

CERTIFICATION PROCESS OF AIRPORT WITH SCHEDULED AIR SERVICE

Martin Vencel' – Peter Koščák

The aim of this thesis titled "Certification Process of Aerodrome with scheduled air service" is to analyze and describe the certification process of the airport in Slovakia, as well as audits and inspections at airports in the Slovak legislation and ICAO regulations. The main reason why I decided to choose this topic was just that this issue was not developed by anyone and there is no comprehensive publication on the subject. Describes the current process of certification of airports in Slovakia, as well as internal and external audit at airports. Based on the analysis of those rules is designed in a way to optimize the work process of certification of aerodromes, their audits and inspections.

K e y w o r d s: certification of aerodrome, airport manual, audit, inspection, documentation

1 INTRODUCTION

Modern times, the development and evolution of new technologies but also the economic crisis, and many other factors are forcing people to travel the world and use air transport, which is one of the fastest and safest. Increasing occupancy of airports is planning their development several years. But every airport that wants to offer customers regular air transportation, must apply for an operating certificate - certificate airport.

This paper serves as a summary of all rules and regulations intended to manage the certification process. In the second part of the paper focuses on audits and inspections at the airport, this is performed externally or internally.

It detailed analyzes legislation and regulations issued by the ICAO and which bind all the states of Chicago. The actual certification process I described the initial interest in hearing about the airport certificate airport to the actual delivery of the certificate or rejection.

The paper describes the documentation that is needed to initiate the certification process, or manual airport, airport security program and also that each airport should be designated protective zones. Without this documentation, the certification process itself can not even begin.

With this issue, I got to know thanks to helpful staff and Košice Airport and also thanks to the willingness of employees Aviation Authority of the Slovak Republic, the section of the airport.

2 THE BASIC LEGAL REQUIREMENTS FOR CERTIFICATION OF AIRPORTS IN SLOVAKIA

The whole process of certification is specific mainly for civilian airports, in obtaining materials I majored in prescription ICAO Doc 9774 Manual on Certification of Aerodromes, č.143/1998 Law on Civil Aviation, ICAO Part 139 Airport Certification, L 14, consultations with management of airports in Slovakia and the Civil Aviation Authority of the Slovak Republic.

I also applied the resources available from the Internet site of the Civil Aviation Authority of the Slovak

Republic, Ministry of Transport, Posts and Telecommunications and the ICAO website.

Slovak legislation clearly shows the operation of airports Law no. 143/1998 - Aviation Act. The sixth part deals with airports and ground aviation facilities. Exactly refers to the construction of airports and aviation ground equipment, responsibilities of the aerodrome operator, buffer zones and special construction authority.[2]

2.1 ICAO Doc 9774 Manual on Certification of Aerodromes

This manual contains guidance material on establishing a framework for aerodrome certification, including identification of the need for appropriate legal provisions, model regulations for adoption or adaptation as appropriate, the certification procedure, a typical civil aviation administration staffing pattern, a sample application form and a sample certificate for use by a State. Information in support of the introduction of the concept of the safety management system for aerodromes is also included.[1]

3 AERODROME CERTIFICATION

The aerodromes certifications are divided into five sections:

Section A – General
Section B – Aerodrome Certification
Section C – Aerodrome Manual
Section D – Obligations of Aerodrome Operator
Section E – Exemptions.

3.1 Section A – General

This section includes an application, definitions and aerodrome standards and practices. These regulations are intended to apply to land aerodromes. States may as deemed appropriate, make provisions in their regulations for the use of military aerodromes by civil aircraft.[1]

3.2 Section B – Airport Certification

This section includes model regulations covering the requirements for aerodrome certification; application for issuance of an aerodrome certificate; grant of the certificate; endorsement of conditions in the certificate; duration of the certificate; surrender of the certificate; transfer of the certificate; grant of an interim certificate and amendment of the certificate.

The specification in ICAO Annex 14, Volume 1, unless otherwise indicated in a particular context, applies to all aerodromes open to public use in accordance with the provisions of Article 15 of the Convention on International Civil Aviation. The responsibility to ensure safety and order at all aerodromes open to public use under their jurisdiction rests with States.

The operator of an aerodrome intended for public use shall, in accordance with the national requirements, be in possession of an aerodrome certificate. An aerodrome certificate is required if the maximum passenger-seating capacity of the aircraft employed in the operation exceeds 10 seats. The operator of an aerodrome for which an aerodrome certificate is not required may nevertheless apply for an aerodrome certificate, for which a fee may be charged.[2]

An applicant for an aerodrome certificate shall submit to the CAA for approval an application in the form prescribed by the CAA. The application shall include the aerodrome manual for the aerodrome.

