



UCTS
University College of
Technology Sarawak

SCHOOL OF ENGINEERING AND TECHNOLOGY (SET)
INTEGRATED DESIGN PROJECT

IDP MANUAL

(Version 2.0)

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1.0 INTRODUCTION

Integrated Design Project (IDP) is a requirement for students to be awarded Bachelor Degree by University College of Technology Sarawak. The project will be carried out within the final two semesters of their study. In this project, students will work in group under the supervision of their respective school's academic staff. At the end of the project, each group of student is required to submit a report and to give a presentation of the project to a panel of examiners.

2.0 OBJECTIVES

2.1 Civil Engineering

The aim of IDP is to provide the opportunity for students to apply and integrate the theoretical knowledge and principles taught in the course in solving technical problems. It also provides the opportunity for the students to demonstrate independency, as well as to plan and organize a project over a certain period of time.

Upon completion of this course, student should also be able to:

- a. Design and produce engineering plans for road and drain based on subdivision and topographical plans.
- b. Design and produce structural plans.
- c. Design and produce the water reticulation plans.
- d. Check and design for slope stability, if necessary.
- e. Produce the site safety and health planning report.
- f. Produce the Construction Quality Assurance Plan.
- g. Produce the Environmental Impact Assessment (EIA) report.
- h. Attach other supporting documents in the appendix, such as
 - Discussion minutes meeting (at least 5) to monitor the progress of the project
 - Gantt Charts and scheduling
 - Bill of Quantity / Taking off
 - Feasibility study report

2.2 Mechanical Engineering

The aim of IDP is to provide the opportunity for mechanical engineering students to utilize knowledge and skills gained throughout the programme in solving complex engineering project.

Upon completion of this course, student should also be able to:

- i. Design a practical, cost effective and innovations engineering solutions.
- ii. Prepare engineering drawing and detailing of mechanical structural elements.
- iii. Conduct stress- strength and structural analysis on the design.
- iv. Prepare engineering calculation on the design
- v. Producing material list for the fabrication.
- vi. Preparing a material and manufacturing cost evaluation on the design
- vii. Application of code of ethic and safety & health on the design

2.3 Electrical Engineering

The aim of IDP is to provide opportunity to student to apply theoretical knowledge gained in solving engineering problems. It also provides the opportunity for the students to demonstrate independency, as well as to plan and organize a project over a semester of 14 weeks.

Upon completion of this course, student should also be able to:

- Apply the theoretical electrical engineering knowledge gained throughout the program to undertake a project.
- Analyse and perform design for complex electrical engineering design.
- Produce electrical engineering drawings and detailing with the aids of related software.
- Interpret the technical drawings such in order to come up with solutions.

3.0 CREDITS & DURATION

The credits and durations are as follow:

3.1 Civil Engineering

The whole project will be consists of IDP I and II each with 4 EAC credits for the Bachelor of Civil Engineering (Hons) in Civil Engineering Program. The entire project will be 10 MQA credits for the Bachelor of Engineering Technology (Hons) in Electrical & Electronic program and 6 EAC credits for the Bachelor of Engineering Power (Hons) program and 7 EAC credits for the Bachelor of Mechanical Engineering (Hons) program. The total credit for the Bachelor of Food Technology (Hons) will be 9 MQA credits. The project will be done in two consecutive long semesters of 14 weeks each.

3.2 Mechanical Engineering

The credit value of Integrated Design Project (IDP) are 4 EAC credit hours which is offered at Semester 2, year 3 for the Bachelor of Mechanical Engineering (Hons) program. The project will be done in in one semester (14 weeks).

3.3 Electrical Engineering

The project will be done within one semester of 14 weeks. The entire project will be 3 MQA credits for the Bachelor of Electrical Engineering (Honours) program. Prerequisite for IDP is successfully complete Year 2.

4.0 SCOPE OF PROJECTS

The projects should be sufficiently challenging. This is to allow the students to demonstrate a variety of skills such as the ability to plan the work, perform the necessary research, manage their time and resources adequately, work independently, show initiative and originality, and present their work in oral and writing.

4.1 Projects can be the combination of the following activities:

- a. Site visitation and investigation
- b. Laboratory experimentations
- c. Analysis
- d. Design
- e. Numerical simulations
- f. Software application and programming
- g. Research
- h. Prototyping

4.2 Industrial based projects

The university encourages projects which are related to industrial problems to give students the experience of identifying and solving actual problems faced by the industry.

5.0 PROJECT TYPE AND SUPERVISOR

The type of project will be decided by the school academic members. Students will be exposed to multi-disciplinary projects that are now common in the construction industry. Each group will be given a real development project. Each group of student will be assigned a supervisor. The supervisor must be the lecturer of the programme.

6.0 PROJECT ASSESSMENT

IDP I and II must be done in two consecutive long semesters. IDP I will be evaluated at the end of the first semester. Grade “P” (in progress status) will be designated on the transcript upon completion. The final grade will only be given upon completion of IDP II.

For the assessment in Bachelor of Civil Engineering (Hons) and Bachelor of Mechanical Engineering (Hons), the supervisor will contribute to 80% and examiner 20% of the total marks of IDP (Table 1). The examiner should be practitioner or lecturer with professional status within a related field.

Table 1: Bachelor of Civil Engineering (Hons), Bachelor of Mechanical Engineering (Hons) and Bachelor of Electrical Engineering (Hons) (Power)

Marks Allocation for Final Year Project

IDP	Assessment	Supervisor	Total
AREA	Project Report	50	100
	Presentation	10	
	Supervisor Evaluation	40	
Total		100	100

Table 3: IDP Course Outcome for Bachelor of Civil Engineering (Hons)

Integrated Design project		Course Outcomes	Attainment
	CO1	Synthesises the theoretical civil engineering knowledge gained throughout the programme to undertake a project	
	CO2	Design for a multi-disciplinary project in civil engineering, which include structural designs of building elements, drainage system designs, road and pavement designs, Environmental Impact Assessment, and slope stability designs	
	CO3	Produce civil engineering drawings and detailing with the aids of AutoCAD	

	CO4	Interpret the technical drawings such as architectural drawing, engineering plans, structural drawings and water reticulation plans	
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Table 4: IDP Course Outcome for Bachelor of Mechanical Engineering (Hons)

		Course Outcomes	Attainment
Integrated Design project	CO1	Apply the theoretical mechanical engineering knowledge gained throughout the program to undertake a project	PO1
	CO2	Analyse and perform design for complex mechanical engineering design	PO2, PO4, PO12
	CO3	Produce mechanical engineering drawings and detailing with the aids of related software	PO3, PO5, PO8, PO9
	CO4	Interpret the technical drawings such in order to come up with solutions	PO6, PO7

Table 5: IDP Course Outcome for Bachelor of Electrical Engineering (Hons)

		Course Outcomes	Attainment
Integrated Design project	CO1	Apply the theoretical electrical engineering knowledge gained throughout the program to undertake a project	P01
	CO2	Analyse and perform design for complex electrical engineering design	P03
	CO3	Produce electrical engineering drawings and detailing with the aids of related software	P04
	CO4	Interpret the technical drawings such in order to come up with solutions	P010

7.0 RULES, ROLES AND RESPONSIBILITIES

7.1 General Rules and regulation

- a. Integrated Design Project I and II (IDP) must be done in two consecutive long semesters of 14 week each.

- b. The following are the conditions where a student fails IDP I;
 - i. Does not submit the progress report.
 - ii. Does not attend the oral presentation.
 - iii. Obtain less than 50% of the total marks of IDP I
 - iv. Unsatisfactory attendance record from the supervisor (less than 8 meetings per semester)

- c. The following are the conditions where a student fails IDP II;
 - i. Does not submit project report.
 - ii. Does not attend the oral presentation.
 - iii. Obtain less than 50% of the total marks of IDP II.
 - iv. Unsatisfactory attendance record from the supervisor (a minimum of 5 meetings per semester)

- d. The following are the conditions where a student will have to repeat the course beginning from IDP I;
 - i. Does not register IDP II in the consecutive long semester after IDP I. (In this case, IDP I will be automatically graded as “F” in the transcript.)
 - ii. Wishes to drop / withdraw IDP I or II.
 - iii. Wishes to change supervisor during IDP I after week 4.
 - iv. Wishes to change supervisor during IDP II.
 - v. Fails IDP I
 - vi. If a student fails IDP I at the end of the semester, he/she will have to repeat IDP I

- e. The followings are the conditions where a student will have to repeat IDP II;
 - i. Fails IDP II
 - ii. If a student fails IDP II at the end of the semester, he/she will have to repeat IDP II. If a student fails under other circumstances not stated in the IDP Manual, such cases will be handled by the School Academic Board of SET under the authority of the Dean of School of Engineering and Technology.

7.2 Student Roles and Responsibilities

Once a project has been assigned, student shall be responsible to make appointments and consult with the supervisor in order to understand the objectives, the expectations, the deliverables, the budget limitations, and so on.

The student should then plan their work (using Gantt chart or its equivalent) to be used as a basis to monitor their progress. The student is strongly advised to set up a weekly or regular meetings with their supervisor to seek advice and to review the progress of the project.

7.3 Supervisor Roles and Responsibilities

The supervisor will set up the requirements of the project and the student will have to meet the requirements. The supervisor will guide the student in the project, recommend approaches, techniques and methods appropriate to achieve the project's objectives.

8.0 SUBMISSION

Final Submission should include one (1) final report hardcopy. Softcopy submission will include preliminary report, final report, presentation slide and all appendixes.

9.0 REPORT FORMAT AND STRUCTURE

9.1 Project Report Specifications

Specifications	Descriptions
Language	English
Paper	<ul style="list-style-type: none"> • White only • High quality • A4 size (210 x 297 mm) • 80 grams weight • Of the same type throughout the report
Printing	<ul style="list-style-type: none"> • Report must be typewritten using word processor and printed single sided • Printing must be of high quality. Text and figures must be clear and legible.
Information required on CD cover	<ul style="list-style-type: none"> • Name of student • Student ID • Name of supervisor • Project Title • Name of Programme

9.2 Formatting

Formatting	Descriptions
Margin	<ul style="list-style-type: none"> • Left margin : 40 mm • Top, right and bottom margin : 25 mm • Header and footer margin : 15 mm
Type setting	<ul style="list-style-type: none"> • Font type : Times New Roman • Font Size : 12 font • Chapter Title : Uppercase, Bold, Centered • Chapter Sub-section : Title Case, Bold, Align Left • Symbol for variable : Italic (e.g. <i>m</i>, <i>P</i>, <i>T</i>, <i>v</i>, α, δ, γ)
Preliminary pages	<ul style="list-style-type: none"> • Include title, declarations, dedications, acknowledgements, abstract, table of content pages and list of tables / figures / symbols, etc. • Numbered using small letter Roman numeric (i, ii, iii....). • The first page (Title Page) is counted as “i” but “i” should not be printed. • Page number should be printed at the top right hand corner of the page.
Body of report	<ul style="list-style-type: none"> • Include all chapters, references and appendices. • Numbered using Arabic numeric (1, 2, 3....). • The first page of each chapter should be counted, but the page numbering should not be printed. • Numbering for References continue from body text. • Numbering for Appendices continue from references. • Page number should be printed at the top right hand corner of the page.
Chapter numbering and section within chapter	<ul style="list-style-type: none"> • All chapters and subsections must be numbered and titled • The subsection should not be more than fourth level <p>Example:</p> <p>1.0 Title of Chapter (first level)</p> <p>1.1 Title of subsection (second level)</p> <p>1.1.1 Title of sub-subsection (third level)</p>

Title / Paragraph Margin	<ul style="list-style-type: none"> Chapter number and title should be centered. Subsection number should align with the left margin. Subsection title should be indented 1.5 cm from the left margin. The first paragraph in a subsection should align with left margin. The subsequent paragraphs should be indented 1.27 cm (0.5inch) from the left margin. General alignment for texts in paragraph should be “justified”.
Spacing	<ul style="list-style-type: none"> General Spacing : 1.5 lines spacing Top margin & title / chapter number : 4.5 lines spacing Chapter number & chapter title : 4.5 lines spacing Chapter title & first line of text : 4.5 lines spacing Last line of text & subsection title : 4.5 lines spacing Title of subsection & first line of text : 1.5 lines spacing Spacing between paragraphs : 1.5 lines spacing Last line of text & table/figure/equation: 1.5 lines spacing Equation & first line of text : 1.5 lines spacing Table/figure & first line of text : 3.0 lines spacing
New pages	<ul style="list-style-type: none"> A new chapter must start on a new page A subsection title should not begin on the last line of a page A new paragraph should not begin on the last line of a page
Equations in Text	<ul style="list-style-type: none"> All equations must be numbered (in brackets) with respect to the chapter using Arabic numeric. Equation should be centered, but its numbering should align with right margin. One spacing before and after mathematical operators (=, +, - etc.). Equations should be followed by explanations of the symbols together with their units, if the symbol appears for the first time in the text. <p>Example: the third equation that appears in Chapter 4:-</p> $F = ma \quad (4.3)$

	<p>where</p> <p>F = force, N</p> <p>m = mass, kg</p> <p>a = acceleration, m/s²</p>
Tables in Text	<ul style="list-style-type: none"> • All tables must be numbered with respect to the chapter using Arabic numbers. For example, Table 4.3 is the third table that appears in Chapter 4. • All tables must have a caption, which should be positioned at the top of the table. Caption should be bold and written in Title Case. • The caption should be centered with the table. • A table should be positioned after it has been cited for the first time in the text. All tables in the chapter can also be grouped together and positioned at an appropriate location. • Tables which are presented in landscape format should be bound with the top of the table to the spine.
Figures in Text	<ul style="list-style-type: none"> • All figures must be numbered with respect to the chapter using Arabic numeric. For example, Figure 4.3 is the third figure that appears in Chapter 4. • All figures must have a caption, which should be positioned at the bottom of the figure. Caption should be bold and written in Title Case. • The caption should be centered with the figure. • Figure should be positioned after it has been cited for the first time in the text. All figures in the chapter can also be grouped together and positioned at an appropriate location. • Figures which are presented in landscape format should be bound with the top of the figure to the spine.

