for the proper administration of justice their disclosure or use, and that protection should be to a level commensurate with the nature of the information each source generates, as well as with the purpose of disclosure of such information is not aimed at preventing the administration of justice; and~~

~~Mindful that the accident investigation authorities and the civil aviation authorities acknowledged the need for further study by ICAO on the protection of safety information~~ can only afford protection to certain investigation records that are under their custody or control; and

~~Recognizing the Safety Information Protection Task Force established pursuant to recommendations of the High Level Safety Conference 2010 and in response to Resolution A37-2, has promulgated for consideration a number of findings and recommendations with respect to the appropriate use and protection of safety information;~~

The Assembly:

1. ~~Calls~~ on Member States to reaffirm their commitment to protect accident and incident investigation records in compliance with Annex 13;

4.2. ~~Urges~~ Member States to ~~continue to~~ examine and if necessary adjust their laws, regulations and policies to protect ~~certain~~ accident and incident investigation records in compliance with paragraph 5.12 of and Appendix 2 to Annex 13, in order to mitigate impediments to accident and incident investigations, ~~in consideration of the legal guidance for the protection of information from safety data collection and processing systems issued by ICAO~~ and to ensure continued availability of all relevant information to accident investigation authorities; and

2. ~~Instructs~~ the Council, taking into account the findings and recommendations of the Safety Information Protection Task Force and further work informed by those findings and recommendations, to take such steps as may be necessary to ensure meaningful progress toward the development of new and/or amended provisions in Annex 13, other Annexes as appropriate and related guidance material before the next ordinary session of the Assembly; and

3. ~~Declares~~ that this resolution supersedes Resolution ~~A37-2~~ A38-3.

Resolution 28/3: ~~Protecting~~ Protection of safety data and safety information from safety data collection and processing systems in order to maintain and improve aviation safety collected for maintaining or improving safety and of flight recorder recordings in normal operations

Whereas the primary objective of the Organization continues to be that of ensuring the safety of international civil aviation worldwide;

Recognizing the importance of the free communication of safety information amongst the stakeholders of the aviation system;

Recalling that Annex 19 — *Safety Management* accords protection to safety data and safety information collected for maintaining or improving safety and their related sources;

Recognizing that the protection of safety data, safety information from inappropriate use and related sources is essential to ensure their continued availability of all relevant safety information, to enable proper and timely preventive actions to be taken since the use of safety data and safety information for purposes other than maintaining or improving safety may inhibit the future availability of such data and information, with a significant adverse effect on safety;

Considering that a balance needs to be struck between the need for the protection of safety data, safety information and related sources to maintain or improve aviation safety and the need for the proper administration of justice;

Noting that the flight recorder recordings and their transcripts were introduced to support accident and incident investigations;

Whereas Annex 6 — *Operation of Aircraft* provides for protection of flight recorder recordings or transcripts in normal operations;

Mindful of the importance of protecting the flight recorder recordings or transcripts in normal operations, outside of Annex 13-type investigations;

Concerned by a trend for safety information to be used for that safety data, safety information and flight recorder recordings or transcripts in normal operations may be used for purposes other than those for which they were collected, including disciplinary, civil, administrative and criminal and punitive enforcement actions and to be admitted as evidence in judicial proceedings;

Noting the importance of that a balanced reporting environment in which disciplinary action is not taken as consequence of actions by where employees and operational personnel may trust that their actions or omissions that are commensurate with their training and experience will not be punished is fundamental to safety reporting that are commensurate with their experience and training, but where gross negligence or willful violations are not tolerated; and

Mindful that the use of safety information for other than safety-related purposes may inhibit the provision of such information, with an adverse effect on aviation safety;

~~Considering that a balance needs to be struck between the need for the protection of safety information and the need for the proper administration of justice, and that protection should be to a level commensurate with the nature of the information each source generates, as well as with the purpose of disclosure of such information;~~

~~Recognizing that technological advances have made possible new safety data collection, processing and exchange systems, resulting in multiple sources of safety information that are essential in order to maintain and improve aviation safety may expand the type of recordings, safety data and safety information that can be captured by safety reporting systems and flight recorders;~~

~~Noting that existing international laws, as well as national laws, and regulations, policies and practices in many States, may not adequately address the manner in which safety information is protected from inappropriate use;~~

~~Noting the issuance and continuing development by ICAO of legal guidance aimed at assisting States to enact national laws and regulations, and to introduce supportive policies and practices, to protect information gathered from safety data collection and processing systems, while allowing for the proper administration of justice;~~

~~Recognizing that the legal guidance in Attachment E to Annex 13, and in Attachment B to Annex 19, will continue to assist many States in the development and implementation of means to protect information gathered from safety data collection and processing systems;~~

~~Mindful that the civil aviation authorities acknowledged the need for continuing study by ICAO on the protection of safety information; and~~

~~Recognizing the Safety Information Protection Task Force, established pursuant to recommendations of the High Level Safety Conference 2010 and in response to Resolution A37-3, has promulgated for consideration a number of findings and recommendations with respect to the appropriate use and protection of safety information;~~

The Assembly:

1. ~~Calls on Member States to reaffirm their commitment to protect safety data and safety information collected for maintaining or improving safety and their related sources;~~

2. ~~Urges Member States to accord protection to the flight recorder recordings or transcripts in normal operations, outside of Annex 13-type investigations;~~

