

Course title: Masters' Thesis (M.Sc. Economics)					
Course code: MPE 108		No. of credits: 20		L-T-P: 0-0-600	Learning hours: 300
Pre-requisite course code and title (if any): MPE 176 - Methods of Research in Economics					
Department: Department of Policy and Management Studies					
Course coordinator(s): Dr Sukanya Das				Course instructor(s): Dr Sukanya Das	
Contact details: Sukanya.das@terisas.ac.in					
Course type: Core				Course offered in: Semester 4	
Course description: Master's Thesis requires the student to conduct meaningful and grounded research in economics with a focus on ecological, environmental and resource economics, the specialization of the MSc Economics program. The first three semesters of M.Sc Economics program are designed in a way to provide skills and sound knowledge in basic economic theory and its practices. The foundations of the thesis are laid down in the core course titled —Methods of Research in Economics (MPE 176; third semester). It takes the students through the entire spectrum of research design that begins with theories, concepts, frameworks and models and ends with a Research Proposal for a Masters' Thesis (Assessment 3). Ordinarily, the student will write a Master's Thesis based on this Research Proposal, under the supervision of faculty/external experts, as decided by MPEC of MSc Economics programme (see, Additional Information).					
Course objectives: To provide the student hands-on training in research in Economics that results in a structured output within a time frame					
Course content					
Module	Topic	L	T	P	
1.	The research proposal including research plan submitted by the student as Assessment 3 of Methods of Research in Economics, and evaluated by faculty members shall determine the requirements of the thesis, subject to approval by the assigned supervisor and Masters Programme Executive Committee.	0	0	600	
Evaluation criteria: <ul style="list-style-type: none">Assessment 1 : Mid-term presentations (15%) to assess the mid-term progress on the thesis (evaluation sheet in Annexure 1) Format of Presentation:<ul style="list-style-type: none">(a) 15 minutes of presentation per student followed by 10 minutes of Q & A(b) Maximum 10 slides per presentation excluding title and references(c) Contents of the presentation must cover a recap of the proposed research question and methodology, progress regarding collection and analysis of data/theoretical modelling, as the case may be, and problem areas if anyAssessment 2: Final presentations (25%) to assess the oral presentation of the final thesis (evaluation sheet in Annexure 2) Format of Presentation:<ul style="list-style-type: none">(a) 20 minutes of presentation per student followed by 10 minutes of Q & A(b) Maximum 15 slides per presentation excluding title and references(c) Contents of the presentation must cover a brief recap of the proposed research question and methodology, detailed results, interpretation and analysis, policy implications and further directions, if any.Assessment 3: Final Thesis (60%) to assess the written presentation of the final thesis (evaluation sheet in Annexure 3) Students must submit two copies of the final thesis in electronic format only to the Office of the Head of the Department on or before the submission date announced by the Thesis Coordinator, incorporating the comments received in the course of their presentations. This should be accompanied by the scan of Thesis Submission form (Annexure 6). The Thesis must be submitted in the prescribed structure and format (Annexure 5).					
Learning outcomes: At the end of this course, the student should be able to demonstrate the ability <ul style="list-style-type: none">to conduct original and meaningful research in Economics (Tests 1-3)to deliver effective oral presentations of such research (Tests 1-2)to motivate, conceptualise, design and execute original research questions in the form of written output (Test 3)					

Pedagogical approach: As required by the research question pursued in the Thesis.

Course Reading Materials:

1. Background material on research methods: The student may refer to MPE176 course material for specific references on research methods. The following books are suggested as ready reference:
 - 1. John W Creswell and David J Creswell. 2018. *Research Design: Qualitative, quantitative and Mixed methods approaches*, New Delhi: Sage
 - Mark Kanazawa. 2018. *Research Methods for Environmental Studies*. London and New York: Earthscan
2. Other material: As mandated by the topic of research, subject to approval from the supervisor

Additional information:

1. Thesis must be written *individually*.
2. A student who has obtained a letter grade of —C or higher in the course titled —Methods of Research in Economics (MPE 176) must continue with the topic and research plan submitted (Assessment 3 in it). A proposal to modify the topic or research plan must be accompanied by appropriate justification and consent from the supervisor assigned. It has to be placed before the Masters Thesis Coordinator who shall seek approval from the MPEC. The modified topic must reflect the overall focus and specialization of the program, i.e. Environment and Resource Economics.
3. The MPEC of M.Sc Economics programme shall assign one of its members as (internal) supervisor. This will take place in the third semester after the presentation of the Research Concept Note (Assessment 1 in MPE 176) in consideration with the expertise of the faculty, the time that they can offer, and aiming at a balanced distribution of (Internal) supervisors. The MPEC may also assign a TERI SAS faculty member who is not a member of MPEC or even an individual from outside TERI SAS as an external supervisor. In such cases, an MPEC member will serve as the internal supervisor.

