

KINGDOM OF BAHRAIN  
Ministry of Transportation  
and Telecommunications



مملكة البحرين  
وزارة المواصلات والاتصالات

# **CIVIL AVIATION PUBLICATION**

## **CAP 38**

# **SURVEILLANCE PROCEDURES MANUAL**



**CIVIL AVIATION PUBLICATIONS**

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## CIVIL AVIATION PUBLICATIONS

### PREFACE

The Surveillance Procedures Manual has been prepared for use and guidance of both BCAA and BCAA approved organizations, for the performance of surveillance. The provision of this manual shall apply to the surveillance activities on all operators, service providers and other organization approved by BCAA.

The design of surveillance programme / plan may suitably be modified to suit the Operator's / Organisation's quality policy as long as the intent of monitoring and compliance does not deviate from the intent of the respective regulation and this guidance.

This guidance material prepared keeping in mind the common objective of identifying any ineffectiveness of the system & procedures adopted by the operator / organisations before they lead to non-conformance and / or violation to the BCAA regulations in vogue. It is imperative to mention that adoption of a common philosophy of surveillance for both regulator and the operator / organization will help in adhering to the standardized procedure.



**CIVIL AVIATION PUBLICATIONS**

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**CIVIL AVIATION PUBLICATIONS**

**CAP 38**

**SURVEILLANCE PROCEDURES MANUAL**

**INDEX**

**CHAPTER 1**

<b>1</b>	Introduction .....	1-1
1.1	Surveillance Policy .....	1-1
1.2	Enforcement Policy & Procedure .....	1-1
1.3	Provisions .....	1-2

**CHAPTER 2**

<b>2</b>	Surveillance .....	2-1
2.1	Introduction .....	2-1
2.2	Classification of Findings .....	2-1
2.3	Purpose .....	2-1
2.4	Surveillance .....	2-2
2.5	Surveillance of Aircraft on the RAMP .....	2-3
2.6	Un-announced inspections .....	2-4
2.7	Roles of BCAA .....	2-5
2.8	Roles of the holder of AOC, Organisation Approval, Licenses & Authorisations .....	2-5
2.9	Other obligations of the holder of AOC, Organisation Approval, Licenses & Authorisations .....	2-6
2.10	Responsibility of the Auditors carrying out surveillance .....	2-6
2.11	Surveillance Procedures .....	2-8
2.11.1	Planning .....	2-8
2.11.2	Preparation .....	2-8
2.11.3	Conduct of Surveillance .....	2-9
2.11.3.1	Collecting Evidence .....	2-10
2.11.3.2	Discontinuing an audit / surveillance .....	2-10
2.11.4	Report Finalisation .....	2-10
2.11.5	Reporting .....	2-10
2.11.6	Deficiency Reporting .....	2-11
2.11.7	Monitoring .....	2-11

**CHAPTER 3**

<b>3</b>	Resolution of Safety Concerns .....	3-1
----------	-------------------------------------	-----

**CHAPTER 4**

<b>4</b>	Monitoring Deficiencies .....	4-1
4.1	Procedure for monitoring deficiencies by surveillance and enforcement .....	4-1
4.2	Six-monthly Review .....	4-1
4.2(a)	Recommendations .....	4-2
4.3	Assessment of Surveillance Activities .....	4-2



## CIVIL AVIATION PUBLICATIONS

### CHAPTER 5

5	Records .....	5-1
---	---------------	-----

### CHAPTER 6

6	Training .....	6-1
---	----------------	-----

### TABLES

Table A	Operators / Approved Organisations.....	6-3
Table B	Enforcement Actions.....	6-4
Table C	Audit/ Surveillance Inspection Summary .....	6-5
Table D	Un-announced Surveillance at a Glance .....	6-6



**CIVIL AVIATION PUBLICATIONS**

**LIST OF EFFECTIVE PAGES**

**CAP 38**

i 07 Feb 24  
ii 07 Feb 24  
iii 07 Feb 24  
iv 07 Feb 24  
v 07 Feb 24  
vi 07 Feb 24

**CHAPTER 1**

1-1 07 Feb 24  
1-2 07 Feb 24

**CHAPTER 2**

2-1 07 Feb 24  
2-2 07 Feb 24  
2-3 07 Feb 24  
2-4 07 Feb 24  
2-5 07 Feb 24  
2-6 07 Feb 24  
2-7 07 Feb 24  
2-8 07 Feb 24  
2-9 07 Feb 24  
2-10 07 Feb 24

2-11 07 Feb 24

**CHAPTER 3**

3-1 07 Feb 24

**CHAPTER 4**

4-1 07 Feb 24

4-2 07 Feb 24

**CHAPTER 5**

5-1 07 Feb 24

**CHAPTER 6**

6-1 07 Feb 24

6-2 07 Feb 24

6-3 07 Feb 24

6-4 07 Feb 24

6-5 07 Feb 24

6-6 07 Feb 24

*End*



**CIVIL AVIATION PUBLICATIONS**

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## CIVIL AVIATION PUBLICATIONS

### CHAPTER 1

#### INTRODUCTION

##### 1.1 Surveillance Policy

The purpose of surveillance is to determine whether compliance with regulations and standards is being maintained, in relation to the approved procedures in the Operator's Manual or exposition required to be submitted (for acceptance/approval by BCAA) under the entry process and maintained during the validity of the certificate. The regulation places emphasis on this exposition, the management and quality assurance systems that show and stay in compliance with the respective regulation.

