

LH231- Technical Report writing

CREDIT HOURS

3 Hours

CONTACT HOURS (Hours/week)

Lecture: 3 Hrs .

TEXT BOOK

Oshima, Alice. Writing Academic English, New York: Pearson Education, 2006.

COURSE DESCRIPTION

PREREQUISITE:

LH132

RELATION OF COURSE TO PROGRAM

Required

COURSE INSTRUCTION OUTCOMES

The student will be able to:

- Identify the different types of technical reports as well as their structure.
- Write effective background reports.
- Recognize the difference between instructional manuals and process description reports.
- Write effective primary research (lab) and feasibility reports.
- Recognize the different sections of a report and how to write each.
- Use a dictionary to know the different meanings of a word / phrase / expression and to differentiate between synonyms.
- Summarize relevant texts.
- Paraphrase relevant texts.
- Include in-text citations in writing when necessary.
- Document report sources.
- Give oral presentations.

TOPICS COVERED

- Drawing practices and techniques (Exercises on geometrical construction)
- Methods of object projection (Exercises on geometrical construction – Exercises on object projection)
- Orthogonal projection (Exercises on orthogonal projection)
- Missing views, dimensioning and free hand sketching (Exercises on projection and free hand sketching)
- Sectioning and conventions (Exercises on sectional views)
- Intersection of geometrical surfaces and development (Exercises in intersection of geometrical surfaces and development)
- Standard metal sections and metal structures (Exercises on metal structures)-Quiz

- Compound metal sections and welds (Exercises on metal structures)
- Isometric projection (Exercises on Isometric)
- Isometric projection & Surface intersections (Exercises on Isometric and surface intersections)
- Perspective projection (Exercises on Perspective projection)
- Perspective projection (Cont.) (Exercises on interior and exterior perspective projection) – Quiz
- Computer Aided drafting using AutoCAD (General Introduction)
- Drawing and editing commands in AutoCAD
- Writing texts, Dimensioning and viewing commands

CONTRIBUTION OF COURSE TO MEET THE REQUIREMENTS OF CRITERION 5:

Professional component Content			
Math and Basic Sciences	Engineering Topics	General Education	Other
			✓

RELATIONSHIP OF COURSE TO STUDENT OUTCOMES:

Student Outcomes		Course aspects
A	An ability to apply knowledge of mathematics, science, and engineering	
B	An ability to design and conduct experiments, analyze and interpret data.	
C	An ability to design a system, component, or process to meet desired needs within realistic constraints such as economics, environmental, social, political, ethical, health, and safety, manufacturability, and sustainability	
D	An ability to function on multi-disciplinary teams.	
E	An ability to identify, formulate, and solve engineering problems	
F	An understanding of professional and ethical responsibility	
G	An ability to communicate effectively	g ₁ g ₂ g ₃
H	The broad education necessary to understand the impact of engineering solutions in a global, economic, environmental, and social content	
I	A recognition of the need for, and an ability to engage in life-long learning.	
J	A knowledge of contemporary issues within and outside the electrical engineering profession.	
k	An ability to use the techniques, skills, and modern engineering tools necessary for electrical engineering practice.	