A student or a supervisor can request a change in the assignment of supervision to the Thesis Coordinator by making a request with justification. Consent of the student and both the supervisor(s) are necessary.

A student or a supervisor may request for having a co-supervisor. Consent of the student and both the supervisor(s) are necessary. All such requests must be sanctioned after approval of the MPEC. No such request can be considered after the mid-term presentations.
4. Students are expected to spend a minimum of 40 hours per week on thesis work throughout the semester. Students are also expected to meet the supervisor (internal as well as external) at least once a fortnight to report on the progress made. The Thesis Coordinator will solicit the monthly confidential progress report from (both) the supervisors in an electronic form (Annexure 4).
5. Plagiarism:¹ Students will be penalised for plagiarism offences, if any, in any of the submissions.
6. Without valid reason and prior approval of the Dean (Academic), a student cannot postpone/change date of his/ her presentation(s) or submission(s) from the schedule announced by the Thesis Coordinator. Even in case of any emergency, a valid proof and an approval from the Dean is required.
7. The timeline for the Master's Thesis presentations and submissions will be notified by the Thesis Coordinator. The deadline for presentations and submissions, unless approved a priori by the Thesis Coordinator in special circumstances, are strict: all submissions must electronically reach the office of the Thesis Coordinator with a time stamp within 2359 hours of the due date. No late submission will be accepted and zero marks will be assigned to the

¹ Plagiarism is defined as presenting someone else's work, including the work of other students, as one's own. Any ideas or materials taken from another source for either written or oral use must be fully acknowledged, unless the information is common knowledge. What is considered "common knowledge" may differ from programme to programme.

- a. A student must not adopt or reproduce ideas, opinions, theories, formulas, graphics, or pictures of another person without acknowledgment.
- b. A student must give credit to the originality of others and acknowledge an indebtedness whenever:
 1. Directly quoting another person's actual words, whether oral or written;
 2. Using another person's ideas, opinions, or theories;
 3. Paraphrasing the words, ideas, opinions, or theories of others, whether oral or written;
 4. Borrowing facts, statistics, or illustrative material; or
 5. Offering materials assembled or collected by others in the form of projects or collections without acknowledgment.

[also see, <https://portal.teriuniversity.ac.in/Rules/Plagiarism.pdf>]

corresponding submission component.

8. The Thesis Coordinator will set up the panel for evaluation of presentations. Weights will be as follows:

(a) For those with only Internal Supervisor—Supervisor(s)² and 1 faculty member (or an expert from outside if any; weightage 60:40 respectively).

9. For those with Internal and External Supervisor/co-supervisor³, both the Supervisors; weightage 60:40 respectively.

Evaluation of the Thesis will be as per the following process:

(a) only the Internal Supervisor (in case of absence of external supervisor or a co-supervisor), or,

(b) by both Internal and External Supervisor/Co-supervisor; weightage 60:40

Student responsibilities: Regular meetings with the supervisor
Prepared by: Nandan Nayn, Seema Sangha and Soumendu Sarkar

Course reviewers:

1. **Vikram Dayal, Professor, Institute of Economic Growth, New Delhi**
2. **Anirban Dasgupta, Associate Professor, South Asian University, New Delhi**

² In case the supervisor(s) is not available due to unavoidable circumstances, a faculty member with expertise in the topic of research will examine the presentation.

³ In case the supervisor(s) is not available due to unavoidable circumstances, a faculty member with expertise in the topic of research will examine the presentation.

Annexure 1: Master's Thesis Mid-term Presentation evaluation sheet
M.Sc. Economics Programme, Department of Policy and Management Studies, TERI SAS

Name of Examiner

Name of Student

Evaluation carried out as Internal supervisor ☐ External Supervisor /Examiner ☐

Please fill each field in a way that the outlined points are addressed providing an impression on the quality of the research proposal and justification for the allocated marks.