The procedures set out in the organisation's manual will be a combination of those required to maintain compliance with regulatory (minimum) standards, and those arising from company (additional) standards activities. A deviation from required procedures to maintain compliance with the minimum standards is a finding of non-compliance.

BCAA is the principal regulatory body for implementing and enforcing civil aviation regulations and is also responsible for regulation of air transport services to/from and within Bahrain. The BCAA discharges State Safety Oversight obligations on behalf of the State. BCAA is consisting of the following Divisions: -

1. Aircraft Permits & Licensing
2. Airworthiness
3. Aircraft Operations
4. Aircraft Safety Rules & Regulation.

##### 1.2 Enforcement policy and procedures

The Enforcement Policy and Procedures Manual has been prepared by BCAA to provide details about the Enforcement policy and procedures, roles and responsibilities of BCAA, description of the enforcement tools available, guidelines and procedure for appropriate use of enforcement tools, reporting enforcement, recording enforcement, Collecting and handling evidence, and investigation.

For detailed procedures on enforcement, refer to the Enforcement Manual (BCAA-EM-01) published on BCAA site.

[https://www.mtt.gov.bh/sites/default/files/bcaa\\_enforcement\\_manual\\_issue\\_2\\_dated\\_01\\_mar\\_2019.pdf](https://www.mtt.gov.bh/sites/default/files/bcaa_enforcement_manual_issue_2_dated_01_mar_2019.pdf)

Compliance and enforcement actions need to be applied as consistently as possible. However, BCAA Inspectors will consider each case individually in order to determine an appropriate enforcement action. They will take/recommend actions that, in their professional judgment, will appropriately serve the purposes of the BCAA's safety mandate. It is essential that enforcement action where required is taken in as fair and equitable manner as possible, through application of consistent, transparent and systematic procedures. A vital part of this aspect is to achieve uniformity, transparency and consistency of enforcement action. Similar conduct under similar circumstances should result in the same type of enforcement action. In addition, precedents of action taken on similar lapses in the part should be kept in mind while deciding enforcement action.



## CIVIL AVIATION PUBLICATIONS

### 1.3 Provisions

This CAP is issued under the provisions of Article 5 and to exercise the authority of BCAA inspectors / representatives for inspecting the aircraft, facility & organizations under the Articles 6, 42, 69 & 73 of the Civil Aviation Law No.14 of 2013 to establish a safe Air Transport Operations.



## CIVIL AVIATION PUBLICATIONS

### CHAPTER 2

## SURVEILLANCE

### 2.1 Introduction

Bahrain being one of the contractual signatories to the convention on International Civil Aviation and a member of the International Civil Aviation Organisation (ICAO), has an obligation to promote safe, orderly and efficient operation of aviation activities. To meet state obligations, BCAA has developed a system of surveillance to ensure that the standard established at the time of issue of aviation documents and updated periodically, such as approval certificate, licence, rating, etc. is maintained throughout the validity period. Therefore, the primary responsibility of the BCAA is Safety Oversight, and to meet this obligation, BCAA has prepared an Annual Surveillance Programme (ASP) in respect of all the Divisions.

In addition to the routine surveillance, BCAA will also conduct a few unannounced inspections on the areas deemed necessary.

Each Operator / Approved Organisation is required to prepare an annual surveillance plan in accordance with the provisions of the respective BCAA regulation, and introduced into the internal quality system of the operator / approved organisations to ensure compliance to the respective regulations upon the provisions of which the approval was granted to them and to maintain continued validity of such approval.

This publication describes the minimum standards for the requirement of surveillance and subsequent monitoring and applying the resolution to the safety concerns. It is further, obligation on the part of operator / approved organisations to establish a foolproof system of quality assurance to maintain compliance to the respective regulation.

### 2.2 Classification of Findings

***Non-Compliance Level 1*** – A level 1 finding is any significant non-compliance with the applicable requirement which lowers the safety standard and hazards seriously the flight safety.

***Non-Compliance Level 2*** - A level 2 finding is any non-compliance with the applicable requirement which could lower the safety standard and possibly hazard the flight safety.

*Note: In general findings which are resulting due to system failure and having direct impact in degradation of safety standard are considered as Level 1. Level 1 finding requires immediate attention and rectification. All other findings other than level 1 are considered as level 2 and shall be rectified within the stipulated time period.*

### 2.3 Purpose

Annual Surveillance Programme is formulated based on the number and type of AOC holder, Organisation approval holders (CAMO/AMO/MTO), as well as individuals, professional competency of license/rating/certificate/approval holders, etc. The procedure adopted by BCAA requires that all non-compliance and safety related findings are recorded by the inspectors as part of their routine regulatory oversight function. Similar procedure is

## CIVIL AVIATION PUBLICATIONS

required to be established by the operators / organization to compliance to the respective regulation.