9.3 Report Structure

In the report writing, there are contents that are important to be included. Listed below are the suggested contents and how to do the paging of each page.

CONTENT	STATUS & PAGING	SAMPLE
Cover Page <ul style="list-style-type: none"> Title of the project report Full name of the author The name of the school and university Year of Submission <i>(all words in capital letters)</i>	Compulsory, no page number	Appendix 1
Title Page <ul style="list-style-type: none"> Title of the project report Full name of the author Statement of award for the project report The name of the school and university Month and Year of submission <i>(all words in capital letters)</i>	Compulsory, no page number	Appendix 3
Abstract An abstract is a summary that provides reader with enough information to understand the entire report. It consist of, at least, the followings: <ul style="list-style-type: none"> A general idea of the project The purpose and the objective(s) of the project A brief description of the method and procedures in the project. An overview of achievement and findings from the project experience / flaws / problems. Abstract should be in one page, and written in 1.5 line spacing, in one paragraph.	Compulsory, page number in Roman numeral	Appendix 9
Table of Contents This segment provides the reader with the arrangement of the whole report and its page number. This	Compulsory, page number in Roman numeral	Appendix 10

comprises a list of numbered headings and subheadings together with page numbers. The sub-headings must not exceed the third level.		
List of Tables This segment provides the title of tables appeared in the report and their respective page numbers.	Compulsory, page number in Roman numeral	Appendix 11
List of Figures This page provides a list of titles of the photographs, graphs, maps, diagrams, and charts used throughout the text together with their respective page numbers.	Compulsory, page number in Roman numeral	Appendix 11
List of Symbols / Notations / Terminology / Abbreviations / Acronyms All symbols, abbreviations, notations and terminology found in the Project Report should be listed on this page according to alphabetical order, together with their units.	If applicable, page number in Roman numeral	Appendix 12
List of Appendices This page consists of a list of appendices that accompanies the report together with the page numbers.	Compulsory, page number in Roman numeral	Appendix 11
Body Text The body text must be fully written in English. It must also bear all the titled chapters and the titles must portray the content of the report. This section may consist of: Chapter 1: Introduction Chapter 2: Literature Review Chapter 3: Research Methodology Chapter 4: Results and Discussions	Compulsory, page number in normal numbering (Arabic numeral)	Appendix 13

Chapter 5: Conclusions and Recommendations		
<p>References</p> <p>All references must be listed in this section. The list of references must be organized according to the alphabetical order of the names of the authors (Harvard Referencing System). If more than one published materials by the same author are cited, these materials should be listed chronologically.</p>	<p>Compulsory, page number in normal numbering (Arabic numeral)</p>	<p>Appendix 14</p>
<p>Appendices</p> <p>The supporting reference materials are generally placed at the end of the report. All materials in the appendices MUST be discussed and referred to in the report. Non-related reference for the purpose of thickening the report should be avoided.</p> <p>All appendices should be titled and numbered alphabetically, e.g. Appendix A, B, and so on.</p> <p>All appendices must be listed in the list of Appendices page.</p>		

10.0 MAIN BODY OF REPORT

10.1 The content of main text

The report is to allow readers get an idea of the project. Thus, it should be SHORT, CLEAR and PRECISE. The suggested length of report is not more than 100 pages.

The body of Project Report should contain, at least, the following chapters:

a. Introduction

This chapter gives general introduction and description of the project and the problems to be addressed. It explains the rationale of the project, outlining the problem statements, objectives, scope of study and the significance of study. This chapter should also briefly describes how the topics will be unfolded and the order of forthcoming material.

b. Literature Review / Background (If applicable)

This chapter should not be just a compilation or reproduction of the works of others. The author should critically examine and comment on the literature relevant to the scope of study. This chapter should clearly indicate what diversity of view exists among the authors in the area of study, and state that how and where the research project fits in.

c. Methodology

This chapter must coherently describe the implementations and the methods adopted in the project. For the technical implementations (i.e. experimental, simulation and modelling programs), relevant engineering and science qualities are to be comply. For example, use of codes and standards. Optimizations, the use of assumptions and simplifications, etc., must be valid and with strong justifications.

d. Results and Discussions

Data can be collected using various methods; experiments, field observations, survey questionnaires, interviews, or even secondary data from the works of other researchers. The data collected must be clearly presented. The analysis data and interpretations of the results to be outlined and elaborated concisely.

e. Conclusions and Recommendations

This chapter presents the findings of the research and draws the conclusions with specific reference to the objective(s) of the study stated in the introduction. It should also mention the recommendations for further research.

The text must be fully written in English. All chapters can be further divided into headings and subheadings. For better organization, all headings and subheadings must be numbered.

9.2 Standard Rules

The standard rules in report writing are as follows:

a. Quotation Adaptation

When quoting statements, information, or ideas that that taken from a source, the respective author should be acknowledge as below:

“... research by Blass (1960) has shown... ‘continue with idea/info’ ...”

“... the latex glove factory achieved improved performance due to higher sales of examination and surgical gloves” (Sime Darby Bhd. 1981).

b. Tables

Tables that are included in this section have to be numbered using Arabic numerals 1, 2, 3. The title of each table is placed on top of each table. The list of each table and the page number should be put in the section list of tables. (*Refer to Appendix 15*)

c. Figures

All diagrams maps, charts, drawings, photographs and graphs have to be numbered using Arabic numerals and the titles are to be placed below the diagrams (*Refer to Appendix 16*). The digital image should have the resolution of at least 300 dpi.

- d. Drawing / Sketches / Photograph

All drawing / sketches must be included in the report as appendix (if any)

- e. Paper cutting

Only photocopied version is allowed.

11.0 COMMON MISTAKES OF REPORT WRITING

11.1 Style of Writing

- a. Person

The report should be written in the third person rather than first or second.

For example:

DO NOT USE THE WRONG EXPRESSION.

- I found that ...
- You will note that

THE RIGHT EXPRESSIONS ARE,

- The reader will observe that ...
- The researcher (or experimenter, investigator, trainee, etc.) found that
- Table 12 shows that ...

- b. Shortened Expressions

Contractions such as “didn’t” (for did not) and “wasn’t” (for was not) are characterized as informal English while complete constructions are characteristics of formal English. Clipped words such as “gym”, “exam”, etc. should not be used, and only standard abbreviations are acceptable.

- c. Capitalization

The most commonly accepted rule is to capitalize the first word in the title and all proper nouns.

11.2 Spelling

Never use the simplified version of spelling, for example ‘thru’.

11.3 Foreign Words and Phrases

Any foreign words that need to be used in the report should be explained. The foreign word must be defined.

11.4 Punctuation

Your text must be properly punctuated according to the fixed rule.

11.5 The Use of Numbers in Context

When numbers are use, they normally appear in Arabic numerals 1, 2, 3 ...

- Numbers below ten are written in words
- Number ten and above appear as numerals
- Fractions or decimals values are written as numerals
- Numbers which begin a sentence must be spelled out when use in the text, for example.

12.0 CITATIONS AND REFERENCING SYSTEM

The author must acknowledge the sources of the ideas, information and arguments. This can be presented in the forms of quotation, paraphrase or simply mentioning or stating the data from the source. Internet information can only be considered as a secondary or supporting reference.

The format for citing should follow either of the latest Harvard or IEEE referencing style.

12.1 Harvard Citation Reference

Harvard citation reference is an author-date system (refer to Table). All in-text parenthetical references must correspond to a source cited in the References list.

The list of reference should be in accordance to the following order:

- a. alphabetical by author's name
- b. chronological by same author
- c. Alphabetical by title.

When formatting the References list, please pay specific attention to:-

- complete and correct information
- consistency in applying Harvard style
- punctuation (period, comma, semi-colon)
- volume, issue and page numbers for articles
- location and publisher for books
- spelling

Table: Description of Harvard Referencing System

Sources	Format	Reference list	In-Text Citation
Journal magazine articles	Author, Initial(s)., Year. Title of journal article. <i>Title of journal</i> (italicized), Volume (Issue or number), Page number(s).	One author Huffman, L.M., 1996. Processing whey protein for use as a food ingredient. <i>Food Technology</i> , 50(2), pp. 49-52.	(Huffman, 1996) ... OR Huffman (1996) ...
		Two author Lamb, R. and Kling, R., 2003. Reconceptualising users as social actors in information systems research. <i>MIS Quarterly</i> , 27(2), pp.197-198.	(Lamb and Kling, 2003) ... OR Lamb and Kling (2003) ...
		Three authors Bent, M., Campbell, J. and Spencer, C., 2007. Academic practice in computing and engineering. <i>Journal of Citation and Referencing</i> , 19(4), pp. 45-56.	(Bent, Campbell and Spencer, 2007) ... OR Bent, Campbell and Spencer(2007) ...
		Four or more authors Gillespie, N.C., Lewis, R.J., Pearn, J.H., Bourke, A.T., Holmes, M.J., Bourke, J.B. and Shields, W.J. 1986, Ciguatera in Australia:	(Gillespie, et al., 1986) ... OR

		occurrence, clinical features, pathophysiology and management. <i>Medical Journal of Australia</i> , 145(11-12), pp. 584-590.	Gillespie, et al. (1986) ...
Theses and dissertations	Author, Initial(s)., Year. <i>Title of dissertation</i> (italicized).Level. Official name of University.	Yeap, K.H., 2011. <i>Boundary matching techniques for terahertz lossy guiding structures</i> . PhD. Universiti Tunku Abdul Rahman.	(Yeap, 2011) ... OR Yeap (2011) ...
Standards	Corporate author, Year. Identifying letters and numbers and full title of standard (italicized).Place: Publisher.	British Standards Institution, 2002. BS11623:2001 Transportable gas cylinders. Milton Keynes: BSI.	(British Standards Institute, 2002) ... OR British Standards Institute (2002) ...
Books	Author(s), Initial(s)., Year. <i>Title of book</i> (italicized).Edition (if any). Place: Publisher.	One author: Baldick, R., 2006. <i>Applied optimization: formulation and algorithms for engineering systems</i> . 2nd ed. Cambridge: Cambridge University Press.	(Baldick, 2006) ... OR Baldick (2006) ...
		Two authors: Smith, C. and Meyer, J., 2005. <i>3G wireless with WiMAX and Wi-Fi: 802.16 and 802.11</i> . New York: McGraw-Hill.	(Smith and Meyer, 2005) ... OR Smith and Meyer (2005) ...
		Three authors: Jamroz, W.R., Kruzelecky, R.V. and Haddad, E.I., 2006. <i>Applied microphotonics</i> . Boca Raton, FL: CRC Press/Taylor &	(Jamroz, Kruzelecky and Haddad, 2006) ... OR


		Francis.	Jamroz, Kruzelecky and Haddad(2006) ...
		Four or more authors: Miller, P., Smith, M., Roberts, J.C., Peters, B., Howard, K. and Curtis, L., 2000. <i>Mobile phone use in teenagers</i> . Collins: Melbourne.	(Miller, et al., 2000) ... OR Miller, et al. (2000) ...
Multiple publications	Author, Initial(s)., Year followed by letter. <i>Title of book</i> (italicized). Place: Publisher.	Same author in the same year (use a lower case letter after the date) Hac, A., 2003a. <i>Mobile telecommunications protocols for data networks</i> . West Sussex: John Wiley & Sons. Hac, A., 2003b. <i>Wireless sensor network designs</i> . West Sussex: John Wiley & Sons	(Hac, 2003a; 2003b) ... OR Hac (2003a; 2003b) ...
		One author in different years (in chronological order) Capron, H.L., 2000. <i>Capron's pocket Internet: 4001 sites</i> . UpperSaddle River, NJ: Prentice Hall. Capron, H.L., 2002. <i>Computers: tools for an information age</i> . 7th ed.Upper Saddle River, NJ: Prentice Hall.	(Capron, 2000; 2002) ... OR Capron (2000; 2002)...

Conference papers	Author, Initial(s)., Year. Full title of conference paper. In: followed by editor or name of organization, <i>Full title of conference</i> (italicized). Location, Date. Place of publication: Publisher.	O'Connor, P.J., 2008. The role of geotourism in supporting regeneration in disadvantaged rural communities in Ireland. In: Pineda, F.D. and Brebbia, C.A., eds. <i>3rd International Conference on Sustainable Tourism</i> . Malta, 3-5 September 2008. Southampton: WIT Press.	(O'Connor, 2008) ... OR O'Connor (2008) ...
Corporate authors	Corporate author, Year. <i>Title of book</i> (italicized). Place: Publisher.	Malaysia Airline System Berhad, 2011. <i>Annual report</i> . Kuala Lumpur: MAS.	First citation: ...according to the report in 2011 by Malaysia Airline System Berhad (MAS) ... Subsequent citations: ... MAS (2011) had published another ...
Translated books	Author, Initial(s)., Year. <i>Title of book</i> (italicized). Translated from (language) by (name of translator, initial(s) first, then surname). Edition (if any). Place: Publisher.	Dupuy, J.P., 2009. <i>On the origins of cognitive science: the mechanization of the mind</i> . Translated from French by M.B. DeBevoise. Cambridge, MA: MIT Press.	(Dupuy, 2009) ... OR Dupuy (2009)...
Edited books		One author:	(Sjostrand, 1993) ...

