



**INTERNATIONAL CIVIL AVIATION ORGANIZATION**

## **FINAL REPORT**

**SECOND MEETING OF THE ASIA/PACIFIC WILDLIFE HAZARD MANAGEMENT  
WORKING GROUP (AP-WHM WG/2)**

VIRTUAL MEETING, 27 TO 29 MAY 2020

The views expressed in this Report should be taken as those  
of the Meeting and not the Organization

Approved by the Meeting and published by the  
ICAO Asia and Pacific Office, Bangkok

## TABLE OF CONTENT

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|   | Page |
|---|------|
| 1. Introduction .....                                     | i-1  |
| 2. Attendance .....                                       | i-1  |
| 3. Opening of the Meeting .....                           | i-1  |
| 4. Election of Chairperson .....                          | i-1  |
| 5. Working Arrangements, Language and Documentation ..... | i-1  |
| 6. Conclusions and Decisions.....                         | i-1  |
| 7. Terms of Reference of AP-WHM/WG.....                   | i-2  |
| 8. List of Draft Conclusions and Draft Decisions.....     | i-3  |

### **Report on Agenda Items**

|  |   |
|--|---|
| Agenda Item 1: Adoption of Agenda .....  | 1 |
| Agenda Item 2: Review Outcomes of Relevant Meetings/Seminars.....  | 1 |
| Agenda Item 3: Global, Regional and National Guidance/Best Practices on Wildlife<br>Hazard Management .....      | 2 |
| Agenda Item 4: Progress Update on Tasks assigned to States and International/<br>Regional Organizations.....     | 5 |
| Agenda Item 5: Asia Pacific Regional Guidance on Implementation of Wildlife<br>Hazard Management Programme ..... | 7 |
| Agenda Item 6: Any Other Business .....  | 8 |
| Agenda Item 7: AP-WHM/WG Task List.....  | 8 |
| Agenda Item 8: Date and Venue of Next Meeting .....  | 8 |

### **Appendix to the Report**

Appendix A – AP-WHM/WG Task List

### **Attachments to the Report**

Attachment A – List of Participants

Attachment B – List of Papers

## 1. Introduction

1.1 The Second Meeting of the Asia/Pacific Wildlife Hazard Management Working Group (AP-WHM WG/2) was held as a virtual meeting from 27 to 29 May 2020.

## 2. Attendance

2.1 The Meeting was attended by 70 participants from 15 Member States, Association of Asia Pacific Airlines (AAPA), Airports Council International (ACI), International Federation of Air Line Pilots' Associations (IFALPA), World Birdstrike Association (WBA), ICAO and Mastermark (Observer).

2.2 The List of Participants is placed at **Attachment A** to this Report.

## 3. Opening of the meeting

3.1 Dr Punya Raj Shakya, Regional Officer/AGA, ICAO Asia and Pacific Office welcomed the delegates to AP-WHM WG/2. Dr Shakya recapitulated the objectives of AP-WHM WG and expressed his appreciation to the participation from States and International Organizations.

3.2 Mr Deo Chandra Lal Karn, Chairperson of AP-WHM WG, welcomed the participants and delivered his opening remarks.

## 4. Officers and Secretariat

4.1 Mr Deo Chandra Lal Karn, Chairperson of AP-WHM WG, presided over the meeting. Mr Steven Ka Ho Pang, Regional Officer/AGA, ICAO Asia and Pacific Office, was the Secretary of the Meeting.

## 5. Working Arrangements, Language and Documentation

5.1 The working language of the meeting was English inclusive of all documentation and this report. There were 11 Working Papers, 5 Information Papers and 1 Presentation considered by the Meeting. A List of Papers and Presentations is included at **Attachment B** to this Report.

## 6. Conclusions and Decisions

### Draft Conclusions, Draft Decisions and Decisions of AP-WHM/WG – Definition

6.1 The AP-WHM WG recorded its actions in the form of Draft Conclusions, Draft Decisions and Decisions within the following definitions:

- a) **Draft Conclusions** deal with matters that, according to APANPIRG Terms of Reference, require the attention of States, or action by the ICAO in accordance with established procedures;
- b) **Draft Decisions** deal with the matters of concern only to APANPIRG and its contributory bodies; and
- c) **Decisions** of AP-WHM/WG relate solely to matters dealing with the internal working arrangements of the AP-WHM WG.

## **7. Terms of Reference of AP-WHM WG**

7.1 The amended Terms of Reference of AP-WHM WG, approved by the Third Meeting of the Aerodrome Operations and Planning Sub Group (AOP/SG/3) (Bangkok, Thailand, 24 to 26 June 2019) includes inter alia the following:

### **TERMS OF REFERENCE WILDLIFE HAZARD MANAGEMENT WORKING GROUP (WHM SWG)**

#### **Objective:**

To assist States to establish a National Wildlife Hazard Management Committee and an Airport Wildlife Hazard Management Programme.

