

## In Progress

Please note that this Unit Profile is still in progress. The content below is subject to change.



# COIT11238 *Networked Infrastructure* Foundations Term 2 - 2022

Profile information current as at 18/05/2022 06:41 am

All details in this unit profile for COIT11238 have been officially approved by CQUniversity and represent a learning partnership between the University and you (our student). The information will not be changed unless absolutely necessary and any change will be clearly indicated by an approved correction included in the profile.

## General Information

### Overview

This unit will provide you with the foundation knowledge of computer and network infrastructure that underpins Information and Communication Technologies (ICT) in modern organisations. You will study the physical and logical components and concepts of ICT related to computer networking. Specifically, you will explore computer architecture components, operating systems, and network evolution, hardware, protocols and security. By the end of this unit, you will be able to install and configure basic networks. You will be able to troubleshoot basic network problems using network management software.

### Details

Career Level: *Undergraduate*

Unit Level: *Level 1*

Credit Points: 6

Student Contribution Band: 8

Fraction of Full-Time Student Load: 0.125

### Pre-requisites or Co-requisites

Anti-requisite: If students have undertaken COIT11233 Information and Communication Technology Foundations, then this unit should not be taken.

Important note: Students enrolled in a subsequent unit who failed their pre-requisite unit, should drop the subsequent unit before the census date or within 10 working days of Fail grade notification. Students who do not drop the unit in this timeframe cannot later drop the unit without academic and financial liability. See details in the [Assessment Policy and Procedure \(Higher Education Coursework\)](#).

### Offerings For Term 2 - 2022

- Brisbane
- Cairns
- Melbourne
- Online
- Rockhampton
- Sydney
- Townsville

### Attendance Requirements

All on-campus students are expected to attend scheduled classes – in some units, these classes are identified as a mandatory (pass/fail) component and attendance is compulsory. International students, on a student visa, must maintain a full time study load and meet both attendance and academic progress requirements in each study period (satisfactory attendance for International students is defined as maintaining at least an 80% attendance record).

### Website

[This unit has a website, within the Moodle system, which is available two weeks before the start of term. It is important that you visit your Moodle site throughout the term. Please visit Moodle for more information.](#)

## Class and Assessment Overview

### Recommended Student Time Commitment

Each 6-credit Undergraduate unit at CQUniversity requires an overall time commitment of an average of 12.5 hours of study per week, making a total of 150 hours for the unit.

### Class Timetable

#### [Regional Campuses](#)

Bundaberg, Cairns, Emerald, Gladstone, Mackay, Rockhampton, Townsville

#### [Metropolitan Campuses](#)

Adelaide, Brisbane, Melbourne, Perth, Sydney

### Assessment Overview

#### Assessment Grading

This is a graded unit: your overall grade will be calculated from the marks or grades for each assessment task, based on the relative weightings shown in the table above. You must obtain an overall mark for the unit of at least 50%, or an overall grade of 'pass' in order to pass the unit. If any 'pass/fail' tasks are shown in the table above they must also be completed successfully ('pass' grade). You must also meet any minimum mark requirements specified for a particular assessment task, as detailed in the 'assessment task' section (note that in some instances, the minimum mark for a task may be greater than 50%). Consult the [University's Grades and Results Policy](#) for more details of interim results and final grades.

## CQUniversity Policies

**All University policies are available on the [CQUniversity Policy site](#).**

You may wish to view these policies:

- Grades and Results Policy
- Assessment Policy and Procedure (Higher Education Coursework)
- Review of Grade Procedure
- Student Academic Integrity Policy and Procedure
- Monitoring Academic Progress (MAP) Policy and Procedure - Domestic Students
- Monitoring Academic Progress (MAP) Policy and Procedure - International Students
- Student Refund and Credit Balance Policy and Procedure
- Student Feedback - Compliments and Complaints Policy and Procedure
- Information and Communications Technology Acceptable Use Policy and Procedure

This list is not an exhaustive list of all University policies. The full list of University policies are available on the [CQUniversity Policy site](#).