	Author, Initial(s). ed(s)., Year. <i>Title of book</i> (italicized). Edition (if any). Place: Publisher.	Sjostrand, S. ed., 1993. <i>Institutional change: theory and empirical findings</i> . Armonk, NY: M.E. Sharpe.	OR Sjostrand (1993) ...
		More than one author: Pike, E. R. and Sarkar, S. eds., 1986. <i>Frontiers in quantum optics</i> . Bristol: Adam Hilger.	(Pike and Sarkar, 1986) ... OR Pike and Sarkar (1986) ...
Chapter in an edited book	Chapter author, Initial(s)., Year of Chapter. Chapter title. In: Book editor(s) initial(s) first followed by surname, ed. Year of book. Title of book (italicized). Place: Publisher. Page numbers followed by full stop.	Connell, D., 2012. Flailing about in the Murray-Darling basin. In: K. Crowley and K.J. Walker, eds. <i>Environmental policy failure: the Australian story</i> . Prahran: Tilde University Press. pp. 74-87. Note: use eds. If more than one editor.	(Connell, 2012) ... OR Connell (2012) ...
Newspaper articles	Author, Initial(s)., Year. Title of article. <i>Title of Newspaper</i> (italicized), Day and month before page numbers and column line.	Prakash, M., 2012. Get ready for touch screen revolution. <i>New Straits Times</i> , 1 Dec. p. B6.	(Prakash, 2012) ... OR Prakash (2012) ...
Reports	Author, Initials(s) or Corporate Author, Year. <i>Title of report</i> (italicized). Place: Publisher.	Mortimer, M., & Cox, M., 1999. Contaminants in mud crabs and sediments from the Maroochy River. Brisbane: Department of Environment.	(Mortimer and Cox, 1999) ... OR Mortimer and Cox (1999) ...

Patents	Author, Initial(s)., Year. <i>Title of patent</i> (italicized). Number of patent including country of issue.	Cookson, A.H., 1985. Particle trap for compressed gas insulated transmission systems. US Patent 4554399.	(Cookson, 1985) ... OR Cookson (1985) ...
DVD, Video or Film	<i>Full title of DVD or Video</i> (italicized). Year. [type of medium] Directed by Director. Country:Filmstudio or maker. Other relevant details.	DVD <i>Unleashing creativity</i> . 2005. [dvd] Directed by Phyllis Lane. Stanford,CA: Bigger Picture Productions.	(Unleashing creativity, 2005) ... OR Unleashing creativity (2005) ...
		Video <i>Homeopathy mystery of healing</i> . 2007. [video] Directed by TimothyDooley. Harrington Park, NJ: Janson Media.	(Homeopathy mystery of healing,2007) ... OR Homeopathy mystery of healing(2007) ...
		Film <i>Days and clouds</i> . 2010. [film] Directed by LionelloCerri. USA: FilmMovement.	(Days and clouds, 2010) ... OR Days and clouds (2010) ...
Unpublished works		Unpublished conference papers Matsummoto, H., 2005. Impact of Japanese traditional culture on global IS management. Paper presented at Pacific Asia Conference on Information Systems (PACIS). Bangkok, Thailand, July 2005.	(Matsummoto, 2005) ... OR Matsummoto (2005) ...

		Unpublished Journal Article Rose, L. and Ramagnano, S., (in press) Emergency nurse responsibilities for mechanical ventilation: a national survey. Journal of Emergency Nursing. (Accepted for publication January 2013).	(Rose and Ramagnano, 2013) ... OR Rose and Ramagnano (2013) ...
		Unpublished Lecture Notes Arokiasamy, L., 2008. Workforce diversity: a human resource development perspective towards organizational performance. [lecture note] Sibu: University College of Technology Sarawak.	(Arokiasamy, 2008) ... OR Arokiasamy (2008) ...
Websites	Author, Initial(s)., Year. Title of web page or web document (italicized). [type of medium] Available at: <url> [Accessed date].	Bryant, C., 2005. Preventing falls in bridge construction. [online] Available at: <http://ohsonline.com/Articles/2005/03/Preventing-Falls-in-Bridge-Construction.aspx> [Accessed 24 October 2013].	(Bryant, 2005) ... OR Bryant (2005) ...
	Name of organization, Year. Title of web page or web document (italicized). [type of medium].	Queensland Health, 2009. Sun safety and physical activity. [online] Available at: <http://access.health.qld.gov.au/health/SkinHealth/SunSafety/SunSafetyAndPhysicalActivity_app.asp> [Accessed 21 April 2012].	(Queensland Health, 2009) ... OR Queensland Health (2009) ...

	Available at: <url> [Accessed date].		
Pictures, Images and Photographs	Artist/Photographer's name, Year of production. Title of image (italicized). [type of medium]Collection Details (Place, url, etc.)	Picasso, P., 1914. Still life with compote and glass. [photograph] New York: The Metropolitan Museum of Art.	(Picasso, 1914) ... OR Picasso (1914) ...
		Tang, C.S., 2011. A Cambodian man rows a boat near a collapsed house in Takeo province. [electronic print] Available at: < http://www.channelnewsasia.com/stories/afpasiapacific/view/1155114/1/.html >[Accessed 26 December 2012].	(Tang, 2011) ... OR Tang (2011) ...
Tables or diagrams	Author, Initial(s)., Year of production. Title (italicized). Edition (if any). Place: Publisher.	Masters, J.R. W., 2000. Animal cell culture: a practical approach. 3rd ed. Oxford: Oxford University Press.	 (Masters, 2000. p. 83)
Quotations	For a direct quotation from an author, enclose this in quotation marks, and give the author, initial(s), date and page number(s) that the quotation was taken from, in brackets.	Mark, B.T., 2011. Agriculture in world history. London: Routledge.	Short Quotation Mark (2011, p.135.) have stated that ...
		Aitchison, J., 2001. Language change: progress or decay? Cambridge: Cambridge University Press.	Long Quotation (> 50 words)

			“Language, then, like everything” (Aitchison, 2001, p.18).
Secondary sources	If you have not read a particular source but it was referred to in another work, cite both the original source and the secondary source where you have referred to.	Bowden, J and Marton, F., 1998. The university of learning. London: Kogan Page. Note: The reference list at the end of your document should only contain works that you have read.	Gibbs, 1981 cited in Bowden and Marton, 1998, p.35). OR ...by Gibbs (1981 cited in Bowden and Marton, 1998, p. 35) found that ...

12.2 IEEE Citation Reference

In IEEE citations, the references should be numbered and appear in the order they appear in the text. When referring to a reference in the text of the document, insert the reference number in square brackets. Eg: [1]

The IEEE citation style has 3 main features:

- The author name is first name (or initial) and last.
- The title of an article (or chapter, conference paper, patent etc.) is in quotation marks.
- The title of the journal or book is in italics.

Source	Format	Reference list
Book	Author(s). <i>Book title</i> . Location: Publishing company, year, pp.	W.K. Chen. <i>Linear Networks and Systems</i> . Belmont, CA: Wadsworth, 1993, pp. 123-35.
Book Chapters	Author(s). “Chapter title” in <i>Book title</i> , edition, volume. Editors name, Ed. Publishing	J.E. Bourne. “Synthetic structure of industrial plastics,” in <i>Plastics</i> , 2 nd ed., vol. 3. J. Peters, Ed. New York: McGraw-Hill, 1964, pp.15-67.

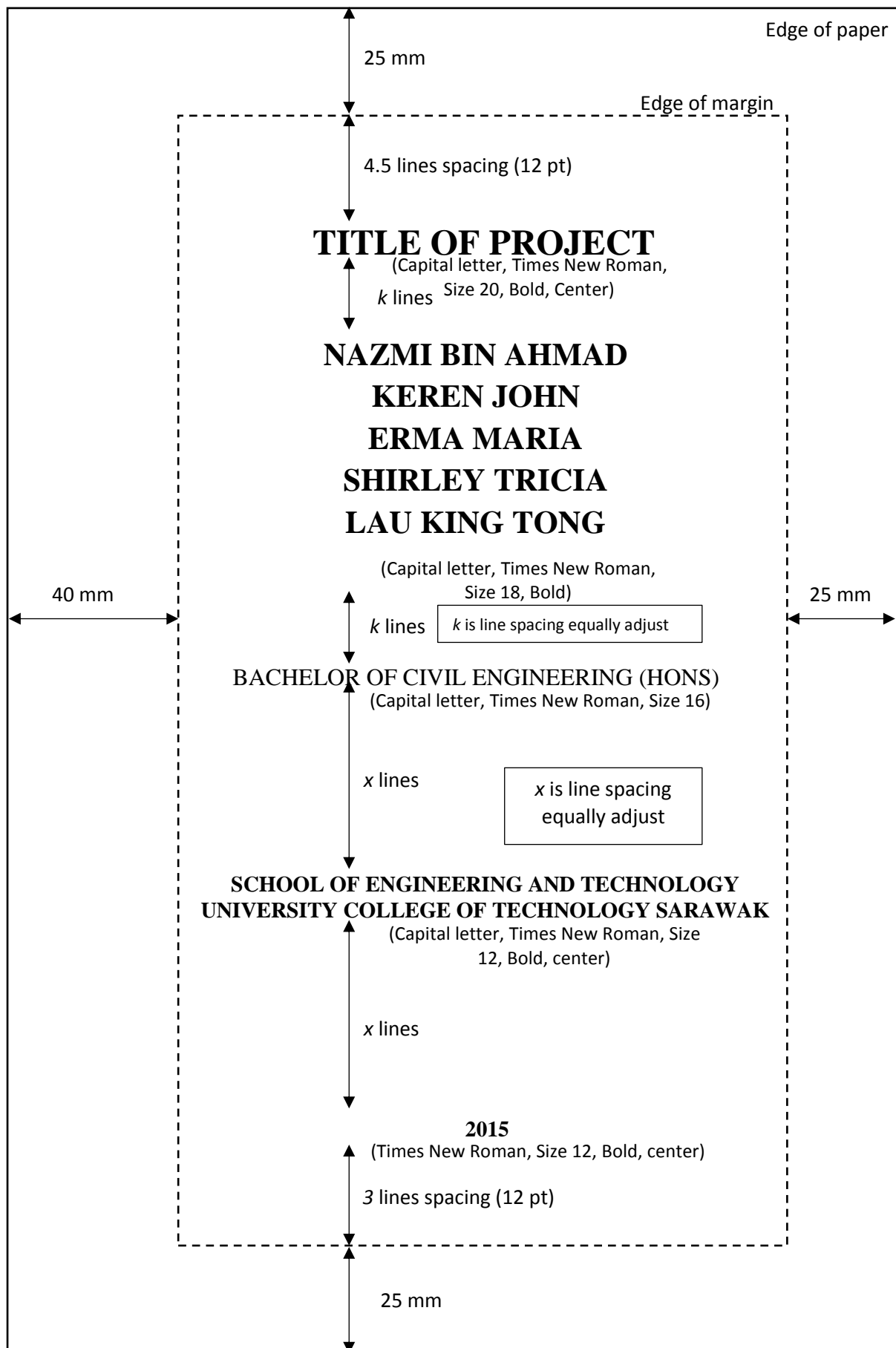
	location: Publishing company, year, pp.	
Article in a Journal	Author(s). "Article title". <i>Journal title</i> , vol., pp, date.	G. Peveri. "Infrared Nation." <i>The International Journal of Infrared Design</i> , vol. 33, pp. 56-99, Jan. 1979.
Articles from Conference Proceedings (published)	Author(s). "Article title." <i>Conference proceedings</i> , year, pp.	D.B. Payne and H.G. Gunhold. "Digital sundials and broadband technology," in <i>Proc. IOOC-ECOC</i> , 1986, pp. 557-998.
Papers Presented at Conferences (unpublished)	Author(s). "Paper's title," Conference name, Location, year.	B. Brandli and M. Dick. "Engineering names and concepts," presented at the nd 2 Int. Conf. Engineering Education, Frankfurt, Germany, 1999.
Standards/Patents	Author(s) / Inventor(s). "Name/Title." Country where patent is registered. Patent number, date.	E.E. Rebecca. "Alternating current fed power supply." U.S. Patent 7 897 777, Nov. 3, 1987.
World Wide Web	Author(s)*. "Title." Internet: complete URL, date updated* [date accessed].	M. Duncan. "Engineering Concepts on Ice. Internet: www.iceengg.edu/staff.html , Oct. 25, 2000 [Nov. 29, 2003].
Newspaper	Author(s)*. "Article title." <i>Newspaper</i> (month, year), section, pages.	B. Bart. "Going Faster." <i>Globe and Mail</i> (Oct. 14, 2002), sec. A p.1. "Telehealth in Alberta." <i>Toronto Star</i> (Nov. 12, 2003), sec. G pp. 1-3.
Dissertations and Theses	Author. "Title." Degree level, school, location, year.	S. Mack. "Desperate Optimism." M.A. thesis, University of Calgary, Canada, 2000.
Lecture	Lecturer(s). Occasion, Topic: "Lecture title." Location, date.	S. Maw. Engg 251. Class Lecture, Topic: "Speed skating." ICT 224, Faculty of Engineering, University of

		Calgary, Calgary, Alberta, Oct. 31, 2003.
E-mail	Author. Subject line of posting. Personal E-mail (date).	J. Aston. "RE: new location, okay?" Personal e-mail (Jul. 3, 2003).
Internet - Newsgroup	Author or Topic*, "Title," Complete network address, date when it was updated [date accessed]. * if you can't find this information, exclude it.	Author or Topic*, "Title," Complete network address, date when it was updated [date accessed].

