

AS/NZS ISO/IEC 23127.1:2021
ISO/IEC 23127-1:2021



Australian/New Zealand Standard™

Information technology — Learning, education, and training — Metadata for facilitators of online learning

Part 1: Framework



AS/NZS ISO/IEC 23127.1:2021

This Joint Australian/New Zealand Standard™ was prepared by Joint Technical Committee IT-019, Information and Documentation, Information Technology — Learning, Education, Training and Research. It was approved on behalf of the Council of Standards Australia on 29 September 2021 and by the New Zealand Standards Approval Board on 6 October 2021.

This Standard was published on 29 October 2021.

The following are represented on Committee IT-019:

Australian Computer Society
Australian Library and Information Association
Australian Research Data Commons
CSIRO
Charles Darwin University
Council of Australian University Librarians
Education Services Australia
Flinders University
Library & Archives NT
Lincoln University
Macquarie University
NSW Department of Education
National Library of New Zealand
Professional Scientists Australia
University of Otago
Victoria University of Wellington

This Standard was issued in draft form for comment as DR AS/NZS ISO/IEC 23127.1:2021.

Keeping Standards up-to-date

Ensure you have the latest versions of our publications and keep up-to-date about Amendments, Rulings, Withdrawals, and new projects by visiting:

www.standards.org.au

www.standards.govt.nz

ISBN 978 1 76113 533 0

Australian/New Zealand Standard™

Information technology — Learning, education, and training — Metadata for facilitators of online learning

Part 1: Framework

First published as AS/NZS ISO/IEC 23127.1:2021.

COPYRIGHT

© ISO/IEC 2021 — All rights reserved

© Standards Australia Limited/the Crown in right of New Zealand, administered by the New Zealand Standards Executive 2021

All rights are reserved. No part of this work may be reproduced or copied in any form or by any means, electronic or mechanical, including photocopying, without the written permission of the publisher, unless otherwise permitted under the Copyright Act 1968 (Cth) or the Copyright Act 1994 (New Zealand).

Preface

This Standard was prepared by the Joint Standards Australia/Standards New Zealand Committee IT-019, Information and Documentation, Information Technology — Learning, Education, Training and Research.

The objective of this document is to specify a metadata structure to store, present and exchange online learning facilitator (OLF) information by specifying the data elements and their attributes to describe facilitator's information on various kinds of online education platforms.

This document provides a generic information model of OLF to describe relevant information that applies to the facilitation and training services provided online, and includes information about the person offering facilitation, the affiliation of the person, facilitation ability, facilitation practices, the facilitation service offered, learners' reviews and testimonies, and related social network information. The conceptual data model allows the linguistic diversity of OLF information attributes and offers a flexible metadata schema to describe them.

This document is identical with, and has been reproduced from, ISO/IEC 23127-1:2021, *Information technology — Learning, education, and training — Metadata for facilitators of online learning — Part 1: Framework*.

As this document has been reproduced from an International Standard, a full point substitutes for a comma when referring to a decimal marker.

Australian or Australian/New Zealand Standards that are identical adoptions of international normative references may be used interchangeably. Refer to the online catalogue for information on specific Standards.

The terms “normative” and “informative” are used in Standards to define the application of the appendices or annexes to which they apply. A “normative” appendix or annex is an integral part of a Standard, whereas an “informative” appendix or annex is only for information and guidance.

Contents

Preface	ii
Foreword	iv
Introduction	v
1 Scope	1
2 Normative references	1
3 Terms and definitions	1
4 Abbreviated terms	2
5 Specification of data elements	2
5.1 General	2
5.2 Data element specification attributes	2
5.3 Data element specification: Matrix template	3
5.4 Data element specification: Example	3
6 OLF data elements	4
7 Specification of OLF classes	4
7.1 Definition of a resource class	4
7.2 Attributes of a resource class	4
7.3 Resource class specification: Matrix template	4
8 Generic OLF classes	4
8.1 General	4
8.2 IC0000 OLF information	5
8.3 IC0100 personal information	5
8.4 IC0200 occupational history information	6
8.5 IC0300 facilitation offer information	6
8.6 IC0400 performance history information	6
8.7 IC0500 academic ability	6
8.8 IC0600 OLF network information	7
9 Predefined rule sets	7
10 Specification of application profiles	7
10.1 General	7
10.2 Application profile attributes	7
10.3 DEGS' matrix	7
10.4 Application profile: Example	7
Annex A (informative) OLF information for online facilitation and training	9
Bibliography	11

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.

