



# THE FEDERAL UNIVERSITY OF TECHNOLOGY, AKURE

## *Department of Mechanical Engineering*

### **MEE 202 – Engineering Drawing II**

#### **COURSE PARTICULARS**

**Course Code:** MEE 202

**Course Title:** Engineering Drawing II

**No. of Units:** 3

**Course Duration:** One hour of theory and six hours of practical per week for 15 weeks.

**Status:** Compulsory

**Course Email Address:**

**Course Webpage:** <http://www.mee.futa.edu.ng/courseschedule.php?coursecode=MEE%202>

**Prerequisite:**

#### **COURSE INSTRUCTORS**

**Engr. (Dr.) M. A. Akintunde**

*First Floor, SEET Central Workshop*

*Dept. of Mechanical Engineering,*

*The Federal University of Technology, Akure, Nigeria.*

**Phone:** +2348035011797

**Email:** [ajyinka@gmail.com](mailto:ajyinka@gmail.com)

**Engr. (Dr.) A. O. Akinola**

*Second Floor, SEET Bldg.*

*Dept. of Mechanical Engineering,*

*The Federal University of Technology, Akure, Nigeria.*

**Phone:** +2348033897286

**Email:** [akintech@yahoo.com](mailto:akintech@yahoo.com)

**Engr. (Dr.) B. O. Akinnuli**

*Ground Floor, SEET Building*

*Dept. of Mechanical Engineering,*

*The Federal University of Technology, Akure, Nigeria.*

**Phone:** +2348034659522

**Email:** [ifembola@yahoo.com](mailto:ifembola@yahoo.com)

**Engr. (Dr.) O. A. Dahunsi**

*First Floor, SEET Central Workshop*

*Dept. of Mechanical Engineering,*

*The Federal University of Technology, Akure, Nigeria.*

**Phone:** +234835897193

**Email:**

**Mr. O. R. Akinyemi**

*Ground Floor, SEET Building  
Dept. of Mechanical Engineering,  
The Federal University of Technology, Akure, Nigeria.  
Phone: +2348033650446  
Email: seyi\_akinyemi@yahoo.com*

**Mr. T. O. Olugbade**

*Ground Floor, SEET Building  
Dept. of Mechanical Engineering,  
The Federal University of Technology, Akure, Nigeria.  
Phone: +2348068859326  
Email: topex44@yahoo.co.uk*

**Mr. C. I. Usifo**

*Central Workshop,  
Dept. of Mechanical Engineering,  
The Federal University of Technology, Akure, Nigeria.  
Phone: +2347037249880  
Email: usichris2000@yahoo.com*

and

**Mr. T. J. Erinle**

*R & A Workshop,  
Dept. of Mechanical Engineering,  
The Federal University of Technology, Akure, Nigeria.  
Phone: +2348069635034  
Email: authenticfaith@yahoo.com*

## **COURSE DESCRIPTION**

This course is designed primarily for all engineering students and students of engineering related courses. It provides a comprehensive knowledge and insight into engineering drawing as a basic tool of engineering. Topics to be covered include: Further projection of solids. First and third angle projections. Isometric projections. Intersection of surfaces and developments. Sectional views, Curve of interpenetrations. True lengths and true shapes. Parts and assembly drawings. Preparation of working drawing for manufacturing in accordance with standards. Reading and interpretation of manufacturer's drawing of equipment.

## COURSE OBJECTIVES

The objectives of this course are to:

- Introduce students to details of engineering drawing as the engineers' language.
- Provide students with opportunities to interpret drawings for various applications.

## COURSE LEARNING OUTCOMES / COMPETENCIES

Upon successful completion of this course, the student will be able to:

- Prepare working drawing for manufacturing in accordance with standards
- Read and interpret manufacturer's drawing of equipment.

## GRADING SYSTEM FOR THE COURSE

This course will be graded as follows:

Class work	20%
Test(s) and Assignments	20%
<u>Final Examination</u>	<u>60%</u>
<b><u>TOTAL</u></b>	<b><u>100%</u></b>

## GENERAL INSTRUCTIONS

**Attendance:** It is expected that every student will be in class for lectures and also participate in all class works. Attendance records will be kept and used to determine each person's qualification to sit for the final examination. In case of illness or other unavoidable cause of absence, the student must communicate as soon as possible with any of the instructors, indicating the reason for the absence.

**Academic Integrity:** Violations of academic integrity, including dishonesty in assignments, examinations, or other academic performances are prohibited. You are not allowed to make copies of another person's work and submit it as your own; that is plagiarism. All cases of academic dishonesty will be reported to the University Management for appropriate sanctions in accordance with the guidelines for handling students' misconduct as spelt out in the Students' Handbook.

**Assignments and Group Work:** Students are expected to submit assignments as scheduled. Failure to submit an assignment as at when due will earn you zero for that assignment. Only under justifying circumstances, for which a student has notified any of the instructors in advance, will late submission of assignments be permitted.

**Code of Conduct in Lecture Rooms and Workshop:** Students should turn off their cell phones during lectures. Students are prohibited from engaging in other activities (such as texting,

chatting on phone, watching videos, *etc.*) during lectures. Food and drinks are not permitted in the workshop.

## READING LIST

1. Engineering Drawing 1 with worked examples by M. A. Parker and F. Pickup
2. Engineering Drawing 2 with worked examples by M. A. Parker and F. Pickup
3. Geometrical and Engineering Drawing by K. Morling

## COURSE OUTLINE

Week	Topic	Remarks
1 & 2	Introduction and Course Overview	During this first class, the expectation of the students from the course will also be documented.
3 & 4	<ul style="list-style-type: none"> <li>• Further projection of solids.</li> <li>• First and third angle projections.</li> </ul>	
5 – 6	<ul style="list-style-type: none"> <li>• Isometric Projection</li> </ul>	
7 - 8	<ul style="list-style-type: none"> <li>• Intersection of surfaces and developments.</li> <li>• Sectional views</li> </ul>	
9	<ul style="list-style-type: none"> <li>• Curve of interpenetrations.</li> <li>• True lengths and true shapes</li> </ul>	
10	<b>MID-SEMESTER TEST</b>	
11 - 12	<ul style="list-style-type: none"> <li>• Parts and assembly drawings..</li> </ul>	
13	<ul style="list-style-type: none"> <li>• Preparation of working drawing for manufacturing in accordance with standards.</li> </ul>	
14	<ul style="list-style-type: none"> <li>• Reading and interpretation of</li> </ul>	

	manufacturer's drawing of equipment	
15	REVISION	This is the week preceding the final examination. At this time, evaluation will be done to assess how far the students' expectations for the course have been met.