#### **ASSIGNMENT BOOKLET**

## Master of Science (Environmental Science) (MSCENV)

# Assignments January 2025 to July 2026 Sessions (Valid from Jan 2025 to December 2026) Third Semester

Tutor Marked Assignments (TMA) MEV 017, MEV 018, MEV 019



School of Inter-disciplinary and Trans-disciplinary Studies Indira Gandhi National Open University Maidan Garhi, New Delhi-110068 Dear Learner,

Welcome to the Programme M.Sc. (Environmental Science)!

You are required to submit one assignment for each Course of the M.Sc. (Environmental Science). Each assignment is a Tutor Marked Assignment (TMA) and carries 100 marks. Each assignment covers the entire course. Answer any five questions in each assignment. All questions carry equal marks. This TMA is concerned mainly with assessing your application and understanding of the course material. Please ensure that you read all the units of the course. It is important that you should write the answers to all the questions in your own words. You should remember that writing answers to assignment questions will improve your writing skills and prepare you for the term-end examination.

This booklet includes assignments for the following courses:

# MEV 017 ENVIRONMENTAL LEGISLATIONS MEV 018 ENVIRONMENTAL HEALTH AND ECOTOXICOLOGY MEV 019 RESEARCH METHODOLOGY FOR ENVIRONMENTAL SCIENCE

It is compulsory to submit the assignments within the stipulated time to be eligible for appearing the term-end examination. The assignments constitute the continuous component of the evaluation process and have 30% weightage in the final grading. Before you write the assignments, first go through the course material and then prepare the assignments carefully by following the instructions pertaining to assignments. Your responses should not be a verbatim reproduction of the textual materials provided for self-learning purposes but it should be in your own words.

If you have any doubt or problem pertaining to the course material and assignments, contact the Programme Coordinator or concerned programme in-charge or Academic Counsellor at your Study Centre for clarification. Once you are able to do the assignment satisfactorily, you will be ready to take the Term-end exam with confidence.

If you still have problems, do feel free to contact us at School of Interdisciplinary and Transdisciplinary Studies.

Wishing you all the best to complete the programme successfully.

#### **Programme Coordinators**

Prof. Shachi Shah, <a href="mailto:sshah@ignou.ac.in">sshah@ignou.ac.in</a>

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#### **INSTRUCTIONS**

Before attempting the assignment, please read the following instructions carefully:

- 1. Read the detailed instructions about the assignment given in the Programme Guide.
- 2. Write your Enrolment Number, Name, Full Address and Date on the top right corner of the first page of your response sheet(s).
- 3. Write the Course Title, Assignment Number and the Name of the Study Centre you are attached to, in the centre of the first page of your response sheet(s).
- 4. Read the instructions related to assignments given in the programme guide.
- 5. Please note that unless you submit the assignments contained in this booklet within the stipulated time, you would not be permitted to appear for the term-end examination.
- 6. The top of the first page of your response sheet should be like the following:

NAME:
ENROLLMENT NO.:
CYCLE OF ADMISSION:
PROGRAMME CODE:
ASSIGNMENT CODE:
COURSE CODE:
COURSE TITLE:
ADDRESS:
CONTACT NUMBER:
DATE OF SUBMISSION:

#### **GUIDELINES FOR TMAS**

You will find it useful to keep the following points in mind:

- **Planning:** Read the questions carefully. Go through the points on which they are based. Make some points regarding each question and then rearrange these in a logical order. And please write the answers in your own words. Do not reproduce passages from the units.
- Organisation: Be a little more selective and analytic before drawing up a rough outline of your answer. In an essay-type question, give adequate attention to your introduction and conclusion. The introduction must offer your brief interpretation of the question and how you propose to develop it. The conclusion must summarize your response to the question. In the course of your answer, you may like to make references to other texts or books as this will add some depth to your analysis.

#### Note the following points before you start writing the assignments:

- 1. Use only A4 paper size for your assignment and tag all the pages carefully.
- 2. Write the relevant question number with each answer.
- 3. You should write the answer in your own handwriting.

#### Make sure that your answer:

- (a) is logical and coherent;
- (b) has clear connections between sentences and paragraphs;
- (c) is written correctly giving adequate consideration to your expression, style and presentation;
- (d) Does not exceed the number of words indicated in the question.

**Submission:** The completed assignment should be sent to the Coordinator of the **S**tudy Centre allotted to you. Please read the instructions given in your Programme Guide. These assignment questions are valid for **January 2025 to July 2026 session** 

Keep a copy of the assignment answer sheets with you before submission for future reference.

- Answer each assignment on separate sheet.
- It is preferred to write all assignments neatly in your own handwriting. Write your name, course code, enrolment no. and cycle of admission on all the assignments in bold letters.

• Express your response in your own words. You are advised to restrict your response based on the marks assigned to it. This will also help you to distribute your time in writing or completing your assignments on time.