## Previous Student Feedback

### Feedback, Recommendations and Responses

Every unit is reviewed for enhancement each year. At the most recent review, the following staff and student feedback items were identified and recommendations were made.

#### Feedback from Student feedback

##### **Feedback**

Some students have difficulties following the provided instructions to download the needed networking simulation tool, Cisco Packet Tracer.

##### **Recommendation**

The existing instructions for downloading Cisco Packet Tracer will be reviewed for updating with more details.

#### Feedback from Student feedback

##### **Feedback**

The provided extra resources are informative and helpful for learning this unit.

##### **Recommendation**

Extra resources for each week topic will be kept and updated.

#### Feedback from Staff feedback

##### **Feedback**

The learning and teaching materials are well organised.

##### **Recommendation**

The style of organising the provided teaching and learning materials will be kept.

## Unit Learning Outcomes

### **On successful completion of this unit, you will be able to:**

1. Explain the role of hardware and software components in computer networks
2. Recognise the importance of protocols, standards and layered architectures in building computer networks
3. Explain the selection of network components, topologies and technologies to meet business requirements
4. Describe challenges and solutions in securing computer networks and infrastructure
5. Interpret the use of forwarding and encapsulation to deliver data in computer networks
6. Discuss techniques for managing, documenting and troubleshooting computer networks.

The Australian Computer Society (ACS) recognises the Skills Framework for the Information Age (SFIA). SFIA is adopted by organisations, governments and individuals in many countries and provides a widely used and consistent definition of ICT skills. SFIA is increasingly being used when developing job descriptions and role profiles. ACS members can use the tool [MySFIA](#) to build a skills profile.

This unit contributes to the following workplace skills as defined by [SFIA 7](#) (the SFIA code is included):

- Network Support (NTAS)
- IT Infrastructure (ITOP)
- Security Administration (SCAD)
- Systems Installation/Decommissioning (HSIN)
- Problem Management (PBMG)

## Alignment of Learning Outcomes, Assessment and Graduate Attributes



## Alignment of Assessment Tasks to Learning Outcomes

Assessment Tasks	Learning Outcomes					
	1	2	3	4	5	6
1 - Online Quiz(zes) - 30%	•	•	•	•	•	
2 - Written Assessment - 30%		•	•			•
3 - Portfolio - 40%	•			•	•	•

## Alignment of Graduate Attributes to Learning Outcomes

Graduate Attributes	Learning Outcomes					
	1	2	3	4	5	6
1 - Communication	•	•	•	•	•	•
2 - Problem Solving	•	•	•	•	•	•
3 - Critical Thinking			•	•	•	
4 - Information Literacy		•		•		•
5 - Team Work						
6 - Information Technology Competence	•	•	•	•	•	•
7 - Cross Cultural Competence						
8 - Ethical practice						
9 - Social Innovation						
10 - Aboriginal and Torres Strait Islander Cultures						

## Alignment of Assessment Tasks to Graduate Attributes

Assessment Tasks	Graduate Attributes									
	1	2	3	4	5	6	7	8	9	10
1 - Online Quiz(zes) - 30%		•	•	•		•				
2 - Written Assessment - 30%	•	•	•	•		•				
3 - Portfolio - 40%	•	•	•	•		•				

## Textbooks and Resources

### Textbooks

COIT11238

#### Prescribed

#### **Guide to Networking Essentials 8th (2019)**

Edition: 8th (2019)

Authors: Greg Tomsho

Cengage

Boston , MA , USA

ISBN: 978-0-3571-1828-3

Binding: Paperback

#### **Additional Textbook Information**

Both paper and eBook copies can now be purchased at the CQUni Bookshop here:

<http://bookshop.cqu.edu.au> (search on the Unit code).

[View textbooks at the CQUniversity Bookshop](#)

### IT Resources

**You will need access to the following IT resources:**

## Academic Integrity Statement

Information for Academic Integrity Statement has not been released yet.

This unit profile has not yet been finalised.