

NAME:

MINISTRY OF EDUCATION, HERITAGE & ARTS

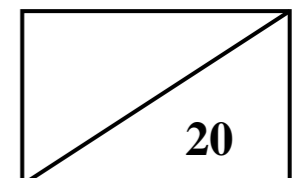
WORKSHEET 7 YEAR 10 2021

BASIC TECHNOLOGY & BASIC GRAPHIC TECHNOLOGY

STRAND 3: DESIGN AND ENTERPRISING

INSTRUCTIONS:

1. Use your exercise book to do the question given below.
2. Use the measurements given. All measurements are in millimeters
3. Show all your construction lines clearly.



NAME:

[20 marks]

LONG ANSWER QUESTIONS

[20 marks]

QUESTION 1 DESIGN

Problem

In many homes, food **spice bottles** are piled and scattered everywhere in the kitchen area.

Brief

Design a **spice rack** to accommodate food spice bottles in the kitchen.

Specifications

The following factors are to be taken into consideration when designing the **spice rack**.

- It must be strong.
- It must be secure and easy to construct.
- It should have two shelves with 4 holes bored on each shelf to store at least 8 spice bottles.
- The materials to be used should be readily available and made from a combination of metal and timber.

Requirements

- (i) In the space provided below, sketch a pictorial pencil or colour rendered final solution of the **spice rack**. **(8 marks)**

| CQ1(i) | | | |
|--------|--------------------|---|--|
| 1 | Correct proportion | 2 | |
| 2 | Correct materials | 2 | |
| 3 | Rendering shown | 3 | |
| 4 | Labels shown | 1 | |

- (ii) Draw a detailed sketch to show how spice bottles are stacked safely on the **spice rack**. **(8 marks)**

| CQ1(ii) | | | |
|---------|---|---|--|
| 1 | Correct proportion | 3 | |
| 2 | Evidence of being kept safely without falling shown | 3 | |
| 3 | Labels shown | 2 | |

- (iii) Explain the final solution according to the following heading: **(4 marks)**

| HEADING | FINAL SOLUTION |
|-----------|----------------|
| Materials | |