**N-ary Relationships in ER Modeling**

A relationship gives information about how two or more entities are connected to each other from the business functionality point of view.

The relationship between the two entities, DEPARTMENT and EMPLOYEE can be explained in two different ways as below:

A department **has** employees:

DEPARTMENT

EMPLOYEE

HAS

An employee **works** for a department:

DEPARTMENT

WORKS

EMPLOYEE

An employee **manages** another employee.

EMPLOYEE

MANAGES

A customer and product are related because of **sales**.

CUSTOMER

PRODUCT

SALES

Like entities, relationships can have attributes: we can define a sale to be a relationship between a customer entity and a given number of the product entities in each sale. The attributes of SALES could be as below:

SALES

As some relationships have their own attributes, data (values of each attribute) will have to be stored in a database table. For this reason, a relationship with attributes is as good as another Entity.

**Assignment:** Gather information about unary, binary, ternary and n-ary relationships.