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 ISO documents 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) or www.iec.ch/members_experts/refdocs).

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. 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) or the IEC list of patent declarations received (see patents.iec.ch).

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

For an explanation of the voluntary nature of standards, the meaning of ISO specific terms and expressions related to conformity assessment, as well as information about ISO's adherence to the World Trade Organization (WTO) principles in the Technical Barriers to Trade (TBT), see www.iso.org/iso/foreword.html. In the IEC, see www.iec.ch/understanding-standards.

This document was prepared by Joint Technical Committee ISO/IEC JTC1, *Information technology*, Subcommittee SC 36, *Information technology for learning, education and training*.

A list of all parts in the ISO 23127 series can be found on the ISO website and IEC websites.

Any feedback or questions on this document should be directed to the user's national standards body. A complete listing of these bodies can be found at www.iso.org/members.html and www.iec.ch/national-committees.

Introduction

With the rapid development of internet and mobile technologies, online learning facilitation is becoming more and more popular. There are tens of thousands of online facilitation service providers in the market already, such as companies, agencies, or independent facilitators. These online facilitators may work with face-to-face or online LET organizations, they may or may not have certificates on facilitation, teaching, or coaching.

An online learning facilitator (OLF) is someone who provides facilitation, tutoring, and training services on different kinds of online platforms or systems. From present practice, services offered by an OLF include lecturing, coaching tutoring, assessing/evaluating, learning resources design, etc. (see Annex A.1).

In the process of online and hybrid learning, it is very common to describe who the OLFs are. It is important to know the contact information, facilitation preference and ability, facilitation service history, etc. OLF information may be found in or associated with different systems, from online learning systems, training websites, teacher rating systems to HR information systems in schools and universities, etc. (see Annex A.2). But different systems only store and use part of this information according to their business needs and functions.

This document describes how to describe OLF in various IT systems, and also how to exchange this information across different platforms. It creates a metadata structure of OLF information to ensure that education IT systems can store and access this information as needed.

By defining a generic conceptual model, this document specifies a high-level semantic interoperability between bindings of OLF information attributes. In this way, the conversion between different bindings becomes simple and straightforward.

This document can be used in different scenarios:

- 1) developing an OLF information model for education IT system;
- 2) maintaining and exchanging OLF data across different IT systems;
- 3) collecting/harvesting OLF information from different IT systems when needed; and
- 4) matching OLF to learners in learning management systems according to the services they offer and their expertise.

The ISO/IEC 23127 series has a multipart structure and is integrated via different parts to define and describe various aspects of online facilitators' information. Each part of the ISO/IEC 23127 series is self-contained and has its own scope and purpose. This facilitates use and maintenance of specific parts and thus of the whole standard.

The ISO/IEC 23127 series aims to enable multilingual equivalence and cultural adaptability. This means incorporating and supporting both (1) a top-down requirements approach, i.e., that of jurisdictional domains; and, (2) a bottom-up approach of the requirements of the individual, i.e., human being, as the (final) user, doing so in a global context. To achieve this, the ISO/IEC 23127 series supports both global interoperability and local specificity, such as:

- natural and special languages and associated multilingual requirements;
- jurisdictional, legal, regulatory, and geopolitical constraints as mandated by relevant jurisdictional domain(s).

This document does not provide detailed information regarding multilingual equivalencies or multicultural requirement support.

In the implementation of one (or more) part(s) of the ISO/IEC 23127 series, it is possible that a user may have additional or more precise requirements to implement. This document only defines high-