

MOUNT ST. MARY'S SCHOOL
SYLLABUS
CLASS-X
SESSION -2022-23

PRE TERM 1

1. **Coordinate Geometry**
2. **Probability**

HALF YEARLY

1. **Coordinate Geometry**
2. **Probability**
3. **Polynomials**
4. **Real Numbers**
5. **Pair of Linear Equations in two variables**
6. **Triangles**
7. **Introduction to Trigonometry**
8. **Areas related to Circles**

PRE TERM 2

1. **Some Applications of Trigonometry**
2. **Quadratic Equations**

FINAL TERM

1. **Coordinate Geometry**
2. **Probability**
3. **Polynomials**
4. **Real Numbers**
5. **Linear Equations in two variables**
6. **Triangles**
7. **Introduction to Trigonometry**
8. **Statistics**
9. **Quadratic Equations**
10. **Arithmetic Progressions**
11. **Circles**
12. **Some Applications of Trigonometry**
13. **Surface Area & Volume**
14. **Areas related to Circles**

NOTE: Activities and Assignments based on AIL (art integration learning) will be carried out every month.

MOUNT ST MARY'S SCHOOL, DELHI CANTT
CLASS X – ENGLISH TERM WISE SYLLABUS 2022 – 23

PRETERM I

- A. Reading Skills – Discursive passage (400-450 words)
- B. Writing Skills – Letter based on given situation.
- C. Grammar – Gap fillings, Editing and omissions based on:

Tenses

Modals

Determiners

Subject Verb Concord

Reported Speech

D. Literature -

FIRST FLIGHT:

1. A Letter to God

2. Dust of Snow

FOOTPRINTS WITHOUT FEET

1. A Triumph of Surgery

HALF YEARLY

A. Reading Skills – Discursive passage (400-450 words), Case based passage (300-350 words)

B. Writing Skills – Formal Letter based on given situation. (120 – 150 words)

- Analytical Paragraph.

C. Grammar - Tenses

Modals

Determiners

Active Passive Voice

Subject Verb Concord

Reported Speech

Commands and Requests Statements

Questions

D. Literature

FIRST FLIGHT:

Prose

1. A Letter to God

2. Nelson Mandela – Long Walk to Freedom

3. Two Stories About Flying

4. From the Diary of Anne Frank

5. Glimpses of India

Poems

1. Dust of Snow

2. Fire and Ice

3. A Tiger in the Zoo

4. How to Tell Wild Animals

5. The Ball Poem

FOOTPRINTS WITHOUT FEET

1. A Triumph of Surgery

2. The Thief's Story

3. The Midnight Visitor

4. A Question of Trust

5. Footprints Without Feet

Words and Expressions – II (Workbook for Class X) – Units 1 to 4

Preboard

A. Reading Skills – Discursive passage (400-450 words), Case based passage (300-350 words)

B. Writing Skills – Letter and Analytical Paragraph.

C. Grammar - Tenses

Modals

Determiners

Subject Verb Concord

Reported Speech

Commands and Requests Statements

Questions

D. Literature

FIRST FLIGHT

Prose

1. A Letter to God

2. Nelson Mandela – Long Walk to Freedom

3. Two Stories About Flying

4. From the Diary of Anne Frank

5. Glimpses of India

6. Mijbil the Otter

7. Madam Rides the Bus

8. The Sermon at Benares

9. The Proposal (Play)

Poem

1. Dust of Snow

2. Fire and Ice

3. A Tiger in the Zoo

4. How to Tell Wild Animals

5. The Ball Poem

6. Amanda!

7. The Trees

8. Fog

9. The Tale of Custard the Dragon

10. For Anne Gregory

FOOTPRINTS WITHOUT FEET

1. A Triumph of Surgery

2. The Thief's Story

3. The Midnight Visitor

4. A Question of Trust

5. Footprints Without Feet
6. The Making of a Scientist
7. The Necklace
8. Bholi
9. The Book that Saved the Earth

Words and Expressions – II (Workbook for Class X) – Units 1 to 4 & 7 to 11.

