



**TVET CURRICULUM DEVELOPMENT, ASSESSMENT AND CERTIFICATION
COUNCIL (TVET CDACC)**

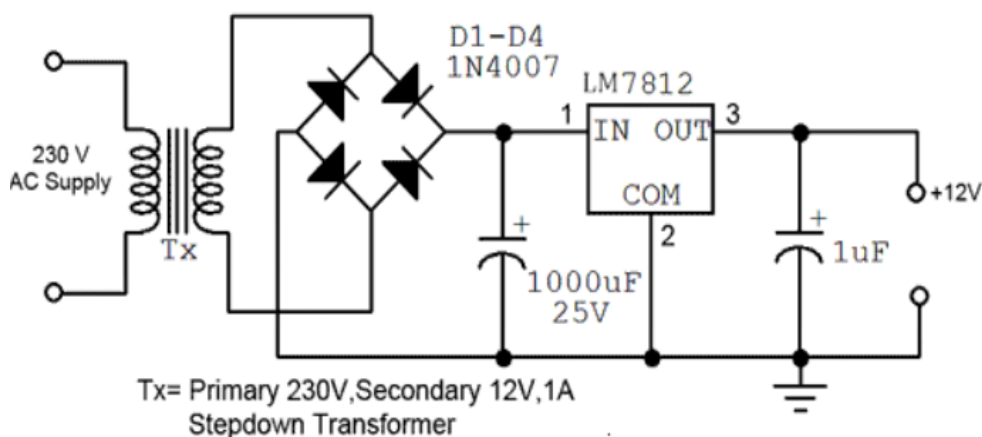
Qualification Code : 071606T4MCT
Qualification : Mechatronics Technician Level 6
Unit Code : ENG/OS/MC/CC/04/6
Unit of Competency : Apply Electrical and Electronics Principles

PRACTICAL ASSESMENT GUIDE

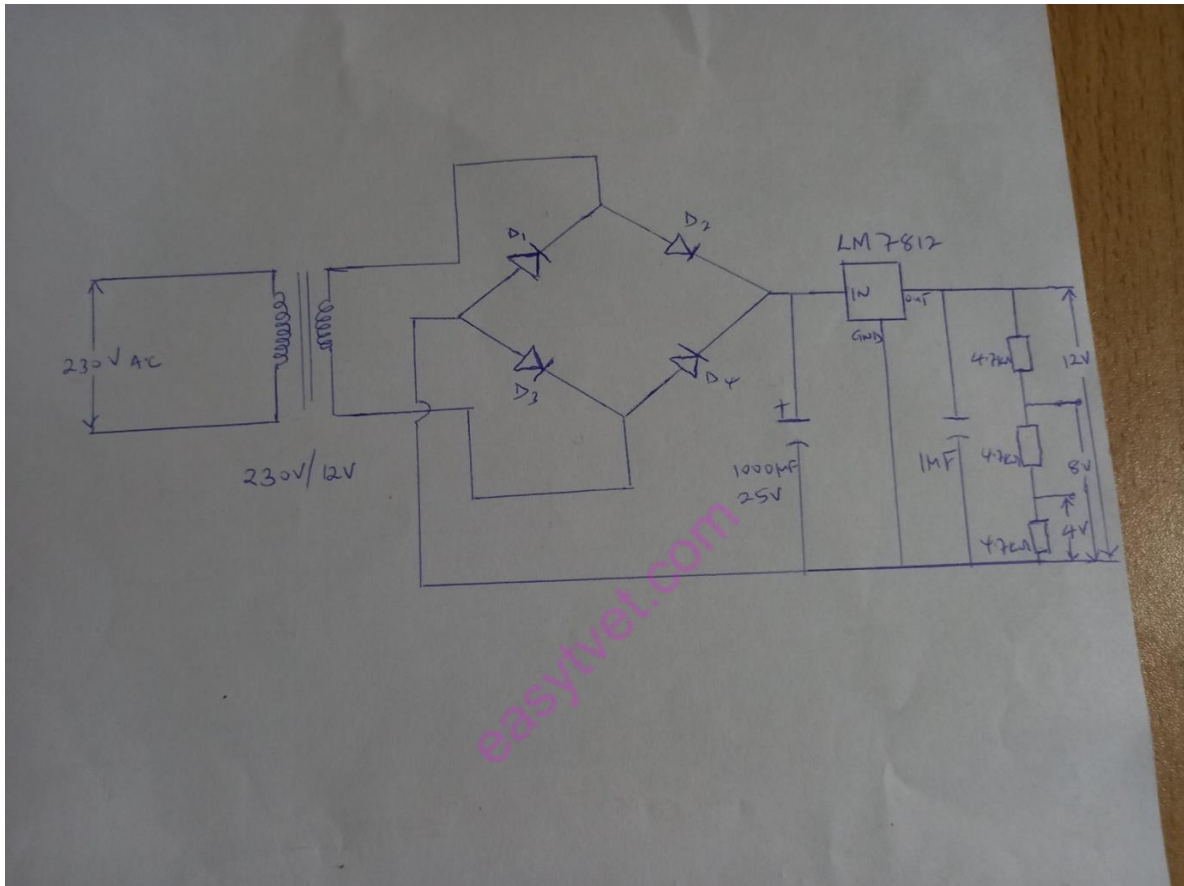
INSTRUCTIONS TO ASSESSOR:

1. Allocate **4 hours** to the candidate to perform the tasks.
2. You are required to mark the practical as the candidate perform the tasks.
3. You are required to take video clips at critical points.
4. Ensure the candidate has a *Name Tag* and *Registration Code* at the back and front.

CIRCUIT DIAGRAM



POWER SUPPLY CIRCUIT WITH VOLTAGE DIVIDER



OBSERVATION CHECKLIST

Candidate's Name & Registration Code			
Assessor's Name & Registration Code			
Venue of Assessment			
Date of assessment			
Item to be Evaluated	Marks Allocated	Marks Awarded	Comments
1. Correct tool and material selection.			
i. Soldering gun, phase tester, assorted screw drivers, digital multimeter			
ii. Capacitor, power diodes, voltage regulator IC-7812, resistors, solder wire	2 2		
2. Estimated the materials to be used	2		
3. Observed safety precautions.			
i. Wore apron.	1		
ii. Safety boots.	1		
iii. Practiced proper handling of tools.	1		
4. Finished the tasks on time	1		
TOTAL	10		
PRODUCT CHECKLIST			
5. Neatness	1		
6. Quality shiny joints	3		
7. Firm and sound connections	4		
8. General neatness	3		
9. General testing before powering	4		
10. Correct circuit operation (functionality)	10		

11. Correct test results for;			
(i) 4V	5		
(ii) 8V	5		
(iii) 12V	5		
TOTAL	50		
GRAND TOTAL	50		
<p>The candidate was found to be: (Please tick (√) as appropriate)</p> <p>Competent/Not yet compete <input type="checkbox"/> <input type="checkbox"/></p> <p><i>(The candidate is competent if s/he gets at least 40%.)</i></p>			
<i>Feedback from candidate:</i>			
<i>Feedback to candidate:</i>			
<i>Candidate's signature:</i>		<i>Date:</i>	
<i>Assessor's signature: Date:</i>			