1. Introduction, Problem Statement and Research Question

Relevance, Clarity, Innovativeness

2. Literature review

Coverage, Ability to review the relevant literature, Inferences of gaps in the literature

3. Method

Choice of method, Appropriateness of method, Comprehensive background, description and limitations of the method; Discussion of conjectures/ variables/ data sources/ sampling strategy and questionnaire (if relevant)

4. Expected findings

Clarity on expected outcome

5. Integration and Coherence

Linkages between the introduction, problem statement, research question, method, results, conclusion etc.

6. Clarity of Presentation

Audible and comprehensible; Information is presented in logical sequence; Good language skills and pronunciation; Appropriate pace of presentation

7. Quality of visual presentation

Clarity; Organization and layout

8. Responses during Q&A session

Response to questions and comments

9. Additional comments/justification, if any*

Suggested weights in total marks:

20% each on (a) method of analysis, (b) integration & coherence and (c) clarity of presentation
10% each on (d) introduction, (e) literature review, (f) expected findings,
10% in total on (g) quality of visual presentation and (h) responses during Q & A session.

Marks* : _____ (out of 100)

Date

Signature

Grade-marks links								
Letter Grade**	A+	A	B+	B	C+	C	D	F
Range of Marks	>90	>80≤90	>70≤80	>60≤70	>50≤60	>45≤50	>40≤45	≤40

* For marks awarded above 90 or below 50 additional justification may be provided in a separate sheet. For example, marks above 90 may be awarded in works with a potential for publication in a decent journal; likewise marks below 50 may be awarded for a work grossly dissatisfactory on most counts.

** See Grading Guidelines.

Grading Guidelines from Student Handbook of TERI School of Advanced Studies ⁴

A+/A

- The thesis shows creativity and substantial effort. Significant and credible results have been obtained; or there is a logical explanation and analysis on what went wrong and suggestions for improvements.
- The thesis is clearly written, including the technical aspects. Data is presented in an easy-to-understand format. Diagrams are clearly labelled. Grammar, typing, and spelling errors are absent.
- The oral presentation is done in a professional and organized manner, describing the main highlights and contributions of the project.

B+/B

- The thesis shows good effort. Acceptable and credible results have been obtained; or there is an explanation of what went wrong.
- The thesis is reasonably well written. The technical descriptions are accurate and complete, although there may be some ambiguities. Data is presented in an easy-to-understand format (tables and/or graphs). Diagrams are included. Most of the grammar, typing, and spelling errors have been corrected.
- The oral presentation is done in a professional manner, describing the main highlights of the project.

C+/C

- The thesis shows reasonable effort, but produces limited results.
- The thesis report is submitted but parts of it are not easy to understand. The technical descriptions may be inaccurate or incomplete. Some data or diagrams may be missing. The report includes grammar, typing, or spelling errors.
- The oral presentation is done in a professional manner, but is difficult to follow or does not include significant details.

D

- The thesis shows a lack of effort and produces poor results.
- The thesis is submitted but is difficult to understand. The technical descriptions may be inaccurate or incomplete. Data or diagrams may be missing. The report includes numerous grammar, typing, or spelling errors.
- The oral presentation is done in an unprofessional manner

F

- The thesis shows a lack of effort and produces poor results.
- The thesis is not submitted in full.
- The oral presentation is not done or done in an unprofessional manner.

⁴ <https://www.terisas.ac.in/pdf/student-handbook.pdf>

Annexure 2: Master's Thesis Final Presentation Evaluation Sheet
M.Sc. Economics Programme, Department of Policy and Management Studies, TERI SAS

Name of Examiner

Name of Student

Evaluation carried out as Internal supervisor ☐ External Supervisor /Examiner ☐

Please fill each field in a way that the outlined points are addressed providing an impression on the quality of the research proposal and justification for the allocated marks.

1. Introduction, Problem Statement and Research Question

Relevance, Clarity, Innovativeness

2. Literature review

Coverage, Ability to review the relevant literature, Inferences of gaps in the literature

3. Method

Choice of method, Appropriateness of method, Comprehensive background, description and limitations of the method; Discussion of conjectures/variables/data sources/sampling strategy and questionnaire (if relevant)

4. Discussion of results

Interpretation and implications of results

5. Integration and Coherence

Linkages between the introduction, problem statement, research question, method, results, conclusion etc.