#### **Scope of works:**

To meet the above objectives, the Working Group shall carry out the following tasks:

- 1) Develop a model TOR for National Wildlife Hazard Management Committee;
- 2) Monitor the establishment of a National Wildlife Hazard Management Committee by the States.
- 3) Assist in conducting workshop/seminar on Global and Regional Guidance on WHM;
- 4) Develop Asia Pacific Regional Guidance on Airport Wildlife Hazard Management Programme, as needed;
- 5) Share the best practices on the measures adopted by member States/Administrations to prevent wildlife strike hazards at or in the vicinity of aerodromes;
- 6) Develop a performance measurement metrics to evaluate the effectiveness of the implementation of the Airport Wildlife Hazard Management Programme by the aerodrome operator; and
- 7) Be consistent with ICAO Annex 14, Volume I – Aerodrome Design and Operations, PANS-Aerodromes (Doc 9981), Doc 9137 Airport Services Manual, Part 3 – Wildlife Control and Reduction, ICAO Bird Strike Information System (Doc 9332) and other requirements where applicable.
- 8) Analysis of the regional problems/issues in wildlife hazard management fields.

#### **Composition:**

The Working Group would be composed of subject matter experts nominated by APAC States / Administrations and International Organization satisfying the criteria:

- (1) Minimum 3 years of work experience in CAA Aerodrome Regulatory Department or in International Organizations or Aerodrome Operations at international airports in wildlife hazard management field;

- (2) Familiar with Annex 14 and related guidance materials; and
- (3) The nominated expert will continue to be a member for a minimum of three consecutive years.

States in other ICAO regions and industry partners with experience in wildlife hazard management may also be invited to participate in the Working Group.

**Conduct of the work and timeframe:**

As far as practicable, the work would be carried out through electronic correspondences and web-conferences. Minimum face-to-face meetings would be planned.

**Time frame:**

The Working Group would complete its work by September 2021.

**8. List of Draft Conclusions, Draft Decisions and Decisions**

| <b>Draft Conclusion AP-WHM WG/2-1: Submission of Wildlife Strike Reports</b>   |  |
|--|--|
| <b>What:</b> That, States are requested to submit wildlife strike reports to ICAO in the format of either ECCAIRS.e5f files or the standard ICAO ECCAIRS Excel-based form.   | <b>Expected impact:</b><br><input checked="" type="checkbox"/> Political / Global<br><input type="checkbox"/> Inter-regional<br><input type="checkbox"/> Economic<br><input type="checkbox"/> Environmental<br><input checked="" type="checkbox"/> Ops/Technical |
| <b>Why:</b> To facilitate wildlife strike occurrence reporting and data analysis.  | <b>Follow-up:</b> <input checked="" type="checkbox"/> Required from States   |
| <b>When:</b> 9-Sep-20  | <b>Status:</b> Draft to be adopted by PIRG   |
| <b>Who:</b> <input checked="" type="checkbox"/> Sub groups <input checked="" type="checkbox"/> APAC States <input checked="" type="checkbox"/> ICAO APAC RO <input type="checkbox"/> ICAO HQ <input type="checkbox"/> Other: Nil |  |

| <b>Draft Conclusion AP-WHM WG/2-2: Wildlife Hazard Management Training</b>   |  |
|--|--|
| <b>What:</b> That, States recognise the prioritised need for competent and trained personnel in aerodrome wildlife hazard management at regulatory and aerodrome operation levels.   | <b>Expected impact:</b><br><input checked="" type="checkbox"/> Political / Global<br><input type="checkbox"/> Inter-regional<br><input type="checkbox"/> Economic<br><input type="checkbox"/> Environmental<br><input checked="" type="checkbox"/> Ops/Technical |
| <b>Why:</b> To reduce the risk associated to wildlife activities by the provision of competent wildlife hazard management personnel at aerodromes.   | <b>Follow-up:</b> <input checked="" type="checkbox"/> Required from States   |
| <b>When:</b> 9-Sep-20  | <b>Status:</b> Draft to be adopted by PIRG   |
| <b>Who:</b> <input checked="" type="checkbox"/> Sub groups <input checked="" type="checkbox"/> APAC States <input checked="" type="checkbox"/> ICAO APAC RO <input type="checkbox"/> ICAO HQ <input type="checkbox"/> Other: Nil |  |

| <b>Draft Conclusion AP–WHM WG/2–3: Promotion of a Positive Safety Culture</b>   |  |
|---|--|
| <b>What:</b> That, <ul style="list-style-type: none"> <li>• States are encouraged to promote a positive safety culture in wildlife hazard management at regulatory and aerodrome operation levels; and</li> <li>• Reporting culture be considered in implementing aerodrome wildlife hazard management programmes.</li> </ul> | <b>Expected impact:</b><br><input checked="" type="checkbox"/> Political / Global<br><input type="checkbox"/> Inter-regional<br><input type="checkbox"/> Economic<br><input type="checkbox"/> Environmental<br><input checked="" type="checkbox"/> Ops/Technical |
| <b>Why:</b> To enhance reporting on wildlife  | <b>Follow-up:</b> <input checked="" type="checkbox"/> Required from States   |
| <b>When:</b> 9-Sep-20   | <b>Status:</b> Draft to be adopted by PIRG   |
| <b>Who:</b> <input checked="" type="checkbox"/> Sub groups <input checked="" type="checkbox"/> APAC States <input checked="" type="checkbox"/> ICAO APAC RO <input type="checkbox"/> ICAO HQ <input type="checkbox"/> Other: Nil  |  |

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**Agenda Item 1: Adoption of Provisional Agenda (WP/01)**

