

Transport Engineering

Academic Year: (2019 / 2020)

Review date: 24-04-2020

Department assigned to the subject: Mechanical Engineering Department

Coordinating teacher: LOPEZ BOADA, MARIA JESUS

Type: Compulsory ECTS Credits : 3.0

Year : 1 Semester : 2

OBJECTIVES

- Know in the key aspects related with today's different means of transport of person and materials.
- Have sufficient criteria to search and select the adequate means of transport.
- Know the constructive, technical operating and functional characteristics of the transporting equipments which are more used in material handling.
- Consult and implement standards.
- Design a transport or lifting equipment using analytical and computational methods.
- Prepare a technical report about the design of a transport or lifting equipment.
- Work in group.

DESCRIPTION OF CONTENTS: PROGRAMME

1. Introduction to Transport Engineering. Material Handling. Intermodal Transportation
2. Cranes
3. Ropes
4. Lifts
5. Belt Conveyors
6. Fork Lifts

ASSESSMENT SYSTEM

The work done by the student will be evaluated by following the Bologna criteria. The work carried out by each student during the term will be evaluated separately as well as the final exam.

Labs are also part of the evaluation of the subject and its execution is obligated to pass the subject.

% end-of-term-examination: 60

% of continuous assessment (assignments, laboratory, practicals...): 40

BASIC BIBLIOGRAPHY

- M^a Jesús López Boada, Beatriz López Boada, Vicente Díaz López Ingeniería del Transporte, UNED, 2012

ADDITIONAL BIBLIOGRAPHY

- David E. Mulcahy Materials handling handbook, McGraw-Hill, 1999
- Dunlop Conveyor belt technique design and calculation, Dunlop, 2010
- Howard I. Shapiro Cranes and derricks, McGraw-Hill, 2000
- L. Janovsky Elevator mechanical design , Ellis Horwood series in mechanical engineering, 1993