The findings/observation details collected during surveillance will be reviewed and analyzed on biannual basis (operator / organisations may adopt more restrictive period of review) to facilitate establishment of most effective surveillance programme for addressing the most prevalent / significant findings and weak areas with the Operators / approval holders.

These details are then used in planning the annual surveillance plan for the subsequent year and to guide inspectors as to the most significant issues to be focused on and to adjust the frequency / area / depth of inspections.

Significant findings will require increased frequency of surveillance, unannounced checks and nil or no significant findings may result in a reduction of the frequency in the routine planned surveillance. The assessment & analysis can be performed using the exiting Q-Pulse system or with Microsoft application (excel or access) in suitable manner. The operator may continue to use their existing system if it suits the methodology defined here.

### 2.4 Surveillance

*Surveillance is a planned inspection of an approved facility or part thereof, as well as individuals, professional competency of license/rating/certificate/approval holders, carried out at regular intervals by ALD, BCAA, to ensure adherence to the laid down requirements by approved organizations for continued approval of BCAA. All the area of an AOC holder including that of in-flight monitoring and approved organizations such as ANTR OPS 1 /3, ANTR 145 / ANTRM / ANTR 147 / Medical Facilities, FSTDs, training establishments, etc., shall be covered with in a period as specified by the respective regulation. By definition, Surveillance is the monitoring of behaviour. Systems of surveillance is the process of monitoring the behaviour of people, objects or processes within systems, for conformity to the expected or desired norms. The planned inspections should include station facility, base facility and operator's expositions / manuals / procedures. The various checklists to be used by the officers while carrying out the surveillance of operators are available in Appendix A.*

The main objective of an audit in aviation is to assess **compliance** with regulatory requirements, industry standards, and company policies and procedures. The audit is typically conducted by an external party, such as the regulatory authority or an independent auditor. On the other hand, the objective of a surveillance inspection is to **monitor and ensure** that the systems, procedures, and processes remain in compliance with regulatory requirements and company policies and procedures. The surveillance inspection is usually conducted by internal personnel, such as quality control or safety personnel.

In summary, audits and surveillance inspections serve different purposes in aviation, but both are essential in ensuring compliance with regulatory requirements and maintaining safety standards. Audits have a broader scope and are conducted less frequently, while surveillance inspections have a narrower scope and are conducted on an ongoing basis.

**Surveillance of Approved Foreign Organization including Line Stations** is a planned inspection of an approved foreign maintenance facility/ line stations, carried out at regular intervals by the ALD, BCAA, to ensure adherence to the laid down requirements.



## CIVIL AVIATION PUBLICATIONS

### 2.5 Surveillance of Aircraft on the Ramp

Under Article 16 of the Convention on International Civil Aviation, States are entitled to search aircraft from other States on landing and departure and to inspect the certificates and other documents prescribed by the Convention and its Annexes, provided there is no unreasonable delay to the operation.

Further, ICAO Annex 6 (Operation of Aircraft, Part I – International Commercial Air Transport – Aero planes) also requires that States shall establish a programme with procedures for the surveillance of operations in their territory by a foreign operator and for taking appropriate action when necessary to preserve safety.

Designated airlines of foreign countries who have been issued the operating authorization / permit by BCAA are subjected to surveillance by BCAA. The RAMP inspection of foreign and national air carriers is carried out as per the annual surveillance plan of BCAA. The ramp inspection shall be carried out by a team comprising of trained inspectors from operations and airworthiness of BCAA following the procedures established for inspection and post inspection activities.

The RAMP inspections on the foreign operators will be carried out on one aircraft per operator per year.

Ramp checks of Bahrain operators are planned product inspections carried out to inspect aircraft at ramp during operation to verify the compliance of laid down regulation during operation of airlines. At least one ramp inspection per type of aircraft per operator shall be carried out annually. This inspection is carried out jointly by Airworthiness and Operation's representatives.

The RAMP inspections are carried out by BCAA in accordance with the established procedures to the international standards.

The inspection of Aircraft at RAMP may be unannounced on some occasions.

The checklist used for the inspection shall be completed and a copy handed over to the pilot-in-command, or in his absence, to a member of the flight crew or to the most senior representative of the operator present in or near the aircraft upon completion of the inspection. A signed acknowledgment of receipt of the proof of inspection shall be requested from the recipient and be retained by the inspector. Refusal by the recipient to sign shall be recorded in the document.

In case of disagreements concerning inspection findings, the deficiencies shall be communicated to the foreign airlines' regulatory authority. Serious safety deficiencies would require BCAA to initiate a dialogue with the regulatory authority of the state of the Operator including the operator. Failure to take positive action to rectify the deficiencies may result in cancellation / revocation of foreign airlines authorization.

Where action is expected to be taken by the airline the regulatory authority will be requested to intimate the action taken to BCAA.