Internal Assessment for both the Terms (Based on the CBSE directions)

A. Subject Enrichment Activities – Assessment of Speaking and Listening Skills as class work and homework assignment.

B. Art Integrated Projects based on activities like Role Play, Skit, Dramatization etc.

C. Portfolio and Notebooks

D. Assignments and worksheets as multiple assessments – Idioms, class tests and case based comprehension.

हिंदी पाठ्यक्रम

कक्षा दसवीं 2022 – 2023

प्री टर्म – 1

स्पर्श – गद्य – बड़े भाई साहब , ततौरा – वामीरो

पद्य – कबीर की साखी , मीरा के पद

व्याकरण – वाक्य रचना , मुहावरे , सूचना , पत्र –प्रारूप , समास – द्वंद्व , द्विगु , बहुव्रीहि, कर्मधारय

अर्धवार्षिक परीक्षा

स्पर्श – गद्य – डायरी का एक पन्ना , अब कहाँ दूसरे के दुख से दुखी होने वाले

बड़े भाई साहब , ततौरा – वामीरो

पद्य – तोप , कबीर की साखी , मीरा के पद

संचयन – हरिहर काका

व्याकरण – वाक्य रचना , मुहावरे , विज्ञापन , सूचना , पत्र –औपचारिक, समास पदबंध , अनुच्छेद, अपठित गद्यांश , अपठित पद्यांश , लघुकथा , ई- मेल लेखन

प्री टर्म – 2

स्पर्श – गद्य – पतझर में टूटी पत्तियाँ , तीसरी कसम के शिल्पकार शैलेंद्र

पद्य – पर्वत प्रदेश में पावस , कर चले हम फिदा

संचयन – सपनों के – से दिन

व्याकरण – वाक्य रचना , मुहावरे , विज्ञापन , पत्र , लघुकथा

प्री – बोर्ड – 1

स्पर्श – गद्य – कारतूस

पद्य – मनुष्यता , आत्मत्राण

संपूर्ण पाठ्यक्रम

प्री – बोर्ड – 2

संपूर्ण पाठ्यक्रम

MOUNT ST. MARY'S SCHOOL

CLASS –X

SUBJECT- SOCIAL SCIENCE SYLLABUS (2022-23)

(CODE-087)

HISTORY

Section 1: Events and Processes

1. The Rise of Nationalism in Europe
2. Nationalism in India (Includes Map Work)

Section 2: Livelihoods, Economies and Societies

3. The Making of a Global World
4. The Age of Industrialization

Section-3: Everyday Life, Culture and Politics.

5. Print Culture and the Modern World

GEOGRAPHY

1. Resources and Development
2. Forest and Wildlife Resources
3. Water Resources (For Internal Assessment Only).
4. Agriculture
5. Minerals and Energy Resources
6. Manufacturing Industries
7. Lifelines of National Economy

NOTE: Map skills for all the above-mentioned chapters will be done.

POLITICAL SCIENCE

1. Power Sharing
2. Federalism
3. Gender, Religion and Caste
4. Political Parties
5. Outcomes of Democracy

ECONOMICS

1. Development
2. Sectors of the Indian Economy
3. Money and Credit
4. Globalisation and the Indian Economy
5. Consumer Rights (**To Be Done For The Project Work Only**)

(PROJECT WORK) Every student has to compulsorily undertake **any one project** on the following topics:

- Consumer Awareness Or
- Social Issues Or
- Sustainable Development

EXAMINATION SYLLABUS

Term -I (Pre-Term 1)

Ch -1: The Rise of Nationalism in Europe (His)

Ch -1: Resources and Development (Geo)

Ch- 1: Development (Eco)

Half Yearly Examination

HISTORY

Ch-1: The Rise of Nationalism in Europe

Ch-2: Nationalism in India

GEOGRAPHY

Ch- 2: Forest and Wildlife

Ch- 3: Water Resources

Ch-4: Agriculture

POLITICAL SCIENCE

Ch-1 Power Sharing

Ch-2 Federalism

Ch 4: Gender, Religion and Caste

ECONOMICS

Ch-2 Sectors of the Indian Economy

Ch 3- Money and Credit

Pre-Board- I

Ch 3: The Making of a Global World (His)

Ch 4: The Age of Industrialization (His)

Ch 5: Print Culture and the Modern World (His)

Ch 6: Political Parties (Pol Sc)

Ch 7: Outcomes of Democracy (Pol Sc)

Ch 5: Minerals and Energy Resources (Geo)

Ch-6 Manufacturing Industries (Geo)

Ch 7: Lifelines of National Economy (Geo)

Ch 4: Globalisation and the Indian Economy (Eco)

**INCLUDING ALL THE PREVIOUS CHAPTERS OF HISTORY, POLITICAL SCIENCE,
GEOGRAPHY AND ECONOMICS (FULL SYLLABUS)**

Pre-Board- II

Full Syllabus of Social Science

**SCIENCE
(Code No. 086)
Class X (2022-23)**

The subject of Science plays an important role in developing well-defined abilities in cognitive, affective and psychomotor domains in children. It augments the spirit of enquiry, creativity, objectivity and aesthetic sensibility.

