

TLE – ICT - CSS

QUARTER 2

Week 4



Introductory Message

MODULE 4-Q2 GRADE 9

WELCOME TO THE WORLD OF COMPUTER SYSTEM SERVICING

This module covers the two of seven (7) common competencies in Computer System Servicing which will lead you to acquire a National Certificate Level II (NC II). It contains information and suggested learning activities for you to complete. Completion of this module will help you better understand the succeeding module on setting up computer networks.

This module consists of two (2) lessons and (6) six learning outcomes. Each lesson and learning outcome contains other sub-learning outcome and learning activities supported by each instruction sheets. Before you perform the activities read the information in What's New and What is It, to ascertain yourself and your teacher that you have acquired the knowledge necessary to perform the skill required of the particular learning outcome.

The specific competency covered in this module and their schedule of recitation are as follows:

LESSON 3: PERFORMING MENSURATION AND CALCULATION (PMC)

- LO 1. Select measuring instruments
- LO 2. Carry out measurements and calculations
- LO 3. Maintain measuring instruments

LESSON 4: PREPARING AND INTERPRETING TECHNICAL DRAWING (PITD)

- LO 1. Identify different kinds of technical drawings
- LO 2. Interpret technical drawings
- LO 3. Prepare/make changes to electrical/electronic schematics and drawing

Lesson

3

Performing Mensuration and Calculation



What I Need to Know

Learning Competency: Lesson 3: Performing Mensuration and Calculation (PMC)

Learning Outcomes: LO 3. Maintain measuring instruments

Learning Objectives:

This module contains unit of competency on PERFORMING MENSURATION AND CALCULATION (PMC)". This covers the knowledge, skills, attitudes, and values needed in understanding of concepts and underlying principles in performing measurements and calculations. At the end of this module, you are expected to:

1. Ensure proper handling of storage media to avoid damage; and

Identify tasks to be undertaken for proper storage of instruments according to manufacturer's specifications and standard operating procedures.

In the previous lesson, you have learned the importance to have a knowledge about the process of digital unit conversion or measurements which helps you understand how to save data in a storage media.



What is It

A **storage device** is a piece of computer hardware used for storing data. It can keep and hold information in short-term or long-term. It comes in different shapes and sizes depending on the needs and functionalities. It is important to take care of the storage devices of your computer system. A **storage device** is any hardware capable of holding information either temporarily or permanently.

There are two types of storage devices used in computers: a **primary storage device**, such as RAM, and a **secondary storage device**, such as a hard drive. Secondary storage can be removable, internal, or external.

Here are some of the examples of storage devices:

1. **Magnetic storage devices** – are the most common type of storage used in computers.
 - a. *Floppy diskette* - A 3 ½ inches disk that can store 1.44 MB of data.

- b. *Hard drive* - An internal hard drive is the main storage device in a computer. It stores the operating system, software applications or programs and the majority of computer's data.
- 2. **Optical storage devices** - use lasers and lights as its method of reading and writing data.
 - a. *Blu-ray disc* - it can store up to 25 GB single-layer disc (50 GB on a dual-layer disc) and are the same size as a standard CD.
 - b. *CD-ROM disc (Compact Disc Read-Only Memory)* - an optical storage device that is read-only or cannot be modified nor deleted.
 - c. *CD-R (CD-Recordable) discs*- are recordable disc that can be written to once.
 - d. *CD-RW (CD-Rewritable) disc* - is a rewritable disc that can be written to multiple times.
 - e. *DVD-R (DVD-Recordable) discs* - are recordable discs that can be written to once.
 - f. *DVD-RW (DVD-Rewritable)* - are rewritable discs that can be written to multiple times.
- 3. **Flash memory devices** - It is a data-storage medium used transferring data between a personal computer (PC) and other digital devices.
 - a. *USB flash drive, jump drive, or thumb drive* - it is a portable storage device. It connects to a computer via a USB port. Flash drives are an easy way to store and transfer information between computers and range in sizes from 2 GB to 1 TB.
 - b. *Memory card* - it is a type of storage media that is often used to store photos, videos, or other data in electronic devices.
 - c. *SD Card (Secure Digital card)* - it is one of the more common types of memory cards used with electronics.

HOW TO TAKE CARE OF STORAGE MEDIA?

Storage Media should not be allowed to encounter liquids, dust, or smoke, and should not be exposed to either extreme heat or direct sunlight. It should be kept away from potential sources of magnetic fields, including electrical equipment. Drives should be maintained and cleaned on a regular basis to prevent damage to media.

Optical Disks should only be handled by the extreme edges or the center hole, and the recording surface must not be touched. The upper surface of optical discs is the data-carrying layer, which is the most prone to damage.

Flash memory devices should be kept away from static electricity and humid places.

✓ **Put storage devices at room temperature.**

Storage devices should not be stored to extremely cold or hot places. Heat causes melting of electronic elements in the storage media. Make sure that the place of storage has enough air supply and proper ventilation to prevent damaging your devices with moisture or heat.

✓ **Do not place the devices on top of other electronics**

Do not place your USB Flash drives near a gaming set or TV set for a long period because it leads to data damage.

✓ **Eject the devices safely**

It is important to make sure that you always safely remove your storage devices from your computer. Pulling the USB or memory card without safely removing it from the PC after use results to full damage of the disk.

✓ **Maintain integrity of your files**

Install antivirus applications on your computer that will actively scan for malware when any type of removable media or device is connected.

✓ **Keep it safe**

To avoid losing important data on your storage media, be sure to have a copy or back up your files. For example, you can use cloud-based storage servers. This is a system that enables computer you safely store data for future use.

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