1.1 The Provisional Agenda presented in WP/01 was adopted as Agenda for the Meeting.

|                |  |
|----------------|--|
| Agenda Item 1: | Adoption of agenda   |
| Agenda Item 2: | Review outcomes of related Meetings/Seminars   |
| Agenda Item 3: | Global, Regional and National Guidance/Best Practices on Wildlife Hazard Management      |
| Agenda Item 4: | Progress Update on Tasks assigned to States and International/Regional Organizations     |
| Agenda Item 5: | Asia Pacific Regional Guidance on Implementation of Wildlife Hazard Management Programme |
| Agenda Item 6: | Any Other Business   |
| Agenda Item 7: | AP-WHM WG Task List  |
| Agenda Item 8: | Date and Venue of Next Meeting   |

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**Agenda Item 2: Review Outcomes of related Meetings/Seminars**Outcomes of APANPIRG/30 Meeting (IP/03)

2.1 The Secretariat provided a brief summary of APANPIRG/30 Meeting, held in Bangkok, Thailand from 4 to 6 September 2019, with particular highlights on the Decisions and Conclusions adopted by AOP/SG/3 and noted by APANPIRG/30. The Report of APANPIRG/30 Meeting can be accessed at: <https://www.icao.int/APAC/Meetings/Pages/2019-APANPIRG30.aspx>

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**Agenda Item 3: Global, Regional and National Guidance/Best Practices on Wildlife Hazard Management**

Submission of Wildlife Strike Reports to ICAO (WP/02)

3.1 The Secretariat presented the new submission formats for wildlife strike reports to ICAO.

3.2 In order to better facilitate occurrence reporting and data analysis, as announced in ICAO EB 2017/25, ICAO had replaced the old IBIS computer application with a new reporting system based on the European Co-ordination Centre for Accident and Incident Reporting Systems (ECCAIRS) platform. A User Manual and Software Installation Manual of ECCAIRS is available at <http://www.icao.int/ibis> for States interested in the platform.

3.3 States were requested to submit the wildlife strike reports either through ECCAIRS.e5f files, or through an ECCAIRS Excel-based form that could be downloaded at <http://www.icao.int/ibis>. The files should be sent to the following email addresses:

[wildlife@icao.int](mailto:wildlife@icao.int), [icaohq@icao.int](mailto:icaohq@icao.int), [aoi@icao.int](mailto:aoi@icao.int), and [iaa@icao.int](mailto:iaa@icao.int)

3.4 The Chairperson enquired if States faced difficulties in using the prescribed means to submit wildlife strike reports. Fiji, Pakistan and USA expressed that there was no issue with the submission to ICAO. Malaysia expressed that the data could be stored in the ECCAIRS Excel-based form but the same form could not be used for further analysis by Malaysia. The meeting later noted that the form could be used for analysis by enabling the pivot function in the Excel-based form, whereas some States used an alternative method to conduct analysis.

3.5 Upon Chairperson’s enquiry, Mastermark stated that there were a number of wildlife hazard management software available in the market to assist aerodrome operators in recording, reporting and analysis of wildlife events. India also shared its experience in using a wildlife hazard management software at Bangalore Airport with positive outcomes.

3.6 USA expressed that it was difficult to come to a simple definition about wildlife strikes since it could involve multiple factors, such as the proper reporting parties and the evidence required to establish a strike. In addition, USA stressed that the quality control of strike reports was as important as the collection of reports. However, the current IBIS database did not allow data sharing among States, and it would be difficult for one State to receive or verify the strike events involving its airlines taken place in another State. USA also expressed that each State should determine the party to collect and analyze the reports considering the workload involved (e.g. CAA, National Wildlife Strike Committee or university), so that appropriate quality control could be applied.

3.7 To further enhance the awareness on this issue, the AP-WHM WG/2 formulated the following Draft Conclusion for adoption by the APANPIRG/31 after its endorsement by AOP/SG/4:

| <b>Draft Conclusion AP–WHM WG/2–1: Submission of Wildlife Strike Reports</b>   |   |
|--|---|
| <p>What: That, States are requested to submit wildlife strike reports to ICAO in the format of either ECCAIRS.e5f files or the standard ICAO ECCAIRS Excel-based form.</p> | <p>Expected impact:</p> <ul style="list-style-type: none"> <li><input checked="" type="checkbox"/> Political / Global</li> <li><input type="checkbox"/> Inter-regional</li> <li><input type="checkbox"/> Economic</li> <li><input type="checkbox"/> Environmental</li> <li><input checked="" type="checkbox"/> Ops/Technical</li> </ul> |
| <p>Why: To facilitate wildlife strike occurrence reporting and data analysis</p>   | <p>Follow-up: <input checked="" type="checkbox"/> Required from States</p>  |

|   |                                     |
|---|-------------------------------------|
| When: 9-Sep-20  | Status: Draft to be adopted by PIRG |
| Who: <input checked="" type="checkbox"/> Sub groups <input checked="" type="checkbox"/> APAC States <input checked="" type="checkbox"/> ICAO APAC RO <input type="checkbox"/> ICAO HQ <input type="checkbox"/> Other: Nil |                                     |

Challenges in Wildlife Hazard Management for Aerodrome Operators in Asia-Pacific (WP/03)

3.8 Presented by ACI, WP/03 delivered the major challenges in wildlife hazard management that aerodrome operators in Asia-Pacific are facing and suggests a way forward to continue to meet these challenges.

3.9 The challenges covered in the WP included the lack of wildlife hazard management plan, the lack of resources and training and the lack of a positive safety culture and communication. Way forward suggested in the WP included the continuation of joint ICAO/ACI seminars and symposiums, continuation of promotion of a positive safety culture, promotion of online training and continuation of cooperation in APEX in Safety.

