**Introduction: Write a brief paragraph which introduces your project saying**

1. who your user is
2. what problem you intend to solve for them.

**3.1. Analysis of the problem (10 marks)**

**3.1.1 Problem identification**

(a) Describe and justify the features that make the problem solvable by computational methods.

1. *List the features of the current system and explain why using computational method would make an improvement on the current system.*

(b) Explain why the problem is amenable to a computational approach.

1. *Explain why this particular problem can be ‘computerised’. (Why would it benefit the user if this was done so).*

*i.e. talk about how the problem can be turned in to an abstraction. Explain how the problem can be broken down and solved in chunks and also state if any ‘chuck’ can be reused.*

*Is it possible to solve some parts of the solution at the same time.*

**3.1.2 Stakeholders**

(a) Identify and describe those who will have an interest in the solution explaining how the solution is appropriate to their needs (this may be named individuals, groups or persona that describes the target end user).

1. *Say who they are,*
2. *What are their needs of the current systems*
3. *How your solution will help.*
   * 1. **Research the problem**
4. Research the problem and solutions to similar problems to identify and justify suitable approaches to a solution.
5. *Use 1 or all of these techniques to look in to the problem*
   1. *Interviews – both structured and unstructured*
   2. *Questionnaires containing 20 – 30 questions, most of which need to be closed questions*
   3. *Observation – watching the job being carried out, what’s on the screens etc*
   4. *Gathering source documents such as reports, input forms.*
   5. *Research in to an equivalent product or system.*
6. Write a clear summary of your research
   * 1. *Perhaps use graphs to help summarise information gathered.*
     2. *Collect source documents and make a comment on important fields.*
     3. *State why your research makes you feel this is a problem to computerize.*

(b) Describe the essential features of a computational solution explaining these choices.

1. Using your research write what features you’d expect to create, for example;
   1. *The user interface*
   2. *Storage*
   3. *Size of files*
   4. *Regularity of processing*
   5. *Improved file security*
   6. *Efficiency – printing and sharing data*
   7. *Lost data*
   8. *Security*
   9. *Editing or sorting and searching data*
   10. *Sharing resources*
   11. *Output requirements*
   12. *Ability of users*

(c) Explain the limitations of the proposed solution.

1. *What sort of things will you* ***NOT*** *be able to implement. , i.e. areas not to be computerised and areas to consider for future computerisation.*

**3.1.4 Specify the proposed solution**

(a) Specify and justify the solution requirements including hardware and software configuration (if appropriate).

1. *The requirements of the new system, both general and specific requirements.*
2. *What are the inputs processes and outputs*
3. *Will some users need more access to the system compared to others? (i.e. who will have key responsibility for management of the system). Please use your research to back up your statements; observations, analysis of paper work, interviews etc*
4. *Constraints on design, software and hardware.*
5. *Constraints on implementation, cost, time scale, user request, user ability etc.*

(b) Identify and justify measurable success criteria for the proposed solution.

1. *Give a clear list of this project aims to do. Remember these must be* ***SMART*** *target which you will use to evaluate the success of your project in the appraisal.*

**This must be a NUMBERED list of 10 or more targets that you intend to meet. THIS IS very important as these will be the targets you use to EVALUATE your success at the end of the project.**

*SMART –*

* *Specific*
* *Measurable*
* *Achievable*
* *Realistic*
* *Time bound*