This is a preview of "ISO/TR 17068:2012". Click here to purchase the full version from the ANSI store.

First edition 2012-11-01

Information and documentation -Trusted third party repository for digital records



ISO/TR 17068:2012(E)

This is a preview of "ISO/TR 17068:2012". Click here to purchase the full version from the ANSI store.



COPYRIGHT PROTECTED DOCUMENT

© ISO 2012

All rights reserved. Unless otherwise specified, no part of this publication may be reproduced or utilized in any form or by any means, electronic or mechanical, including photocopying and microfilm, without permission in writing from either ISO at the address below or ISO's member body in the country of the requester.

ISO copyright office Case postale 56 • CH-1211 Geneva 20 Tel. + 41 22 749 01 11 Fax + 41 22 749 09 47 E-mail copyright@iso.org Web www.iso.org

Published in Switzerland

This is a preview of "ISO/TR 17068:2012". Click here to purchase the full version from the ANSI store.

Contents			Page
For	eword		iv
Introduction			v
1			
_	-		
2		d definitions	
3	Overview of a TTPR		
		cessity for a TTPR	
		quirements for trustworthiness	
		PR components	
	3.4 Ch	aracteristics of a TTPR	6
4	TTPR services		
		vice procedure	
		PR service contracts	
	4.3 TT	PR services	9
5	System requirements		18
		neral	
		gital record repository system	
		ansmitter-receiver system	
	5.4 Ne	twork system	19
	5.5 Tir	ne-stamping system	19
		nil management system	
		curity system of network system	
		cess control equipment	
	5.9 Dis	saster protection facility	20
	5.10 Sys	stem for certificate issuance and validation of digital record	20
		ckup system	
	5.12 Re	mote repository system	22
6	Management requirements		
		neral	
		ent management	
		ministrator's role and authority management	
		twork and security management	
	-	gital record management	
		nagement of transmitted and received messages	
		dit record management	
		ta backup and recovery management	
		curity management	
		gration and receipt management	
		ent system management	
Bibliography			32

ISO/TR 17068:2012(E)

This is a preview of "ISO/TR 17068:2012". Click here to purchase the full version from the ANSI store.

Foreword

ISO (the International Organization for Standardization) is a worldwide federation of national standards bodies (ISO member bodies). The work of preparing International Standards is normally carried out through ISO technical committees. Each member body interested in a subject for which a technical committee has been established has the right to be represented on that committee. International organizations, governmental and non-governmental, in liaison with ISO, also take part in the work. ISO collaborates closely with the International Electrotechnical Commission (IEC) on all matters of electrotechnical standardization.

International Standards are drafted in accordance with the rules given in the ISO/IEC Directives, Part 2.

The main task of technical committees is to prepare International Standards. Draft International Standards adopted by the technical committees are circulated to the member bodies for voting. Publication as an International Standard requires approval by at least 75 % of the member bodies casting a vote.

In exceptional circumstances, when a technical committee has collected data of a different kind from that which is normally published as an International Standard ("state of the art", for example), it may decide by a simple majority vote of its participating members to publish a Technical Report. A Technical Report is entirely informative in nature and does not have to be reviewed until the data it provides are considered to be no longer valid or useful.

Attention is drawn to the possibility that some of the elements of this document may be the subject of patent rights. ISO shall not be held responsible for identifying any or all such patent rights.

ISO/TR 17068 was prepared by Technical Committee ISO/TC 46, *Information and documentation*, Subcommittee SC 11, *Archives/records management*.

This is a preview of "ISO/TR 17068:2012". Click here to purchase the full version from the ANSI store.

Introduction

As digital records are the inevitable by-products of various business activities in electronic and/or digital systems, there is an increasing need to secure the legal admissibility of digital records during their period of retention. It is internationally agreed that "digital records shall not be denied validity or enforceability of legal recognition by reason of their format alone"¹⁾. Despite this, it may be very difficult for an organization to assert that its digital records are authentic and able to act as effective evidence of business action over a long period. In many cases legal admissibility of digital records managed by organizations' records systems may not be ensured. As a result, there is a growing need for certification services for digital records by neutral third parties.

In order to protect digital records from business disputes during the period they are required for sustaining legal obligation and ongoing retention, it is essential to ensure that the authenticity, reliability and integrity of digital records endures.

Digital signatures are a well-known means of maintaining the integrity of digital records. However, as a digital signature can only ensure integrity within its validity time (generally one to two years or less), most digitally signed records cannot ensure their integrity for longer than this validity time. As a result, it may be very difficult for an individual record system to prove the integrity of their digital records for the period of retention obligation, where this is longer than the validity period of the digital signature.

A possible solution can be provided by a Trusted Third Party Repository (TTPR) service.

A TTPR is defined as a set of services, systems and personnel that ensure that digital records, entrusted to it by a client, remain and can be asserted to be reliable and authentic, with the aim of providing reliable access to managed digital records to its clients for the period of obligation for retention. A TTPR for digital records should provide trustworthy services for clients, which can be examined by interested parties (i.e. inspector, auditor, evaluator). These TTPR services are helpful to identify the evidence admissibility of clients' digital records as a source of evidence.

This Technical Report describes the specific requirements for the trustworthy services provided by a TTPR. Its main purpose is to ensure that digital records can retain the relevant evidence and information in an ensured and trusted manner during the required period of retention.

¹⁾ UNCITRAL 200t, United Nations Convention on the Use of Electronic Communication in International Contracts.