

# D.A.V. PUBLIC SCHOOL, NERUL

# SYLLABUS- 2021-2022 CLASS - XI



## **INDEX**

- 1. English
- 2. Mathematics
- 3. Biology
- 4. Chemistry
- 5. Physics
- 6. Computer Science
- 7. Accountancy
- 8. Entrepreneurship
- 9. Economics
- 10. Business Studies
- 11. Applied Mathematics
- The entire syllabus is divided in two terms.
- Syllabus of each subject is uploaded in the Google Classroom of the respective class.

## **ENGLISH**

#### **Term - 1**

#### **Unit Test 1**

The Portrait of a Lady (Prose), A Photograph (Poem)

The Summer of the Beautiful White Horse (Prose)

## **Periodic Test-1**

**Section A - Reading Comprehension** 

**Section B** 

**Short Writing Task - Notice Writing** 

Long Writing Task - Business/Official Letters (Letter of Enquiry,

Letter of Placing Order and Letter of Complaint), Speech

#### **Grammar**

Determiners, Tenses, Re-ordering of Sentences

**Section C - Literature** 

Hornbill - The Portrait of a Lady, A Photograph, We're Not Afraid to

Die...if We Can All Be Together

Snapshots - The Summer Of the Beautiful White Horse, The Address

**Unit Test - 2** 

**Grammar -** Determiners, Tenses, Re-ordering of Sentences

**Literature -** Discovering Tut: The Saga Continues, The Laburnum Top, Ranga's Marriage

#### **Preliminary and First Term Examination**

**Section A - Reading Comprehension** 

**Section B** 

**Short Writing Task - Notice Writing** 

Long Writing Task - Business/Official Letters, Speech

Grammar - Determiners, Tenses, Re-ordering of Sentences

**Literature - Hornbill** 

The Portrait of a Lady, A Photograph, We're Not Afraid to Die...if We Can All Be Together, Discovering Tut: The Saga Continues, The Laburnum Top, The Landscape of the Soul

**Snapshots -** The Summer Of the Beautiful White Horse, The Address, Ranga's Marriage

ASL for Term 1

Term 2

**UNIT TEST - 3** 

Literature - The Voice of the Rain, The Ailing Planet: The Green Movement's Role, Albert Einstein at School

Grammar - Determiners, Tenses, Re-ordering of Sentences

**UNIT TEST - 4** 

**Grammar** - Determiners, Tenses, Re-ordering of Sentences

Literature - The Browning Version, Childhood, Mother's Day

Periodic Test-2, Preliminary Examination and Second Term

**Section A - Reading Comprehension** 

**Section B** 

**Short Writing Task** - Posters

Long Writing Tasks - Official Letters(Letter to school/college authorities, regarding admissions, school issues, requirements/suitability of courses) Debate

**Grammar** - Determiners, Tenses, Re-ordering of Sentences

## **Literature - Hornbill**

The Voice of the Rain, The Ailing Planet: The Green Movement's Role,

The Browning Version, Childhood, Silk Road

Snapshots - Albert Einstein at School, Mother's Day, Birth

Project work in Term-2

## **MATHEMATICS**

## **FIRST TERM**

#### **UNIT TEST-1**

1.Sets

#### **PERIODIC TEST-1**

- 1.Sets
- 2.Relations and functions.
- 3. Complex numbers and quadratic equations.

#### **UNIT TEST- 2.**

1.Sequences and series

## PRELIMINARY AND FIRST TERM EXAMINATION

- 1.Sets
- 2. Relations and functions.
- 3. Complex numbers and quadratic equations.
- 4. Sequences and series
- 5.Straight lines
- 6.Limits
- 7.Statistics.

#### INTERNAL ASSESSMENT

**Activities and Viva** 

#### **SECOND TERM**

## **UNIT TEST-3**

Trigonometric functions

#### **UNIT TEST-4**

Permutations and combinations

#### **PERIODIC TEST - 2**

- 1. Trigonometric function
- 2. Linear inequalities
- 3. Permutations and Combinations
- 4. Conic Sections
- 5. Introduction to 3D Geometry

#### PRELIMINARY AND SECOND TERM EXAM

- 1. Trigonometric function
- 2. Linear inequalities
- 3. Permutations and Combinations
- 4. Conic Sections
- 5. Introduction to 3D Geometry
- 6. Derivatives
- 7. Probability

#### INTERNAL ASSESSMENT

**Activities and Viva** 

## **PHYSICS**

#### **FIRST TERM**

#### **UNIT TEST -1**

- 1. Physical world
- 2. Units and measurements
- 3. Motion in a straight line

#### **PERIODIC TEST 1**

- 3. Motion in a straight line
- 4. Motion in a plane

#### **UNIT TEST -2**

- 5. Laws of motion
- 6. Work energy power

## PRELIMINARY AND FIRST TERM EXAMINATION

- 1. Physical world
- 2. Units and measurements
- 3. Motion in a straight line
- 4. Motion in a plane
- 5. Laws of motion
- 6. Work energy power
- 7. Rotational motion
- 8. Gravitation

Practical & project work for Term I

#### **SECOND TERM**

## **UNIT TEST -3**

- 9. Mechanical properties of solid
- 10. Mechanical properties of fluids

## **UNIT TEST - 4**

- 11. Thermal properties of matter
- 12. Thermo dynamics

#### **PERIODIC TEST - 2**

- 13. Kinetic energy
- 14. Oscillation
- 15. Waves.