The CAA may approve the application and accept/approve the aerodrome manual submitted under regulation and grant an aerodrome certificate to the applicant. The CAA may refuse to grant an aerodrome certificate to an applicant. In such cases, the CAA must notify the applicant, in writing, of its reason no later than 5 days after making that decision.

After successful completion of the processing of the application and the inspection of the aerodrome, the CAA, when granting the aerodrome certificate, will endorse the conditions for the type of use of the aerodromes and other details.

An aerodrome certificate shall remain in force until it is suspended or cancelled or, alternatively, an aerodrome certificate shall be valid for 3 years or until it is suspended or cancelled, whichever is earlier.

The CAA may provide that the requirements of regulations have been met, amend an aerodrome certificate when there is a change in the ownership or management of the aerodrome, there is a change in the use or operation of the aerodrome, there is a change in the boundaries of the aerodrome, or the holder of the aerodrome certificate requests an amendment.[1]

3.3 Section C – Airport Manual

The aerodrome manual is a fundamental requirement of the certification process. It contains all the pertinent information concerning the aerodrome site, facilities, services, equipment, operating procedures,

organization and management including the safety management system. The information presented in the aerodrome manual should demonstrate that the aerodrome conforms to the certification standards and practices and that there are no apparent shortcomings which would adversely affect the safety of aircraft operations.

The manual is a reference document and provides a checklist of aerodrome certification standards to be maintained and the level of airside services at the aerodrome. Information provided in the aerodrome manual will enable the CAA to assess the suitability of the aerodrome for aircraft operations proposed and to judge an applicant's fitness to hold a certificate.

It is a basic reference guide for conducting site inspections for granting an aerodrome certificate and for subsequent safety inspections.

The aerodrome manual is a reference document agreed between the aerodrome operator and the CAA with respect to the standards, conditions and the level of service to be maintained at the aerodrome.

The aerodrome manual is subject to amendment in order to ensure that it provides current and accurate information. The aerodrome certificate holder should therefore be made responsible for the amendment of the manual and for notifying the CAA of any such amendments. The content of an aerodrome manual should be treated with due respect to the confidentiality requirements of individual States.[1]

3.4 Section D – Obligations of Airport Operator

Competence of operational and maintenance personnel – the aerodrome operator shall employ an adequate number of qualified and skilled personnel to perform all critical activities for aerodrome operation and maintenance. If the CAA or any other competent authority of government requires competency certification for the personnel referred to in regulation, the aerodrome operator shall employ only those persons possessing such certificates.

The aerodrome operator shall implement a program to upgrade the competency of the personnel referred to in regulation.

The aerodrome operator shall establish a safety management system for the aerodrome describing the structure of the organization and the duties, powers and responsibilities of the officials in the organizational structure, with a view to ensuring that operations are carried out in a demonstrably controlled way and the improved where necessary.

The aerodrome operator shall oblige all users of the aerodrome, including fixed-base operators, ground-handling agencies and other organizations that perform activities independently at the aerodrome in relation to flight or aircraft handling, to comply with the requirements laid down by the aerodrome operator with regard to safety at the aerodrome.[1]

3.5 Section E – Exemptions

The CAA may exempt, in writing, an aerodrome operator from complying with specific provision of these regulations. Before the CAA decides to exempt the aerodrome operator, the CAA must take into account all safety-related aspects. An exemption is subject to the aerodrome operator complying with the conditions and procedures specified by the CAA in the aerodrome certificate as being necessary in the interest of safety.

When an aerodrome does not meet the requirements of a standard or practice in regulation, the CAA may determine, after carrying out aeronautical studies, only if and where permitted by the standards and practices, the conditions and procedures that are necessary to ensure a level of safety equivalent to that established by the relevant standard or practice. Deviation from standard or practice and the conditions and procedures referred to in regulation shall be set out in an endorsement on the aerodrome certificate.[1]

4 AIRPORT CERTIFICATION PROCEDURES

The aerodrome certification procedures should ensure full compliance with and have as a control the aerodrome certification regulations promulgated by the CAA.

The aerodrome certification process will comprise – dealing with the expression of interest by an intending applicant for the aerodrome certificate, assessing the formal application including evaluation of the aerodrome manual, assessing the aerodrome facilities and equipment, issuing or refusing an aerodrome certificate and the certified status of an aerodrome and the required details in the AIP.[2]

The CAA must be satisfied that the aerodrome operator has the necessary competence and experience to comply with the relevant regulatory provisions, orders and directives of the CAA. To ensure uniformity, the CAA may prescribe a standard application form for an aerodrome certificate. Based on the results of the assessment of the formal application or a certificate, the CAA should notify the applicant whether the application was successful or unsuccessful. If the application was unsuccessful the applicant should be advised of the additional steps that need to be taken by the applicant prior to certification. For example, the aerodrome manual may need to be amended to incorporate any changes to the aerodrome facilities and equipment that may be required in order to comply with the standards and practices specified in regulations. If the application was successful, the aerodrome certificate, incorporating conditions pursuant to regulations, shall be granted to the applicant after an identifying number has been allocated.