3.10 The Meeting noted that there were a number of wildlife hazard management courses available but some aerodromes still faced the problem of staff competency in their wildlife hazard management unit. It was agreed that the issue could be caused by insufficient awareness among aerodrome senior management, thus resulting in the lack of resources in the area.

3.11 With reference to WP/03 and the discussion by the Meeting, the AP-WHM WG/2 Meeting formulated the following Draft Conclusions for adoption by APANPIRG/31 after endorsement by AOP/SG/4:

|   |   |
|---|---|
| <b>Draft Conclusion AP-WHM WG/2-2: Wildlife Hazard Management Training</b>  |   |
| What: That, States recognise the prioritised need for competent and trained personnel in aerodrome wildlife hazard management at regulatory and aerodrome operation levels.   | Expected impact:<br><input checked="" type="checkbox"/> Political / Global<br><input type="checkbox"/> Inter-regional<br><input type="checkbox"/> Economic<br><input type="checkbox"/> Environmental<br><input checked="" type="checkbox"/> Ops/Technical |
| Why: To reduce the risk associated to wildlife activities by the provision of competent wildlife hazard management personnel at aerodromes.   | Follow-up: <input checked="" type="checkbox"/> Required from States   |
| When: 9-Sep-20  | Status: Draft to be adopted by PIRG   |
| Who: <input checked="" type="checkbox"/> Sub groups <input checked="" type="checkbox"/> APAC States <input checked="" type="checkbox"/> ICAO APAC RO <input type="checkbox"/> ICAO HQ <input type="checkbox"/> Other: Nil |   |

|   |   |
|---|---|
| <b>Draft Conclusion AP-WHM WG/2-3: Promotion of a Positive Safety Culture</b>   |   |
| What: That,<br><ul style="list-style-type: none"> <li>• States are encouraged to promote a positive safety culture in wildlife hazard management at regulatory and aerodrome operation levels; and</li> <li>• Reporting culture be considered in implementing aerodrome wildlife hazard management programmes.</li> </ul> | Expected impact:<br><input checked="" type="checkbox"/> Political / Global<br><input type="checkbox"/> Inter-regional<br><input type="checkbox"/> Economic<br><input type="checkbox"/> Environmental<br><input checked="" type="checkbox"/> Ops/Technical |

|       |  |            |  |
|-------|--|------------|--|
| Why:  | To enhance reporting on wildlife   | Follow-up: | <input checked="" type="checkbox"/> Required from States |
| When: | 9-Sep-20   | Status:    | Draft to be adopted by PIRG                              |
| Who:  | <input checked="" type="checkbox"/> Sub groups <input checked="" type="checkbox"/> APAC States <input checked="" type="checkbox"/> ICAO APAC RO <input type="checkbox"/> ICAO HQ <input type="checkbox"/> Other: Nil |            |  |

3.12 The Secretariat revealed that a draft regional guidance on Aerodrome Operations Personnel Competency Requirement Framework will be submitted to AOP/SG/4 in July 2020 for consideration. In addition, the upcoming amendment to PANS-Aerodrome (Doc 9981) would include procedures about training for wildlife management personnel.

3.13 The Chairperson requested and ACI agreed to follow up on the provision of wildlife hazard management training in the APAC region.

#### Wildlife Hazard from the Pilots' Point of View (WP/04)

3.14 Presented by IFALPA, WP/04 delivered the pilots' point of view on the matter of wildlife hazard and how pilots are willing to help mitigating the threats posed by it.

3.15 In addition, the WP also covered the wildlife management issues during the COVID-19 pandemic, and suggested all stakeholders working together and sharing information to cope with the situation.

#### Demonstration of Smart Wildlife App (PPT)

3.16 WBA demonstrated the use of a smart software application for wildlife recording and analysis. A number of functions was exhibited, including recording of wildlife presence, recording of wildlife dispersal, generation of reports and dashboard, strike risk calculation, etc.

#### Adoption of Amendment 15 to Annex 14, Volume I (IP/01)

3.17 AP-WHM WG/2 noted that the Amendment 15 to Annex 14, Volume I will become effective on 20 July 2020 and applicable on 5 November 2020, with the exception of provisions related to airport master plan and pavement rating, which will become applicable on 3 November 2022 and 28 November 2024 respectively.

#### Challenges of Wildlife Hazard Management at KIAB – 12-year Engagement of Best Practices and Progress on Wildlife Hazard Management (IP/04)

3.18 India presented the wildlife hazard management practices engaged to control the bird/wildlife hazards, posing threats to aircraft operating from Bangalore and efforts undertaken to reduce the hazards in order to provide a safe flying environment at Kempegowda International Airport, Bangalore (KIAB).

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**Agenda Item 4: Progress Update on Tasks assigned to States and International/Regional Organizations**Case Study on Airport Wildlife Strike Hazard Assessment and Implementation of Mitigation Measures (WP/05)

4.1 In response to AP-WHM WG Task 1/6, WP/05 presented a case study of effective control and reduction of wildlife hazard in Thailand. The need of coordination among relevant organizations, such as aerodrome operators, aircraft operators and air traffic controllers, was identified crucial to implement such mitigation measures.