13. ~~Urges all Member States to continue to examine their existing legislation and adjust as necessary, or enact laws and regulations and introduce supportive policies and practices, to protect safety data, safety information gathered from all relevant safety data collection and processing systems based, to the extent possible, on the legal and other guidance developed by ICAO and related sources, and the flight recorder recordings or transcripts in normal operations;~~

2. ~~Urges the Council to cooperate with Member States and appropriate international organizations regarding the development and implementation of guidance, taking into account the findings and recommendations of the Safety Information Protection Task Force and further work informed by those findings and recommendations, to support the establishment of effective safety reporting systems, and the~~

achievement of a balanced environment where valuable information derived from all relevant safety data collection and processing systems is readily accessible for the purposes of maintaining and improving aviation safety, while respecting principles of administration of justice and freedom of information;

3. ~~Instructs the Council to take appropriate steps to ensure that ICAO Standards and Recommended Practices in Annex 19, other Annexes as appropriate and guidance materials on the protection of information gathered from safety data collection and processing systems (SDCPS) are enhanced, taking into account the findings and recommendations of the Safety Information Protection Task Force and further work informed by those findings and recommendations, with a view to ensuring and sustaining the availability of safety information required for the management, maintenance and improvement of safety, taking into account the necessary interaction between safety and judicial authorities in the context of open reporting culture; and~~

4. *Directs* the Secretary General to continue to provide support to States in implementing the protective frameworks in Annexes 6 and 19; and

45. *Declares* that this resolution supersedes Resolution A37-3 ~~A38-4~~.

28.21 The Commission reviewed A40-WP/213, presented by Singapore, the United States and IATA, and co-sponsored by China, Fiji, Indonesia, Marshall Islands, Nauru, Palau, Papua New Guinea, Philippines, Trinidad and Tobago, the United Kingdom and FSF, which highlighted the progress of State-industry collaborations to establish regional information sharing and data analysis programmes in support of safety risk management. The Commission agreed that States and industry partners should harness and optimize resources to develop safety data collection and analytic capabilities for the fulfilment of regional and global aviation safety priorities and objectives in relation to the GASP. The Commission also recommended that States and industry partners collaborate on the exchange of best practices in safety information sharing and analysis, and share methodologies for safety risk identification, analysis and mitigation. The Commission was informed that ICAO has set up the Safety Management Implementation (SMI) website (www.icao.int/SMI) for the sharing of practical examples and tools related to safety management implementation. States and international organizations have been invited to contribute to the website. The Commission was advised that the actions proposed in A40-WP/213 are addressed at a higher level in the draft Resolution 28/1 contained in A40-WP/51.

28.22 The Commission reviewed A40-WP/361 Revision No. 1, presented by Venezuela (Bolivarian Republic of) and supported by SAM States and LACAC⁸, which highlighted challenges in State safety programme (SSP) implementation. The Commission expressed support for taking into consideration scalability in the implementation of GASP strategies.

28.23 Information papers were provided by Nepal (A40-WP/484), Republic of Korea (A40-WP/430) and the Russian Federation (A40-WP/492).

⁸ Belize, Bolivia, Chile, Costa Rica, Cuba, Ecuador, El Salvador, Guatemala, Guyana, Honduras, Nicaragua, Panama, Paraguay, Peru and Uruguay.

Results of the Thirteenth Air Navigation Conference

28.24 The Commission reviewed A40-WP/12, presented by the Council, which reported on the outcomes of AN-Conf/13. The Commission, in noting the outcomes of AN-Conf/13, urged States to action the recommendations addressed to them.

28.25 The Commission recognized the importance of convening divisional-type meetings, such as air navigation or high-level safety conferences, ahead of Assembly sessions as a mean to recommend additional technical work for ICAO in due time for budgetary preparation for the following triennium. The Commission supported this practice and recommended that it continue. The Commission encouraged States, international organizations and industry stakeholders to support ICAO in accomplishing non-budgeted work stemming from divisional-type meeting recommendations by providing extra-budgetary resources to the Organization. The Commission recognized that convening divisional-type meetings ahead of Assembly sessions allows the Technical Commission to focus on Global Plans and policy decisions, thereby improving the efficiency of Assemblies. Furthermore, the Commission recommended that ICAO highlight to States and international organizations the importance of attendance at divisional-type meetings in order to discuss technical matters.

28.26 The Commission reviewed A40-WP/157, presented by the 54 Contracting States⁹, Members of AFCAC, which highlighted the need to continue strengthening civil-military cooperation and promoting implementation of flexible use of airspace. The Commission was informed that in response to AN-Conf/13 Recommendation 3.4/1 and 3.4/2, approved by Council, these proposals are being addressed. Consequently, and in highlighting the importance of civil-military cooperation and collaboration, the Commission agreed that ICAO and States should continue their efforts in support of this cooperation, as well as in support of flexible use of airspace implementation.

28.27 Information papers provided by India (A40-WP/363) and Bangladesh (A40-WP/503) were noted.

Consolidated statement of continuing ICAO policies

28.28 The Commission reviewed A40-WP/3, presented by the Council in accordance with Resolution A15-9, which requires that the Assembly adopt, at each regular session for which a Technical Session is established, a consolidated statement of continuing ICAO policies and associated practices related specifically to air navigation. The Commission agreed to the changes proposed in the appendix to A40-WP/3.