6. Clarity of Presentation

Audible and comprehensible; Information is presented in logical sequence; Good language skills and pronunciation; Appropriate pace of presentation

7. Quality of visual presentation

Clarity; Organization and layout

8. Responses during Q&A session

Response to questions and comments

9. Additional comments/justification, if any*

Suggested weights in total marks:

20% each on (a) method of analysis, (b) integration & coherence and (c) discussion of results

10% each on (d) introduction, (e) literature review, (f) clarity of presentation

10% in total on (g) quality of visual presentation and (h) responses during Q & A session

Marks* : _____ (out of 100)

Date

Signature

Grade-marks links								
Letter Grade**	A+	A	B+	B	C+	C	D	F
Range of Marks	>90	>80≤90	>70≤80	>60≤70	>50≤60	>45≤50	>40≤45	≤40

* For marks awarded above 90 or below 50, additional justification may be provided in a separate sheet. For example marks above 90 may be awarded in works with a potential for publication in a decent journal; likewise marks below 50 may be awarded for a work grossly dissatisfactory on most counts.

** See Grading Guidelines.

Grading Guidelines from Student Handbook of TERI School of Advanced Studies ⁵

A+/A

- The thesis shows creativity and substantial effort. Significant and credible results have been obtained; or there is a logical explanation and analysis on what went wrong and suggestions for improvements.
- The thesis is clearly written, including the technical aspects. Data is presented in an easy-to-understand format. Diagrams are clearly labelled. Grammar, typing, and spelling errors are absent.
- The oral presentation is done in a professional and organized manner, describing the main highlights and contributions of the project.

B+/B

- The thesis shows good effort. Acceptable and credible results have been obtained; or there is an explanation of what went wrong.
- The thesis is reasonably well written. The technical descriptions are accurate and complete, although there may be some ambiguities. Data is presented in an easy-to-understand format (tables and/or graphs). Diagrams are included. Most of the grammar, typing, and spelling errors have been corrected.
- The oral presentation is done in a professional manner, describing the main highlights of the project.

C+/C

- The thesis shows reasonable effort, but produces limited results.
- The thesis report is submitted but parts of it are not easy to understand. The technical descriptions may be inaccurate or incomplete. Some data or diagrams may be missing. The report includes grammar, typing, or spelling errors.
- The oral presentation is done in a professional manner, but is difficult to follow or does not include significant details.

D

- The thesis shows a lack of effort and produces poor results.
- The thesis is submitted but is difficult to understand. The technical descriptions may be inaccurate or incomplete. Data or diagrams may be missing. The report includes numerous grammar, typing, or spelling errors.
- The oral presentation is done in an unprofessional manner

F

- The thesis shows a lack of effort and produces poor results.
- The thesis is not submitted in full.
- The oral presentation is not done or done in an unprofessional manner.

⁵ <https://www.terisas.ac.in/pdf/student-handbook.pdf> Page 7 of 14

Annexure 3: Master's Thesis Final Thesis Evaluation Sheet
M.Sc. Economics Programme, Department of Policy and Management Studies, TERISAS

Name of Examiner

Name of Student

Evaluation carried out as Internal supervisor ☐ External Supervisor ☐

Please provide comments below on various attributes of the research ranging from appreciation, constructive criticism and suggestions for improvement.

1. Abstract

Comprehensiveness, Appropriate length

2. Introduction, problem statement and research question

Background information, Relevance of problem statement; Innovativeness of the research question

3. Literature review

Coverage; Ability to review the relevant literature; Inferences of gaps in the literature

4. Method

Choice of method; Appropriateness of method; Comprehensive background, description and limitations of the method

5. Results of the study and interpretation

Interpretation of results; Discussion and implications of results; Conclusion

6. Integration and coherence

Linkages between the introduction, research question, method, findings and conclusion; Overall clarity

7. List of references

Adequate use of references through-out the text; Link between list of references to text; Citation style, both in-text and in reference

8. Regularity in supervisor interaction and attending presentations

Regular interaction with supervisor (at least fortnightly updates by students in expected)

9. Additional comments/justification, if any*

Suggested weights in total marks:

30% on (a) results and its interpretation

10% each on (b) abstract, (c) introduction, (d) literature review, (e) method, (f) integration & coherence, (g) list of references and (h) regularity of the student in consulting you.