Upon satisfactory completion of the certification process, information about the aerodrome should be provided to the aeronautical information service for publication.[1]

4.1 Assessment of a formal application for an airport certificate

The CAA must be satisfied that the aerodrome operator has the necessary competence and experience to comply with the relevant regulatory provisions, orders and directives of the CAA. To ensure uniformity, the CAA may prescribe a standard application form for an aerodrome certificate. The assessment by the CAA of the formal application should include the following: a) a flight operations assessment if that was not carried out during the time of dealing with the expression of interest. This assessment should also include an aeronautical study pursuant to regulation if there is a deviation from a standard or a practice, b) an assessment of the aerodrome manual submitted by the applicant to determine whether: 1) the manual complies with the requirements of the regulations. All verifications that can be completed or initiated in the office should be carried out, including the aerodrome data to be published by the aeronautical information service, and the adequacy of the aerodrome operating procedures; and 2) the management system, including the safety management system, indicates that the applicant will be able to operate and maintain the aerodrome properly, and c) a site visit as detailed. A site visit should be undertaken for the purpose of assessing the aerodrome facilities, services and equipment to verify and ensure that they comply with the specified standards and practices. This should include: a) on-site verification of aerodrome data; and b) the checking of aerodrome facilities and equipment, which should include:

1) Dimensions and surface conditions of:

- runway(s),
- runway shoulders,
- runway strip(s),
- runway end safety areas,
- stopway(s) and clearways,
- taxiway(s),
- taxiway shoulders,
- taxiway strips,
- aprons.

2) The presence of obstacles in obstacle limitation surfaces at and in the vicinity of the aerodrome. 3) The following aeronautical ground lights, including their flight check records:

- runway and taxiway lighting,
- approach lights,
- PAPI/APAPI or T-VASIS/AT-VASIS,
- apron floodlighting,
- obstacle lighting,
- pilot-activated lighting, if applicable,
- visual docking guidance systems,

4) standby power,

5) wind direction indicator(s),

6) illumination of the wind direction indicator(s),

7) aerodrome markings and markers,

8) signs in the movement areas,

9) tie-down points for aircraft,

10) ground farthing points,

- 11) rescue and fire-fighting equipment and installations,
- 12) aerodrome maintenance equipment, particularly for the airside facilities maintenance including runway surface friction measurement,
- 13) runway sweepers and snow removal equipment,
- 14) disabled aircraft removal equipment,
- 15) wildlife management procedures and equipment,
- 16) two-way radios installed in vehicles for use by the aerodrome operator in the movement area,
- 17) the presence of lights that may endanger the safety of aircraft,
- 18) fuelling facilities.[1]

4.2 Transfer of an airport certificate

Transfer of an aerodrome certificate may be required in accordance with the applicable national regulations when the ownership and the operation of the aerodrome are transferred from one operator to another. Establishment of a standard procedure will ensure that the aerodrome certificates are transferred correctly and consistently using a common legal format nationally.[1]

5 AUDITS AND CONTROLS ON AIRPORT

Airport as a company is subject to controls and audits. These controls and audits carried out by the authority as state supervision. ISO certification audits carried out by an external firm, which issued the certificates and also are performed internally Managed quality control at the airport.

5.1 Audits provided by CAA

These audits are carried out most of the audits planned, but also unplanned. The audits are announced in advance so that each airport will send notice of the survey with the schedule that you will be checked.

Tasks of audits: 1. Regular audits or special audits on the spot, focusing on airport safety management system, including airport screening and data published in AIP-e control and airport facilities, equipment and operational procedures. 2. Assessment of internal audits of the airport and reports on emergency safety audits and activities associated with them.

Program of airport audits should work on this principle, according to which the internal audit program certificate holder's airport utmost importance and audits of the Authority shall be implemented for the purpose of evaluation and assessment of the program and also for the purpose of independent review and verification of data about the airport, which is published in AIP, as well as operational procedures, security measures, equipment and facilities. Regular checks are therefore required in order to ensure that the certificate holder airport to fulfill its obligations arising from the certificate as provided for in the model legislation ICAO Doc 9774 Manual on

Certification of Aerodromes and requirements set out in the manual airport.

