PROGRAMME GUIDANCE
for
New Zealand Certificate in Computing (Intermediate User) (Level 3) (ref 2593 v2)
September 2022

This guidance has been developed to aid providers developing programmes leading to this qualification and provides a list of suggested unit standards that have been aligned to the qualification's Graduate Profile Outcomes (GPOs).

Strategic Purpose

The purpose of this qualification is to provide Aotearoa New Zealand organisations and communities with graduates who have intermediate level user computing skills, and can be employed in a range of roles, operating effectively with skills that will meet standard professional conventions and be internationally relevant.

This qualification may build on existing skills and can be used to recognise the achievement of relevant knowledge and skills by those already employed.

Graduates of this qualification will have the skills to enable them to proceed to further study and contribute to society by supporting digital proficiency and using their digital capability in a range of community and voluntary areas.

General Conditions for Programme

Programme design

Programmes must be designed to equip learners to use a wide range of digital devices and applications for a specified purpose, with relevant quality outputs to professional standards.

Programmes must incorporate a focus on current and emerging digital tools, technologies and systems.

Programmes must include the intermediate level use of a variety of relevant software applications including:

- word processing,
- spreadsheet,
- interactive web pages,
- presentation,
- database;
- digital media and image editing; and
- collaboration tools.

Programmes must reflect quality industry practice and maintain currency with amendments to, and replacements of, relevant legislation, regulations, Australia/New Zealand standards (AS/NZS), and security responsibilities including cyber safety.

Diversity and inclusion

Programme design must consider bicultural, multicultural, gender and accessibility perspectives. Programme design must also consider ngā kaupapa o te Tiriti o Waitangi (the principles of the Treaty of Waitangi).

Professional practice

Professional practice must be an integral part of the programme and delivery. Professional practice includes the core 'soft skills' of communication, collaboration, interpersonal skills, self-management, problem solving, reflection and ethical principles and practices.

It also includes the awareness of implications of complying with legal and regulatory requirements (e.g. health and safety, copyright, intellectual property, spamming, software licensing, privacy), and observing security responsibilities relevant to an organisational environment.

Practical experience

Practical experience is essential, and it is recommended that learners complete at least half of their programme in real or realistic practical settings such as workplaces, labs or other simulated environments, or table-top walk-through exercises.

Suggested unit standards

The following list of standards aligned to each GPO was developed as part of the 2021 review of Computing and Information Technology unit standards and follows the 2020 review of this qualification. It includes both recommended and optional standards with recommended standards highlighted.

Suggested unit standards towards the NZ Certificate in Computing (Intermediate User) (Level 3)				
Qualification GPO	**Unit**	**Title**	**Level**	**Credits**
GPO1 Use a wide range of features, functions and settings of digital devices, software and techniques to search, access, create, combine, manipulate, store and share data, and explore current and emerging trends in the use of digital tools**.** **(25 credits)** *Programmes must include the intermediate level use of a variety of relevant software applications including word processing, spreadsheet, interactive web pages, presentation, database; use of digital media and image editing software; and use of collaboration tools.*	**29785**	Use a **word processing application to integrate** images, spreadsheet and database data into documents	3	5
	29786	Produce a **spreadsheet** for organisational use	3	5
	29787	Produce and use a **relational database** to provide a solution for organisational use	3	5
	32942	Use and maintain a **computer database** to meet organisational requirements	3	3
	29788	Develop, test, and evaluate an **interactive website** for organisational use	3	5
	32939	**Maintain, update, test, and evaluate an interactive website** for organisational use	3	5
	29789	Use a **presentation application** to produce an interactive multimedia presentation	3	3
	29790	Use digital tools to create and **monitor a project plan**	3	3
	29791	Capture and prepare **digital media for integration** into other applications	3	2
	29792	Use a **desktop publishing application** to produce documents	3	4
	29797	**Synchronise data** across digital devices and multiple platforms. *Note: may also contribute to GPOs 3-6.*	3	2
	29780	Configure, manage, and use contemporary and emerging **digital devices**. *Note: may be applied across other GPOs.*	*2*	*3*
	29772	**Manage files and folders** using digital devices.	2	2

Suggested unit standards towards the NZ Certificate in Computing (Intermediate User) (Level 3)				
Qualification GPO	**Unit**	**Title**	**Level**	**Credits**
	29778	Use the main features and functions of a **schematic diagram** application to create diagrams.	2	2
	29779	Create, assemble, and test **a microprocessor-controlled device** built from components	2	3
GPO2 Investigate, plan, consult, design and develop integrated solution(s) to meet the requirements of a specified brief **(10 credits)**	**29793**	Investigate, plan, design and create digital outcome solutions to meet the requirements of a specified brief	3	5
GPO3 Identify risks and consistently apply appropriate ethics and practices when using digital tools and digitally stored and transmitted information to securely and legally operate in a digital environment. **(10 credits)**	**29794**	Describe **risks** and implement **security solutions** when using digital tools	3	5
	29795	Apply **ethical behaviour** when using digital tools	3	5
GPO4 Collaborate and communicate effectively with others in a range of formal and informal digital environments, using appropriate communication principles, etiquette and tools. **(7 credits)**	**29796**	Collaborate and communicate with others effectively and safely in a digital environment	3	7

Suggested unit standards towards the NZ Certificate in Computing (Intermediate User) (Level 3)				
Qualification GPO	**Unit**	**Title**	**Level**	**Credits**
GPO5 Manage own learning and work effectively in a digital context **(3 credits)**	**32940**	Demonstrate the application of new skills achieved with self-directed learning in a digital context	3	3
GPO6 Use problem solving techniques to trouble-shoot, fix or escalate a range of common hardware and software problems by selecting from known solutions. **(5 credits)**	**29798**	**Troubleshoot, fix and escalate** a range of common hardware and software problems	3	3
	29797	**Synchronise data** across digital devices and multiple platforms. *Note: may also contribute to GPOs 1, 3-5.*	3	2
	9695	Examine **problem-solving** models and explain associated techniques	3	3
Optional standards – not directly aligned with any specific GPO, but relevant for IT skill development	*5968*	*Discuss the social implications of information technology. Note: may contribute to GPOs 1, 6.*	*3*	*3*
	32941	*Demonstrate and apply knowledge of the principles of computer networks. Note: may contribute to GPOs 2, 3, 6.*	*3*	*5*
	18741	*Create a computer program to provide a solution to a problem. Note: may contribute to GPOs 1-2.*	*3*	*6*
	18750	*Produce an interactive electronic training package for organisation use. Note: may contribute to GPO 2.*	*3*	*5*

For further information and questions on this guidance, please contact us at qualifications@toimai.nz.