



**Final Term Examination January 2014**

**Answer the following questions**

**(Total: 40 Marks)**

**FIRST QUESTION (10 MARKS)**

**Choose the correct answer**

انقل رقم السؤال ورقم اجابته الصحيحة فقط في كراسة الاجابة

1. The appendix forms a part of the
  - A. front matter
  - B. main text
  - C. glossary
  - D. back matter
2. Each figure within a report should have a title and a number
  - A. Under the figure
  - B. Above the figure
  - C. Inside the figure
3. The cover letter is:
  - A. summary of your qualifications and experiences
  - B. description of your core strengths and suitability for the job
  - C. statement of your job objective
4. The difference between standard academic reports and field reports is
  - A. The language used in field reports is simpler,
  - B. The language used in academic reports is personal
  - C. Both the above two answers are correct
  - D. None of the above answers are correct
5. You should always include terms such as 'we' and 'our' in reports to sound friendlier.
  - A. True
  - B. False
6. The section explains the schedule with time for doing the proposal is called:
  - A. Plan of Action
  - B. Criteria for Proposal Evaluation
  - C. Management Plan

⬅️ **لاحظ أن أسئلة الامتحان من 3 صفحات** ➡️

7. The purpose of an essay is:
- to introduce and document engineering and scientific designs
  - to show how well you have understood a question and are able to answer it
  - to convey specific information to provide the reader with information
8. A list of all the reference material you consulted during your research for the report is called:
- References
  - Glossary
  - Bibliography
  - Table of contents
9. In a design report the engineers audiences are interested in how the design work and how effective the design is.
- True
  - False
10. The glossary is the list of:
- references
  - diagrams used in the report
  - subjects covered in the report
  - technical terms used in the report

### **SECOND QUESTION (20 MARKS)**

**Give a brief answer (اجابة مختصرة) of ONLY 10 of the following questions**  
اكتب رقم الأسئلة التي تقوم بإجابتها حسب الموجود في ورقة الأسئلة

- Differentiate between solicited and unsolicited proposals
- What make a technical presentation effective?
- Explain the purposes of writing reports?
- Compare between CV, Resume, and Application form
- In a Field Report: what are the things to look for when observing?
- What are the main contents of a Thesis?
- Is there any difference between the "References" in: design report, CV and thesis?
- What are the main items that must be included in the "Introduction" of a Design Report?
- What are the forms of Progress Reports?
- Compare between formal and informal appendices in a report?
- What are the main sections of Laboratory Reports?
- What are the main sections of a Formal Report?

⤴ **لاحظ أن أسئلة الامتحان من 3 صفحات** ⤵

### THIRD QUESTION (10 MARKS)

#### 3.1 Rewrite the following references in a correct formal reference list (4marks)

**Reference (1)**

“Control Strategies for MicroGrids Black Start and Islanded Operation”, Vol. 1, No. 3, July, 2005, J. Lopes, C. Moreira, International Journal of Distributed Energy Resources.

**Reference (2)**

A. N. Kumar and V. K. Chinnaiyan, “Comparison of Modulation Techniques for Matrix Converter” IACSIT International Journal of Engineering and Technology, Vol. 2, No. 2, April 2010

**Reference (3)**

IEEE Transactions on Power Delivery, Vol. 22, No. 1, January 2007, “Steady-State Model and Power Flow Analysis of Electronically-Coupled Distributed Resource Units”, Hassan Nakeeb, Reza Irani

#### 3.2 Identify the errors in writing the following table (3marks)

Attribute	P.S.I	A	B	C
Fund Corr.	10	-2	-2	-1
Perf. Guaz	8	-0.8	-0.8	-4
Prod. Cost	10	-2	-1	-10
O & M Costs	8	0	0	-10
Ergonomic	10	-3	-3	-1
Psychological	5	0	0	-1
Legal	5	-1	-1	0
Total	64	-8.8	-7.8	-27.8

**Table 3.6. Performance Success Index Table**

#### 3.3. Following is a part of a Ph. D. thesis contents.

**Rewrite the contents in a formal form**

(3 marks)

1. introduction
2. modeling framework
  - 2.1 equivalent electrical circuit model
    - 2.1.1 mathematical modeling of PV
    - 2.1.2 building the PV model
  - 2.2 validation of the model
    - 2.2.1 model validation under standard test conditions
    - 2.2.2 model validation for different temperature levels
    - 2.2.3 model validation for different radiation levels
3. simulation and results

*With my Best Wishes*

*Prof. Dr. Magdi El-Saadawi*

*18/1/2014*