*Note 1: BCAA inspectors may refer to TPM GEN 05 and RAMP Inspection Guidance Material for the categorization of the findings / observation, assessment detailed procedures.*

## CIVIL AVIATION PUBLICATIONS

*Note 2: Surveillance obligation in the case of Leased Aircraft*

*In the case of Leased aircraft, the guidance given under the Chapter 2 of CAP 06 will have to be followed. Following will be the policy with respect to surveillance on the leased aircraft:*

*Dry Lease-In (BCAA as State of Registry & Operator)– The aircraft is monitored under the oversight of BCAA and subjected to BCAA’s routine surveillance programme.*

*Dry Lease-In (BCAA as State of Operator)– The aircraft is subjected to BCAA’s RAMP Inspection (Annual Surveillance Programme)*

*Dry Lease-Out (Bahrain Operator) – The Aircraft is under the State of operator, where the same is registered and entered to AOC of the state of the operator. The aircraft is subjected to RAMP inspection as part of the Annual Surveillance Programme of foreign operator.*

*Wet Lease In – Where the lessor is the operator holding an AOC issued by the State of Registry. In this scenario, the aircraft is subjected to RAMP inspection as part of the annual surveillance programme.*

*Wet Lease Out – The BCAA would retain full responsibility for oversight and confirmation of this responsibility must be agreed with the foreign operator’s civil aviation authority. The aircraft is monitored under the oversight of BCAA and subjected to BCAA’s routine surveillance programme.*

### **2.6 UN-Announced Inspections**

Apart from scheduled Surveillances, Operators / Organisations / BCAA should also carry out un-announced inspections on the approved facilities. Un-announced inspections are unplanned checks and are carried out to verify the effectiveness of the internal audit system of any organisation and ensuring the continued compliance including that of previous audit/surveillance findings. Un-announced inspections are carried out to observe processes, and/or inspect aircraft, documents, and records. The purpose of such inspection is also to ensure that operators do not shortcut any procedures, deployment of necessary manpower, release of aircraft without proper defect rectification, extend MELs due to absence of managerial supervision at night or any other reason. Verification to Compliance of surveillance finding may be carried out during this inspection.

In order to enhance safety of operation and to maintain higher standard of continued oversight of operators / organisations, BCAA may be required to carry out un-announced inspections to ensure that such entities are meeting the desired level of standards.

The operators / auditee need not be intimidated for such surveillance inspections. This will make operator / auditee aware of the fact that the quality system of the auditee / BCAA may conduct surprise surveillance checks during their operation and will make operator vigilant and alert to follow the laid down procedures while conducting tasks. The surveillance inspectors / auditors must ensure that the operator / organisation has detailed adequate staff / manpower for the particular activity and the personnel use laid down procedures, updated technical data and are provided with adequate facilities for satisfactory performance of the task. The working environmental conditions, fatigue level, human factor / human performance and use of alcohol, psychoactive substance must also be checked. These are some of the areas where compromises can be made while performing the task.

## CIVIL AVIATION PUBLICATIONS

The relevant portions of the existing checklists under the respective regulations / CAPs may be used for carrying out this surveillance.

### 2.7 The Roles of BCAA are as follows:

1. Develop an Annual Surveillance Programme (ASP) each year related to their area of surveillance based on the analysis conducted on previous surveillance / inspection / audit / unannounced inspections and the observations / findings and quantum of such details thereof. The ASP is published in the month of December every year.
2. Review and / or develop a checklist for surveillance area giving reference of regulations to applicable be complied with schedule surveillance activities, assigning officers and resources.
3. Refer to the CAPs / TPMs as applicable while carrying out surveillance / audit / inspection / unannounced inspections.
4. Maintain records of surveillance activities/create Data Base.
5. Follow up implementation and closure of corrective actions through Q-Pulse tracking mechanism. Assess the action taken by the organization and carry out a follow up audit if required.
6. Report findings of level 1 nature / violations to the Director immediately upon detection.
7. Act / Recommend / enforce regulatory action where necessary to ensure compliance with the rules.
8. Assess the Root Cause Analyze carried out by the organization. Report if the same is not acceptable for re-analysis.
9. Report on the performance of surveillance quarterly in prescribed formats (**Appendices**).
10. Organise a six monthly surveillance review meeting to address the compliance obligations and subsequent corrective actions.
11. Enhance / alter the surveillance programme for the subsequent period as mentioned in the preceding paragraph.

### 2.8 Roles of the Holder of AOC, Organization Approval, Licenses & Authorizations

1. To prepare surveillance plan covering all the areas of approved scope, either on one-time comprehensive and / or progressive manner.
2. Publish the schedule of surveillance within the organization with the respective post holders.
3. Inform BCAA of the annual surveillance plan.
4. Carryout surveillance as planned.
5. Identify the deviations if any for applying corrective and preventive action with the

## CIVIL AVIATION PUBLICATIONS

application of appropriate and real-time Root Cause Analysis.