4.2 USA shared its practice in which FAA issued credentials to biologists identified appropriate to provide wildlife hazard management service to aerodromes. The qualification requirements of biologists were provided in an FAA Advisory Circular, and the aerodrome operators could approach the qualified biologists from USDA and private firms. In addition, FAA shared its practice that an aerodrome should have bird surveys conducted at least twice a month, covering morning, afternoon and evening, and mammal surveys once in three months so as to obtain comprehensive wildlife information at and around the aerodrome.

Wildlife Hazard Management Survey Questionnaire (WP/11)

4.3 Subsequent to the First Meeting of ICAO Asia/Pacific Wildlife Hazard Management Working Group (AP-WHM WG/1), a questionnaire was forwarded to the States and Administrations in the region to assess the status of the wildlife management measures being adopted by the respective States. Responses were received from the following 10 States / Administrations: Bangladesh, Brunei Darussalam, Cambodia, Hong Kong China, India, Indonesia, Pakistan, Philippines, Singapore and Thailand. Their responses were tabulated and analyzed.

4.4 In response to AP-WHM WG Task 1/5, this paper highlights the analysis and recommendations to the Working Group for further discussion and evolution of the processes. In the meantime, the full responses and analysis of the survey questionnaire were contained in the Attachments to AP-WHM WG/2 WP/11.

4.5 The objective of the survey questionnaire was to analyse States' challenges in wildlife hazard management and to formulate prioritised actions to provide assistance to the States as required. Noting that only a few States responded to the survey and some sub-regions were poorly or not represented, COSCAP-SEA recommended that the survey be re-issued to States in the APAC region that have not responded earlier. The AP-WHM WG/2 Meeting agreed to the recommendation and new tasks were included in the AP-WHM WG Task List.

National Procedure for Recording and Reporting Wildlife Strikes to Aircraft (WP/08)

4.6 Delivered by World Birdstrike Association, WP/08 presented a method to develop guidance for establishment of a National Procedure for recording and reporting wildlife strikes to aircraft. The paper was prepared in response to AP-WHM WG Task 1/11.

4.7 The paper stressed on the importance of recording all bird / wildlife strike cases, including confirmed cases, suspected cases, cases reported by pilots and ATC without ground confirmation, as well as bird / wildlife carcasses found on runway.

4.8 The paper also advocated a standard form for all strike cases, the development of a wildlife hazard risk assessment matrix, and the use of data modelling and analysis.

4.9 On the issue of the name of birds to be quoted in strike reports, USA expressed that the use of scientific name would avoid confusion. While common names might be easier to quote, these common names would vary in different parts of the world.

4.10 The procedure would be subject to further review by the Secretariat prior to being finalised.

Procedures for Collection of Information on Presence of Wildlife on or around Aerodrome (WP/10)

4.11 This paper presents the development of various procedures for the collection of information from aircraft operators, aerodrome personnel and other sources on the presence of wildlife on or around the aerodrome constituting a potential hazard to aircraft operations.

4.12 The proposed wildlife sighting reporting processes included one for airport and airline personnel, and another for aircrew in flight. As part of the process for aircrew in flight, the paper also highlighted a need of a standardised real-time reporting format so as to minimize the time for transmitting the information and subsequent clarifications. The standardized format will be developed and presented at the AP-WHM/WG/3 Meeting.

4.13 Mastermark stated that there were a number of software available for wildlife recording, report and analysis, yet some products might not fully meet the requirements in Annex 14, Volume I, Doc 9137 Part 3 and/or relevant materials. WBA concurred and suggested that aerodromes should evaluate the software before adoption.

4.14 WBA expressed that the wildlife strike report should not be too lengthy, and it should be fitted in Electronic Flight Bag for easy access and filling by pilots.

4.15 The procedures would be subject to further review by the Secretariat prior to being finalised.

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**Agenda Item 5: Asia Pacific Regional Guidance on Implementation of Wildlife Hazard Management Programme**Evaluation of Airport Wildlife Hazard Management Programme (WP/06)

5.1 Delivered by India and World Birdstrike Association, WP/06 presented the process for evaluation of established wildlife hazard management programme (WHMP) at airport to provide safety assurance that the programme is fully effective and correctly implemented. The paper was prepared in response to AP-WHM WG Task 1/13, i.e. “Develop performance measurement indicators/metrics to evaluate the effectiveness of the implementation of Airport Wildlife Hazard Management Programme”.

5.2 The paper was attached with a number of examples of safety performance indicators and targets related to airport WHMP, which may be useful for aerodrome operators in the evaluation.

5.3 India supplemented that a combination of various dispersal methods is needed for effectiveness. USA expressed that the environment faced by wildlife hazard management personnel would be dynamic and ever-changing. USA suggested a 3-tier evaluation for completeness, which include airport’s self-evaluation of WHMP, regulator’s review of the airport WHMP, as well as regulator’s review of WHMP-related regulations.

5.4 The Meeting agreed that the performance measurement metrics would be reviewed by States involved in the relevant task prior to being finalized.

Guidance on Wildlife Hazard Management Programme in Fiji (WP/07)

5.5 Delivered by Fiji, WP/07 presented the Guidance Material implemented by Fiji to assist aerodrome operators to comply with the ICAO Annex 14, Volume I requirements on the development, implementation and demonstration of an effective bird/wildlife strike and wildlife control programme at airports. The paper was prepared in response to AP-WHM WG Task 1/9.

