

**DIPLOMA IN CIVIL ENGINEERING (DCLE(G)) /  
DIPLOMA IN ELECTRICAL AND MECHANICAL  
ENGINEERING (DEME) /  
DCLEVI / DMEVI / DELVI / DECVI / DCSVI**

00682

**Term-End Examination**

**June, 2019**

**BET-026 : WORKSHOP TECHNOLOGY**

*Time : 2 hours*

*Maximum Marks : 70*

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**Note :** *Part A is compulsory. Attempt any six questions from Part B and two questions from Part C.*

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**PART A (Compulsory)**

1. Attempt any *seven* questions. *7×2=14*
- (a) Name any two common materials used for making the patterns.
- (b) Indicate only the names of two types of “Core Prints”.
- (c) The main function of binder in moulding sand is
- (i) To improve its existing properties.
- (ii) To impart permeability and refractoriness.
- (iii) To impart the sufficient strength properties and cohesiveness properties.
- (iv) None of the above

- (d) The Box Nut in bench-vice is made of
- (i) High carbon steel
  - (ii) High speed steel
  - (iii) Cast iron
  - (iv) None of the above
- (e) The filing process which is used to remove the maximum amount of extra metal from any surface is known as
- (i) Cross filing
  - (ii) Draw filing
  - (iii) Straight filing
  - (iv) None of the above
- (f) Name two joints used in plumbing work.
- (g) The percentage composition of lead and tin in case of Plumber's Solder is
- (i) 37% : 63%
  - (ii) 70% : 30%
  - (iii) 50% : 50%
  - (iv) None of the above

- (h) The standard colour for the acetylene cylinder is
- (i) Black
  - (ii) Yellow
  - (iii) Blue
  - (iv) Maroon
- (i) Feed or displacement of cutting tool in machine work is expressed in
- (i) Metre Per Minute
  - (ii) Revolution Per Minute
  - (iii) mm/revolution
  - (iv) None of the above

show answer

## PART B

Attempt any **six** questions.

6×6=36

2. Enlist any two types of boring tools used in carpentry work. Describe any one in brief with the help of a neat sketch. 6
3. What is “Core” ? How many types of “cores” are there ? 6
4. With a neat sketch, name the different parts of a flat file. 6
5. How does a flux help in soldering process ? Also enlist the types of flux. 6
6. Enlist different types of stakes used in sheet metal works. 6
7. Differentiate between “TIG welding” and “MIG welding” processes. 6
8. Draw the free hand sketches of “Pan headed” and “Counter-sunk headed” rivets. 6
9. How are cutting speed, feed and depth of cut in lathe work usually expressed ? 6
10. Differentiate between Dead centre, Live centre and Revolving centre. 6

## PART C

Attempt any *two* questions.

2×10=20

11. What are the main constituents of an oil paint ?  
Explain in brief, the painting process on old wood-work. 10
  12. Make a list of different Accessories and Attachments used with lathe work. Explain any one with simple sketch. 10
  13. What are the main objectives of heat treatment ?  
Differentiate between Annealing and Normalizing processes of heat treatment. 10
  14. Enlist different methods of "Filing" in fitting work. Explain any one with neat diagram. 10
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