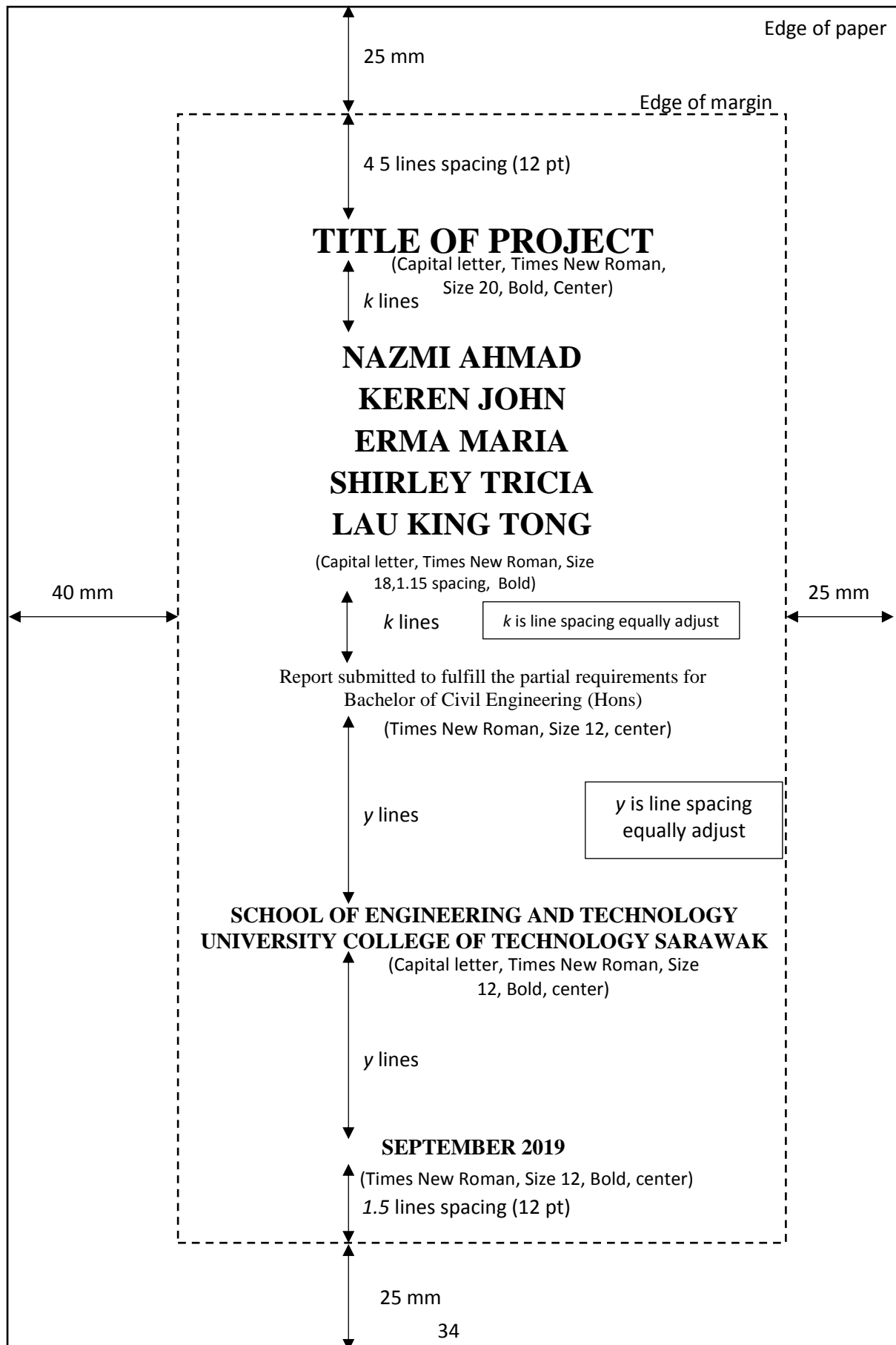
To refer readers to specific page numbers in a text, use the number of the reference followed by a colon (:) and the page numbers. For example:

Johnson suggests that citing will lead to a decrease in being cited for plagiarism [1:28-29].	The [1] refers to the numbered reference And the 28-29 refers to the pages being cited.
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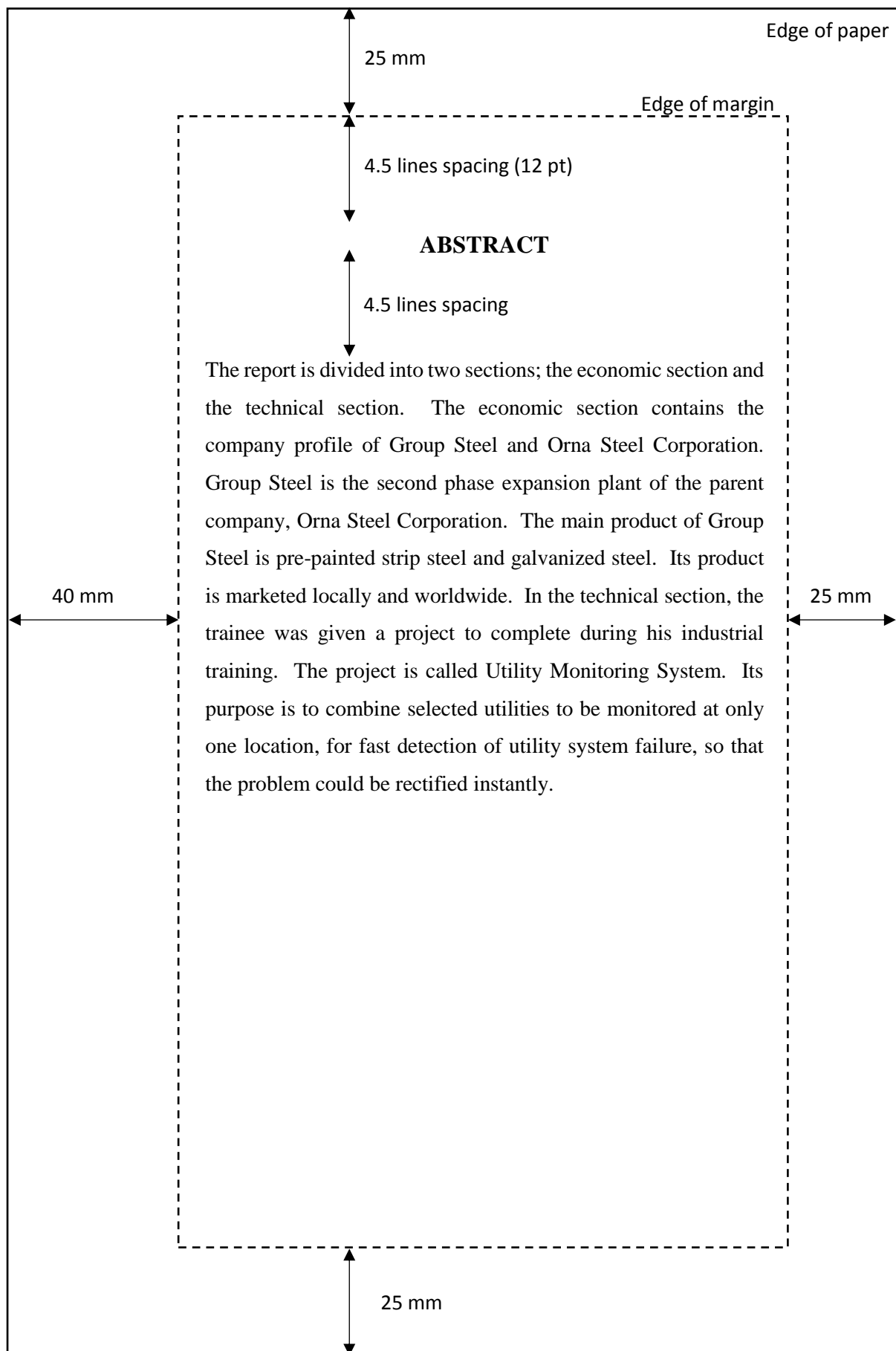
Appendix 1: Cover Page



