Doc 9868

Procedures for
Air Navigation Services

Training

First Edition — 2006

International Civil Aviation Organization

This is a preview. Click here to purchase the full publication.

This is a preview. Click here to purchase the full publication.

Doc 9868

Procedures for Air Navigation Services

Training

First Edition — 2006

International Civil Aviation Organization

This is a preview. Click here to purchase the full publication.

This is a preview. Click here to purchase the full publication.

Published in separate English, French, Russian and Spanish editions by the
INTERNATIONAL CIVIL AVIATION ORGANIZATION
999 University Street, Montréal, Quebec, Canada H3C 5H7

For ordering information and for a complete listing of sales agents
and booksellers, please go to the ICAO website at www.icao.int

Doc 9868, *Procedures for Air Navigation Services*
Order Number: 9868
ISBN 92-9194-785-7

© ICAO 2006

All rights reserved. No part of this publication may be reproduced, stored in a retrieval system or transmitted in any form or by any means, without prior permission in writing from the International Civil Aviation Organization.

This is a preview. Click here to purchase the full publication.

This is a preview. Click here to purchase the full publication.

AMENDMENTS

Amendments are announced in the supplements to the *Catalogue of ICAO Publications;* the Catalogue and its supplements are available on the ICAO website at www.icao.int. The space below is provided to keep a record of such amendments.

RECORD OF AMENDMENTS AND CORRIGENDA

AMENDMENTS		
No.	Date	Entered by
1	25/8/11	ICAO
2	2/5/13	ICAO
3	13/11/14	ICAO

CORRIGENDA		
No.	Date	Entered by

This is a preview. Click here to purchase the full publication.

This is a preview. Click here to purchase the full publication.

TABLE OF CONTENTS

FOREWORD ..... **(v)**

1. Historical background ..... (v)
2. Scope and purpose ..... (v)
3. Status ..... (vi)
4. Implementation ..... (vi)
5. Publication of differences ..... (vi)
6. Contents of the document ..... (vii)

CHAPTER 1. Definitions and acronyms **1-1**

1.1 Definitions 1-1
1.2 Acronyms 1-5

CHAPTER 2. General provisions for competency-based training and assessment **2-1**

2.1 Introduction 2-1
2.2 Competency-based approach to training and assessment 2-1
2.3 The competency framework 2-2

Attachment to Chapter 2 — An example of an ISD methodology: The ICAO course development methodology 2-A-1

CHAPTER 3. Competency-based training and licensing for the multi-crew pilot licence (MPL) **3-1**

3.1 Introduction 3-1
3.2 Assessment 3-1
3.3 Training 3-1

Appendix 1 to Chapter 3 — Multi-crew pilot licence training scheme 3-1-1

Appendix 2 to Chapter 3 — Multi-crew pilot licence competency units — Competency elements and performance criteria 3-2-1

Appendix 3 to Chapter 3 — Guidelines for the implementation of the multi-crew pilot licence 3-3-1

Attachment A to Chapter 3— Competency-based training and licensing for the multi-crew pilot licence — Guidance on the design and development of a multi-crew pilot licence training programme 3-A-1

Attachment B to Chapter 3 — Multi-crew pilot licence sample training objectives 3-B-1

Attachment C to Chapter 3 — Threat and error management (TEM) 3-C-1

This is a preview. Click here to purchase the full publication.

CHAPTER 4. Competency-based training and assessment for aircraft maintenance personnel 4-1

4.1 Introduction 4-1
4.2 Existing aircraft maintenance licences and training programmes 4-1
4.3 The link between competency-based training and assessment and privileges 4-2
4.4 Issue of Licences and Authorizations 4-2
4.5 Assessment 4-4
4.6 Training 4-4

Appendix 1 to Chapter 4 — Guidelines for the implementation of competency-based training and assessment for aircraft maintenance personnel 4-1-1

Appendix 2 to Chapter 4 — Aircraft maintenance competency units — competency elements and performance criteria 4-2-1

Attachment A to Chapter 4— Competency-based training for aircraft maintenance — Guidance on the design and development of a competency-based training programme for maintenance personnel 4-A-1

Attachment B to Chapter 4 — Deriving training objectives for aircraft maintenance personnel 4-B-1

CHAPTER 5. Evidence-based training (EBT) 5-1

5.1 Applicability 5-1
5.2 Background 5-1
5.3 EBT philosophy 5-2

Chapter 6. Competencies for flight crew training, course developer and instructor, and MPL examiner and inspector 6-1

6.1 Course developer and instructor qualifications 6-1
6.2 MPL examiner and inspector qualifications 6-2

Attachment to Chapter 6 — Competencies of instructors, MPL examiners and inspectors, and course developers 6-A-1

Chapter 7. Upset prevention and recovery training (UPRT) 7-1

7.1 Applicability 7-1
7.2 Background 7-1
7.3 UPRT approach 7-1
7.4 Regulatory requirements 7-2
7.5 Training 7-2
7.6 Regulatory oversight 7-5

This is a preview. Click here to purchase the full publication.

FOREWORD

1. Historical background

1.1 The *Procedures for Air Navigation Services — Training* (PANS-TRG) are the result of the evolution of the work initiated by the Flight Crew Licensing and Training Panel (FCLTP) on the implementation of the training required for the pilot licences and ratings found in Annex 1 — *Personnel Licensing*, including the multi-crew pilot licence (MPL).

1.2 The FCLTP, at its first meeting (Montréal, 8 to 19 December 2003), identified a clear need for licensing and training material that, although too detailed to take the form of Standards, was of sufficient importance to provide universal benefit to States. The need called for material that had to be harmonized and subjected to a formal consultation and approval process and that called for a higher level of adherence on the part of States than that required of guidance material. The FCLTP determined that the establishment of the PANS-TRG would be the appropriate document for use by all States.

1.3 The first amendment to the PANS-TRG was issued in 2011, following the work undertaken by the IATA Training and Qualifications Initiative on the development of a competency-based approach to the training and assessment of aircraft maintenance mechanics/technicians/engineers (AMMTEs), including those personnel with licensed or authorized privileges.

1.4 Between 2006 and 2010, aeroplane accidents resulting from a loss of control in flight (LOC-I) event were the leading cause of fatalities in commercial aviation. Recognizing the need to identify and effectively implement mitigating strategies, the prevention of aeroplane upsets quickly became an ICAO priority. Following extensive studies of the LOC-I phenomena, in collaboration with Civil Aviation Authorities (CAAs), aviation accident investigative bodies, LOC-I focus groups, industry associations, original equipment manufacturers (OEMs), and subject matter experts from around the world, it became readily apparent that deficiencies in current training practices were contributing factors in most aeroplane upset-related accidents. Consequently, ICAO has introduced improvements to existing Standards and Recommended Practices (SARPs) and corresponding guidance material that will introduce and support aeroplane upset prevention and recovery training (UPRT) requirements.

2. Scope and purpose

2.1 The *Procedures for Air Navigation Services — Training* (PANS-TRG) are complementary to the Standards and Recommended Practices (SARPs) contained in Annex 1.

2.2 The PANS-TRG specifies, in greater detail than in the SARPs, the actual procedures to be applied by training organizations when providing training for aeronautical personnel. This edition, including the third amendment to PANS-TRG, contains procedures for the development and implementation of various competency-based training programmes designed to meet the Annex 1 requirements for the MPL and the aircraft maintenance mechanic/technician/engineer (AMMTE) licence, as well as those flight crew training

This is a preview. Click here to purchase the full publication.