INTERNATIONAL STANDARD

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Information technology — Machine readable test data for biometric testing and reporting —

Part 1: Test reports

Technologies de l'information — Données d'essai lisibles par machine pour les rapports et les essais biométriques —

Partie 1: Rapports d'essai

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Contents

Page

Foreword

ISO (the International Organization for Standardization) and IEC (the International Electrotechnical Commission) form the specialized system for worldwide standardization. National bodies that are members of ISO or IEC participate in the development of International Standards through technical committees established by the respective organization to deal with particular fields of technical activity. ISO and IEC technical committees collaborate in fields of mutual interest. Other international organizations, governmental and non-governmental, in liaison with ISO and IEC, also take part in the work. In the field of information technology, ISO and IEC have established a joint technical committee, ISO/IEC JTC 1.

The procedures used to develop this document and those intended for its further maintenance are described in the ISO/IEC Directives, Part 1. In particular the different approval criteria needed for the different types of document should be noted. This document was drafted in accordance with the editorial rules of the ISO/IEC Directives, Part 2 (see www.iso.org/directives).

Attention is drawn to the possibility that some of the elements of this document may be the subject of patent rights. ISO and IEC shall not be held responsible for identifying any or all such patent rights. Details of any patent rights identified during the development of the document will be in the Introduction and/or on the ISO list of patent declarations received (see www.iso.org/patents).

Any trade name used in this document is information given for the convenience of users and does not constitute an endorsement.

For an explanation on the meaning of ISO specific terms and expressions related to conformity assessment, as well as information about ISO's adherence to the WTO principles in the Technical Barriers to Trade (TBT), see the following URL: Foreword — Supplementary information.

The committee responsible for this document is ISO/IEC JTC 1, *Information technology*, SC 37, *Biometrics*.

ISO/IEC 29120 consists of the following parts, under the general title *Information technology — Machine readable test data for biometric testing and reporting*:

— *Part 1: Test reports*

Introduction

This International Standard will enhance the usability of biometric test data by providing them in a common and machine readable form. This International Standard is intended to provide

— documentary evidence that a product has been tested,

— a statement of authenticity of the test report,

— an ability to maintain of registry of products,

— a clear mechanism for maintaining product availability and certification status, and

— an ability for a relying system to depend on a biometric product used in a remote authentication context.

This International Standard is not intended to replace traditional biometric test reports. Indeed, because such texts are essential to the complete documentation of a test, they are viewed as parents of the machine readable content defined in ISO/IEC 29120 and are explicitly referenced in these reports.

Accordingly, the parts of this International Standard establish requirements for, and define formats for, signed test reports and biometric datasets as follows.

This part of ISO/IEC 29120 establishes machine readable records for documenting the output of a biometric test. This supports the documentary reporting requirements of some parts of ISO/IEC 19795. This part of ISO/IEC 29120 is primarily intended to support scenario and technology tests. Additionally, interoperability tests can be documented by a collection of ISO/IEC 29120-1 test reports (one for each tested combination of components). The International Standard also includes mechanism to protect the integrity of the test report. This assures a receiving system that the test information (date, laboratory, accreditation body, manner of testing, conformance, test size, accuracy) can be relied upon and used appropriately.

As the parts of ISO/IEC 19795 have been developed and testing standards have been published, there is an increasing reliance on the correct conduct of tests and their documented outputs. Although the ISO/IEC 19795 standards include extensive disclosure and reporting requirements, they do not establish definitive data formats for those pieces of information. Other data concerning the commissioning, accreditation, and conduct of the test can also be valuable to consumers of the test reports. In addition, this International Standard will benefit users of biometric tests via improved

— conformance to testing standards,

— reliability (via automation of relevant activities), and

— comparability of test results.

Information technology — Machine readable test data for biometric testing and reporting —

Part 1: Test reports

1 Scope

This part of ISO/IEC 29120 establishes

— machine readable records for documenting the output of a biometric test,

— formats for data that ISO/IEC 19795 tests are required to report, and

— an ASN.1 syntax for test reports.

This standard specifically does not

— require, prohibit, or otherwise specify, the format of biometric samples or templates used in a test,

— require, prohibit or otherwise specify, the encapsulation of biometric samples or templates used in a test, or

— regulate metrics for tests.

NOTE ISO/IEC 19795-1 establishes the reportable metrics.

2 Conformance

A test report shall be conformant to this part of ISO/IEC 29120 if it meets all normative requirements of this part of ISO/IEC 29120.

3 Normative references

The following documents, in whole or in part, are normatively referenced in this document and are indispensable for its application. For dated references, only the edition cited applies. For undated references, the latest edition of the referenced document (including any amendments) applies.

ISO 8601:2004, *Data elements and interchange formats — Information interchange — Representation of dates and times*

ISO/IEC 8825-1:2008, *Information technology — ASN.1 encoding rules: Specification of Basic Encoding Rules (BER), Canonical Encoding Rules (CER) and Distinguished Encoding Rules (DER) — Part 1*

ISO/IEC 8825-4:2008, *Information technology — ASN.1 encoding rules: XML Encoding Rules (XER) — Part 4*

ISO/IEC 9594-2, *Information technology — Open Systems Interconnection — The Directory — Part 2: Models*

ISO/IEC 19785-3:2007, *Information technology — Common Biometric Exchange Formats Framework — Part 3: Patron format specifications*

ISO/IEC 19795-1, *Information technology — Biometric performance testing and reporting — Part 1: Principles and framework*

RFC 3852, *Cryptographic Message Syntax (CMS)*

RFC 5911, *New ASN.1 Modules for Cryptographic Message Syntax (CMS) and S/MIME*