Appendix 2: Title Page



Appendix 3: Abstract

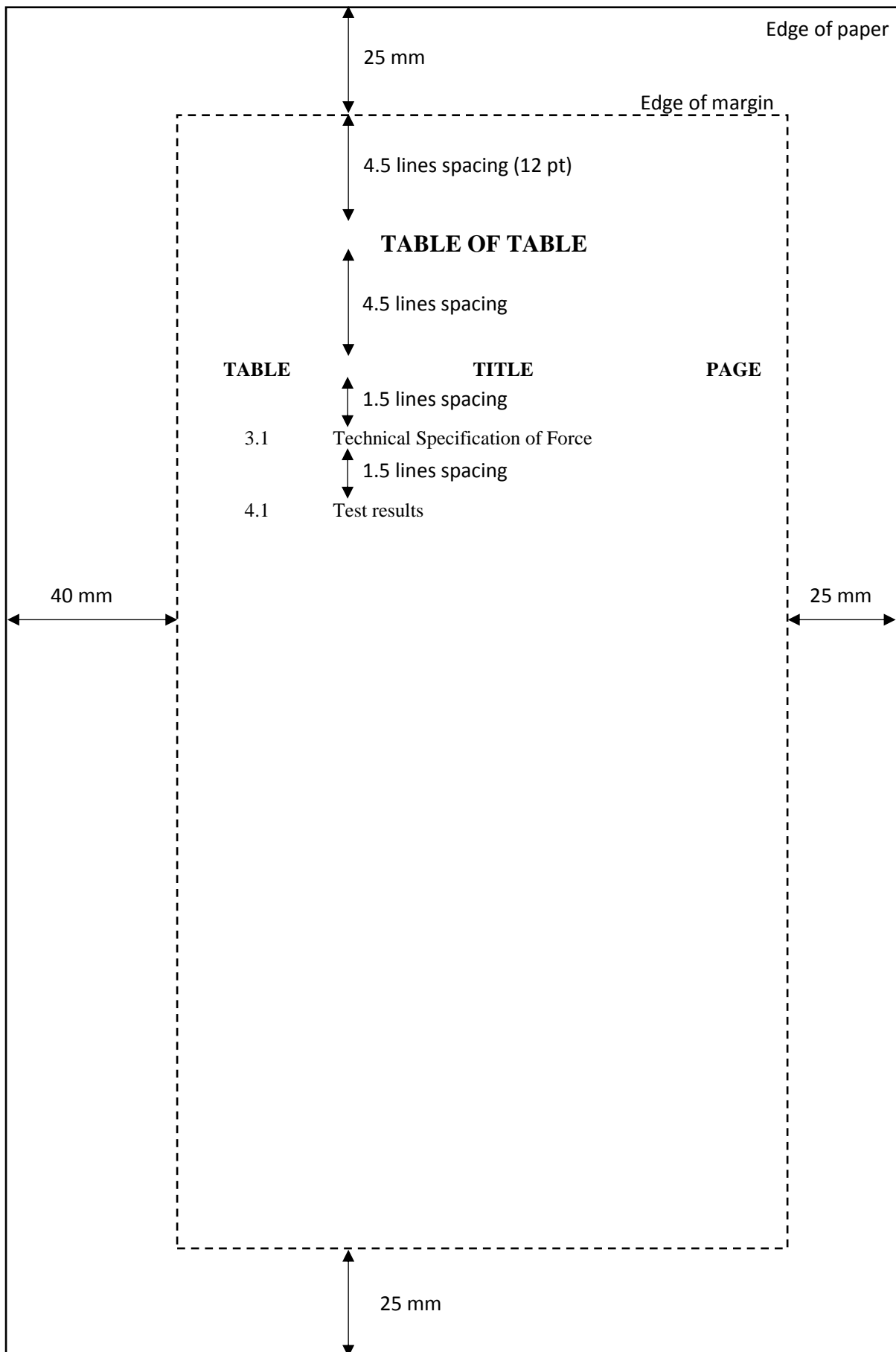


Appendix 4: Table of Content Page

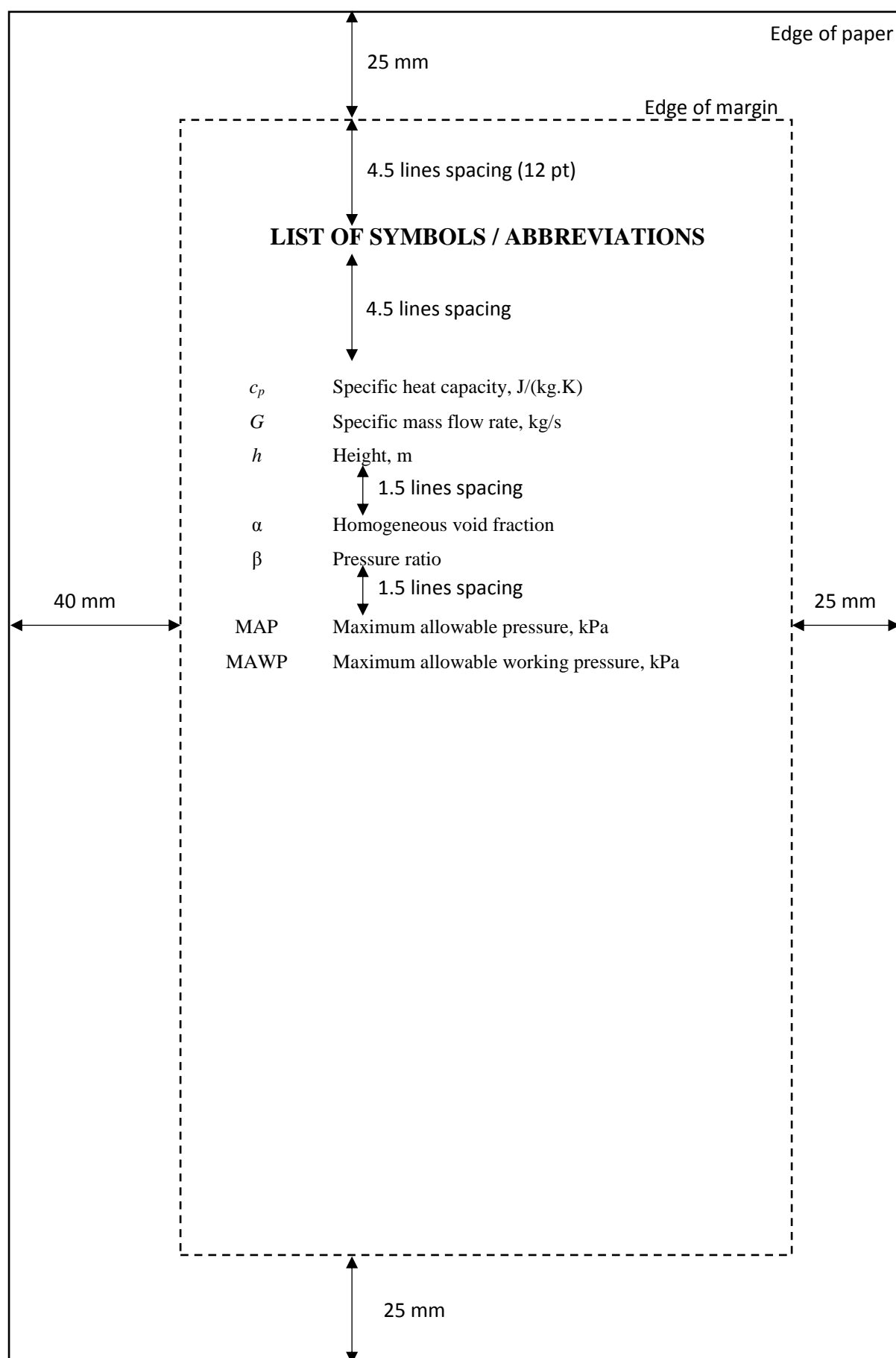
The diagram illustrates the layout of a Table of Contents page. It features a central dashed box representing the content area, with a solid outer box representing the paper edge. Margins are indicated by arrows: 25 mm at the top and bottom, 40 mm on the left, and 25 mm on the right. The title 'TABLE OF CONTENTS' is centered within the dashed box, with 4.5 lines spacing above and below it. The table itself is also centered, with 4.5 lines spacing between the title and the first entry. The table has three columns: CHAPTER, TITLE, and PAGE. The entries include a Declaration, Approval for Submission, Acknowledgements, Abstract, Table of Contents, List of Tables, List of Figure, and then Chapter 1 (Introduction) and Chapter 2 (Literature Review). The spacing between the List of Figure and the start of Chapter 1 is 3.0 lines, and between the end of Chapter 2 and the Reference section is 1.5 lines. The bottom margin of the dashed box is 25 mm.

CHAPTER	TITLE	PAGE
	DECLARATION	ii
	APPROVAL FOR SUBMISSION	Iii
	ACKNOWLEDGEMENTS	vi
	ABSTRACT	vii
	TABLE OF CONTENTS	viii
	LIST OF TABLES	x
	LIST OF FIGURE	xi
1	INTRODUCTION	1
	1.1 Background	1
	1.2	3
2	LITERATURE REVIEW	1
	2.1 Definition	
	2.1.1	
	REFERENCE	92
	APPENDICES	95

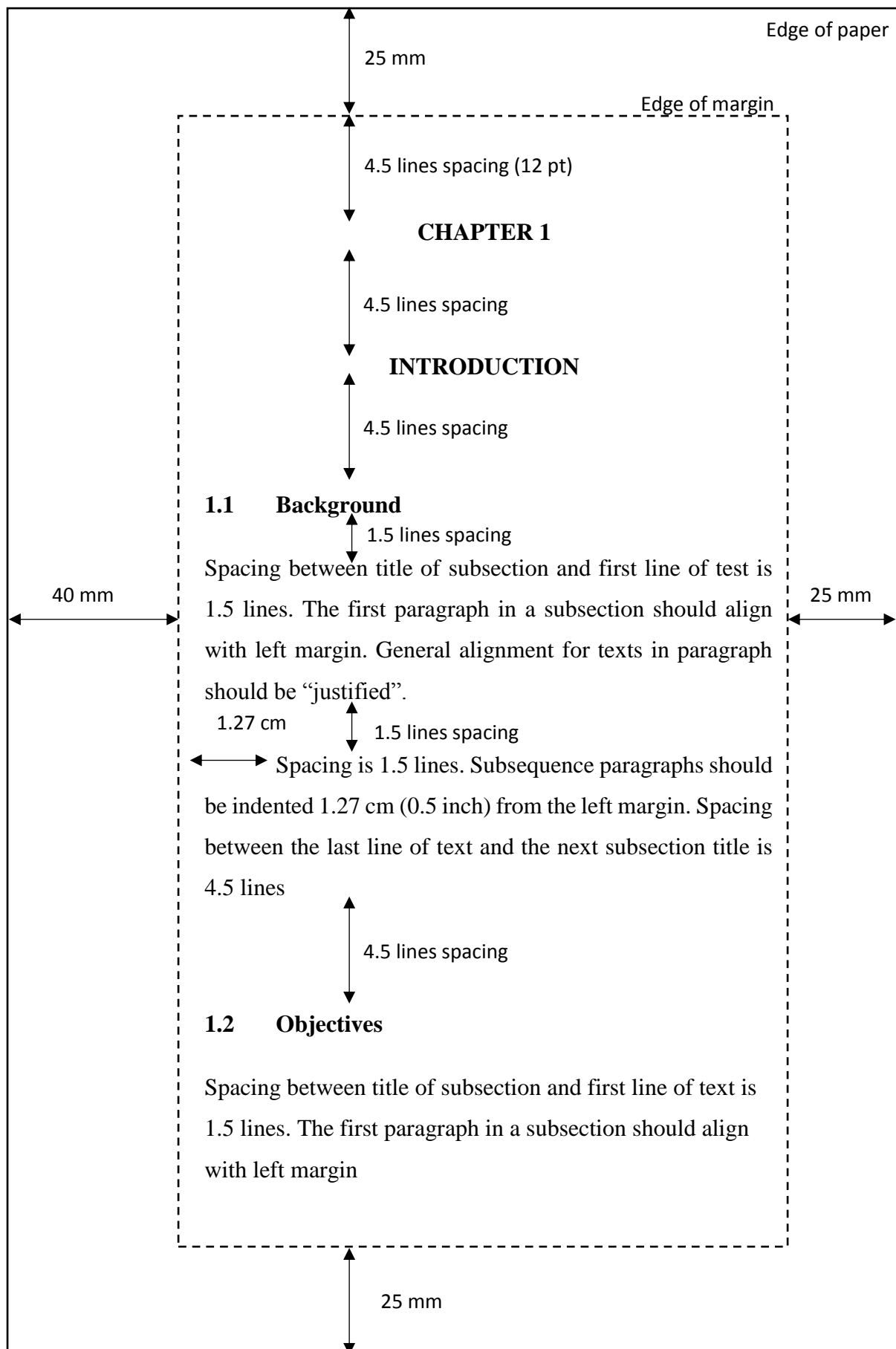
Appendix 5: List of Tables / Figures / Appendices



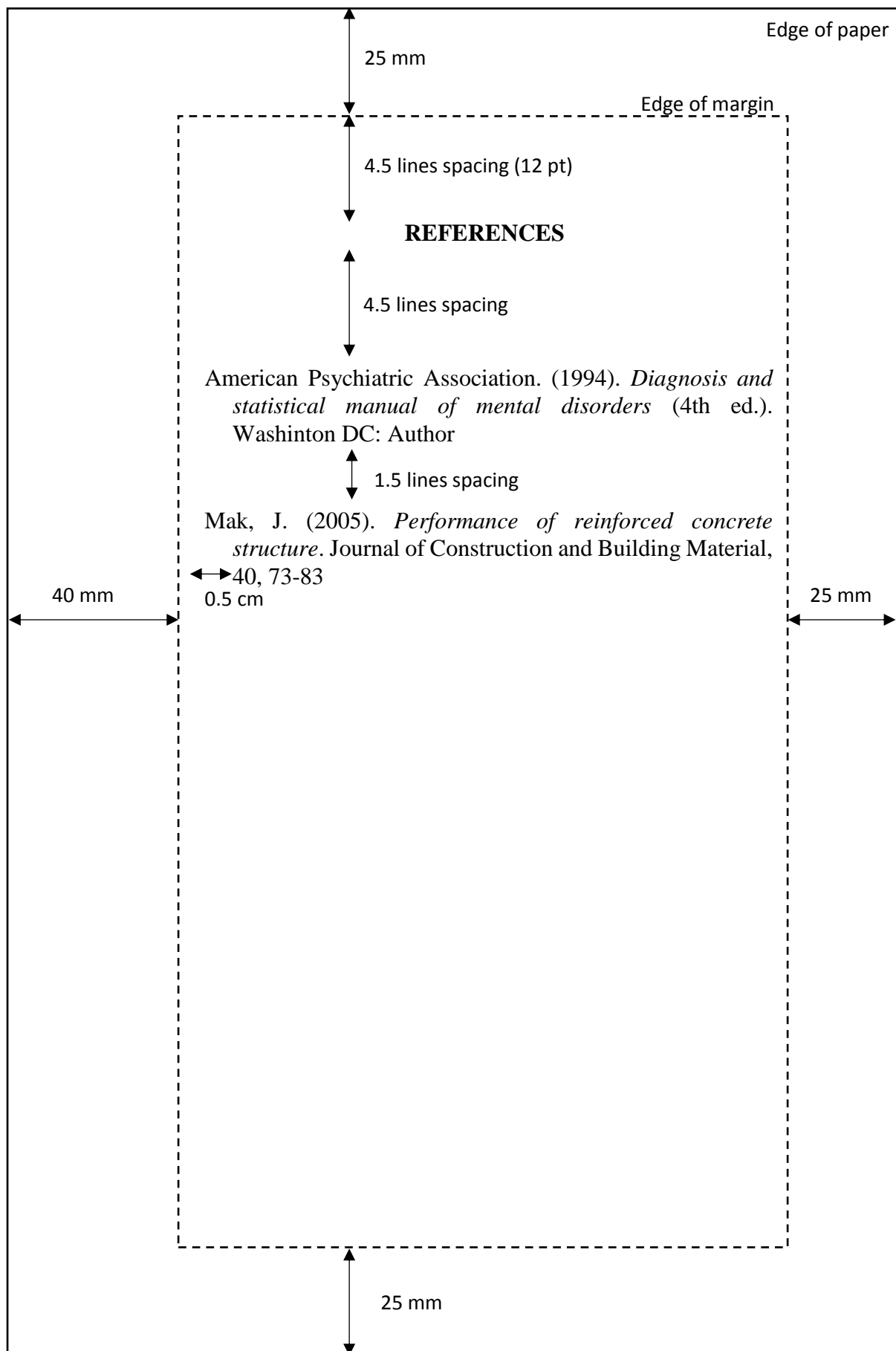
Appendix 6: List of Symbols / Abbreviation