6. Identify and apply the appropriate corrective / preventive action plan based on the Root Cause Analysis.
7. Maintain records of surveillance / the details of the internal audit, the findings / observations.
8. Based on the surveillance data gathered, analyse performance and re-alter the annual surveillance plan as necessary to increase and / or reduce the frequency of audits required to be carried out on any particular area / discipline which are found to have significant findings / observations and repetitive in nature.
9. Conduct awareness programme within the organization for effective application of quality procedures, corrective and preventive actions.

### **2.9 Other Obligations of the Holder of AOC, Organization Approval, Licenses & Authorizations**

Operators / Organisations are obliged to extend the following for effective performance of the audit and ensure compliance to the applicable regulation -

- a) Share the annual surveillance programme / plan with BCAA well in advance. This may facilitate BCAA to plan / alter the annual surveillance programme / plan of BCAA, likely to have effect on any specific area of audit with operator / organization.
- b) Make arrangements for travel, stay, local transportation, etc. as admissible. Normally, the audits are carried out by two inspectors together as part of the audit philosophy. However, at the discretion of BCAA, certain audits may be performed by a single inspector depending upon the scope of approval held at a particular station / scope of area of the operator / organization.
- c) Facilitate during the audit by BCAA inspectors.

### **2.10 Responsibility of the Auditors Carrying out Surveillance**

Applicable to both the BCAA & Organization

- i) Intimate the organization / identified area of the surveillance plan in advance of the Auditor's visit. On request from the organization / area in-charge, the dates of inspection may be deferred for a reasonable period once or twice, further indefinite deferment should be treated as significant finding which may invite necessary enforcement action.
- ii) The assigned auditor should familiarize themselves with the reference regulation in a thorough manner. The Auditor should study:-
  - a) Applicable ANTRs / CAPs / Job Aids, etc.
  - b) Organization expositions / exposition procedures.





## CIVIL AVIATION PUBLICATIONS

- c) Previous audit(s) / Inspection reports (at least two previous reports must be studied and actions taken by organization to close all previous findings should be noted).
- d) Relevant checklist(s) should be updated with any changes in the regulations / expositions and customized for the specific organization / area should be prepared.
- e) The division specific information with respect to area of surveillance such as ADs, MMEL revision no., manufactures latest instruction with regard to AMM revision etc. should be noted prior to commencement of audit.

It is expected that the study and familiarization with the organization / area specific material will take 2-3 days prior to the surveillance date. These preparatory days should be considered by the relevant sections of the BCAA & Organisation.

- f) The surveillance shall be started with a meeting of Accountable Manager / Post Holder with the Audit Team.
- g) Surveillance shall be carried out with the use of a standardized audit check list. The customization may be applied to a specific organization / activity based on the review of expositions / manuals / procedures / previous findings as necessary.
- h) Observations made during surveillance shall be recorded against each item of audit check list.
- i) The completed deficiency reporting form should then be forwarded to the concerned operator/organization for necessary corrective action through the Q-Pulse system.

*Note: The deficiency reporting shall be made using the format as being referred under the Quality System of the respective organisation or the BCAA as approved.*

- j) After receipt of notification of findings, carry out Root Cause Analysis, define corrective / preventive action plan and demonstrate corrective action to the satisfaction of the BCAA within a period depending upon the level of the finding.

Followings are the root cause for non-compliance:

- (i) Lack of organisation's policy / Requirements
  - (ii) Lack of documented system / procedure
  - (iii) Existing system / procedure ineffective
  - (iv) Non-compliance to the Regulatory / organisation's requirement
  - (v) Inadequate infrastructure
  - (vi) Inadequate manpower,
  - (vii) Lack of training / Responsibility not defined,
  - (viii) Personnel non-adherence to the requirement
- k) On receipt of such deficiency report the operator / organization / individual as the case may be, shall review the target date depending upon the level of deficiency for corrective action before acceptance of the same.



## CIVIL AVIATION PUBLICATIONS

- l) Organizations shall take prompt action of resolving the non-conformities brought out during the surveillance inspection, spot checks or safety audits conducted by self and BCAA.
- m) Time period for compliance shall be counted from the next calendar day of the date of raising the deficiency report (Q-Pulse System).
- n) Where the organization fails to implement the corrective action after the time period agreed with BCAA, where no reasonable and justified reasons are assigned for non-implementation of the corrective action plan necessary enforcement action will be initiated against the organization or the person responsible for non-compliance as the case may be.
- o) The time period for resolution of findings / non-conformances should be as specified in the respective regulation. Variation to the time periods for compliance shall only be with the approval of BCAA.

### 2.11 Surveillance Procedures

Following are the elements of the surveillance:

1. Planning
2. Preparation
3. Conduct
4. Reporting
5. Finalization
6. Follow-up Monitoring and improvement

#### 2.11.1 Planning

- (i) It is desired that all the aviation activities of the operator and the approved organization are subjected to surveillance inspection at an interval as required by the respective regulation. A comprehensive surveillance programme is required to be prepared covering all areas of all the scope approvals held. The operator / approved organizations shall introduce this planning as part of the internal quality system of the organization.
- (ii) BCAA shall prepare an organization-wise calendar of surveillance activity. The annual surveillance program (with tentative period of audit) published in the BCAA website. Further, the planned / proposed dates / days of audit is also informed in consultation with the respective operator / organization in advance advising them to carry out their internal audits of the respective areas, prior to the proposed surveillance inspections.

