Port Moresby International School

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Unit & Assessment Outline for Students & Parents Grades 7 – 10.

Year	2026	Grade	9	Semester	Two (2)
Course Title	IGCSE-ICT 0147 / PNG Lower Secondary-Computing				
Curriculum Taught	Cambridge IGCSE Information and Communication Technology				
Topics	ICT Applications/SLC/Databases/Safety &Security/Communications				

Assessment

Week	Topic(s)	Type of Task	Weighting
5	T3 Test – ICT Applications/SLC	Written Test	25%
8	Database Exercises	Practical Tasks	20%
12	Database Assignment	Practical Assignment	30%
15	T4 Test – Safety, Security, Comms	Written Test	25%

Learning outcomes against which the students will be reported:

1. Demonstrates knowledge and appropriate use of computing terms and concepts.

2. Applies knowledge and concepts appropriately to a variety of tasks in familiar and unfamiliar situations

3. Effectively communicates knowledge, concepts and ideas through a range of written or non-written formats

4. Applies computing skills in producing information products

Course Aims/Goals

• Help students to develop and consolidate their knowledge, skills and understanding in IT.

• Encourage students to develop further as autonomous users of Information Technology.

• Encourage students to continue to develop their Information Technology skills to enhance their work in a variety of subject areas.

• Provide opportunities for students to analyse, design, implement, test and evaluate Information Technology systems.

• Encourage students to consider the impact of new technologies on methods of working in the outside world on social, economic, ethical and moral issues.

• Help students to grow in their awareness of the ways in which Information Technology is used in practical and work-related situations.

Content Outline

Weeks	Content Outline	Curriculum Links
1-2	**ICT Applications -** Booking systems; Banking applications; Computers in medicine; Computers in libraries; Expert systems; Computers in retail industry; Recognition systems; Monitoring and tracking systems; Satellite systems.	[IGCSE 6]
3-4	**The System Life Cycle –** Analysis: methods of research, Record and analyse information about the current system; Design: Produce designs, Validation checks; Development and testing: Develop system from a design and test it, Testing strategies; Implementation: Methods of implementation; Documentation: User documentation, Technical Documentation; Evaluation: The need for evaluation, Evaluation strategies.	[IGCSE 7]
5-6	**Assessment#01 - T3 Test – ICT Applications/SLC** **Proofing**: Software tools; Proofing techniques. **Databases:** Data types; Database terms; Flat-file vs. Relational databases; Creating databases; **Create a database structure -** Locate, open, and import data from an existing file; Import data from an existing file and create a relationship between two tables	[IGCSE 15] [IGCSE 18]
7-8	**Databases: Manipulate data** – Enter data with 100% accuracy, showing subsets of data, and sorting data; Perform searches using queries; Perform wildcard searches; Put formulas in queries; perform searches on databases. **Databases: Present data** – Produce reports; Produce calculations at run-time; Create reports based on queries; Show and hide data and labels within a report; Database labels; Create a data entry form. **Assessment#02 - Database Exercises**	[IGCSE 18]
9-10	**Safety and Security:** Physical Safety: Issues and measures for preventing accidents, Evaluate your own use of IT equipment; Personal data: How to avoid inappropriate disclosure of data, Evaluate your own use of the internet, email and social media; e-Safety: Precautions to take when playing on the internet, How to recognise when someone is attempting to obtain personal data; Security of data: Hacking and its effect, Use of firewalls, Authentication techniques, Prevent unauthorised access to the system – Passwords, Two-factor authentication, Digital signatures, Firewalls, Phishing, pharming, smishing and vishing, Moderated and un-moderated forums.	[IGCSE 18]
11-12	**Assessment#03 - Database Assignment** Create a database structure; Manipulate data; Present data	[IGCSE 8]
13-14	**Communication**: Communication with other ICT users using email: What is an email, Constraints that affect the use of email, Spam, Web browsers and search engines, Internet terms, Intranet vs. internet vs. WWW; Effective use of the internet: Locating specified information from a given website URL, Finding specific information using a search engine, Structure of a web address, Blogs, Wikis, Social networking websites, Issues with information on the internet, Undesirability of information on the internet.	[IGCSE 10]
15-16	**Assessment#04 - T4 Test – Safety, Security, Comms** **Presentation Authoring:** Using a master slide; Create presentation slides to meet the needs of the audience; Display the presentation in a variety of formats	[IGCSE 19]
17-18	**Presentation Authoring:** Using a master slide; Create presentation slides to meet the needs of the audience; Display the presentation in a variety of formats	[IGCSE 19]
19-20	IGCSE ICT 0417 Paper 1 practice [Theory] IGCSE ICT 0417 Paper 2 practice [Practical]	[IGCSE 1-21] [IGCSE 11-19]