Assignment 1.1 Task 4

This is a software development and implementation task.

A teacher has compiled a list of linked learning objectives, activities, and resources which are referenced with respect to the IT National Curriculum (strands and levels); the DfEE Schemes of Work and software skills.

The teacher now wishes to create a database to hold this data which can be used for lesson planning.

In the session on October 23rd, you will (as a cohort) start from this outline description and produce a more detailed specification for the database - taking yourselves as the users.

What you must do

(a) Design a set of screens which the teacher can use when entering data. You should annotate your design to indicate what data is to be entered, any buttons used together with details of menus and any drop down lists used.

Annotate your design to show what data has to be entered by the teacher and data which may be obtained from the database.

(b)
- (i) Activity and Learning Objective are two entities in the database. State the relationship between these two entities.
- (ii) Normalise the data to third normal form (3NF). Your output must include a listing of the entities, their attributes and identification of primary keys.

(c) Build a database system based on the requirements of the teacher. As evidence of the system you should produce:

- Printouts of the tables containing some sample data (at least 20 learning objectives, 15 activities and 10 resources).
- Printouts of a form used by the teacher when entering learning objectives, activities and resources.
- Printouts of a report* showing how data has been entered from the database.
- Printouts of a list showing activities linked each of the Schemes of Work, a list of learning outcomes associated with each activity and a list of resources associated with each activity.
- Printouts of a routine* used in the database.

Note:
Data for the database should be taken from the lesson plans you use on PTE.
Items marked * will be refined in the session on the 23rd October.