# Project Management Very Quick Notes

## Project Proposal

A project proposal is a document where the goals and the methods of solution (expertise, equipment and methodologies) are agreed by relevant stakeholders.

### Components of Project Proposal (examples)

* Problem statement
* Project plan/schedule
* Aim of the project
* Project summary
* Scope of project

## Gantt Charts vs. PERT Charts

### Benefits of Gantt Charts

* They allow for quick and easy indication of whether a project is on or off schedule.

### Limitations of Gantt Charts

* Does not show as clearly dependent stages as PERT charts;
* Estimates must be completed before the chart can be drawn.
* Changes to the project schedule require a redrawing of the Gantt chart. (However, applications can make this process much easier, making it a non-problem.)

## Major terms

### Concurrent/parallel activities

They are activities that can take place **at the same time**.

### Dependent/sequential activities

They are activities where one activity **cannot be started** until **another activity has been completed**.

### Dummy activities

Dummy activities are **artificial activities** with **no duration** and **no resources** utilised. It is typically used to **demonstrate network dependencies** that would otherwise be difficult or impossible to illustrate using simple arrow linkages.

### Critical path

It is the sequence of project network activities which add up to the **longest overall duration**. It represents the **shortest time possible to complete the project**.

### Float/slack

Float time is the length of time an activity can be **delayed or overrun** without the whole project being affected. All activities on the critical path have a float of zero.

# Database Management Very Quick Notes

## Flat-file database

A flat file database is one with a single table or multiple tables that are **not related to each other**.

## Database Management

### Advantages

1. Data independence

Data in a relational database is held in such a way that changes to the structure of the database do not affect any of the programs that access the data. In non-database approaches, a minor change in the program or file structure may require a considerable reprogramming effort.

1. Consistency of data
2. Control over redundancy
3. Greater security and integrity of data

Access to data can be controlled very easily, unlike a decentralised flat file database.

1. Increased productivity and more information available to users

It allows data from other departments of the company to

### Disadvantages