28.29 In light of the discussion, the Commission agreed to submit, for adoption by the Plenary, the following resolution:

⁹ Algeria, Angola, Benin, Botswana, Burkina Faso, Burundi, Cabo Verde, Cameroon, Central African Republic, Chad, Comoros, Congo, Côte d'Ivoire, Democratic Republic of the Congo, Djibouti, Egypt, Equatorial Guinea, Eritrea, Eswatini, Ethiopia, Gabon, Gambia, Ghana, Guinea, Guinea-Bissau, Kenya, Lesotho, Liberia, Libya, Madagascar, Malawi, Mali, Mauritania, Mauritius, Morocco, Mozambique, Namibia, Niger, Nigeria, Rwanda, Sao Tome and Principe, Senegal, Seychelles, Sierra Leone, Somalia, South Africa, South Sudan, Sudan, Togo, Tunisia, Uganda, United Republic of Tanzania, Zambia, Zimbabwe.

Resolution 28/4: Consolidated statement of continuing ICAO policies and associated practices related specifically to air navigation

Whereas in Resolution A15-9 the Assembly resolved to adopt in each session for which a Technical Commission is established a consolidated statement of continuing policies related specifically to air navigation up to date as at the end of that session;

Whereas a statement of continuing policies and associated practices related specifically to air navigation as they existed at the end of the 37th-38th Session of the Assembly was adopted by the Assembly in Resolution A37-15 A38-12, Appendices A to W-O inclusive;

Whereas the Assembly has reviewed proposals by the Council for the amendment of the statement of continuing policies and associated practices in Resolution A37-15 A38-12, Appendices A to W-O inclusive, and has amended the statement to reflect the decisions taken during the 38th-40th Session;

Whereas a policy or associated practice that requires continued application for a period of more than three years should be regarded as a continuing policy or associated practice; and

Whereas material which is contained in regulatory or readily available authoritative ICAO documents, such as Annexes, Global Plans, rules of procedures and directives to air navigation meetings should normally be excluded from the consolidated statements. This pertains, including, in particular, to the associated practices; and

Whereas the Assembly agreed to develop a new Resolution A38-11 based on Resolution A37-15 Appendices A, D and E, as a continuing policy in respect to formulation and implementation of Standards and Recommended Practices (SARPs), Procedures for Air Navigation Services (PANS) and notification of differences that would apply to all Annexes to the Convention and technical guidance material;

The Assembly:

1. *Resolves* that:
 - a) the Appendices attached to this resolution constitute the consolidated statement of continuing air navigation policies and associated practices of ICAO as they exist at the close of the 38th-40th Session of the Assembly; and
 - b) the practices associated with the individual policies in the appendices constitute guidance intended to facilitate and ensure implementation of the respective policies; and
2. *Requests* the Council to keep the consolidated statement of continuing ICAO policies and associated practices related specifically to air navigation under review and advise the Assembly when changes are required to the statement; and
3. *Declares* that this resolution supersedes Resolutions A37-15 A38-12 with its Appendices and A15-9 except for Appendices A, D and E which are superseded by the new Resolution A38-

APPENDIX A

Air navigation meetings of worldwide scope

Whereas the holding of worldwide air navigation meetings is an important function of ICAO and entails substantial expenditures of effort and money by the Member States and ICAO; and

Whereas it is necessary to ensure that maximum benefit is obtained from these meetings without imposing any undue burden upon the Member States or ICAO;

The Assembly resolves that:

1. meetings, convened by the Council, in which all Member States may participate on an equal basis shall be the principal means of progressing the resolution of problems of worldwide import, including the development of amendments to the Annexes, Global Plans and other basic documents in the air navigation field;
2. such meetings shall be convened only when justified by the number and importance of the problems to be dealt with and when there is the likelihood of constructive action on them; meetings convened on this basis may also be requested to conduct exploratory discussions on matters not mature for definite action;
3. the organization of such meetings shall be arranged so that they are best suited to carry out the assigned task and to provide proper coordination among the technical specialities involved; and
4. unless necessitated by extraordinary circumstances, not more than two such meetings shall be convened in a calendar year, and successive meetings dealing extensively with the same technical specialty shall be separated by at least twelve months.

Associated practices

1. Before deciding to refer a matter to a worldwide meeting, the Council should consider whether correspondence with States or use of machinery such as panels or air navigation study groups could dispose of it or facilitate subsequent action on it by a future meeting.
2. The agenda should be sufficiently explicit to define the task to be performed and to indicate the types of specialized expertise that will be needed at the meeting. In an agenda including more than one technical specialty the types of expertise called for should be kept to the minimum compatible with efficiency.
3. To facilitate the participation of all Member States, the Council should so plan the meeting programme as to keep to the minimum, consistent with efficiency, the demands upon the time of States' technical officials.
4. The planned duration of a meeting should allow adequate time for completion of the agenda, study of the report as drafted in the working languages of the meeting and approval of the report. Following the meeting, the Secretariat should make any necessary minor editorial amendments and typographical corrections to the meeting report.

5. The approved agenda and the main supporting documentation should be dispatched, normally by air, not less than ten months in advance of the convening date in the case of the agenda and not less than three months in the case of the main supporting documentation; other documentation should be dispatched as soon as possible.