#### 2.11.2 Preparation

It is imperative that the surveillance is carried out by teams consisting of preferably two members, the senior being the team leader. Decision on the number of auditors will be based on the quantum and complexity of the scope of area being planned for audit. Due to certain exigency, deviation from the annual surveillance program may be permitted with the approval of the respective post holder of the operator / organization and Chief of division in the case of BCAA.

## CIVIL AVIATION PUBLICATIONS

- (i) The team should start preparing for the surveillance activity well in advance. The following should be studied:
  - Internal audit report of the concerned area.
  - Relevant regulation or other applicable standards.
  - Company Expositions, and other internal Manuals / Procedures.
  - Approved documents like Maintenance Programme, MEL, Technical log etc. as required;
  - All maintenance data
  - Previous surveillance findings and action taken information. This may be in the form of completed/closed audit finding forms or file correspondence.
  - Customized checklist etc.
- (ii) The respective Post holders or one representative of the approved organisation familiar with the area being surveyed be associated with the inspection. This is done to enable the organization to provide any clarifications / better understanding on the spot and to ensure that the findings are immediately known to the organization.
- (iii) During the preparation stage, the Auditors should determine the depth of sampling required to verify each system. For example, where history indicates that an Organization has adequate systems, a small sampling may be sufficient to confirm that the situation has not changed. Where history indicates recurring problems with a system, a greater level of sampling would be appropriate.

### 2.11.3 Conduct of Surveillance

- (i) The surveillance should be objective, without any bias, with a view to detect any weakness and deficiency in the practice and procedure followed by the operator / organisation in the light of the requirements laid down by BCAA / manufacturer and should be used as a tool for enhancing airworthiness/ safety standards.
- (ii) Prior to commencement of the surveillance, a briefing meeting be held, explaining the purpose and scope of the surveillance. Open issues of the previous audits, organization's internal audit findings and corrective actions may also be discussed during the briefing.
- (iii) Inspections will sample the organization's activities. Investigation should be to a depth that will enable a judgment to be made on the ability of the organization's systems to deliver a safe and compliant outcome. The method to follow is to determine how well the organisation accomplishes the process being assessed. To do this, the team should seek to ascertain whether or not the organization's processes are:
  - Managed by a suitable and qualified person and department;
  - Supported by policies and procedures that are sufficiently detailed, and are understood;
  - Supported by adequate infrastructure;
  - Compliant with legislation;
  - Put into practice and achieve their objectives;
  - Controlled;
  - Measured, reviewed and improved;
  - Interfaced effectively with other persons and departments.

## CIVIL AVIATION PUBLICATIONS

- (v) The checklist shall be used while carrying out surveillance / audit, as per the program drawn out so that the surveillance is comprehensive and meaningful. The contents of checklists are to be treated as general guidance requiring adherence by approved organizations. The auditor may use relevant regulations, approved organization policy (ies), maintenance data etc. for reference whenever check lists are found not adequate to cover any specific activities of the organization.
- (vi) Surveillance Programme shall cover all applicable areas of Special Operations (eg. RVSM, EDTO, etc.)

### 2.11.3.1 Collecting Evidence

Evidence is collected during the audit with relevant information recorded to support the final audit findings. It should be obtained with the knowledge of the Auditee and verified for correctness and completeness. Evidence includes:

- Oral evidence – record date, time, details of conversation on Audit;
- Notes taken during an audit;
- Documents sighted during the audit – reference the document and page numbers;
- Copies of documents and records – verified where necessary for correctness and completeness.
- Photographs (record time, date, place and photographer on worksheet);
- Video recordings (record time, date, place and video operator on worksheet); and
- Physical evidence such as original document, records or defective parts.

### 2.11.3.2 Discontinuing an Audit / Surveillance

The decision to discontinue an audit must be made in consultation with the chief of the respective division by the respective team leader. However, in threatening situations, an individual Auditor may discontinue an audit. Events that may prevent an audit continuing include:

- The safety of the audit team is at risk;
- The objective of the audit becomes unattainable due to access limitations;
- Hindrance, harassment or aggressive behaviour of the Auditee;
- Non-availability of Auditee's key staff;
- Non-cooperation from the auditee
- Enforcement action is assessed as being more appropriate to discontinuing an audit.

### 2.11.4 Report Finalization

While pointing out the deficiencies, it is important to note that the relevant Regulations/ Standards/ Requirements /Expositions/Procedure manual/circulars should be clearly spelt out. Where deficiencies are not covered by these documents, the same may be treated as a suggestion for improvement. Surveillance records must be kept in a clear manner and provide a chronological history of surveillance activities and events.