Marks* : _____ (out of 100)

Date

Signature

Grade-marks links								
Letter Grade**	A+	A	B+	B	C+	C	D	F
Range of Marks	>90	>80≤90	>70≤80	>60≤70	>50≤60	>45≤50	>40≤45	≤40

* For marks awarded above 90 or below 50, additional justification may be provided in a separate sheet. For example marks above 90 may be awarded in works with a potential for publication in a decent journal; likewise marks below 50 may be awarded for a work grossly dissatisfactory on most counts.

** See Grading Guidelines.

Grading Guidelines from Student Handbook of TERI School of Advanced Studies ⁶

A+/A

- The thesis shows creativity and substantial effort. Significant and credible results have been obtained; or there is a logical explanation and analysis on what went wrong and suggestions for improvements.
- The thesis is clearly written, including the technical aspects. Data is presented in an easy-to-understand format. Diagrams are clearly labelled. Grammar, typing, and spelling errors are absent.
- The oral presentation is done in a professional and organized manner, describing the main highlights and contributions of the project.

B+/B

- The thesis shows good effort. Acceptable and credible results have been obtained; or there is an explanation of what went wrong.
- The thesis is reasonably well written. The technical descriptions are accurate and complete, although there may be some ambiguities. Data is presented in an easy-to-understand format (tables and/or graphs). Diagrams are included. Most of the grammar, typing, and spelling errors have been corrected.
- The oral presentation is done in a professional manner, describing the main highlights of the project.

C+/C

- The thesis shows reasonable effort, but produces limited results.
- The thesis report is submitted but parts of it are not easy to understand. The technical descriptions may be inaccurate or incomplete. Some data or diagrams may be missing. The report includes grammar, typing, or spelling errors.
- The oral presentation is done in a professional manner, but is difficult to follow or does not include significant details.

D

- The thesis shows a lack of effort and produces poor results.
- The thesis is submitted but is difficult to understand. The technical descriptions may be inaccurate or incomplete. Data or diagrams may be missing. The report includes numerous grammar, typing, or spelling errors.
- The oral presentation is done in an unprofessional manner

F

- The thesis shows a lack of effort and produces poor results.
- The thesis is not submitted in full.
- The oral presentation is not done or done in an unprofessional manner.

⁶ <https://www.terisas.ac.in/pdf/student-handbook.pdf>

Annexure 4: Format for Submission of Confidential Progress Report (Master's Thesis)
M.Sc Economics Programme, Department of Policy and Management Studies, TERI School of
Advanced Studies

CONFIDENTIAL PROGRESS REPORT

For / / to / /

Name of the Student:

Title of the Research Topic:

1	Status of the work	
2	List out the work related activities accomplished so far	
3	Future Work Plan and Time Line	
4	Comments from Supervisor (s)	

Date:

[Signature of Student]

[Signature of Internal/External Supervisor]

Annexure 5: Structure of the Master's Thesis

M.Sc. Economics Program, Department of Policy and Management Studies, TERI School of

Advanced Studies The Contents of the Thesis should be in this order (may refer to the Thesis submitted earlier):

1	Title Page	
2	Declaration by the Student	
3	Certificate by the Supervisor and the Head of the Department	
4	Acknowledgment Page	
5	Table of Contents	
6	Abstract	Page numbering in Roman, i.e., i, ii
7	List of Tables (if any)	
8	List of Figures (if any)	
9	List of Symbols/Abbreviations (if any)	
10	Introduction	
11	Literature Review	
12	Method (including data if it is an empirical study)	
13	Analysis	
14	Conclusion	
15	References	
16	Annexures (if any) [Page numbering in Roman with A as a prefix, i.e. Ai, Aii...]	

Brief Details

Abstract: This is a summary of the completed work, from Introduction to Conclusion, within 250 words. Broadly, it defined the area of study, states the objectives of the thesis, describes the study area and the methodology used, major findings, and their significance. Write this section after the rest of the work is complete.

Introduction: This describes the topic and the problem within 3-4 pages. Introduction must be brief and informative. It must describe the problem, its relevance and scope. The hypothesis must be clearly stated and a summary of research may be presented that places the problem in the context. The objectives and expected outcomes from the study must also be stated. All references need to be included in the references section.