APPENDIX B

Panels of the Air Navigation Commission (ANC)

Whereas panels of the Air Navigation Commission have proved a valuable medium for advancing the solution of specialized technical problems; and

Whereas it is necessary to ensure that maximum benefit is obtained from Air Navigation Commission panels without imposing any undue burden upon the Member States or ICAO;

The Assembly resolves that:

1. the Air Navigation Commission shall establish panels if necessary to advance the solution of specialized technical problems which cannot be solved adequately or expeditiously by the Air Navigation Commission through other established facilities;
2. the Air Navigation Commission shall ensure that the terms of reference and the work programmes of panels shall support the ICAO Strategic Objectives, be clear and concise with timelines and shall be adhered to;
3. the Air Navigation Commission shall review periodically the progress of panels and shall terminate panels as soon as the activities assigned to them have been accomplished. A panel shall be allowed to continue in existence only if its continuation is considered justified by the Air Navigation Commission; and
4. panel activity shall support a performance-based approach to SARPs development to the extent possible.

Associated practice

Reports should be clearly presented as the advice of a group of experts to the Air Navigation Commission so that they cannot be construed as representing the views of Member States.

APPENDIX C

Certificates of airworthiness, certificates of competency and licences of flight crews

Whereas Article 33 of the Convention does not explicitly define the purposes for which recognition is to be accorded to certificates and licences;

Whereas several interpretations exist as to whether or not there is any obligation on Member States to recognize certificates and licences issued or rendered valid by other Member States pending the coming into force of SARPs applicable to the aircraft or flight crew involved; and

Whereas with respect to certain categories of aircraft or flight crew licences, it may be many years before SARPs come into force or it may be found most practicable not to adopt SARPs for some categories or flight crew licences;

The Assembly resolves that:

1. certificates of airworthiness and certificates of competency and licences of the flight crew of an aircraft issued or rendered valid by the Member State in which the aircraft is registered shall be recognized as valid by other Member States for the purpose of flight over their territories, including landings and take-offs, subject to the provisions of Articles 32 (b) and 33 of the Convention; and
2. pending the coming into force of international Standards respecting particular categories of aircraft or flight crew, and certificates issued or rendered valid, under national regulations, by the Member State in which the aircraft is registered shall be recognized by other Member States for the purpose of flight over their territories, including landings and take-offs.

APPENDIX D

Qualified and Competent Aviation Personnel

Whereas the satisfactory implementation of SARPs and PANS is contingent upon having qualified and competent personnel;

Whereas difficulties are being experienced by Member States in these matters due to a lack of qualified personnel to support the existing and future air transportation system;

Whereas special effort is required to support Member States in meeting their human resource needs; and

Whereas learning activities conducted by ICAO are an effective means of promoting a common understanding and the uniform application of SARPs and PANS;

The Assembly resolves that:

1. ICAO shall assist Member States in achieving and maintaining competency of aviation personnel through the ICAO Aviation Training Programme;

2. the ICAO Aviation Training Programme shall be governed by the following principles:
 - a) qualification of aviation professionals is the responsibility of Member States;
 - b) the highest priority is placed on learning activities that support the implementation of SARPs;
 - c) cooperation with Member States and industry is essential to develop and implement learning activities to support the implementation of SARPs; and
 - d) priority shall be placed on cultivating the next generation of aviation professionals.
3. ICAO advises operators of training facilities but does not participate in the operation of such facilities; and
4. Member States assist each other to optimize access to learning activities for their aviation professionals.

Associated practices

1. The Council should assist Member States to harmonize aviation professionals' levels of competency. These efforts should be based on:
 - a) data analysis to determine priorities and needs;
 - b) identified training needs for the implementation of ICAO provisions; and
 - c) a competency-based approach.

APPENDIX E

Formulation and Implementation of Regional Plans including Regional Supplementary Procedures

Whereas the Council establishes Regional Plans setting forth the facilities, services and Regional Supplementary Procedures to be provided or employed by Member States pursuant to Article 28 of the Convention;

Whereas the Regional Plans require amendment from time to time to reflect the changing needs of international civil aviation;

Whereas ICAO has established an approach to planning of facilities and services that centres on the Global ATM Operational Concept and the Global Air Navigation Plan; and

Whereas any serious deficiencies in the implementation of Regional Plans may affect the safety, regularity and efficiency of international air operations and, therefore, should be eliminated as quickly as practicable;

The Assembly resolves that:

1. Regional Plans shall be revised when it becomes apparent that they are no longer consistent with current and foreseen requirements of international civil aviation;
2. when the nature of a required change permits, the associated amendment of the Regional Plan shall be undertaken by correspondence between ICAO and Member States and International Organizations concerned; and
3. when amendment proposals are associated with the services and facilities provided by States and such amendment proposals:
 - a) do not represent changes to the requirements set by the Council in the Regional Plans;
 - b) do not conflict with established ICAO policy; and
 - c) do not involve issues which cannot be resolved at the regional level;

the Council may delegate authority for processing and promulgating such amendments to the regional level.

4. Regional Air Navigation (RAN) meetings, although important instruments in the determination of the facilities and services, shall be convened only to address issues which cannot be adequately addressed through the planning and implementation regional groups (PIRGs);
5. priority shall be given in the implementation programmes of Member States to the provision, and continuing operation of those facilities and services, the lack of which would likely have an adverse effect on international air operations;
6. the identification and investigation of and action by ICAO on significant deficiencies in the implementation of Regional Plans shall be carried out in the minimum practicable time; and
7. Planning and implementation regional groups (PIRGs), using a project management approach, shall identify problems and shortcomings in Regional Plans and in the implementation thereof, along with suggested remedial measures.

