JUNE 2012 EXAMINATION

DATE: 5 JUNE 2012

TIME: 09H00 – 11H00 TOTAL: 100 MARKS

DURATION: 2 HOURS PASS MARK: 40%

(DP-80 / IU-30)

PROJECT MANAGEMENT

THIS EXAMINATION PAPER CONSISTS OF 4 SECTIONS:

SECTION A: CONSISTS OF:
(i) 10 MULTIPLE-CHOICE QUESTIONS (10 MARKS)
(ii) 10 TRUE OR FALSE QUESTIONS (20 MARKS)

ANSWER ALL THE QUESTIONS

SECTION B: CONSISTS OF 2 SHORT QUESTIONS

ANSWER BOTH QUESTIONS (15 MARKS)

SECTION C: CONSISTS OF 1 LONG ANSWER QUESTION

ANSWER THE QUESTION (30 MARKS)

SECTION D: CONSISTS OF 1 INTERPRETATIVE QUESTION

ANSWER THE QUESTION (25 MARKS)

INSTRUCTIONS:

1. Read the following instructions carefully before answering the paper, as failure to act upon them will result in a loss of marks.
2. Write your answers in your answer book, which is provided in the exam.
3. Ensure that your name and student number are clearly indicated on your answer book.
4. Write your answers in either blue or black ink in your answer book.
5. Read each question very carefully before you answer it and number your answers exactly as the questions are numbered.
6. Begin with the question for which you think you will get the best marks.
7. Note the mark allocations for each question – give enough facts to earn the marks allocated.
   Don't waste time by giving more information than required.
8. You are welcome to use diagrams to illustrate your answers.
9. Please write neatly – we cannot mark illegible handwriting.
10. Any student caught cheating will have his or her examination paper and notes confiscated.
    The College will take disciplinary measures to protect the integrity of these examinations.
11. If there is something wrong with or missing from your exam paper or your answer book, please inform your invigilator immediately. If you do not inform your invigilator about a problem, the College will not be able to rectify it afterwards, and your marks cannot be adjusted to allow for the problem.
12. This paper may be removed from the examination hall after the examination has taken place.
SECTION A

(30 MARKS)

ANSWER ALL THE QUESTIONS

(i) MULTIPLE-CHOICE QUESTIONS

Choose the correct option for each of the following. Write only the question number and your chosen answer. For instance, if you think that the correct answer for number 1 is (a), then write it as 1. (a).

1. The purpose of an exception report is to flag:

(a) an occurrence that is within its limits.
(b) an occurrence that is outside its control limits.
(c) the control limits of an occurrence.
(d) outside occurrences.

2. Which one of the following is not a primary objective of a project?

(a) scope
(b) time
(c) profit
(d) cost

3. The document used to present the inflow and outflow of cash in the baseline plan is called a:

(a) trial balance.
(b) forecast.
(c) budget.
(d) cash flow statement.

4. Which analysis will provide you with the means to identify the following environmental influences: strengths, weaknesses, opportunities and threats?

(a) problem solving analysis
(b) the scope statement
(c) swot analysis
(d) scope management

5. The purpose of a resource histogram is to:

(a) determine the number of resources.
(b) compare the required resources with the available resources.
(c) allocate resources.
(d) determine the available resources.
6. A project is formally started by a:
   (a) progress meeting.
   (b) close-out meeting.
   (c) handover meeting.
   (d) external review meeting.

7. The purpose of the project life cycle is:
   (a) to determine the logical relationships between activities.
   (b) to subdivide the work in the network breakdown structure.
   (c) to subdivide the scope of work into manageable and sequential phases.
   (d) to provide hold points at the end of each phase.

8. The reason why Henry Gantt developed a bar chart was:
   (a) to make the planning of a project easier.
   (b) to calculate the duration of activities.
   (c) to determine the logical relationships between activities.
   (d) for a visual aid in planning and controlling projects.

9. Which of the following information is required to identify the logical relationships between activities?
   (a) hammock activities and a list of activities
   (b) logical loop and hammock activities
   (c) a list of activities and their logical relationships
   (d) the predecessors and successors

10. The appropriate organisational structure for large capital projects is:
    (a) a pure project structure.
    (b) a matrix structure.
    (c) an overlay matrix structure.
    (d) a functional structure.

