

**GURU NANAK DEV ENGINEERING COLLEGE,
LUDHIANA**

DEPARTMENT OF MECHANICAL ENGINEERING

Guidelines for B.Tech. Major Project Report

1. The major project report shall be computer typed (English- British, Font -Times Roman, Size-12 point) and printed on A4 size paper.
2. The major project report shall be **hard bound** with cover page in white colour. The name of the candidate, degree (specifying the specialization), month and year of submission, name of college shall be printed in black on the cover [Refer sample sheet (outer cover and inner title page)]. Besides this following should be printed on the spine of the major project report:
 - a) Year at the top e.g. 2014 (b) Short Title of the major project in the middle e.g. DESIGN OF HEAT PIPE (c) B.TECH. (MECH.) in the bottom
3. The major project report shall be typed on one side only with double space with a margin 3.5 cm on the left, 2.5 cm on the top, and 1.25 cm on the right and at bottom.
4. In the major project report,
 - A. The initial pages** (numbered in lower case Roman numerals e.g. i, ii, iii, iv,.....) shall be as follows:
 - a) The title page [Refer sample sheet (inner title page)] should be given first. There is no page number written on this page, but it is not to be considered for page count.
 - b) the Certificate by the candidate(s) and the major project guide (s) in sequence, followed by
 - c) Abstract (not exceeding 1500 words)
 - d) Acknowledgment
 - e) List of Figures (if any)
 - f) List of Tables (if any),
 - g) Notations/Nomenclature (if any), and then
 - h) Contents (do not put page number/s).
 - B. The main pages** (numbered with Arabic numerals e.g. 1, 2, 3, 4,

Body of Text – divided into chapters as follows:

- a) Chapter 1- Introduction and Background of the Project
- b) Chapter 2- Literature Survey (include if properly done)
- c) Chapter 3- Present Work

(It must contain details about Problem Formulation, Objectives and Methodology. It can span in two to three further chapters depending on the type and volume of the work)

- d) Chapter 4 - Results and Discussion
- e) Chapter 5-Conclusions and Scope for Future Work

C. The end pages (numbered with Arabic numerals in continuation with the main pages)

These must include the following:-

- a) References
- b) Appendix/Appendices (if any)

5. In the body of the text, a reference should be indicated/cited as follows:

For Active Citation:

Giving author name followed by year of publication in parenthesis e.g.

For single author: “As discussed by **Singh (2009)**, an enhancement of performance is possible.”

For two authors: “As discussed by **Singh and Shan (2002)**, an enhancement of performance is possible.”

For more than two authors: “As discussed by **Singh et al. (2002)**, an enhancement of performance is possible.”

For website: “As discussed in **<http://www.mdienergy.com/163136AC.pdf>**, an enhancement of performance is possible.”

For more than one citation: “As discussed by **Singh et al. (2005); Laroia and Adithan (1994)**, an enhancement of performance is possible.”

For Passive Citation:

Giving both author name and year of publication in parenthesis e.g.

For single author: “It leads to enhancement of performance (**Singh, 2009**).”

For two authors: “It leads to enhancement of performance (**Singh and Shan, 2002**).”

For more than two authors: “It leads to enhancement of performance (**Singh et al., 2005**).”

For website: “It leads to enhancement of performance (<http://www.mdienergy.com/163136AC.pdf>).”

For more than one citation: “It leads to enhancement of performance (**Singh et al., 2005; Laroia and Adithan, 1994**)”

6. The reference should be given at the end of the major project report in alphabetical order indicating:
- i) Author(s)'s surname and his/their initials
 - ii) Title of the paper and name of the journal
 - iii) Number of the volume, page numbers, and the year of publication
 - iv) Name of the book and the publisher
 - v) Name of the conference, date, year, page number and place of occurrence.
- (v) Standard abbreviation may be used in the names of the journals

A. Example for journal paper:

Single Author

Singh, J. (2009), “*Magneto Abrasive Flow Machining Process*,” International Journal of Machine Tools and Manufacturing, Vol. 50, No. 2, pp. 53-59.

Two Authors

Singh, S. and Shan, H. S. (2002), “*Development of Magneto Abrasive Flow Machining Process*”, International Journal of Machine Tools and Manufacturing, Vol. 42, No. 6, pp. 953-959.

More than two authors

Singh, S., Shan, H. S. and Kumar, P. (2005), “*Experimental Investigations of Magneto Abrasive Flow Machining Process*”, International Journal of Machine Tools and Manufacturing, Vol. 45, No. 6, pp. 663-670.

