

MIT WORLD PEACE UNIVERSITY

Database Management Systems  
Second Year B. Tech, Semester 4

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DRAWING OF THE ENTITY RELATIONSHIP  
DIAGRAM

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ASSIGNMENT No. 1

Prepared By

Krishnaraj Thadesar  
Cyber Security and Forensics  
Batch A1, PA 20

January 19, 2023

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## **1 Aim**

## **2 Objectives**

## **3 Problem Statement**

Requirements of the Company The Company is organized into:

1. DEPARTMENTS. Each department has a name, number and an employee who manages the department. We keep track of the start date of the department manager.
2. Each department controls a number of PROJECTS. Each project has a name, Number, and is located at a single location.
3. We store each EMPLOYEEs social security number, address, salary, sex and birthdate. Each employee works for one department but may work on several projects. We keep track of the number of hours per week that an employee currently works on each project. We also keep track of the direct supervisor of each employee.
4. Each employee may have a number of DEPENDENTS. For each dependent we keep track of their name, sex, birthdate, and relationship to the employee.

## **4 Theory**

### **4.1 Entities**

1. Company - Department
2. Department - Name, Number, Manager, Start Date
3. Projects - Name, Number, Location
4. Employees - SSN, Address, Salary, sex, Birthdate, Department, Supervisor, no. of hours per week.
5. Dependents - Name, sex, birthdate, Relationship.

## **5 Procedure**

1. Identify the entities
2. Draw relationship table
3. Draw rough er diagram.
4. Draw each entity in depth, that have all the attributes.
5. Show the relationship with cardinality. If it is unary ternary etc.

### **5.1 Relationships**

Relationships are mostly verbs, they are names of the columns.

1. Department

## **6 Conclusion**

## **7 FAQ**