(ii) TRUE OR FALSE QUESTIONS

Indicate whether the following statements are true or false. Rewrite your false answers to make them true.

1. Defining the scope of work is normally done during the concept initiation phase.

2. Float is a scheduling tool where the time of each activity is represented as a horizontal bar.

3. The work breakdown structure (WBS) technique is used to identify all the activities that need to be performed in the project.

4. The terms of reference (TOR) document from which the authority and budget for the project is obtained should not include the scope of work of the project.
5. The first document that is normally produced in a project is called a Risk plan.

6. Retention is where the client retains a percentage of the contractor’s income against the contractor failing to complete their contractual obligations.

7. The feasibility study analyses the project charter, project brief and project proposal.

8. Quality assurance does not specify measurable criteria against which you can identify opportunities for improvement.

9. Fast tracking is a method used to reduce the duration of a project.

10. The schedule Gantt chart is not the best document to use for communicating schedule information. [10 × 2 = 20]
SECTION B: SHORT QUESTIONS (15 MARKS)

ANSWER BOTH QUESTIONS

QUESTION 1

(a) You are a housing developer, requested to build houses for clients.

   Explain how you will ensure that the required design of the houses is achieved. (5)

(b) Explain the criteria for a good quality assurance system. (5) [10]

QUESTION 2

A project manager must be able to steer a project through a minefield of problems and risk triggers.

List the common reasons for project failure. [5]

[15]
QUESTION 1

(a) The project manager is responsible for the identification of risk.

Explain contracting as a means of deflecting risk (in part or whole) to another party.

Name and briefly discuss the different types of contracts. (15)

(b) There is a general agreement that most projects pass through a four-phase life cycle.

Name the four phases of the life cycle in the correct order, and list each of the following project activities under the appropriate heading of the four phases. You may use a table format.

- Gather data
- Finalise product
- Obtain project approval
- Establish: master plan WBS, cash flow
- Set up communication and organisation
- Access risks
- Procure goods and services
- Evaluate project
- Identify alternatives
- Execute work (15) [30]
QUESTION 1

Using the Delphi technique, a project team for a landscaping company identified the following activities that need to be completed for the current project:

<table>
<thead>
<tr>
<th>Activity number</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>100</td>
<td>Draft a project charter</td>
</tr>
<tr>
<td>200</td>
<td>Draw a Gantt Chart</td>
</tr>
<tr>
<td>300</td>
<td>Prepare premises</td>
</tr>
<tr>
<td>400</td>
<td>Conduct a close out meeting</td>
</tr>
<tr>
<td>500</td>
<td>Do a feasibility study</td>
</tr>
<tr>
<td>600</td>
<td>Create a cash flow statement</td>
</tr>
<tr>
<td>700</td>
<td>Procure plants and shrubs</td>
</tr>
<tr>
<td>800</td>
<td>Inspect and rectify problems</td>
</tr>
<tr>
<td>900</td>
<td>Prioritise stakeholders</td>
</tr>
<tr>
<td>101</td>
<td>Apply the CPM</td>
</tr>
<tr>
<td>201</td>
<td>Complete landscaping</td>
</tr>
<tr>
<td>301</td>
<td>Hand over irrigation procedure</td>
</tr>
</tbody>
</table>

(a) You are required to assist the team in the next step of the planning process by indicating the following in a table format:

- the phases in which the activities should be performed; and
- what the required input and output of each phase should be.

Use the following suggested format for the table:

<table>
<thead>
<tr>
<th>Phase</th>
<th>Phase</th>
<th>Phase</th>
<th>Phase</th>
</tr>
</thead>
<tbody>
<tr>
<td>Input</td>
<td>Input</td>
<td>Input</td>
<td>Input</td>
</tr>
<tr>
<td>Process</td>
<td>Process</td>
<td>Process</td>
<td>Process</td>
</tr>
<tr>
<td>Output</td>
<td>Output</td>
<td>Output</td>
<td>Output</td>
</tr>
</tbody>
</table>
(b) Advise the project team on what method they should apply to shorten the duration of the project. Give them an example using two or more of the above activities. (5) [25]

Section A: 30 marks
Section B: 15 marks
Section C: 30 marks
Section D: 25 marks
TOTAL: 100 MARKS