Appendix 7: Body Text



Appendix 8: Reference



Appendix 9: Example of Table

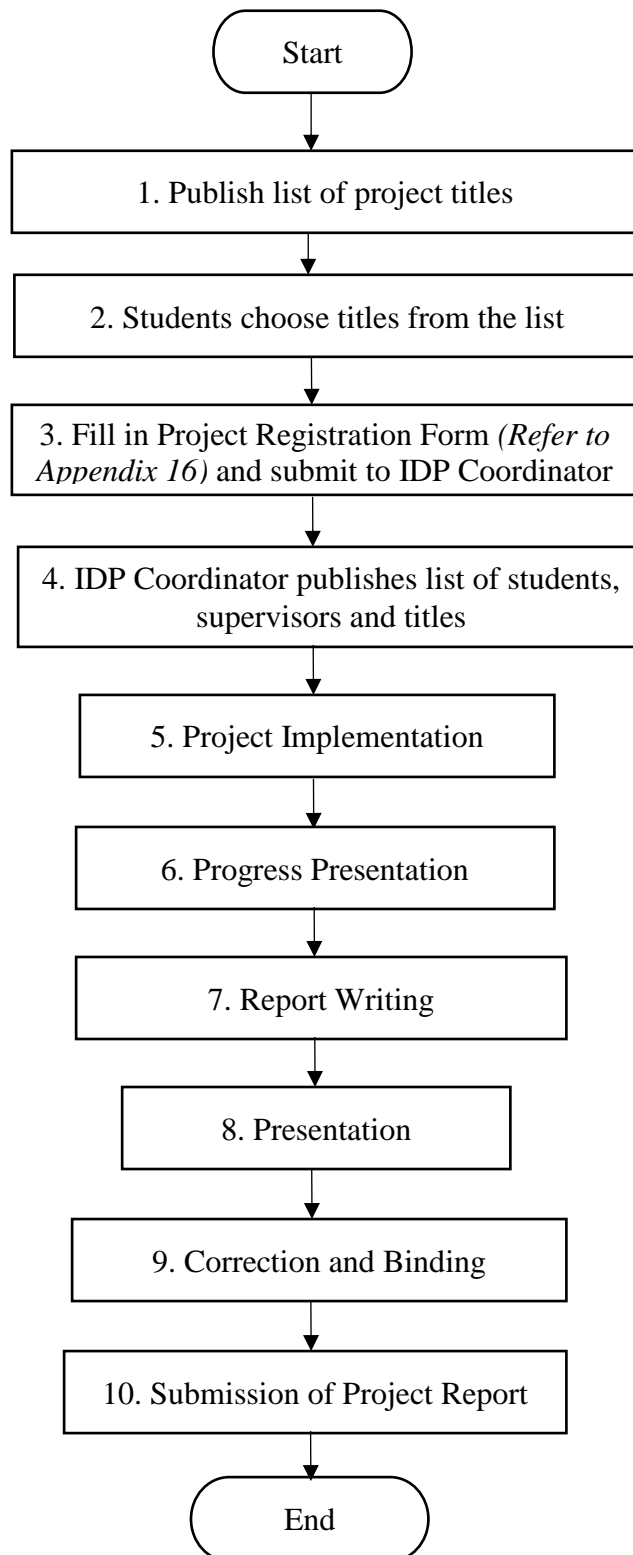
Table 2.2: Comparison of results between lab experiment and software simulation

Ratio Distance	Average Lab Experiment	Average software simulation
0.125	0.25	0.137
0.250	0.46	0.560
0.375	0.63	0.738
0.500	0.75	0.861

Appendix 10: Example of Figures



Figure 1.1: Logo of University College of Technology Sarawak (UCTS)

Appendix 11: Integrated Design Project Flow Chart

Appendix 12: Rubrics for Assessment



UNIVERSITY COLLEGE OF TECHNOLOGY SARAWAK
School of Engineering and Technology
Bachelor of Civil Engineering (Hons)
Integrated Design Project (Progress Report Evaluation - Supervisor)

Name:
 ID:
 Project Title:
 Supervisor:

	Criteria	Weight	Rating (1-10)	Subtotal (%)	Comments
Introduction	Project title clearly reflects the focus of the study	0.2			
	Background of study and problem statements are articulated clearly	0.35			
	Aims and objectives are explicitly outlined	0.35			
	Scope of study is well-defined	0.3			
	Rationale for carrying out the project is explained clearly	0.3			
Literature Review	Literature review is thorough, comprehensive, relevant and consistent with the research topic	2			
	Literatures are critically evaluated; original thinking is evident	1			
	Review of literature is presented in a logical and coherent manner	0.5			
	The work of others is acknowledged and referenced accordingly	0.25			
	Source material is up to date and comprehensive	0.25			
Methodology	Work scope is justifiable and workable	0.5			
	Awareness of various possible investigative methods	0.2			
	Main tasks, difficulties and problems are outlined and explained	1			
	Identification, justification, explanation and use of appropriate tools and techniques/approaches	0.4			
	Identification of appropriate project milestones	0.2			
	Evidence of planning and organization, and demonstrate the problem solving skills	0.2			
Overall Presentation	Free from spelling mistake and grammatical error	0.5			
	Layout, format and outline of the report are consistent with the requirements	0.5			
	Proper presentation of charts, diagrams, tables and references	0.5			
	Interesting to read and visually pleasant	0.5			
Grand Total					

Supervisor signature:

Date:

Scale	Description
1-2	Unacceptable: Show no evidences of efforts; work is largely lack of structure or has major flaws.
3-4	Marginal: Little efforts are seen; work is somewhat structured; numerous errors found, substantial improvements are needed.
5-6	Acceptable: Evidences of efforts are seen; work is structured; less error found, slight improvements are needed.
7-8	Decent: Good efforts are seen; work is decent well-structured; minimal error, slight improvements are needed.
9-10	Exceptional: Evidences of great efforts are seen; work is very well structured, analysed in-depth and well presented, beyond expectation.



UNIVERSITY COLLEGE OF TECHNOLOGY SARAWAK
School of Engineering and Technology
Bachelor of Civil Engineering (Hons)
Integrated Design Project (Progress Report - Examiner)

Name:

ID:

Project Title:

Examiner:

	Criteria	Weight	Rating (1-10)	Subtotal (%)	Comments
Introduction	Project title clearly reflects the focus of the study	0.2			
	Background of study and problem statements are articulated clearly	0.35			
	Aims and objectives are explicitly outlined	0.35			
	Scope of study is well-defined	0.3			
	Rationale for carrying out the project is explained clearly	0.3			
Literature Review	Literature review is thorough, comprehensive, relevant and consistent with the research topic	2			
	Literatures are critically evaluated; original thinking is evident	1			
	Review of literature is presented in a logical and coherent manner	0.5			
	The work of others is acknowledged and referenced accordingly	0.25			
	Source material is up to date and comprehensive	0.25			
Methodology	Work scope is justifiable and workable	0.5			
	Awareness of various possible investigative methods	0.2			
	Main tasks, difficulties and problems are outlined and explained	1			
	Identification, justification, explanation and use of appropriate tools and techniques/approaches	0.4			
	Identification of appropriate project milestones	0.2			
Overall Presentation	Evidence of planning and organization, and demonstrate the problem solving skills	0.2			
	Free from spelling mistake and grammatical error	0.5			
	Layout, format and outline of the report are consistent with the requirements	0.5			
	Proper presentation of charts, diagrams, tables and references	0.5			
Grand Total					

Examiner signature:

Date

Scale	Description
1-2	Unacceptable: Show no evidences of efforts; work is largely lack of structure or has major flaws.
3-4	Marginal: Little efforts are seen; work is somewhat structured; numerous errors found, substantial improvements are needed.
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UNIVERSITY COLLEGE OF TECHNOLOGY SARAWAK
School of Engineering and Technology
Bachelor of Civil Engineering (Hons)
Integrated Design Project (Oral Presentation-Supervisor)

Name:

ID:

Project Title:

Supervisor:

	Criteria	Weight	Rating (1-10)	Subtotal (%)	Comments
Presentation Skill & Style	Stage Presence: Confident, excellent gestures, good audience attention, good eye contact and portray a professional image.	0.5			
	Delivery: effective, poised, controlled, and smooth to ensure audience comprehension, within allocated time	1			
	Visual Aids: Figures / charts / tables are well prepared, informative, effective, attractive and not distracting.	0.5			
	Clarity: cover all key aspects are clearly and comprehensively explained and elaborated	1			
Language / Vocabulary	Language & Pronunciation: Properly spoken, fluent, clear voice, correct and precise pronunciations	0.75			
	Vocabulary & Grammar: appropriate terminologies, use a variety of phrases, sentences are well structure and grammatically correct	0.75			
Technical Content	Introduction: Topic is introduced clearly and in an interesting way. Background, problems, objectives, scope and significance of study are clearly stated	0.5			
	Topic development: Points were well-organised and developed with sufficient and appropriate details, connections between ideas are made clear. Information is relevant and well expressed.	0.5			
	Understanding: Displayed an excellent grasp and mastery of content, facts, evidence, in depth	0.5			
	Wordings: Wordings on slides are presented in concise and comprehensible manner	0.5			
	Technical: identification of problem, proposal of solution, methodology, analysis and interpretation of the expected results are logical, workable and justifiable.	1.5			
	Conclusion: The presentation was summed up clearly and effectively, with key points emphasised.	0.5			
Questions & Answers	Answers: Questions are answered with little difficulty. Very good knowledge of the topic was demonstrated. Language was correct and fluent.	0.75			
	Oral defence: response are eloquent, arguments are skilfully presented, keeps countenance with good answering techniques	0.75			
Grand Total					

Supervisor
signature:

Date:

Scale	Description
1-2	Unacceptable: Show no evidences of efforts; work has major flaws.
3-4	Marginal: Little efforts are seen; work is somewhat structured; numerous errors found, substantial improvements are needed.
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UNIVERSITY COLLEGE OF TECHNOLOGY SARAWAK
School of Engineering and Technology
Bachelor of Civil Engineering (Hons)
Integrated Design Project (Oral Presentation-Examiner)

Name:

ID:

Project Title:

Examiner

	Criteria	Weight	Rating (1-10)	Subtotal (%)	Comments
Presentation Skill & Style	Stage Presence: Confident, excellent gestures, good audience attention, good eye contact and portray a professional image.	0.5			
	Delivery: effective, poised, controlled, and smooth to ensure audience comprehension, within allocated time	1			
	Visual Aids: Figures / charts / tables are well prepared, informative, effective, attractive and not distracting.	0.5			
	Clarity: cover all key aspects are clearly and comprehensively explained and elaborated	1			
Language / Vocabulary	Language & Pronunciation: Properly spoken, fluent, clear voice, correct and precise pronunciations	0.75			
	Vocabulary & Grammar: appropriate terminologies, use a variety of phrases, sentences are well structure and grammatically correct	0.75			
Technical Content	Introduction: Topic is introduced clearly and in an interesting way. Background, problems, objectives, scope and significance of study are clearly stated	0.5			
	Topic development: Points were well-organised and developed with sufficient and appropriate details, connections between ideas are made clear. Information is relevant and well expressed.	0.5			
	Understanding: Displayed an excellent grasp and mastery of content, facts, evidence, in depth	0.5			
	Wordings: Wordings on slides are presented in concise and comprehensible manner	0.5			
	Technical: identification of problem, proposal of solution, methodology, analysis and interpretation of the expected results are logical, workable and justifiable.	1.5			
	Conclusion: The presentation was summed up clearly and effectively, with key points emphasised.	0.5			
Questions & Answers	Answers: Questions are answered with little difficulty. Very good knowledge of the topic was demonstrated. Language was correct and fluent.	0.75			
	Oral defence: response are eloquent, arguments are skilfully presented, keeps countenance with good answering techniques	0.75			
Grand Total					

Examiner
signature:

Date:

Scale	Description
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UNIVERSITY COLLEGE OF TECHNOLOGY SARAWAK
School of Engineering and Technology
Bachelor of Civil Engineering (Hons)
Integrated Design Project (Supervisor Evaluation)

Name:

ID:

Project Title:

Supervisor:

	Criteria	Weight	Rating (1-10)	Total (%)	Comments
CO1	Acknowledge the continuous development of knowledge and the needs of self-upgrading.	3			
CO2	Develop objectives of a research.	1			
CO3	Review on previous research.	3			
CO4	Design methodology to collect data for conducting research.	2			
CO5	Plan the schedule of a research.	1			
CO6	Produce a research proposal.	3			
Grand Total					

Attendance		Status
Number of meeting with supervisor throughout the semester	> = 8 times	Satisfactory

Supervisor signature:

Date:

Scale	Description
1-2	Unacceptable: Show no evidences of efforts; work has major flaws.
3-4	Marginal: Little efforts are seen; work is somewhat structured; numerous errors found, substantial improvements are needed.
5-6	Acceptable: Evidences of efforts are seen; work is structured; less error found, slight improvements are needed.
7-8	Decent: Good efforts are seen; work is decent well-structured; minimal error, slight improvements are needed.
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UNIVERSITY COLLEGE OF TECHNOLOGY SARAWAK
School of Engineering and Technology
Bachelor of Civil Engineering (Hons)
Integrated Design Project (Final Report – Supervisor & Examiner)

Name:
 ID:
 Project Title:
 Supervisor:

	Criteria	Weight	Rating (1-10)	Subtotal (%)	Comments
Abstract & Introduction	Provides reader an overview of project clearly and concisely	0.3			
	Project title clearly reflects the focus of the study	0.2			
	Background of study and problem statements are articulated clearly	0.2			
	Aims and objectives are explicitly outlined	0.2			
	Scope of study is well-defined	0.2			
	Rationale for carrying out the project is explained clearly	0.2			
Literature Review	Literature review is thorough, comprehensive, relevant and consistent with the research topic	0.2			
	Literatures are critically evaluated; original thinking is evident	0.2			
	Review of literature is presented in a logical and coherent manner	0.2			
	The work of others is acknowledged and referenced accordingly	0.2			
	Source material is up to date and comprehensive	0.2			
Methodology	Work scope is justifiable and workable	0.2			
	Main tasks and test programs are outlined and explained	0.5			
	Identification, justification, explanation and use of appropriate tools and techniques/approaches	0.5			
	Evidence of planning and organization, and demonstrate the problem solving skills	0.3			
Results and Discussions	Clear presentation of test conditions and data	0.3			
	Approach of analysis and scope of investigative are appropriate (in line with the objectives)	0.4			
	Justification of data, analysis and results. Theoretical and experimental results are analysed, compared and explained	1			
	Results supported by full documentation	0.4			
	Results are effectively interpreted and discussed, well integrated into existing literature and focusing on the aims	1.5			
	Evidence of self-determined effort to acquire additional knowledge and skills to achieve aims	0.4			
Conclusion and Recommendations	Conclusion addresses the research question / issue and achievement of aim and objectives	0.3			
	Conclusions are drawn from analysis and are supported by data	0.3			
	State limitations of final product	0.3			
	Realistic recommendations for future development	0.3			
Overall Presentation	Free from spelling mistake and grammatical error	0.25			
	Layout, format and outline of the report are consistent with the requirements	0.25			
	Proper presentation of charts, diagrams, tables and references	0.25			
	Interesting to read and visually pleasant	0.25			
Grand Total					