General Instructions:

1. There will be an **Annual Examination** based on the **entire syllabus**.
2. The Annual Examination will be of 80 marks and 20 marks weightage shall be for Internal Assessment.
3. For Internal Assessment: There will be Periodic Assessment that would include:
 - a. For 5 marks- Three periodic tests conducted by the school. Average of the best two tests to be taken that will have a weightage of 05 marks towards the final result.
 - b. For 5 marks- Diverse methods of assessment as per the need of the class dynamics and curriculum transaction. These may include - short tests, oral test, quiz, concept maps, projects, posters, presentations and enquiry based scientific investigations etc. and use rubrics for arguing them objectively. This will also have a weightage of 05 marks towards the final result.
 - c. Practical / Laboratory work should be done throughout the year and the student should maintain record of the same. Practical Assessment should be continuous. There will be weightage of 5 marks towards the final result. All practicals listed in the syllabus must be completed.
 - d. Portfolio to be prepared by the student- This would include classwork and other sample of student work and will carry a weightage of 5 marks towards the final results.

**CHEMISTRY
CLASS X**

Theme: Materials

Unit I:

A. Chemical Substances - Nature and Behaviour

Chemical reactions: Chemical equation, Balanced chemical equation, implications of a balanced chemical equation, types of chemical reactions: combination, decomposition, displacement, double displacement, precipitation, endothermic exothermic reactions, oxidation and reduction.

B. Acids, bases and salts: Their definitions in terms of furnishing of H^+ and OH^- ions, General

properties, examples and uses, neutralization, concept of pH scale (Definition relating to logarithm not required), importance of pH in everyday life; preparation and uses of Sodium Hydroxide, Bleaching powder, Baking soda, Washing soda and Plaster of Paris.

C. Metals and nonmetals: Properties of metals and non-metals; Reactivity series; Formation and

properties of ionic compounds; Basic metallurgical processes; Corrosion and its prevention.

D. Carbon compounds: Covalent bonding in carbon compounds. Versatile nature of carbon.

Homologous series. Nomenclature of carbon compounds containing functional groups (halogens, alcohol, ketones, aldehydes, alkanes and alkynes), difference between saturated hydro carbons and unsaturated hydrocarbons. Chemical properties of carbon compounds (combustion, oxidation, addition and substitution reaction). Ethanol and Ethanoic acid (only properties and uses), soaps and detergents

PRACTICALS

Practical should be conducted alongside the concepts taught in theory classes

LIST OF EXPERIMENTS

1. A. Finding the pH of the following samples by using pH paper/universal indicator:

- (i) Dilute Hydrochloric Acid
- (ii) Dilute NaOH solution
- (iii) Dilute Ethanoic Acid solution
- (iv) Lemon juice
- (v) Water
- (vi) Dilute Hydrogen Carbonate solution

B. Studying the properties of acids and bases (HCl & NaOH) on the basis of their reaction with:

- a) Litmus solution (Blue/Red)
- b) Zinc metal
- c) Solid sodium carbonate

2. Performing and observing the following reactions and classifying them into:

A. Combination reaction

- B. Decomposition reaction
 C. Displacement reaction
 D. Double displacement reaction
 (i) Action of water on quicklime
 (ii) Action of heat on ferrous sulphate crystals
 (iii) Iron nails kept in copper sulphate solution
 (iv) Reaction between sodium sulphate and barium chloride solutions
3. Observing the action of Zn, Fe, Cu and Al metals on the following salt solutions:
 i) ZnSO₄(aq)
 ii) FeSO₄(aq)
 iii) CuSO₄(aq)
 iv) Al₂(SO₄)₃(aq)
- Arranging Zn, Fe, Cu and Al (metals) in the decreasing order of reactivity based on the above result

MOUNT. ST. MARY'S SCHOOL.
CLASS X - CHEMISTRY
SYLLUBUS DISTRIBUTION FOR EXAMINATIONS (2022-23)