Remember that you must submit your assignments before you can appear for the Term End Exams. Please remember to keep a copy of your completed assignment, just in case the one you submitted is lost in transit.

Good luck with your work!

#### **MEV 017: ENVIRONMENTAL LEGISLATIONS**

#### TUTOR MARKED ASSIGNMENT

**Course Code: MEV-017** 

**Course Title: Environmental Legislations** 

Assignment Code: MEV-017/TMA-01/January 2025 to July 2026 session

**Coverage: All Blocks** 

Maximum Marks 100

5x20=100

**Note:** This assignment is based on the entire course.

Answer any five questions. All question carries equal marks.

Please write all answers in your own words.

1. Discuss the fundamental duties provisions pertaining to environment in the Indian Constitution.

Discuss the features of National conservation strategy for the conservation of the natural resources.

- 2. Explain the salient features of Environmental Protection Act, 1986. Explain the features of National Green Tribunal Act, 2010.
- 3. Write Short notes on the following:
  - a. Pitambar Committee
  - b. Tiwari Committee
  - c. Central Pollution Control Board
  - d. State Pollution Control Board
- 4. Explain the key mechanisms of Kyoto protocol. Explain the features of Paris Agreement on Climate Change.
- 5. Write short notes on the following
  - a. EIA
  - b. Public Liability Insurance Act 1991
  - c. Noise Pollution Control Laws
  - d. Forest Conservation Act, 1980
- 6. Write short notes on the following:
  - a. Johannesburg declaration on sustainable development
  - b. The Antarctic Treaty, 1959
  - c. Montreal Protocol
  - d. Cartagena protocol on biosafety

- 7. a. Explain the salient features of Biomedical wastes (Management and handling) Rules 1998, and Municipal solid waste (Management and handling) Rules 2000.
- 8. Explain the features of Scheduled Tribes and other traditional forest dwellers (Recognition of forest rights) Act 2006. Explain the importance of Biological Diversity Act, 2002.

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### MEV 018: ENVIRONMENTAL HEALTH AND ECOTOXICOLOGY

#### TUTOR MARKED ASSIGNMENT

Course Code: MEV-018

Course Title: Environmental Health and Ecotoxicology

Assignment Code: MEV-018/TMA-01/January 2025 to July 2026 session

**Coverage: All Blocks** 

Maximum Marks 100

5x20=100

**Note:** This assignment is based on the entire course.

Answer any five questions. All question carries equal marks.

Please write all answers in your own words.

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1. Explain the interactions between environment and human health. Explain the importance of a healthy environment and lifestyle.

- 2. Explain the concept of ecotoxicology. Write briefly the differences between biodegradable and non-biodegradable substances. Describe the influence of environmental factors on toxicity.
- 3. Explain the factors affecting concentration of toxicants in environment. Explain the biochemical aspect of toxicants.
- 4. Explain the pathways, dispersion and transportation of the toxic substances. Explain the concept of bio-accumulation and bio-magnification.
- 5. Describe the concept of well-being. Explain the dimensions and determinants of health.
- 6. Explain the importance of public health surveillance and environmental health. Discuss the Government initiatives to promote environmental sanitation.
- 7. Explain various food borne diseases, their classification, pathogenesis, prevention and control.
- 8. Write short notes on the following:
  - a. Environmental monitoring
  - b. Absorption of Toxicants
  - c. Dose Response Relationship
  - d. Mechanism of Carcinogenicity and teratogens

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#### MEV 019: RESEARCH METHODOLOGY FOR ENVIRONMENTAL SCIENCE

#### TUTOR MARKED ASSIGNMENT

Course Code: MEV-019

Course Title: Research Methodology for Environmental Science

Assignment Code: MEV-019/TMA-01/January 2025 to July 2026 session

**Coverage: All Blocks** 

Maximum Marks 100

5x20=100

**Note:** This assignment is based on the entire course.

Answer any five questions. All question carries equal marks.

Please write all answers in your own words.

1. Explain the types and approaches of research. Explain the importance of formulating research questions, objectives and hypothesis.

- 2. Explain the different types of sampling designs. Explain the different methods of data collection.
- 3. Write short notes on the following:
  - a. Frequency distribution
  - b. Data tabulation
  - c. Diagrammatic representation
  - d. Measures of central tendency
- 4. Explain the different types of remote sensing. Explain the advantages and disadvantages of remote sensing.
- 5. Write short notes on the following:
  - a. Measures of dispersion
  - b. GIS
  - c. Copyright
  - d, Research ethics
- 6. Discuss the applications of geospatial technologies in natural resource management.
- 7. Write short notes on the following: (20 marks)
  - a. Spearman's Rank correlation coefficient
  - b. Students t distribution
  - c. Plagiarism

- d. Type-I and Type-II error
- 8. Explain the concept of regression. Explain the properties of regression coefficients. measures of Central Tendency. (20 marks)

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