Supervisor signature:

Date

Scale	Description
1-2	Unacceptable: Show no evidences of efforts; work is largely lack of structure or has major flaws.
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UNIVERSITY COLLEGE OF TECHNOLOGY SARAWAK
School of Engineering and Technology (SET)
Bachelor of Civil Engineering (Hons)
Integrated Design Project (Oral Presentation – Examiner)

Name:

ID:

Project Title:

Examiner

	Criteria	Weight	Rating (1-10)	Subtotal (%)	Comments
Presentation Skill & Style	Stage Presence: Confident, excellent gestures, good audience attention, good eye contact and portray a professional image.	0.5			
	Delivery: effective, poised, controlled, and smooth to ensure audience comprehension, within allocated time	1			
	Visual Aids: Figures / charts / tables are well prepared, informative, effective, attractive and not distracting.	0.5			
	Clarity: cover all key aspects are clearly and comprehensively explained and elaborated	1			
Language Vocabulary	Language & Pronunciation: Properly spoken, fluent, clear voice, correct and precise pronunciations	0.5			
	Vocabulary & Grammar: appropriate terminologies, use a variety of phrases, sentences are well structure and grammatically correct	0.5			
	Introduction: Topic is introduced clearly and in an interesting way. Background, problems, objectives, scope and significance of study are clearly stated	0.5			
	Topic development: Points were well-organised and developed with sufficient and appropriate details, connections between ideas are made clear. Information is relevant and well expressed.	0.3			
	Understanding: Displayed an excellent grasp and mastery of content, facts, evidence, in depth	0.3			
	Wordings: Wordings on slides are presented in concise and comprehensible manner	0.4			
	Technical: identification of problem, proposal of solution, methodology, analysis and interpretation of the results are logical, workable and justifiable.	1			
Technical Content	Discussion: Discussion of analysis and results are in depth, logical, supported with facts and evident, and propose viable solution to complex engineering problems	1			
	Conclusion: The presentation was summed up clearly and effectively, with key points emphasised.	0.5			
Questions & Answers	Answers: Questions are answered with little difficulty. Very good knowledge of the topic was demonstrated. Language was correct and fluent.	1			
	Oral defence: response are eloquent, arguments are skilfully presented, keeps countenance with good answering techniques	1			
Grand Total					

Examiner signature:

Date:

Scale	Description
1-2	Unacceptable: Show no evidences of efforts; work is largely lack of structure or has major flaws.
3-4	Marginal: Little efforts are seen; work is somewhat structured; numerous errors found, substantial improvements are needed.
5-6	Acceptable: Evidences of efforts are seen; work is structured; less error found, slight improvements are needed.
7-8	Decent: Good efforts are seen; work is decent well-structured; minimal error, slight improvements are needed.
9-10	Exceptional: Evidences of great efforts are seen; work is very well structured, analysed in-depth and well presented, beyond expectation.



UNIVERSITY COLLEGE OF TECHNOLOGY SARAWAK
School of Engineering and Technology
Bachelor of Civil Engineering (Hons)
Integrated Design Project (Oral Presentation-Supervisor)

Name:

ID:

Project Title:

Supervisor:

	Criteria	Weight	Rating (1-10)	Subtotal (%)	Comments
Presentation Skill & Style	Stage Presence: Confident, excellent gestures, good audience attention, good eye contact and portray a professional image.	0.5			
	Delivery: effective, poised, controlled, and smooth to ensure audience comprehension, within allocated time	1			
	Visual Aids: Figures / charts / tables are well prepared, informative, effective, attractive and not distracting.	0.5			
	Clarity: cover all key aspects are clearly and comprehensively explained and elaborated	1			
Language / Vocabulary	Language & Pronunciation: Properly spoken, fluent, clear voice, correct and precise pronunciations	0.5			
	Vocabulary & Grammar: appropriate terminologies, use a variety of phrases, sentences are well structure and grammatically correct	0.5			
Technical Content	Introduction: Topic is introduced clearly and in an interesting way. Background, problems, objectives, scope and significance of study are clearly stated	0.5			
	Topic development: Points were well-organised and developed with sufficient and appropriate details, connections between ideas are made clear. Information is relevant and well expressed.	0.3			
	Understanding: Displayed an excellent grasp and mastery of content, facts, evidence, in depth	0.3			
	Wordings: Wordings on slides are presented in concise and comprehensible manner	0.4			
	Technical: identification of problem, proposal of solution, methodology, analysis and interpretation of the results are logical, workable and justifiable.	1			
	Discussion: Discussion of analysis and results are in depth, logical, supported with facts and evident, and propose viable solution to complex engineering problems	1			
	Conclusion: The presentation was summed up clearly and effectively, with key points emphasised.	0.5			
Questions & Answers	Answers: Questions are answered with little difficulty. Very good knowledge of the topic was demonstrated. Language was correct and fluent.	1			
	Oral defence: response are eloquent, arguments are skilfully presented, keeps countenance with good answering techniques	1			
Grand Total					

Supervisor signature:

Date:

Scale	Description
1-2	Unacceptable: Show no evidences of efforts; work has major flaws.
3-4	Marginal: Little efforts are seen; work is somewhat structured; numerous errors found, substantial improvements are needed.
5-6	Acceptable: Evidences of efforts are seen; work is structured; less error found, slight improvements are needed.
7-8	Decent: Good efforts are seen; work is decent well-structured; minimal error, slight improvements are needed.
9-10	Exceptional: Evidences of great efforts are seen; work is very well structured, analysed in-depth and well presented, beyond expectation.



UNIVERSITY COLLEGE OF TECHNOLOGY SARAWAK
School of Engineering and Technology
Bachelor of Civil Engineering (Hons)
Integrated Design Project (Supervisor Evaluation)

Name:

ID:

Project Title:

Supervisor:

	Criteria	Weight	Rating (1-10)	Total (%)	Comments
CO1	Acknowledge the continuous development of knowledge and the needs of self-upgrading	3			
CO2	Execute an engineering research programme	3			
CO3	Analyse the research data	3			
CO4	Justify the significances, results, findings and impacts of research.	2			
CO5	Conclude the research findings and outcomes with confidence	2			
CO6	Produce an academic writing	3			
Grand Total					

Attendance	Status
Number of meeting with supervisor throughout the semester	> = 8 times Satisfactory

Supervisor signature:

Date:

Scale	Description
1-2	Unacceptable: Show no evidences of efforts; work has major flaws.
3-4	Marginal: Little efforts are seen; work is somewhat structured; numerous errors found, substantial improvements are needed.
5-6	Acceptable: Evidences of efforts are seen; work is structured; less error found, slight improvements are needed.
7-8	Decent: Good efforts are seen; work is decent well-structured; minimal error, slight improvements are needed.
9-10	Exceptional: Evidences of great efforts are seen; work is very well structured, analysed in-depth and well presented, beyond expectation.



UNIVERSITY COLLEGE OF TECHNOLOGY SARAWAK

School of Engineering and Technology

Bachelor of Civil Engineering (Hons)

Integrated Design Project (Supervisor Evaluation)

Name:

ID:

Project Title:

Supervisor:

Co-supervisor:

Similarity	%	Supervisor's Comments (Compulsory if parameters of originality exceeds the limit approved by UCTS)
Overall similarity index		
Similarity by source		
Internet Sources		
Publications		
Student Papers		
Number of individual sources listed with more than 10% similarity:		
Parameters of originality required and limits approved by UCTS are as follows: (i) Overall similarity index is 30% and below, and		

Note: Supervisor/Candidate is required to provide softcopy of full set of the originality report to the school

Based on the above results, I hereby declare that I am

Satisfied

with the originality of the Project Report submitted by my student as named above.

Supervisor signature:

Co-Supervisor signature:

Date:

Date:

NOTE: In the case that the marks given by the supervisor and the examiner differ by 1/4 of the total marks of the respective assessment method, an additional examiner will be involved. The student then needs to submit an additional report or undergo another presentation session, depending on the circumstances. The final marks given will be an average of the marks given by the three examiners.



SCHOOL OF ENGINEERING AND TECHNOLOGY
Bachelor of Mechanical Engineering (Hons)
EEM 3944 Integrated Design Project
Oral Presentation Evaluation

Group No. :
 Semester/Session :
 Project Title :

		PO	Max. Marks	Descriptors	Score
1.	Language, Layout, Format, Originality				
	<ul style="list-style-type: none"> Grammatically satisfying. Title page. Consistent font and spacing. Properly labelled figures and tables. Table of contents, list of figures and tables are properly numbered into section and subsections with page number. Equations are numbered. References are written in correct format. Appendices are used when necessary. Present own works, constitute original scholarship and an advancement of knowledge. 	PO7	10	Good (8 - 10) Satisfactory (7 - 5) Fair (4- 2) Weak (0 - 1)	
2.	Project Description				
	<ul style="list-style-type: none"> Brief introduction of the entire project. Assess coverage of the aims and purpose of the project. Assess the descriptions of the approach to the problem and its context. Clearly state the design option. Address and discuss the requirements of the project. 	PO3	15	Good (12 - 15) Satisfactory (8 - 11) Fair (4 - 7) Weak (0 - 3)	
3.	Technical & Design Issues				
	<ul style="list-style-type: none"> Design procedures are clearly explained. 	PO1	10	Good (8 - 10) Satisfactory (7 - 5) Fair (4- 2) Weak (0 - 1)	

	<ul style="list-style-type: none"> Codes of practice, standards, references, formulas used are clearly identified. Recognize the limitations and address any constraints of the project. Design to take care of environmental issues. 	PO2	10	Good (8 - 10) Satisfactory (7 - 5) Fair (4- 2) Weak (0 - 1)	
	<ul style="list-style-type: none"> Regulatory control – government, council, JKR, etc. are taken into consideration 	PO3	10	Good (8 - 10) Satisfactory (7 - 5) Fair (4- 2) Weak (0 - 1)	
	<ul style="list-style-type: none"> Were there any difficulties in design and were they taken into consideration? Identify and discuss the design considerations 	PO4	10	Good (8 - 10) Satisfactory (7 - 5) Fair (4- 2) Weak (0 - 1)	
	<ul style="list-style-type: none"> Design considerations are clearly presented with the relevant engineering drawings/sketches. Design considerations are supported with convincing data, plots, graphs, and hardware/software. 	PO5	10	Good (8 - 10) Satisfactory (7 - 5) Fair (4- 2) Weak (0 - 1)	
	<ul style="list-style-type: none"> Construction procedures are clearly identified and explained. Is the design practical? Is their chosen option buildable? How much has been considered especially on issues like procurement of material, availability of contractors, labour and expertise. Has the costing been done and related issues addressed? 	PO9	15	Good (12 - 15) Satisfactory (8 - 11) Fair (4 - 7) Weak (0 - 3)	
4.	Conclusions and Summary				
	<ul style="list-style-type: none"> Highlight the overall conclusions of the project summarizing the design output. Conduct professional and ethical responsibilities 	PO6	10	Good (8 - 10) Satisfactory (7 - 5) Fair (4- 2) Weak (0 - 1)	

TOTAL
SCORE

Comments:

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Examined by

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Signature

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Date :

**Guidelines for Descriptors*

Good	Satisfactory	Fair	Weak
Clear presentation; almost all major points sufficiently addressed; generally thorough and comprehensive.	Generally acceptable, some points sufficiently addressed and some need minor improvement.	May require major revision; include substantial and consistent errors.	Require major revision in almost all major points; include very substantial and consistent error; fail to provide clear presentation.



SCHOOL OF ENGINEERING AND TECHNOLOGY
Bachelor of Mechanical Engineering (Hons)
EEM 3944 Integrated Design Project
Oral Presentation Evaluation

Group No. :

Semester/Session :

Project Title :

		PO	Max. Marks	Descriptors	Score
1.	Delivery				
	<ul style="list-style-type: none"> • Keep within allocated time • Clarity of voice. • Expression of confidence. • Body gestures (i.e. hand movement etc.). • Formal attire. 	PO7	15	Good (11- 15) Satisfactory (7 - 10) Fair (4 - 6) Weak (0 - 3)	
2.	Contents and Presentation Materials				
	<ul style="list-style-type: none"> • Clear introduction of project. • Address and discuss the requirements of the project. • Creativity, innovativeness and originality of design option. • Clearly state the design option. • Stating clearly the outcomes/conclusions 	PO2	35	Good (25 -35) Satisfactory (17 - 24) Fair (9 - 16) Weak (0 - 8)	
3.	Technical and Design Consideration				
	<ul style="list-style-type: none"> • Apply knowledge of mathematics, natural science, engineering fundamentals and an engineering specialization to the solution of complex engineering problems 	PO1	7	Good (6 - 7) Satisfactory (4 - 5) Fair (2 - 3) Weak (0 - 1)	
	<ul style="list-style-type: none"> • Identify, formulate and analyze complex engineering problems creatively and innovatively 	PO2	7	Good (6 - 7) Satisfactory (4 - 5) Fair (2 - 3) Weak (0 - 1)	
	<ul style="list-style-type: none"> • Identify, formulate, research literature and analyze complex engineering problems reaching substantiated conclusions using first principles of mathematics, natural sciences and engineering sciences. 	PO3	7	Good (6 - 7) Satisfactory (4 - 5) Fair (2 - 3) Weak (0 - 1)	

	<ul style="list-style-type: none"> • Select and apply appropriate techniques, resources, and modern engineering and IT tools, including prediction and modelling, to complex engineering problems, with an understanding of the limitations. 	PO4	7	Good (6 - 7) Satisfactory (4 - 5) Fair (2 - 3) Weak (0 - 1)	
	<ul style="list-style-type: none"> • Design solutions for complex engineering problems and design systems, components or processes that meet specified needs with appropriate consideration for public health and safety, cultural, societal, and environmental considerations. 	PO5	7	Good (6 - 7) Satisfactory (4 - 5) Fair (2 - 3) Weak (0 - 1)	
	<ul style="list-style-type: none"> • Address and discuss the constructability, buildability and costing aspects. 	PO9	7	Good (6 - 7) Satisfactory (4 - 5) Fair (2 - 3) Weak (0 - 1)	
4.	Treatment of Questions				
	<ul style="list-style-type: none"> • Answers with knowledge (based on evidence). • Answers are to the point (Spontaneous/logical). 	PO8	8	Good (6 - 8) Satisfactory (4 - 5) Fair (2 - 3) Weak (0 - 1)	

TOTAL SCORE

Comments:

Examined by : _____**Signature** : _____**Date** : _____**Guidelines for Descriptors*

Good	Satisfactory	Fair	Weak
Clear presentation; almost all major points sufficiently addressed; generally thorough and comprehensive.	Generally acceptable, some points sufficiently addressed and some need minor improvement.	May require major revision; include substantial and consistent errors.	Require major revision in almost all major points; include very substantial and consistent error; fail to provide clear presentation.