Associated practices

1. The Council should ensure that the structure and format of Regional Plans is aligned with the Global Air Navigation Plan and is in support of a performance-based approach to planning.
2. In assessing the urgency of any revision of the Regional Plans the Council should take into account the time needed by Member States to arrange for the provision of any necessary additional facilities and services.
3. The Council should ensure that implementation dates in Regional Plans involving the procurement of new types of equipment are realistically related to the ready availability of suitable equipment.

4. The Council should ensure that web-based regional plans are developed, with supporting planning tools, in order to improve efficiency and expedite the amendment cycle.

5. The Council should use the planning and implementation regional groups (PIRGs) it has established throughout the regions to assist in keeping up to date the Regional Plans and any complementary documents.

APPENDIX F

Regional air navigation (RAN) meetings

Whereas RAN meetings are important instruments in the determination of the facilities and services the Member States are expected to provide pursuant to Article 28 of the Convention;

Whereas these meetings entail substantial expenditures of effort and money by Member States and ICAO;

Whereas it is necessary to ensure that maximum benefit is obtained from these meetings without imposing any undue burden on Member States or ICAO; and

Considering that regional air navigation planning is normally accomplished by Planning and Implementation Regional Groups (PIRGs);

The Assembly resolves that:

1. RAN meetings shall be convened only to address issues which cannot be adequately addressed through PIRGs;
2. the convening of such meetings and their agenda shall be based on the existence or expectation of specific shortcomings in the Regional Plans of the respective areas;
3. the geographical area to be considered, account being taken of the existing and planned international air transport and international general aviation operations, the technical fields to be dealt with and the languages to be used shall be decided for each such meeting;
4. the organization best suited to deal with the agenda and to ensure effective coordination among the components of the meeting shall be used for each such meeting; and
5. meetings of limited technical and/or geographical scope shall be convened when specific problems, particularly those requiring urgent solution, need to be dealt with or when convening them will reduce the frequency with which full scale RAN meetings must be held.

Associated practices

1. The Council should endeavour to hold RAN meetings at sites within the areas concerned and should encourage the Member States within those areas to serve as host, either individually or jointly.
2. The approved agenda and the main supporting documentation should be made available, by electronic means, not less than ten months in advance of the convening date in the case of the agenda and not less than three months in the case of the main supporting documentation.
3. The Council should ensure that adequate guidance is made available to RAN meetings on operational and technical matters relevant to their agenda.
4. Each participating Member State should inform itself, in advance of a meeting, on the plans of its air transport operators and its international general aviation for future operations and, similarly, on the expected traffic by other aircraft on its registry and on the overall requirements of these various categories of aviation for facilities and services.
5. The Council, taking into account the requirement to improve still further existing safety levels, should foster the establishment, for and by RAN meetings, of up-to-date planning criteria which would aim to ensure that Regional Plans satisfy the operational requirements and are economically justified.
6. The Council should develop and maintain specific and detailed directives for consideration of implementation matters at RAN meetings.

APPENDIX G

Delimitation of air traffic services (ATS) airspaces

Whereas Annex 11 to the Convention requires a Member State to determine those portions of airspace over its territory within which air traffic services will be provided and, thereafter, to arrange for such services to be established and provided;

Whereas Annex 11 to the Convention also makes provision for a Member State to delegate its responsibility for providing air traffic services over its territory to another State by mutual agreement;

Whereas cooperative efforts between Member States could lead to more efficient air traffic management;

Whereas both the delegating and the providing State can reserve the right to terminate any such agreement at any time; and

Whereas Annex 11 to the Convention prescribes that those portions of the airspace over the high seas where air traffic services will be provided shall be determined on the basis of regional air navigation agreements, which are agreements approved by the Council usually on the advice of regional air navigation meetings;

The Assembly resolves, with reference to regional air navigation plans, that:

1. the limits of ATS airspaces, whether over States' territories or over the high seas, shall be established on the basis of technical and operational considerations with the aim of ensuring safety and optimizing efficiency and economy for both providers and users of the services;
2. established ATS airspaces should not be segmented for reasons other than technical, operational, safety and efficiency considerations;
3. if any ATS airspaces need to extend over the territories of two or more States, or parts thereof, agreement thereon should be negotiated between the States concerned, taking into account the need for cost-effective introduction and operation of CNS/ATM systems, and more efficient airspace management, in particular, in the upper airspace;
4. the providing State in implementing air traffic services within airspace over the territory of the delegating State shall do so in accordance with the requirements of the delegating State, which shall establish and maintain in operation such facilities and services for the use of the providing State as are mutually agreed to be necessary;
5. any delegation of responsibility by one State to another or any assignment of responsibility over the high seas shall be limited to technical and operational functions pertaining to the safety and regularity of the air traffic operating in the airspace concerned;

and, furthermore, *declares* that:

6. any Member State which delegates to another State the responsibility for providing air traffic services within airspace over its territory does so without derogation of its sovereignty; and
7. the approval by the Council of regional air navigation agreements relating to the provision by a State of air traffic services within airspace over the high seas does not imply recognition of sovereignty of that State over the airspace concerned.