5.6 The analysis of wildlife data in respect of wildlife strikes as well as the observations and monitoring of wildlife activities could reveal trends that would assist airport authorities in identifying areas of concern which should be addressed through a well-managed wildlife control programme.

5.7 This paper also invites the Meeting to consider the development of a Regional Guidance document on Airport Wildlife Hazard Management Programmes (WHMP) with reference to the best practices from Fiji and other States in the APAC Region.

5.8 Australia suggested and the Meeting agreed that the future Regional Guidance on WHMP should be so organized to link to the SMS components.

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**Agenda Item 6: Any other Business**List of Experts of Asia/Pacific Wildlife Hazard Management Working Group (IP/02)

7.1 AP-WHM WG/2 noted the list of experts of AP-WHM WG.

7.2 With the suggestion from Chairperson, Secretariat would invite States / Administrations to nominate additional experts for AP-WHM WG.

COVID-19 Safety Operational Measures (IP/05)

7.3 Presented by the Secretariat, IP/05 introduced the COVID-19 Safety Operational Measures related to Aerodromes and Ground Aids. In particular, a sample checklist on aerodrome operations is available for CAAs / aerodrome operators to conduct a quick check for aerodrome readiness subsequent to an extended period of reduced operations or closure. The checklist covers a number of areas including wildlife hazard management.

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**Agenda Item 7: AP-WHM/WG Task List**Task List of AP-WHM/WG (WP/09)

8.1 The AP-WHM WG/2 Meeting reviewed the Task List, and the updated Task List is available in **Appendix A**.

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**Agenda Item 8: Date and Venue of Next Meeting**

9.1 The next meeting of AP-WHM WG will be held in May 2021 for three days. States/Administrations interested to host the AP-WHM WG/3 were requested to contact the Secretariat. The venue of AP-WHM WG/3 will be communicated to States/Administrations through ICAO APAC Invitation Letter.

9.2 Mr. Deo Chandra Lal Karn, Chairperson of AP-WHM WG thanked participants from States and International Organizations for their contribution and cooperation to the Second Meeting of the Working Group.

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**AP-WHM/WG TASK LIST**  
(Grey Highlights – Updated in AP-WHM WG/2)

|     | <b>ACTION ITEM/PLANNED ACTIVITIES</b>  | <b>RESPONSIBLE PARTY</b> | <b>TIME FRAME</b>   | <b>STATUS</b> | <b>REMARKS</b>  |
|-----|--|--------------------------|---|---------------|---|
| 1/1 | Develop a Generic Composition of National Wildlife Hazard Management Committee   | AP-WHM/WG/1              | AP-WHM/WG/1   | Completed     | AP-WHM/WG/1-WP/06   |
| 1/2 | Develop a Generic Terms of Reference of National Wildlife Hazard Management Committee  | AP-WHM/WG/1              | AP-WHM/WG/1   | Completed     | AP-WHM/WG/1-WP/06   |
| 1/3 | Develop survey questionnaire to analyze the State's problem/issues/deficiencies on wildlife hazards management including ICAO USOAP CMA WHM PQs  | Sri Lanka, India, WBA    | By the end of June 2019   | Completed     |   |
| 1/4 | Send survey questionnaire to States/Member Administrations   | Secretariat              | By the end of July 2019 (giving 4 months of time for the completion of the Survey Questionnaires by States) | Completed     | State Letter T 11/5.6 – AP069/19 (AGA) dated 18 July 2019 |
| 1/5 | Analyze the State's problem/issues on wildlife hazards management based on completed survey questionnaires and present the report to AP-WHM/WG/2 | Sri Lanka, India, WBA    | AP-WHM/WG/2   | Completed     | AP-WHM WG/2-WP/11<br><br>Continued in Task 2/5            |
| 1/6 | Present a case study on airport wildlife strike hazard assessment and implementation of mitigation measures                                      | Thailand, India          | AP-WHM/WG/2   | Completed     | AP-WHM WG/2-WP/05 from Thailand                           |

Appendix A

|      | <b>ACTION ITEM/PLANNED ACTIVITIES</b>  | <b>RESPONSIBLE PARTY</b>   | <b>TIME FRAME</b>  | <b>STATUS</b>                                 | <b>REMARKS</b>   |
|------|--|--|--|---|--|
| 1/7  | Request papers from ACI, CANSO, IFALPA, IFATCA and IATA to present their views on wildlife strike hazards at the Second Meeting of AP-WHM/WG | Secretariat  | AP-WHM/WG/2  | Completed                                     | AP-WHM WG/2-WP/03 from ACI and WP/04 from IFALPA                                   |
| 1/8  | Develop a Generic Composition of Airport Wildlife Hazard Management Committee and its TOR  | Nepal, Bhutan, Lao PDR   | By the end of July 2019  | Completed                                     | Decision AOP/SG/3-6<br><br>Posted in ICAO APAC Website under e-Documents           |
| 1/9  | Develop a Regional Guidance on Development and Implementation of Airport Wildlife Hazard Management Programme                                | Australia, Fiji, India, WBA, AAPA  | AP-WHM/WG/2<br>(Initial Draft)<br><br>December 2020<br>(Initial Draft)<br><br>AP-WHM WG/3<br>(Final Draft) | In progress                                   | AP-WHM WG/2-WP/07 from Fiji  |
| 1/10 | Encourage States to use IBIS electronic format or ECCAIRS to submit wildlife strike reports to ICAO  | Bangladesh, Bhutan, Cambodia, Fiji, India, Lao PDR, Maldives, Nepal, Philippines, Sri Lanka, Thailand<br><br>Secretariat | From 1 <sup>st</sup> June 2019   | Completed                                     | State Letter T 11/5.6 – AP043/20 (AGA) dated 2 March 2020<br><br>AP-WHM WG/2-WP/02 |
| 1/11 | Develop guidance for establishment of national procedure for recording and reporting wildlife strikes to aircraft                            | Philippines, Sri Lanka, Nepal, WBA, IFALPA<br><br>USA, Secretariat   | Initial Draft by the end of December 2019<br><br>Final Draft by AP-WHM/WG/2<br><br>Review by December 2020 | Completed<br><br>Completed<br><br>In Progress | AP-WHM WG/2-WP/08 from WBA   |