SCHOOL OF ENGINEERING AND TECHNOLOGY
Bachelor of Mechanical Engineering (Hons)
EEM 3944 Integrated Design Project
Oral Presentation Evaluation

Group No. :

Semester/Session :

Project Title :

		PO	Max. Marks	Descriptors	Score
1.	Language, Layout, Format, Originality				
	<ul style="list-style-type: none"> Grammatically satisfying. Title page. Consistent font and spacing. Properly labelled figures and tables. Table of contents, list of figures and tables are properly numbered into section and subsections with page number. Equations are numbered. References are written in correct format. Appendices are used when necessary. Present own works, constitute original scholarship and an advancement of knowledge. 	PO7	10	Good (8 - 10) Satisfactory (7 - 5) Fair (4- 2) Weak (0 - 1)	
2.	Project Description				
	<ul style="list-style-type: none"> Brief introduction of the entire project. Assess coverage of the aims and purpose of the project. Assess the descriptions of the approach to the problem and its context. Clearly state the design option. Address and discuss the requirements of the project. 	PO3	15	Good (12 - 15) Satisfactory (8 - 11) Fair (4 - 7) Weak (0 - 3)	
3.	Technical & Design Issues				
	<ul style="list-style-type: none"> Design procedures are clearly explained. 	PO1	10	Good (8 - 10) Satisfactory (7 - 5) Fair (4- 2) Weak (0 - 1)	

	<ul style="list-style-type: none"> Codes of practice, standards, references, formulas used are clearly identified. Recognize the limitations and address any constraints of the project. Design to take care of environmental issues. 	PO2	10	Good (8 - 10) Satisfactory (7 - 5) Fair (4- 2) Weak (0 - 1)	
	<ul style="list-style-type: none"> Regulatory control – government, council, JKR, etc. are taken into consideration 	PO3	10	Good (8 - 10) Satisfactory (7 - 5) Fair (4- 2) Weak (0 - 1)	
	<ul style="list-style-type: none"> Were there any difficulties in design and were they taken into consideration? Identify and discuss the design considerations 	PO4	10	Good (8 - 10) Satisfactory (7 - 5) Fair (4- 2) Weak (0 - 1)	
	<ul style="list-style-type: none"> Design considerations are clearly presented with the relevant engineering drawings/sketches. Design considerations are supported with convincing data, plots, graphs, and hardware/software. 	PO5	10	Good (8 - 10) Satisfactory (7 - 5) Fair (4- 2) Weak (0 - 1)	
	<ul style="list-style-type: none"> Construction procedures are clearly identified and explained. Is the design practical? Is their chosen option buildable? How much has been considered especially on issues like procurement of material, availability of contractors, labour and expertise. Has the costing been done and related issues addressed? 	PO9	15	Good (12 - 15) Satisfactory (8 - 11) Fair (4 - 7) Weak (0 - 3)	
4.	Conclusions and Summary				
	<ul style="list-style-type: none"> Highlight the overall conclusions of the project summarizing the design output. Conduct professional and ethical responsibilities 	PO6	10	Good (8 - 10) Satisfactory (7 - 5) Fair (4- 2) Weak (0 - 1)	

TOTAL SCORE	
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Comments:

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Examined by : _____ Signature : _____

Examined by : _____ Signature : _____

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Examined by : _____ Signature : _____

Date : _____

**Guidelines for Descriptors*

Good	Satisfactory	Fair	Weak
Clear presentation; almost all major points sufficiently addressed; generally thorough and comprehensive.	Generally acceptable, some points sufficiently addressed and some need minor improvement.	May require major revision; include substantial and consistent errors.	Require major revision in almost all major points; include very substantial and consistent error; fail to provide clear presentation.



UNIVERSITY COLLEGE OF TECHNOLOGY SARAWAK
School of Engineering and Technology
Bachelor of Electrical Engineering (Power) (Hons) Engineering & Bachelor of Engineering
Technology in Electrical & Electronic (Hons)
Integrated Design Project (Assignment Project Score Sheet)

Name:

ID:

Project Title:

Supervisor:

Co-supervisor:

Category	Criteria for Judging <i>(Please circle the appropriate grade for each category)</i>	Excellent	Very Good	Good	Average +	Average	Average -	Poor	Very Poor	Failure	Mark Awarded
Abstract (5)	<ul style="list-style-type: none"> Objective(s) / Problem Statement / Scope of study / Methodology / Findings 	A (5)	A- (4.5)	B+ (4)	B (3.5)	B- (3)	C+ (2.5)	C (2)	C- (1.5)	D (1)	
Introduction (10)	<ul style="list-style-type: none"> Background of study Problem statement – identification and significant Objective and scope of study The relevancy of project Feasibility of project within the scope and time frame 	A (10)	A- (8.5)	B+ (8)	B (7.5)	B- (6.3)	C+ (5.5)	C (5)	C- (4.5)	D (2)	
Literature Review and/or Theory (15)	<ul style="list-style-type: none"> No. of references Critical analysis of literature Citation and cross referencing Relevancy and recentness of the literature. 	A (15)	A- (13.5)	B+ (12)	B (10.5)	B- (9.3)	C+ (8.5)	C (7)	C- (5)	D (3)	
Methodology (20)	<ul style="list-style-type: none"> Research methodology / Project activities / Key milestone / Gantt Chart / Tools (e.g. equipment, hardware etc.) required 	A (20)	A- (17)	B+ (16)	B (15)	B- (13)	C+ (11)	C (10)	C- (9)	D (4)	
Result and discussion (30)	<ul style="list-style-type: none"> Findings Data gathering / analysis Experimentation / modelling / prototype / project deliverables 	A (30)	A- (26)	B+ (24)	B (22)	B- (19)	C+ (17)	C (15)	C- (13)	D (6)	
Conclusion and recommendations (10)	<ul style="list-style-type: none"> Relevancy to the objective Suggested future work for expansion and continuation 	A (10)	A- (8.5)	B+ (8)	B (7.5)	B- (6.3)	C+ (5.5)	C (5)	C- (4.5)	D (2)	
Others (10)	<ul style="list-style-type: none"> Compliance to the standard guideline / format / neatness / proper usage of English / writing skill / weekly progress report 	A (10)	A- (8.5)	B+ (8)	B (7.5)	B- (6.3)	C+ (5.5)	C (5)	C- (4.5)	D (2)	
STUDENT AND SUPERVISOR MEETING (MINIMUM = 8)										TOTAL SCORE	/ 100
Comment:											
Supervisor / co-supervisor / examiner's signature:					Name:						
					Date:						



UNIVERSITY COLLEGE OF TECHNOLOGY SARAWAK
School of Engineering and Technology
Bachelor of Electrical Engineering (Power) (Hons) Engineering & Bachelor of Engineering Technology
in Electrical & Electronic (Hons)

Integrated Design Project (Oral Presentation Score Sheet)

Name:

ID:

Project Title:

Supervisor:

Co-supervisor:

Category	Criteria for Judging <i>(Please circle the appropriate grade for each category)</i>	Excellent	Very Good	Good	Average +	Average	Average -	Poor	Very Poor	Failure	Mark Awarded
Introduction (10)	<ul style="list-style-type: none"> Background of study Problem statement – identification and significant Objective and scope of study The relevancy of project Feasibility of project within the scope and time frame 	A (10)	A- (8.5)	B+ (8)	B (7.5)	B- (6.3)	C+ (5.5)	C (5)	C- (4.5)	D (2)	
Literature Review and/or Theory (10)	<ul style="list-style-type: none"> No. of references Critical analysis of literature Citation and cross referencing Relevancy and recentness of the literature. 	A (10)	A- (8.5)	B+ (8)	B (7.5)	B- (6.3)	C+ (5.5)	C (5)	C- (4.5)	D (2)	
Methodology (10)	<ul style="list-style-type: none"> Research methodology / Project activities / Key milestone / Gantt Chart / Tools (e.g. equipment, hardware etc.) required 	A (10)	A- (8.5)	B+ (8)	B (7.5)	B- (6.3)	C+ (5.5)	C (5)	C- (4.5)	D (2)	
Result and discussion (20)	<ul style="list-style-type: none"> Findings Data gathering / analysis Experimentation / modelling / prototype / project deliverables 	A (20)	A- (17)	B+ (16)	B (15)	B- (13)	C+ (11)	C (10)	C- (9)	D (4)	
Conclusion and recommendations (10)	<ul style="list-style-type: none"> Relevancy to the objective Suggested future work for expansion and continuation 	A (10)	A- (8.5)	B+ (8)	B (7.5)	B- (6.3)	C+ (5.5)	C (5)	C- (4.5)	D (2)	
Clarity of presentation (10)	<ul style="list-style-type: none"> Fluency and choice of words (using language clearly and accurately), pronunciation and articulation 	A (10)	A- (8.5)	B+ (8)	B (7.5)	B- (6.3)	C+ (5.5)	C (5)	C- (4.5)	D (2)	
Non-verbal communication (10)	<ul style="list-style-type: none"> Appearance / Facial expression / confidence Gesture / Eye contact / pauses 	A (10)	A- (8.5)	B+ (8)	B (7.5)	B- (6.3)	C+ (5.5)	C (5)	C- (4.5)	D (2)	
Questions and answers (20)	<ul style="list-style-type: none"> Technical and factual accuracy / grasp of subject Creativity – use of example Convincing answer / showing creativity and innovativeness. 	A (20)	A- (17)	B+ (16)	B (15)	B- (13)	C+ (11)	C (10)	C- (9)	D (4)	
STUDENT AND SUPERVISOR MEETING (MINIMUM = 8)											TOTAL SCORE / 100
Comment:											
Supervisor / examiner's signature:				Name:							
				Date:							

Appendix 13: Integrated Design Project I Timeline

WEEK	ACTIVITY	ACTION BY
1 – 14	On-going interaction with supervisor (logbook updates weekly) and report writing progress (submit chapter by chapter for review by supervisor) – Minimum 8 times	Student / Supervisor
1 - 2	Students submit signed IDP REGISTRATION FORM (APPENDIX 18)	Student / Supervisor
12	Submission of IDP 1 Draft Report to supervisor	Student / Supervisor
13	Submission of IDP 1 Final Report (2 copies) to FYP Coordinator	Student / IDP Coordinator
14	Presentation of IDP 1 Final Report	Student / IDP Coordinator Supervisor / Examiner
15	Submission of assessment forms by supervisor and examiner to the IDP Coordinator	Supervisor / Examiner / IDP Coordinator
17	Submission of students results / status by IDP Coordinator to HOP	IDP Coordinator / HOP

Appendix 14: Integrated Design Project II Timeline

WEEK	ACTIVITY	ACTION BY
Semester break	Continuing research work / Thesis writing in progress	Student
1 – 14	On-going interaction with supervisor (logbook updates weekly) and report writing progress (submit chapter by chapter for review by supervisor) – Minimum 8 times	Student / Supervisor
12	Submission of Thesis Full Draft report to the supervisor for review	Student / Supervisor
13	Submission of Thesis Final Draft Report (2 copies) to IDP Coordinator	Student / IDP Coordinator
14	Thesis Final Presentation	Student / IDP Coordinator Supervisor / Examiner
15	Submission of the corrected Thesis Final Draft report to the supervisor / examiner for approval	Student / Supervisor / Examiner
16 – 17	<ul style="list-style-type: none"> • Submission of the hard bound (hard cover) THESIS (3 copies) • Submission of 3 CDs carrying draft of the final thesis report • Submission of Extended Summary Paper as per IDP MANUAL guidelines. • Submission of log book form, originality form and thesis endorsement and submission forms (Appendix 19, 20 & 21) to IDP Coordinator upon approval by the supervisor. ▪ Submission of assessment forms by supervisor and internal examiner to the IDP Coordinator. 	Student / Supervisor / Examiner / IDP Coordinator
18	<ul style="list-style-type: none"> • Submission of students results / status by IDP Coordinator to HOP 	IDP Coordinator / HOP