Associated practices

1. Member States should seek the most efficient and economic delineation of ATS airspaces, the optimum location of points for transfer of responsibility and the most efficient coordination procedures in cooperation with the other States concerned and with ICAO.
2. Member States should consider, as necessary, establishing jointly a single air traffic services provider to be responsible for the provision of air traffic services within ATS airspace extending over the territories of two or more States or over the high seas.
3. The Council should encourage States providing air traffic services over the high seas to enter, as far as is practicable, into agreements with appropriate States providing air traffic services in adjacent airspaces, so that, in the event the required air traffic services over the high seas cannot be provided, contingency plans, which may require temporary modifications of ATS airspace limits, will be available to be put into effect with the approval of the ICAO Council until the original services are restored.

APPENDIX H

Provision of search and rescue services

Whereas in accordance with Article 25 of the Convention each Member State undertakes to provide such measures of assistance to aircraft in distress in its territory as it may find practicable and to collaborate in coordinated measures which may be recommended from time to time pursuant to the Convention;

Whereas Annex 12 to the Convention contains specifications relating to the establishment and provision of search and rescue services within the territories of Member States as well as within areas over the high seas;

Whereas Annex 12 to the Convention specifies that those portions of the high seas where search and rescue services will be provided shall be determined on the basis of regional air navigation agreements, which are agreements approved by the Council usually on the advice of regional air navigation meetings;

Whereas Annex 12 to the Convention recommends that search and rescue regions should, insofar as practicable, be coincident with corresponding flight information regions and, with respect to those areas over the high seas, maritime search and rescue regions;

Whereas Article 69 of the Convention specifies that, if the Council is of the opinion that the air navigation services of a Member State are not reasonably adequate for the safe operation of international air services, present or contemplated, the Council shall consult with the State directly concerned, and other States affected, with a view to finding means by which the situation may be remedied, and may make recommendations for that purpose; and

Whereas the air navigation services referred to in Article 69 of the Convention include, inter alia, search and rescue services;

The Assembly resolves that:

1. search and rescue regions, whether over States' territories or, in accordance with regional air navigation agreement, over an area greater than a State's sovereign airspace or over the high seas, shall be delimited on the basis of technical and operational considerations, including the desirability of coincident flight information regions, search and rescue regions, and, with respect to areas over the high seas, maritime search and rescue regions, with the aim of ensuring safety, and optimizing efficiency with the least overall cost;
2. States shall ensure the closest practicable cooperation between maritime and aeronautical search and rescue services where they serve the same area and, where practical, establish joint rescue coordination centres to coordinate aeronautical and maritime search and rescue operations;
3. if any search and rescue regions need to extend over the territories of two or more States, or parts thereof, agreement thereon should be negotiated between the States concerned;
4. the providing State in implementing search and rescue services over the territory of the delegating State shall do so in accordance with the requirements of the delegating State, which shall establish and maintain in operation such facilities and services for the use of the providing State as are mutually agreed to be necessary;

5. any delegation of responsibility by one State to another or any assignment of responsibility over the high seas shall be limited to technical and operational functions pertaining to the provision of search and rescue services in the area concerned;

6. remedies to any inadequacies in the provision of efficient search and rescue services, including over the high seas, should be sought through negotiations with States which may be able to give operational or financial assistance in search and rescue operations, with a view to concluding agreements to that effect;

and, furthermore, *declares* that:

7. any Member State which delegates to another State the responsibility for providing search and rescue services within its territory does so without derogation of its sovereignty; and

8. the approval by Council of regional air navigation agreements relating to the provision by a State of search and rescue services within areas over the high seas does not imply recognition of sovereignty of that State over the area concerned.

Associated practices

1. Member States should, in cooperation with other States and ICAO, seek the most efficient delineation of search and rescue regions and consider, as necessary, pooling available resources or establishing jointly a single search and rescue organization to be responsible for the provision of search and rescue services within areas extending over the territories of two or more States or over the high seas.

2. The Council should encourage States whose air coverage of the search and rescue regions for which they are responsible cannot be ensured because of a lack of adequate facilities, to request assistance from other States to remedy the situation and to negotiate agreements with appropriate States regarding the assistance to be provided during search and rescue operations.

APPENDIX I

Coordination and cooperation of civil and military air traffic

Whereas the airspace is a resource common to both civil and military aviation, and given that many air navigation facilities and services are provided and used by both civil and military aviation;

Whereas the Preamble of the *Convention on International Civil Aviation* stipulates that signatories thereto had “agreed on certain principles and arrangements in order that international civil aviation may be developed in a safe and orderly manner and that international air transport services may be established on the basis of equality of opportunity and operated soundly and economically”;

Whereas Article 3 a) of the Convention states that “This Convention shall be applicable only to civil aircraft, and shall not be applicable to state aircraft” and Article 3 d) requires that “contracting States undertake, when issuing regulations for their state aircraft, that they will have due regard for the safety of navigation of civil aircraft”;

Recognizing that growing civil air traffic and mission-oriented military air traffic would benefit greatly from a more flexible use of airspace used for military purposes and that satisfactory solutions to the problem of cooperative access to airspace have not evolved in all areas;

Whereas the flexible use of airspace by both civil and military air traffic may be regarded as the ultimate goal, improvement in civil/military coordination and cooperation offers an immediate approach towards more effective airspace management; and

Recalling that the ICAO Global ATM Operational Concept states that all airspace should be a usable resource, any restriction on the use of any particular volume of airspace should be considered transitory, and all airspace should be managed flexibly;

The Assembly resolves that:

1. the common use by civil and military aviation of airspace and of certain facilities and services shall be arranged so as to ensure the safety, regularity and efficiency of civil aviation as well as to ensure the requirements of military air traffic are met;
2. the regulations and procedures established by Member States to govern the operation of their state aircraft over the high seas shall ensure that these operations do not compromise the safety, regularity and efficiency of international civil air traffic and that, to the extent practicable, these operations comply with the rules of the air in Annex 2;
3. the Secretary General shall provide guidance on best practices for civil/military coordination and cooperation;
4. Member States may include, when appropriate, representatives of military authorities in their delegations to ICAO meetings; and
5. ICAO serves as an international forum that plays a role in facilitating improved civil/military cooperation, collaboration and the sharing of best practices, and to provide the necessary follow-up activities that build on the success of the Global Air Traffic Management Forum on Civil/Military Cooperation (2009) with the support of civil/military partners.

Associated practices

1. Member States should as necessary initiate or improve the coordination and cooperation between their civil and military air traffic services to implement the policy in Resolving Clause 1 above.
2. When establishing the regulations and procedures mentioned in Resolving Clause 2, the State concerned should coordinate the matter with all States responsible for the provision of air traffic services over the high seas in the area in question.
3. The Council should ensure that the matter of civil and military coordination and cooperation in the use of airspace is included, when appropriate, in the agenda of divisional and regional meetings, in accordance with Resolving Clauses 3, 4 and 5 above.

APPENDIX J

The provision of adequate aerodromes

Whereas major improvements to the physical characteristics of aerodromes are required at many locations;

Whereas in certain cases these improvements will involve considerable outlay and it would be inadvisable to plan such work without taking into account future developments;

Whereas States and aerodrome authorities will continue to need to know the general trends in aerodrome requirements which succeeding generations of aircraft will most likely produce;

Whereas many serious problems can be avoided if the operating requirements of new aircraft are such as to permit them to operate economically without further demands on the physical characteristics of aerodromes;

Whereas the operation of aerodromes has many advantages, environmental considerations have imposed limitations upon the operation of aircraft at some locations. In view of the capacity problems currently experienced globally, account should be taken of the introduction into service of newer quieter aircraft;

Whereas there is a growing trend for aerodromes to be operated by autonomous entities, the obligation of States to ensure safe aerodrome facilities and services remains unaffected; and

Whereas aerodrome certification is an essential means to ensure aerodrome safety and enhance efficiency, and that the results of the ICAO Universal Safety Oversight Audit Programme (USOAP) audits suggest that the level of implementation of aerodrome certification, including safety management systems (SMS), is not yet optimal;

The Assembly resolves that:

1. the technical requirements for aerodromes shall be kept under review by ICAO;
2. there is a need for future generations of aircraft to be designed so that they are capable of being operated efficiently, and with the least possible environmental disturbance, from aerodromes used for the operation of present-day aircraft;
3. States should take necessary measures, including the allocation of adequate resources, to improve the level of implementation of aerodrome certification, including SMS at aerodromes; and
4. States should place greater emphasis on the management of aerodrome operations, with runway safety given a high priority.

Associated practices

1. In the light of the results of the continuing review mentioned in Resolving Clause 1 above, the Council, taking into account the requirement to improve still further existing safety levels and efficiency, should:

- a) develop additional guidance material on future developments;
- b) develop procedures for the management of aerodrome operations; and
- c) keep Member States informed of developments.

2. The Council should continue to draw the attention of aircraft manufacturers and operators to the policy expressed in Resolving Clause 2.

APPENDIX K

Adequate conditions of employment for aviation ground personnel

Whereas conditions of employment that do not correspond to the qualifications and responsibilities of aviation ground services personnel constitute a major cause of difficulty in recruiting suitably qualified personnel and retaining them after completion of the training; and

Whereas this difficulty is impeding the satisfactory implementation of Regional Plans, SARPs and PANS;

The Assembly resolves that States should take the necessary steps to ensure that conditions of employment for personnel in the aviation ground services should be commensurate with the qualifications required and the responsibility carried by them.

APPENDIX L

Participation by States in the technical work of ICAO

Whereas the technical contributions of Member States are essential to attain satisfactory progress in the technical work of ICAO;

Whereas difficulties are from time to time experienced in obtaining prompt and adequate contributions from Member States to the technical work of ICAO; and

Whereas it is necessary to ensure that maximum benefit is obtained from this participation without imposing an undue burden on Member States and ICAO;

The Assembly resolves that there is a need for effective technical contributions from Member States to the technical work of ICAO.

Associated practices

1. The Council should encourage effective participation by Member States in the technical work of ICAO, paying due regard to the need to minimize the cost to ICAO and Member States of such participation.
2. Insofar as each may find it practicable, Member States should:
 - a) assist, by correspondence, in advancing ICAO technical projects;
 - b) attend ICAO meetings and participate actively in pre-meeting preparations, particularly by presenting advance documentation containing either specific proposals relative to items of the agenda or their views on documentation submitted to them;
 - c) participate in ICAO panel activities and ensure that their nominees are suitably qualified and are able to contribute effectively to the panel work;
 - d) undertake specialized studies as requested by ICAO; and
 - e) assist ICAO in its technical work through any other means the Council may devise.

