

# ECDL MODULE ICT IN EDUCATION

**Syllabus Version 1.0** 

#### **Purpose**

This document details the syllabus for the ICT in Education module. The syllabus describes, through learning outcomes, the knowledge and skills that a candidate for the ICT in Education module should possess. The syllabus also provides the basis for the theory and practice-based test in this module.

### Copyright © 1997 - 2015 ECDL Foundation

All rights reserved. No part of this publication may be reproduced in any form except as permitted by ECDL Foundation. Enquiries for permission to reproduce material should be directed to ECDL Foundation.

#### **Disclaimer**

Although every care has been taken by ECDL Foundation in the preparation of this publication, no warranty is given by ECDL Foundation, as publisher, as to the completeness of the information contained within it and neither shall ECDL Foundation be responsible or liable for any errors, omissions, inaccuracies, loss or damage whatsoever arising by virtue of such information or any instructions or advice contained within this publication. Changes may be made by ECDL Foundation at its own discretion and at any time without notice.

# **ICT in Education Module**

This module sets out knowledge and skills relating to the pedagogically effective use of ICT to support and enhance teaching, learning and assessment in the classroom.

## **Module Goals**

Successful candidates will be able to:

- Understand the key concepts and benefits of using ICT to support and enhance teaching, learning and assessment in the classroom.
- Outline considerations for planning an ICT-enhanced lesson.
- Understand safety, security and well-being considerations when using ICT in education.
- Outline ICT resources that can be used to support and enhance teaching, learning and assessment.
- Understand how to source and evaluate ICT resources to support and enhance teaching, learning and assessment.
- · Outline key features of classroom technologies.
- Use key features of a learning platform.

•	01		
CATEGORY	SKILL SET	REF.	TASK ITEM
1 Key Concepts	1.1 Benefits	1.1.1	Understand that ICT used in Education can consist of computers and devices, networks, applications/tools, and digital content.
		1.1.2	Outline the benefits of using ICT to support and enhance teaching.
		1.1.3	Outline the benefits of using ICT to support and enhance learning.
		1.1.4	Outline the benefits of using ICT to support and enhance assessment.
		1.1.5	Outline barriers to using ICT to support and enhance teaching, learning and assessment.
	1.2 Pedagogy and ICT	1.2.1	Outline how ICT can support different learning styles.
		1.2.2	Outline how ICT can support different teaching/learning strategies.
		1.2.3	Outline how ICT can support different learning environments.
2 Planning	2.1 Lesson Planning Considerations	2.1.1	Outline steps involved in planning an ICT-enhanced lesson.
		2.1.2	Recognise that planning an ICT-enhanced lesson includes the selection of ICT for lesson preparation, teaching activities, learning activities, assessment activities.

	CATEGORY	SKILL SET	REF.	TASK ITEM
•			2.1.3	Outline practical considerations when planning an ICT-enhanced lesson.
			2.1.4	Understand the importance of ensuring equal access to ICT for all students. Identify some options for enhancing accessibility.
			2.1.5	Create a lesson plan for an ICT-enhanced lesson.
		2.2 Safety, Security and Well-Being	2.2.1	Understand the concept of an acceptable use policy (AUP).
		2.2.2	Understand the importance of educating students and parents about safe and responsible Internet use. Outline some potential risks for students using the Internet.	
		2.2.3	Outline ways to minimize risks for students using the Internet.	
		2.2.4	Be aware of the importance of protecting student data by implementing relevant data protection laws. Understand the teacher's role and responsibilities in implementing data protection policies.	
			2.2.5	Recognise some methods for protecting data on computers and devices.
			2.2.6	Recognise some ways to help ensure teacher and student well-being while using a computer or device.
,	3 Selecting ICT resources	3.1 ICT Resources for Teaching and Learning	3.1.1	Identify types of digital content that can be used to support and enhance teaching and learning and outline their key features.
			3.1.2	Identify communication tools that can be used to support and enhance teaching and learning and outline their key features.
		3.1.3	Identify online collaboration tools that can be used to support and enhance teaching and learning and outline their key features.	
		3.1.4	Identify productivity tools that can be used to support and enhance teaching and learning and outline their key features.	
		3.1.5	Identify image, audio, video tools that can be used to support and enhance teaching and learning and outline their key features.	
		3.2 ICT Resources for Assessment	3.2.1	Identify on-screen assessment tools that can be used to support and enhance assessment and outline their key features.

CATEGORY	SKILL SET	REF.	TASK ITEM
		3.2.2	Identify electronic survey/voting tools that can be used to support and enhance assessment and outline their key features.
		3.2.3	Understand the term electronic portfolio and how it can support and enhance assessment. Identify tools for supporting the use of electronic portfolios and outline their key features.
		3.2.4	Understand how ICT can support and enhance collaborative assessment.
		3.2.5	Identify tools that can be used to support the management and administration of assessment and outline their key features.
	3.3 Sourcing, Evaluating ICT Resources	3.3.1	Identify sources of ICT resources.
		3.3.2	Understand the importance of evaluating ICT resources using a systematic approach such as an evaluation matrix.
		3.3.3	Be aware of the importance for teachers and learners of critically evaluating digital content. Recognise appropriate criteria for evaluating digital content for effective use in education.
		3.3.4	Recognise appropriate criteria for evaluating applications/tools for effective use in education.
		3.3.5	Understand the terms copyright, intellectual property rights, plagiarism, Creative Commons licenses. Recognise the need to acknowledge sources, seek permission to use digital text, images, audio, video, as appropriate.
		3.3.6	Be aware of the importance of using licensed software. Outline types of software licenses: enduser license agreement (EULA), multi-user license, open source, shareware, freeware.
		3.3.7	Evaluate an ICT resource to determine its effectiveness in supporting and enhancing teaching, learning and assessment.
4 Managing the Learning Environment	4.1 Classroom Technologies	4.1.1	Understand the concept of an interactive whiteboard and outline its key features.
		4.1.2	Understand the purpose of a digital projector in the classroom and outline its key features.
		4.1.3	Understand the purpose of a digital visualiser in the classroom and outline its key features.
		4.1.4	Understand the concept of screen sharing tools and outline their key features.

CATEGORY	SKILL SET	REF.	TASK ITEM
		4.1.5	Understand the concept of mobile learning and outline the key features of mobile devices.
		4.1.6	Understand the terms 1:1 computing and Bring Your Own Device (BYOD).
		4.1.7	Identify equipment used in teaching, learning and assessment to support the creation and use of image, audio and video files and to support communication and online collaboration.
	4.2 Learning platforms	4.2.1	Understand the concept of a learning platform and identify its key features.
		4.2.2	Create a course in a learning platform: set the category, name, start date, number of weeks/topics. Delete a course.
		4.2.3	Create a user. Assign, unassign users to a course in a learning platform.
		4.2.4	Add content to, delete content from the course page in a learning platform like: file, folder, existing content, label, page, URL.
		4.2.5	Be aware of available communication/collaboration activities in a learning platform. Create, edit, remove a communication/collaboration activity like:

forum, wiki, chat.