B. Example for conference paper:

Laroia, S.C. and Adithan, M. (1994), “*Precision Machining of Advanced Ceramics*” Proceedings of the International Conference on Advanced Manufacturing Technology (ICMAT) held at University Teknoloi Malaysia, Johor Bahru ,Malaysia, 12th – 14th May, pp 203-210.

C. Example for book/report:

Adithan, M. and Gupta, A.B. (1996), "*Manufacturing Technology*", New Age International Publishers, New Delhi.

D. Example for website

<http://www.mdienergy.com/163136AC.pdf>, retrieved on 30.03.2011.

7. The diagrams should be printed on a light/white background. Tabular matter should be clearly arranged. Decimal point may be indicated by full stop (.). The caption for Figure must be given at the **BOTTOM** of the **Fig.** and Caption for the Table must be given at the **TOP** of the **Table**.
8. The graphs should be combined for the same parameters for proper comparison. Single graph should be avoided as far as possible.

Sample sheet (outer cover and inner title page)

PERFORMANCE TESTING OF H-H-O GAS BOOSTER FITTED 4 STROKE S.I. ENGINE

(24pt.)

MAJOR PROJECT REPORT (14pt.)

SUBMITTED IN PARTIAL FULFILMENT OF THE REQUIREMENTS FOR THE AWARD
OF THE DEGREE OF (12pt.)

BACHELOR OF TECHNOLOGY

(Mechanical) (14pt.)

SUBMITTED BY:

PUNEET SOOD (6141111182) (14pt)
DEEPAK KUMAR (6141111148)
SUDEEPTA DAS (6141111191)

UNDER GUIDANCE:

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Er. D. S. BHOGAL

GNDEC Logo

**DEPARTMENT OF MECHANICAL ENGINEERING
GURU NANAK DEV ENGINEERING COLLEGE, LUDHIANA
MAY, 2010 (14pt.)**

Sample sheet - Certificate

GURU NANAK DEV ENGINEERING COLLEGE, LUDHIANA

CERTIFICATE

I/we hereby certify that the work which is being presented in the major project report entitled "TITLE" by me/us in partial fulfilment of requirements for the award of degree of B.Tech. (Mechanical) submitted in the Department of Mechanical Engineering at GURU NANAK DEV ENGINEERING COLLEGE, LUDHIANA under PUNJAB TECHNICAL UNIVERSITY, KAPURTHALA is an authentic record of my/our own work carried out during a period from "DATE OF START OF SEMESTER" to "DATE OF END OF SEMESTER". This work is in continuation of my/our Minor Project carried in previous semester. The matter presented in this major project report has not been submitted by me/us in any other University / Institute for the award of any Degree or Diploma.

Signature of the Student/s
NAME OF STUDENT/S (PTU Roll No.) - Sign

This is to certify that the above statement made by the candidate/s is correct to the best of my/our knowledge

Signature of the Major Project Guide/s

NAME OF MAJOR PROJECT GUIDE/s - Sign
Designation (Deptt.)

SAMPLE SHEET (ACKNOWLEDGEMENT)

ACKNOWLEDGEMENT

The authors are highly grateful to the Director, Guru Nanak Dev Engineering College (GNDEC), Ludhiana, for providing this opportunity to carry out the present major project work

The constant guidance and encouragement received from Dr. Sehjpal Singh, Professor and Head, Department of Mechanical Engineering, GNDEC Ludhiana has been of great help in carrying out the present work and is acknowledged with reverential thanks.

The authors would like to express a deep sense of gratitude and thanks profusely to Dr. Paramjit Singh Bilga, Professor, Er. Davinder Singh Bhogal, Asstt. Professor, Department of Mechanical, GNDEC, who was our major project guides. Without the wise counsel and able guidance, it would have been impossible to complete the in this manner.

The help rendered by Mr Kamaljit Singh, Technician, Mr. Balbir, Mechanic, Mr. Kulwant Singh, Attendant, Mr. Bahadur Singh, Attendant, Heat Engines Laboratory, Department of Mechanical Engineering, GNDEC, for experimentation is greatly acknowledged.

The author express gratitude to other faculty members of Mechanical Engineering Department, GNDEC and Head and Staff of Workshops, GNDEC for their intellectual support throughout the course of this work.

Finally, the authors are indebted to all whosoever have contributed in this major project work.

PUNEET SOOD (7141111182) (14pt)

DEEPAK KUMAR (7141111148)

SUDEEPTA DAS (7141111191)

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