APPENDIX M

The Headquarters' and Regional Offices' technical Secretariat

Whereas there is a continuing need to provide effective assistance to Member States in the implementation of Regional Plans, SARPs, PANS and SUPPs;

Whereas it is important that the technical Secretariat of Headquarters and the Regional Offices is effectively used to provide assistance to Member States in their implementation problems; and

Whereas it is important that, for the proper execution of their tasks, the members of the technical Secretariat of Headquarters and the Regional Offices are enabled to maintain their technical proficiency and are kept adequately informed of the latest developments in their particular fields;

The Assembly resolves that:

1. the resources of the Headquarters' and Regional Offices' technical Secretariat shall be effectively deployed to provide optimum assistance to Member States with their problems relating to continuous monitoring activities, the implementation of Regional Plans, SARPs, PANS and SUPPs; and
2. the members of the Headquarters' and Regional Offices' technical Secretariat shall be enabled to maintain their technical proficiency and to keep adequately informed on the latest technical developments.

Associated practices

1. The members of the Headquarters' and Regional Offices' technical Secretariat should be enabled to carry out frequent visits of adequate duration when such visits are necessary or are requested by Member States to assist them with their implementation problems.
2. To the maximum practicable extent, temporary assignment of specialized personnel from one Regional Office to another and from Headquarters to the Regional Offices should take place when temporary reinforcement in the Regional Offices is required.
3. The members of the Headquarters' and Regional Offices' technical Secretariat should be enabled to keep adequately up to date in their particular fields by, inter alia, attendance at selected technical meetings, visits to research and development organizations, witnessing trial applications, and evaluation of new equipment and techniques. However, such visits should not be allowed to take priority over the primary function of the Secretariat to serve ICAO and its several deliberative bodies. Furthermore, the travelling on such visits should be integrated as far as possible with travel necessary for the performance of other ICAO duties.

APPENDIX N

Cooperation among Member States in investigations of aircraft accidents

Whereas it is incumbent on the State in which an accident occurs to institute an inquiry into the circumstances of the accident in conformity with Article 26 of the Convention;

Whereas owing to the growing sophistication and complexity of modern aircraft, the conduct of an accident investigation may require participation by experts from many specialized technical and operational fields and access to specially equipped facilities for investigation;

Whereas many Member States do not have such specialized technical and operational expertise and appropriate facilities;

Whereas it is essential for flight safety and accident prevention that accidents be thoroughly investigated and reported and that the effectiveness of the investigations should not be unduly hampered by considerations of cost;

Whereas the costs of salvage and investigation of major aircraft accidents may place a heavy financial burden on the resources of the State where the accident occurred; and

Mindful of the publication of the ICAO *Manual on Regional Accident and Incident Investigation Organization* (Doc 9946);

The Assembly resolves to recommend that Member States cooperate in the investigation of aircraft accidents, especially accidents in which the investigation requires highly specialized experts and facilities and that to this end Member States and regional accident and incident investigation organizations (RAIOs), to the extent possible, inter alia:

- a) provide, on request by other Member States, expert assistance and facilities for the investigation of major aircraft accidents; and
- b) afford opportunity to Member States seeking investigation experience to attend investigations of aircraft accidents, in the interest of developing and furthering investigation expertise.

Associated practices

1. Member States are encouraged to support the convening of regional accident investigation workshops with a view to exchanging information on each State's investigation legislation and procedures, on the sharing of knowledge and expertise in investigation management and techniques, on the availability of experts and facilities and on practices in dealing with encountered accident investigation difficulties.
2. Member States should be encouraged to facilitate the participation of investigators of accident investigation authorities as observers in investigations in other States for training purposes and orientation visits.
3. Member States and RAIOS are encouraged to assess their needs and capabilities in the field of aircraft accident investigation and prevention with a view to developing training curricula for basic accident investigation and prevention courses. The use of regional training centres for such courses should be fully explored as well as the incorporation of the TRAINAIR PLUS methodology which provides for internationally standardized and competency-based training.
4. Member States are encouraged to refer to the model Memorandum of Understanding (MOU) developed by ICAO in 2007 for use by States to encourage mutual cooperation during the investigation of aircraft accidents and serious incidents. The model MOU is available on the ICAO public website.
5. Member States are encouraged to consider, as necessary, the ICAO *Manual on Regional Accident and Incident Investigation Organization* (Doc 9946) which provides guidance on how to establish and manage a regional accident and incident investigation system within a region or subregion.

APPENDIX O

Human performance

Whereas the aims and objectives of ICAO as laid down by the Chicago Convention provide for fostering the development of international air transport “. . . so as to . . . promote safety of flight in international air navigation”;

Whereas it is recognized that human performance, as influenced by physiological and cognitive capabilities and constraints, contributes significantly to the overall safety performance of the aviation system;

Whereas it is recognized that the safety and efficiency benefits associated with new technologies, systems and procedures can only be realized when they are designed to enhance the performance of the individuals who use them; and

Whereas it is recognized that implementation of the future aviation systems will result in changes in roles for aviation professionals requiring work across multi-disciplinary teams to support collaborative decision-making;

The Assembly resolves that:

1. Member States ensure the integration of human performance considerations in the planning, design, and implementation of new technologies, systems and processes as part of a safety management approach;
2. Member States promote and facilitate the integration of human performance elements within competency-based training programmes throughout the career of a professional; and
3. Member States include strategies which promote safe, consistent, efficient and effective operational performance of the individual and across teams of individuals to address safety priorities.

— END —