These checks may correspond airport category according to their distribution in that each State. Recommended frequency of checks every 24 months so that. If necessary, that period may be extended to 36 months.[4]

5.2 Audits tasks

The frequency of such inspections may correspond to the class of the aerodrome as categorized by the State. For example, one State requires its aerodromes, which are categorized as large, medium and small certified hub aerodromes, to be inspected annually, reducing the frequency to once in eighteen months in the case of NONHUB aerodromes. For its "limited certified" aerodromes, the recommended frequency is once in twenty-four months, which can be reduced to once in thirty-six months if circumstances so require. The tasks and responsibilities associated with periodic inspections are described in next section.

These tasks may be carried out in the following phases: a) *Pre-inspection briefing* with aerodrome management, including coordination with air traffic control tower personnel. b) *Administrative inspection* of the aerodrome safety management system, including such items as snow and ice control plans (if applicable), current NOTAMs, medical and RFF training records, aviation fuel suppliers' safety records, fuelling agents' certificates and fire safety training records, documentation of the annual review of the aerodrome emergency plan, including full-scale emergency exercises, and the aerodrome operator's records of the safety audits of fixed-base operators, ground handling agents and other agencies engaged in airside activities. c) *Movement area inspection* including the inspection and checking of runways and taxiways in order to ascertain the condition of pavements, markings, lighting, signs, shoulders, strips and runway end safety areas, checking for potentially hazardous conditions if construction work is in progress, such as excavations, trenches, stockpiled material, inadequate construction area markings, construction equipment in the movement area and inadequate marking and lighting of temporary thresholds; checking ground vehicle operations in the movement area to verify that only authorized vehicles have access to the area and that the required procedures are being followed, the vehicles are properly marked and the drivers know and use the proper communication terminology, checking that the public is protected against unauthorized entry to the movement area and against jet or propeller blast; checking for wildlife hazards and wildlife attractants; and checking landing direction indicators and wind direction indicators. d) *Rescue and fire-fighting* including the checking of training records, random testing of the knowledge, of firefighters; checking that the equipment is in position, is functional and meets the category, requirements, conducting a time response drill, checking the alarm

system, checking and examining, proximity suits, other protective clothing and fire-fighting and rescue tools and supplies in the inventory. e) *Fuel facilities* including the examination of the inspection records by qualified and authorized personnel, particularly checking that the aerodrome fire-fighting standards are adequately covered in the inspection checklist, and spot checking, including fuel sampling, for compliance with the applicable requirements. f) *Night inspections* including the evaluation and checking for compliance with the standards related to runway, taxiway and apron lighting and signage, pavement markings; aerodrome beacons, wind direction indicator lighting, obstacle lighting and the marking and lighting of construction areas. g) *Post inspection briefing* with the aerodrome management, including the determination of appropriate enforcement action for non-compliance with the regulations.[1]

5.3 The procedure for audit of documentation

Individual procedures for managing document identifies organizational standard that specifies: How is created, assessed, approved, indicates issues, leading distribution and disseminate documentation. The correct way of evidence, custody and care of the documentation Integrated Management System (IMS). Methods for handling and storage of inside information and protocols in accordance with the standard EN ISO 9001 Quality Management Systems and Methods of treatment with external documentation, valid for all employees and the departments of the company.[3]

5.4 Airport employees' controls

Training Schedule Manager compiles quality management based on the requirements submitted to it by managers of organizational units to ensure the preparation of his subordinates. The managers of organizational units are assigned to determine the need for further increases proficiency of skill cards, possibly from the personal files of employees and compare them with reality. After clarifying the requirements manager of quality management processes is a draft program of training and awareness capabilities and approval by senior staff organizational units shall be filed for approval by the Executive Director of the company. The application must indicate the approximate dates, divided into quarters, the manner of (internally and externally), budget and a list of employees who undergo training. Where appropriate, this plan during the year to date. Executive Management then assesses the implementation of the plan from two aspects - material and financial. This review is part of the administration to review the quality management for executive management. It can also carry out training that is not in the plan, but those can be done only within the company. On such training, not in the plan set out by the Executive Director, on a suggestion senior employee particular director organizational unit. On the personnel department stores all original certificates and certificates

of training, organized and paid by the employer and employees as is necessary may make copies.[5]

6 CONCLUSION

The entire certification process is in the hands of the Civil Aviation Authority of the Slovak Republic. Being the main national regulatory authority shall comply with all legislative requirements of our state, but according to Chicago Convention and procedures, rules and regulations of ICAO. Civil Aviation Authority of the Slovak Republic conscientiously keeps records of all airports in Slovakia with the public and closed operation.

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AUTHORS' ADDRESSES

Martin Vencel', Ing. Department of Air Traffic Management
Faculty of Aeronautics Technical university of Košice,
Rampová 7, 041 01 Košice, vencil.m1@gmail.com
Peter Koščák, Ing., PhD. Department of Aviation Engineering
Faculty of Aeronautics Technical university of Košice,
Rampová 7, 041 01 Košice, peter.koscak@tuke.sk