|      | <b>ACTION ITEM/PLANNED ACTIVITIES</b>   | <b>RESPONSIBLE PARTY</b>   | <b>TIME FRAME</b>  | <b>STATUS</b>                                 | <b>REMARKS</b>  |
|------|---|--|--|---|---|
| 1/12 | Develop procedures for the collection of information from aircraft operators, aerodrome personnel and other sources on the presence of wildlife on or around the aerodrome constituting a potential hazard to aircraft operations | Philippines, Sri Lanka, Nepal, WBA, IFALPA<br><br>Secretariat                  | Initial Draft by the end of December 2019<br><br>Final Draft by AP-WHM/WG/2<br><br>Review by December 2020 | Completed<br><br>Completed<br><br>In Progress | AP-WHM WG/2-WP/10 from WBA<br><br>Continued in Task 2/6 for remaining work  |
| 1/13 | Develop performance measurement indicators/metrics to evaluate the effectiveness of the implementation of Airport Wildlife Hazard Management Programme  | Bangladesh, India, Thailand, WBA   | Initial draft by the end of December 2019 and final draft by AP-WHM/WG/2                                   | Completed                                     | AP-WHM WG/2-WP/06 from India<br><br>Continued in Task 2/7   |
| 2/1  | Monitor the establishment of a National Wildlife Hazard Management Committee by the States<br>[Scope of work – 2 as per ToR]  | Secretariat – Issue State Letter based on AOP/SG/3 Conclusion.                 | July 2020  |   |   |
| 2/2  | Assist in conducting workshop/seminar on Global and Regional Guidance on WHM<br>[Scope of work – 3 as per ToR]  | Australia, ACI<br><br>ICAO/ACI Regional Workshop on WHM – ACI to take the lead | TBC in 2021  |   | Possible timing: Australian Aviation Wildlife Hazard Group (AAWHG) Forum in September 2021 in Adelaide, Australia |

|     | <b>ACTION ITEM/PLANNED ACTIVITIES</b>   | <b>RESPONSIBLE PARTY</b>  | <b>TIME FRAME</b>  | <b>STATUS</b> | <b>REMARKS</b>                                     |
|-----|---|---|--|---------------|--|
| 2/3 | Share the best practices on the measures adopted by member States/Administrations to prevent wildlife strike hazards at or in the vicinity of aerodromes<br><br>a) Submission of best practices to Secretariat/ICAO APAC Office<br><br>b) Review and select/consolidate the best practices for posting in ICAO APAC Website<br><br>c) Publish the best practices in ICAO APAC Website | All States/Administrations<br><br>Expert Group composed of the Chairman, Australia, Fiji, New Zealand, USA and WBA<br><br>Secretariat | By December 2020<br><br>Before AP-WHM/WG/3<br><br>June 2021    |               |  |
| 2/4 | Re-send survey questionnaire to States/Administrations that did not provide responses in Task 1/4   | Secretariat<br><br>COSCAPs and PASO to assist in collection of responses  | June 2020<br>(2 months for States/ Administrations to respond) |               | Mark questions for responses by CAA and aerodromes |
| 2/5 | Based on the survey questionnaire responses:<br><br>a) Compile the results of the survey questionnaire and the problems / issues faced by States<br><br>b) Conduct needs analysis and present the recommendations on the prioritized actions to provide assistance to States as required, including future tasks for the WHM WG   | WBA<br><br>Australia, China, Fiji, Indonesia, Malaysia, Nepal, New Zealand, Pakistan, Thailand  | October 2020<br><br>AP-WHM/WG/3                                |               |  |

**Appendix A**

|     | <b>ACTION ITEM/PLANNED ACTIVITIES</b>   | <b>RESPONSIBLE PARTY</b>  | <b>TIME FRAME</b> | <b>STATUS</b> | <b>REMARKS</b> |
|-----|---|---|-------------------|---------------|----------------|
| 2/6 | Develop a standardised real-time reporting format for aircrew in flight for transmitting the sighting of wildlife presence. | Philippines, Sri Lanka, Nepal, WBA, IFALPA [WBA to take the lead] | AP-WHM/WG/3       |               |                |
| 2/7 | Review performance measurement indicators/metrics presented in WP/06 (AP-WHM/WG/2)  | Australia, USA, ACI, WBA  | September 2020    |               |                |