### 2.11.5 Reporting

On completion of the surveillance, the deficiencies observed by the auditor should be listed and discussed in a debriefing meeting with Accountable Manager and/or relevant Post holder(s). After final discussion, deficiencies noticed shall be listed on Deficiency Reporting Form and / or Q-Pulse System, which will have a unique number.

## CIVIL AVIATION PUBLICATIONS

### 2.11.6 Deficiency Reporting

For every deficiency observed, a deficiency report will be raised through Q-Pulse System preferably within two weeks of the audit. Even If the organisation has already taken necessary rectification action. The same will be reflected in the report of finding(s). The findings may be classified as Level 1 and Level 2. For categorization of level of findings refer to the respective regulation in vogue.

Resolution of deficiencies observed during surveillance shall be dealt in line with the respective regulation / CAP.

### 2.11.7 Monitoring

- i. All deficiencies observed during surveillance / inspection shall be followed up and monitored for at the time of receipt of compliance report with root cause analysis.
- ii. The audit team leader will review the compliance action and if satisfied may close.
- iii. The Audit findings and the Corrective / Preventive actions and subsequent audit results on the same / similar area are reviewed in accordance with the Chapter 3 & 4 to facilitate the recommendations to the revision to the existing surveillance programme based on the performance of the auditee's area indicated
- iv. As explained under chapter 5, based on the analysis of data presented over the attached Tables A to Table D (or alternate report forms generated over the Q-Pulse system) the annual surveillance programme may require revision to increase the scope of audit and / or the frequency as deemed necessary. The normalcy of audit programme with respect to the scope and the frequency may be established depending upon the subsequent analysis.
- v. Where the organization has not implemented the necessary corrective action within a period as specified in the respective regulation, BCAA may initiate action as deemed suitable.



## CIVIL AVIATION PUBLICATIONS

### CHAPTER 3

#### RESOLUTION OF SAFETY CONCERNS

For effective implementation of regulatory compliance, it is necessary that surveillance carried out by divisions are monitored by the respective chiefs progressively.

All the chiefs are required to follow the procedures detailed in BCAA's Enforcement Manual. The Director will also act as a nodal person for the Enforcement proceedings.

Chiefs of the divisions should emphasize on the following:

1. Cases where significant noncompliance occurs with the applicable requirement which lowers the safety standards and hazards seriously the flight safety.
2. Cases of violations to the applicable regulatory provisions.
3. Repetitive findings which could lower the safety standards and could possibly hazard the flight safety.
4. Other deficiencies if not rectified within the stipulated time period.
5. Cases put up under appeals.
6. Review of recommendations of Courts of Inquiry and similar safety recommendations.
7. Important incidents to all aircraft and
8. Other Important safety issues

The BCAA on the enforcement actions to be taken in a fair and transparent manner. The decisions are taken in line with applicable rules and regulations.

In the process of enforcement, the following principles are adhered to:

1. Natural justice
2. Impartial and fair consideration
3. Proportionality and standardization of enforcement actions.

The cases under consideration are presented by the concerned division and discussed. The decisions of the divisions are minuted and conveyed to the participants and concerned directorates for effective implementation.



## CIVIL AVIATION PUBLICATIONS

### CHAPTER – 4

#### MONITORING DEFICIENCIES

##### 4.1 Procedure for Monitoring Deficiencies by Surveillance and Enforcement

All deficiencies observed during surveillance carried out by Divisions are required to be summarized at every six-month interval. The summary will indicate the following:

- a. Organization Audited
- b. Date of Audit
- c. Scope of area of audit
- d. Person responsible for that area / scope
- e. ANTR Reference
- f. CAP Reference
- g. Finding
- h. Observation
- i. Violation / non-conformance in detail with evidence / supporting documents.
- j. Level of the findings
- k. Target Date for closure
- l. Root Cause as indicated by the Operator.
- m. Acceptance of the Root Cause and / or BCAA's advice.
- n. Open / Close Status
- o. Remarks
- p. Similar and / or repetition of the same findings / observation in the past audit for the period of 2 years.
- q. Statistics on the repetitive findings (level-wise, area-wise, root cause-wise etc.) It's a tool for the performance based surveillance assessment.
- r. Recommendation (select as applicable) – isolated and require no follow up / repetitive and require follow up / require additional audit through increased frequency during the surveillance plan of the subsequent year.

##### 4.2 Six-monthly Review

A review will be conducted by the Director – ALD at six months interval with the data gathered above and the recommendations given therein. Representatives of all the divisions are required to attend this meeting. In the meeting, the chiefs will present analysis of the monthly progress, shortfall against the monthly target and also analyze the deficiencies categorized as Level 1 / 2. These annual surveillance programme data will be used for review and to (i) recommend the revision to the existing surveillance programme based on the performance of the auditee's area indicated if any required, (ii) resolution, (iii) tracking and (iv) dissemination of safety related issues.

Auditors are required to intimate ALD, BCAA immediately, whenever they observe any Level 1 finding while carrying out their surveillance programme. These Level 1 findings will be examined by the concerned division for safety resolution.