Literature Review: The literature review must be a critical evaluation of existing work and explain the relevance of previous efforts and the gaps in research. The review should be more than just a collection of summaries of research papers. The reference sources will be textbooks, journals, and publications. Limit yourself to authentic sources. All references are to be reported in the references section.

Data and Methodology: A brief description of the data along with the summary statistics must be given. The student may choose a secondary source, or do a study by the questionnaire method. If the interview method is chosen, the sample details such as profile and size, and reasons behind such a choice may be described. It describes the methods and techniques of survey, analysis, etc. The method should be carefully formulated, identifying problems that may arise and possible solutions.

Results and Analysis: Explain and discuss the main results of the study, relating to the objective and hypotheses stated at the beginning. The results may be supplemented with brief tables and graphs. All the tables and figures should be self-contained, numbered and referred in the text. Avoid description of the tables and figures in the text; rather include the interpretation.

Conclusion: This section should be an assessment describing the gaps, limitations and scope for further research, based on the analysis that have been done to answer specific questions. Also sum up the main conclusions.

Acknowledgments: Acknowledge all the individuals and the agencies who have helped you in your work.

Annexure: This includes field data, questionnaire format, graphs, boxes and tables that could not be accommodated in the results section. All annexure should be referred in the main text.

General Formatting Instructions for the Master's Thesis

1. Please refer to thesis submitted in previous years for the color scheme of the cover and the binding requirements. Copies are available with the library.
2. The suggested format is as follows.
 - a. A page size of A4 (210 by 297 mm)
 - b. Left and right margins: 0.98" top and bottom: 1", justified,
 - c. One-and-a-half spacing
 - d. Times New Roman 12 point as the base font
 - e. Page numbers at the bottom of the page and at the centre
 - f. Printed on both sides; so, Gutter 0.5"
 - i. Figures should be put on a separate page with no text in the back of that page; this page should be placed immediately after the text page where this figure was mentioned for the first time. Figures will not have page number.
3. References should be in alphabetical order with no numbering or bullet points.
4. Tables should not have vertical grids. Horizontal grids should be highlighted at the top 2 lines, and bottom line only.
5. Chapter heading should follow the following format:
 - (a) All the main heading should be in UPPER CASE, BOLD and in the centre.
 - (b) All sub-headings should be in the Title case, left justified and *bold-italics*. They should be numbered.
6. Allow a spacing of 3 lines (double the usual line spacing) before you begin a paragraph or section.
7. Paragraphs and Sections within the subheading should not be numbered.

Format of the Title Page

<p style="text-align: center;"><i>Title of the Master's Thesis</i></p> <p style="text-align: center;"><i>Master's Thesis</i></p> <p style="text-align: center;"><i>Submitted by:</i> <Name of student></p> <p style="text-align: center;">In partial fulfillment for the <i>Degree of M.Sc. (Economics)</i></p> <p style="text-align: center;"><i>Submitted to:</i> Department of Policy and Management Studies TERI School of Advanced Studies Plot 10, Institutional Area, Vasant Kunj New Delhi-110070 India</p> <p style="text-align: center;"><i>Month Year</i></p>

Annexure 6: Templates for Thesis Submission Form
M.Sc Economics Programme, Department of Policy and Management Studies, TERI School of
Advanced Studies

Declaration to be made by the Student

This is to certify that the research that forms the basis of this thesis titled _____ is an original work carried out by me and has not been submitted anywhere else for the award of any degree.

I certify that, to the best of my knowledge, all sources of information and data have been fully acknowledged in the report.

Name of the Student
M.Sc. Economics
TERI School of Advanced Studies

Certificate for Supervisor(s) and the Head

This is to certify that ----- has carried out a Master's Thesis, in partial fulfillment of requirements for the degree of M.Sc. Economics on the topic _____ during month year (say, July 2018) _____ month year (say, April 2019).

The report embodies the original work of the candidate, to the best of our knowledge.

Signature of Internal Supervisor
Name and Designation

Date

Signature of External Supervisor/ Co-supervisor
Name and Designation
Organisation Address

Date

Signature of Thesis Coordinator
Name and Designation

Date

Signature of Head of Department
Name

Date