## SECOND MEETING OF THE ASIA/PACIFIC WILDLIFE HAZARD MANAGEMENT WORKING GROUP (AP-WHM WG/2)

Virtual Meeting, 27 to 29 May 2020

### LIST OF PARTICIPANTS

|                                  |           |
|----------------------------------|-----------|
| <b>TOTAL NO. OF STATES</b>       | <b>15</b> |
| <b>TOTAL NO. OF ORGANIZATION</b> | <b>4</b>  |
| <b>TOTAL NO. OF PARTICIPANTS</b> | <b>65</b> |
| <b>ICAO</b>                      | <b>3</b>  |
| <b>OBSERVER</b>                  | <b>2</b>  |
| <b>GRAND TOTAL</b>               | <b>70</b> |

|                    |          |                                     |          |
|--------------------|----------|-------------------------------------|----------|
| <b>AUSTRALIA</b>   | <b>3</b> | <b>PHILIPPINES</b>                  | <b>2</b> |
| <b>CAMBODIA</b>    | <b>5</b> | <b>SRI LANKA</b>                    | <b>3</b> |
| <b>CHINA</b>       | <b>2</b> | <b>THAILAND</b>                     | <b>8</b> |
| <b>FIJI</b>        | <b>5</b> | <b>USA</b>                          | <b>3</b> |
| <b>INDIA</b>       | <b>3</b> |                                     |          |
| <b>INDONESIA</b>   | <b>4</b> | <b>AAPA</b>                         | <b>2</b> |
| <b>LAO PDR</b>     | <b>2</b> | <b>ACI</b>                          | <b>2</b> |
| <b>MALAYSIA</b>    | <b>6</b> | <b>IFALPA</b>                       | <b>3</b> |
| <b>NEPAL</b>       | <b>4</b> | <b>WORLD BIRDSTRIKE ASSOCIATION</b> | <b>3</b> |
| <b>NEW ZEALAND</b> | <b>2</b> | <b>ICAO</b>                         | <b>3</b> |
| <b>PAKISTAN</b>    | <b>3</b> | <b>OBSERVER</b>                     | <b>2</b> |

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| NAME |                       | TITLE/ORGANIZATION  | TELEPHONE            | E-MAIL   |
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| 13. | <b>SRI LANKA (3)</b>                           |  |                              |  |
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|     | 44. Mr. Rehenu Chandana Kumara<br>Kasturiratna | Airport Manager (Air-side Operations)<br>Airport & Aviation Services (SL) Limited          | Tel: +9477 3096161           | <a href="mailto:chandanakasturi.am@airport.lk">chandanakasturi.am@airport.lk</a> ;<br><a href="mailto:chanku75@gmail.com">chanku75@gmail.com</a> ; |
| 14. | <b>THAILAND (8)</b>                            |  |                              |  |
|     | 45. Ms. Chomchanok Huayhong                    | Aerodrome Safety Inspector<br>The Civil Aviation Authority of Thailand                     | Tel: +66 2 568 8826          | <a href="mailto:chomchanok.h@caat.or.th">chomchanok.h@caat.or.th</a> ;   |
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The Second Meeting of the Asia-Pacific Wildlife Hazard  
Management Working Group (AP-WHM WG/2)

Virtual Meeting, 27 to 29 May 2020

### LIST OF INFORMATION AND WORKING PAPERS

| Paper No.                 | Agenda Item | Title  | Presented by |
|---------------------------|-------------|--|--------------|
| <b>INFORMATION PAPERS</b> |             |  |              |
| IP/01                     | 3           | Adoption of Amendment 15 to Annex 14, Volume I   | Secretariat  |
| IP/02                     | 6           | List of Experts - Asia/Pacific Wildlife Hazard Management Working Group (AP-WHM WG)  | Secretariat  |
| IP/03                     | 2           | Outcomes of APANPIRG/30  | Secretariat  |
| IP/04                     | 3           | Challenges of Wildlife Hazard Management at KIAB – 12-Year Engagement of Best Practices and Progress on Wildlife Hazard Management | India        |
| IP/05                     | 6           | COVID-19 Safety Operational Measures   | Secretariat  |

| <b>WORKING PAPERS</b> |   |   |               |
|-----------------------|---|---|---------------|
| WP/01                 | 1 | Adoption of Agenda AP-WHM WG/2  | Secretariat   |
| WP/02                 | 3 | Submission of Wildlife Strike Reports to ICAO   | Secretariat   |
| WP/03                 | 3 | Challenges in Wildlife Hazard Management for Aerodrome Operators in Asia-Pacific                  | ACI           |
| WP/04                 | 3 | Wildlife Hazard from the Pilots' Point of View  | IFALPA        |
| WP/05                 | 4 | Case Study on Airport Wildlife Strike Hazard Assessment and Implementation of Mitigation Measures | Thailand      |
| WP/06                 | 5 | Evaluation of Airport Wildlife Hazard Management Programme  | India and WBA |
| WP/07                 | 5 | Guidance on Wildlife Hazard Management Programme in Fiji  | Fiji          |
| WP/08                 | 4 | National Procedure for Recording and Reporting Wildlife Strikes to Aircraft                       | WBA           |

| <b>Paper No.</b> | <b>Agenda Item</b> | <b>Title</b>  | <b>Presented by</b> |
|------------------|--------------------|---|---------------------|
| WP/09            | 7                  | AP-WHM WG Task List   | Secretariat         |
| WP/10            | 4                  | Procedures for Collection of Information on Presence of Wildlife on or Around Aerodrome | WBA                 |
| WP/11            | 4                  | Wildlife Hazard Management Survey Questionnaire   | WBA                 |

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