| S.NO | EXAMINATION | CHAPTERS/TOPICS INCLUDED |
|------|-----------------------|---|
| 1 | PRE TERM-1 | Chemical reactions and equations: Chemical equation, Balanced chemical equation, implications of a balanced chemical equation, types of chemical reactions: combination, decomposition, displacement, double displacement, precipitation, endothermic exothermic reactions, oxidation and reduction. |
| 2 | TERM I -EXAMINATION | Chemical reactions: Chemical equation, Balanced chemical equation, implications of a balanced chemical equation, types of chemical reactions: combination, decomposition, displacement, double displacement, precipitation, endothermic exothermic reactions, oxidation and reduction. Acids, bases and salts: Their definitions in terms of furnishing of H ⁺ and OH ⁻ ions, General properties, examples and uses, neutralization, concept of pH scale (Definition relating to logarithm not required), importance of pH in everyday life; preparation and uses of Sodium Hydroxide, Bleaching powder, Baking soda, Washing soda and Plaster of Paris. |
| 4 | PRE TERM-II | Metals and nonmetals: Properties of metals and non-metals; Reactivity series; Formation and properties of ionic compounds; Basic metallurgical processes; Corrosion and its prevention. |
| 5 | PRE BOARD EXAMINATION | Chemical reactions: Chemical equation, Balanced chemical equation, implications of a balanced chemical equation, types of chemical reactions: combination, decomposition, displacement, double displacement, precipitation, endothermic exothermic reactions, oxidation and reduction. Acids, bases and salts: Their definitions in terms of furnishing of H ⁺ and OH ⁻ ions, General properties, examples and uses, neutralization, concept of pH scale (Definition relating to logarithm not required), importance of pH in everyday life; preparation and uses of Sodium Hydroxide, Bleaching powder, Baking soda, Washing soda and Plaster of Paris. Metals and nonmetals: Properties of metals and non-metals; Reactivity series; Formation and properties of ionic compounds; Basic metallurgical processes; Corrosion and its prevention. Carbon compounds: Covalent bonding in carbon compounds. Versatile nature of carbon. Homologous series. Nomenclature of carbon compounds containing functional groups (halogens, alcohol, ketones, aldehydes, alkanes and alkynes), difference between saturated hydro carbons and unsaturated hydrocarbons. Chemical properties of carbon compounds(combustion,oxidation, addition and substitution reaction). Ethanol and Ethanoic acid (only properties and uses), soaps and detergents |

CLASS X
SESSION 2017-2018
SUBJECT: BIOLOGY

CHAPTER WISE MARKS DISTRIBUTION

| S.NO. | CHAPTER NUMBER | CHAPTER NAME |
|--------------|----------------|------------------------------------|
| 1. | 6 | Life Processes |
| 2. | 7 | Control and Coordination |
| 3. | 8 | Reproduction in Plants and Animals |
| 4. | 9 | Heredity and Evolution |
| 5. | 15 | Our Environment |
| 6. | 16 | Management of Natural Resources |
| TOTAL | | |

SYLLABUS DISTRIBUTION

- **PRE-TERM 1:** Chapter 6 and Chapter 7 till Page 119 before Coordination in Plants
- **HALF YEARLY:** Chapter 6, 7 and 8
- **Pre-Board Examination I:** Chapter 6,7,8,9,15 and 16
- **Pre-Board Examination II:** Chapter 6,7,8,9,15 and 16

SYLLABUS FOR ACADEMIC SESSION (2022-2023)

CLASS- X
PHYSICS

| CHAPTER NO. | TOPIC |
|-------------|--------------------------------------|
| 10 | LIGHT-REFLECTION AND REFRACTION |
| 11 | HUMAN EYE AND COLOURFUL WORLD |
| 12 | ELECTRICITY |
| 13 | MAGNETIC EFFECTS OF ELECTRIC CURRENT |
| | |

SYLLABUS DISTRIBUTION

PRE-TERM – I (JULY): CHAPTER: 10 (Only Topic: ‘Reflection of Light’ is coming for Pre-Term-I examination).

FIRST TERM(SEPTEMBER): CHAPTERS: 10,11.

PRE-TERM- II(NOVEMBER): CHAPTER: 12.

SECOND TERM(MARCH): CHAPTERS: 10, 11,12,13.(entire syllabus)

Class 10- Artificial Intelligence - Syllabus- 2022-23

Term-1

Pre-Term 1 Examination

Part A

Unit 1- Communication Skills II *(To be assessed as project/internal assessment)

Unit 2- Self Management Skills II

Part B

Unit 1: Introduction to Artificial Intelligence

Half Yearly Examination

Part A

Unit 1- Communication Skills II*

Unit 2- Self Management Skills II

Unit 3: ICT Skills-II

Part B

Unit 1: Introduction to Artificial Intelligence

Unit 2: AI Project Cycle

Unit-3 :Natural Language Programming

Practical Examination

Unit 3: Advanced Python

Data Visualisation

Term -2

Part A

Unit 4 Entepreneurial Skills II

Unit 5-Green Skills -II * (To be assessed as project/internal assessment)

Part B

Unit -3 :Natural language Processing

Unit-4: Evaluation

Pre Board Examinations

To be tested on Full Syllabus

Practical Examination

Advanced Python

Data Science

Computer Vision