All Level 1 and significant level 2 discrepancies are discussed during the surveillance meeting. If enforcement action has already been taken or initiated against Level 1 / significant Level 2 findings, same shall be highlighted. Records of all Level 1 and significant Level 2 findings and action taken are being maintained with the Q-Pulse system.



## CIVIL AVIATION PUBLICATIONS

The subsequent year's surveillance plan will be derived based on the outcome of the six-monthly review in terms of number of areas to be covered and the frequency of audit of that particular area.

### **4.2.(a) Recommendations**

The operators / Organisations are advised to follow a similar philosophy while designing the internal audits, reporting of findings, root cause analysis for the findings, alterations to the surveillance programme, based on assessment of the performances and executing their surveillance programme / plan to establish resolution to the safety concern.

### **4.3 Assessment of surveillance activities**

In order to ensure that the compliance to various regulations / policies of BCAA and policies / procedures of the operators & approved organisations, it is advised that the performance of the surveillance and its outcome is assessed periodically. This periodic performance assessment facilitates the operator & approved organizations to identify the weak areas and the effectiveness of the compliance system and to alter the Annual Surveillance Programme suitably to increase the frequency of audits on weaker areas of the organization thereby improving the effectiveness of the compliance mechanism.





## CIVIL AVIATION PUBLICATIONS

### CHAPTER - 5

#### RECORDS

**5.1** Operator / Organizations & BCAA shall maintain records of each audit with the following details (not limited to):

1. Organization Detail
2. Date of Surveillance
3. Surveillance Area
4. Regulation References
5. Exposition References
6. Exposition Procedure References
7. Deficiency details (Finding / Observation)
8. Level of the Findings / Observations
9. Date(s) of reporting of Findings / Observations
10. Root Cause
11. Corrective action
12. Preventive action
13. Date of closing
14. Remarks
15. Details of enforcement action if any

The surveillance records shall be maintained for 5 years.

The records maintenance system with the root cause analysis system, will facilitate assessment of weak area in a particular year and planning for the subsequent year's surveillance programme.



## CIVIL AVIATION PUBLICATIONS

### CHAPTER 6

#### TRAINING

Training is essential to understand working procedures of the surveillance activities. Therefore, training shall be conducted for all the auditors / inspectors / staff on procedures so that they can understand the system and carry out surveillance, monitoring of the Annual Surveillance Programme and also to ensure maintenance of records.

The training shall cover both Classroom and on-job training on the following:

1. Auditing Techniques
2. Objective of the surveillance programme
3. Responsibilities
4. Analytical study of the week areas based on the statistics collected over the period of the last two years.
5. Preparation of surveillance programme based on the above study.
6. Surveillance Procedures.
7. Recording of findings / observations
8. Reporting of findings / observations
9. Follow up action on findings / observations.
10. Assessment and identifying the most appropriate of Root Cause
11. Procedure for enforcement action.
12. Monitoring the execution of the planned surveillances.
13. Maintenance of records of surveillance and enforcement action.

**CIVIL AVIATION PUBLICATIONS**  
**Tables**

**TABLES TO BE PRESENTED BY REGIONAL OFFICES/ DIRECTORATES TO SED FOR MONTHLY SURVEILLANCE  
REVIEW**

The following Tables are presented:

1. Table A – Operators / Approved Organisations
2. Table B – Enforcement Actions
3. Table C – Audit/ Surveillance Inspection Summary
4. Table D – Un-announced Surveillance at a Glance

*Note: These tables are representative in nature and may be altered to suit the system established by BCAA / operator / organization respectively.*



**CIVIL AVIATION PUBLICATIONS**

**Table A**

**Operators / Approved Organisations**

Month -----

Name of the Operator / Organisation	Total Number of Surveillance Targeted for the month	Total Number of Surveillance conducted during the month	Total Number of Findings detected		Total Number of Findings corrected		Total Number of Findings pending for corrective action		Findings pending for corrective action		Remarks
			Level 1	Level 2	Level 1	Level 2	Level 1	Level 2	More Than 1 Month	More Than 2 Month	

**CIVIL AVIATION PUBLICATIONS**

**Table B**

**Enforcement Actions**

For the Month of -----

Sl. No.	Name of the Operator / Organisation	Actions Initiated (Show Cause Notice / Warnings)	No. of Cases	Action Taken – Closed Cases	Open Cases

## CIVIL AVIATION PUBLICATIONS

### TABLE C

Audit / Surveillance Summary (Including that of unannounced audits)

Name & Address of the Organisation			Organisation IDs if any				Name of the Division			
Total Number of Deficiency:										
Finding / Observation Number	Date of Surveillance	Area of Surveillance	Details of Findings / Observation	Reference: ANTR / Other Regulation	Findings Level	Target Date	Close	Open	Number of Repetitions	If Repetitive, give the previous finding reference(s)



**CIVIL AVIATION PUBLICATIONS**

<b>Table D</b> Un-Announced Surveillance details Month -----					
Sl. No.	Name of the Operator / Organization / details of Aircraft	Area of Inspection	Findings / Observations	Corrective / Preventive action	Remarks