#### PRELIMINARY AND SECOND TERM EXAMINATION

- 9. Mechanical properties of solid
- 10. Mechanical properties of fluids
- 11. Thermal properties of matter
- 12. Thermo dynamics
- 13. Kinetic energy
- 14. Oscillation
- 15. Waves.

Practical & project work for Term II

## **CHEMISTRY**

#### **FIRST TERM**

## **UNIT TEST-1**

1. Some basic concepts of chemistry

#### **PERIODIC TEST-1**

- 1.Structure of atom
- 2. Periodic classification of elements

#### **UNIT TEST-2**

1. Chemical Bonding

#### PRELIMINARY EXAM AND FIRST TERM EXAMINATION

- 1. Some basic concept of Chemistry
- 2. Atomic Structure
- 3. Periodic classification of elements
- 4. Chemical Bonding
- 5. Redox Reaction
- 6.Hydrogen
- 7. Some basic concept of organic chemistry

#### **PRACTICAL Examination**

#### **SECOND TERM**

#### **UNIT TEST-3**

1.States of Matter

#### **UNIT TEST-4**

1.Equilibrium

#### **PERIODIC TEST-2**

- 1.s block element
- 2.p block element
- 3. Thermodynamics

#### PRELIMINARY EXAM AND SECOND TERM EXAMINATION

- 1.Hydrocarbon
- 2. States of Matter: Gases and Liquids
- 3.Equilibrium
- 4.s block element
- 5.p block element
- 6.Chemical Thermodynamics

#### PRACTICAL EXAMINATION

## **BIOLOGY**

## **FIRST TERM**

#### **UNIT TEST - 1**

Chapter-1: The Living World

Chapter-2: Biological Classification

Chapter-3: Plant Kingdom

**PERIODIC TEST - 1** 

Chapter-1: The Living World

Chapter-2: Biological Classification

Chapter-3: Plant Kingdom

Chapter-4: Animal Kingdom

Chapter-5: Morphology of Flowering Plants

**UNIT TEST - 2** 

Chapter-7: Structural Organization in Animals

Chapter-8: Cell-The Unit of Life

Chapter-9: Biomolecules

**PRELIMINARY & TERM - I EXAMINATION** 

Chapter-1: The Living World

Chapter-2: Biological Classification

Chapter-3: Plant Kingdom

Chapter-4: Animal Kingdom

Chapter-5: Morphology of Flowering Plants

Chapter-7: Structural Organization in Animals

Chapter-8: Cell-The Unit of Life

Chapter-9: Biomolecules

Practical for Term - I

#### **SECOND TERM**

## **UNIT TEST - 3**

Chapter-10: Cell Cycle and Cell Division

Chapter-13: Photosynthesis in Higher Plants

Chapter-14: Respiration in Plants

Chapter-15: Plant - Growth and Development

#### **UNIT TEST - 4**

Chapter-17: Breathing and Exchange of Gases

Chapter-18: Body Fluids and Circulation

Chapter-19: Excretory Products and their Elimination

Chapter-20: Locomotion and Movement

#### **PERIODIC TEST - 2**

Chapter-10: Cell Cycle and Cell Division

Chapter-13: Photosynthesis in Higher Plants

Chapter-14: Respiration in Plants

Chapter-15: Plant - Growth and Development

Chapter-17: Breathing and Exchange of Gases

Chapter-18: Body Fluids and Circulation

Chapter-19: Excretory Products and their Elimination

Chapter-20: Locomotion and Movement

Chapter-21: Neural Control and Coordination

Chapter-22: Chemical Coordination and Integration

#### **PRELIMINARY & TERM - II EXAMINATION**

Chapter-10: Cell Cycle and Cell Division

Chapter-13: Photosynthesis in Higher Plants

Chapter-14: Respiration in Plants

Chapter-15: Plant - Growth and Development

Chapter-17: Breathing and Exchange of Gases

Chapter-18: Body Fluids and Circulation

Chapter-19: Excretory Products and their Elimination

Chapter-20: Locomotion and Movement

Chapter-21: Neural Control and Coordination

Chapter-22: Chemical Coordination and Integration

Practical for Term- II

## **COMPUTER SCIENCE**

#### **FIRST TERM**

#### **UNIT TEST-1**

Unit I: Computer Systems and Organisation

- Basic Computer Organisation:
- Types of software:
- Operating system (OS):

#### **PERIODIC TEST 1**

Unit II: Computational Thinking and Programming – 1

- Introduction to problem solving
- Basics of Python programming
- Data types
- Operators
- Expressions
- Errors
- Flow of control
- Conditional statements
- Iterative statements

## **UNIT TEST -2**

- Data types
- Operators
- Expressions
- Errors
- Flow of control
- Conditional statements
- Iterative statements
- Number system
- Encoding schemes
- Boolean logic
- Strings

#### PRELIMINARY AND FIRST TERM EXAMINATION

Unit I: Computer Systems and Organization

- Basic Computer Organization
- Types of software
- Operating system (OS)

Unit II: Computational Thinking and Programming – 1

- Introduction to problem solving
- Familiarization with the basics of Python programming:
- Knowledge of data types
- Operators
- Expressions
- Errors
- Flow of control
- Conditional statements
- Iterative statements
- Number system
- Encoding schemes
- Boolean logic
- Strings

Practical for all programs completed in the class

#### **SECOND TERM**

**UNIT TEST - 3** 

Unit II: Computational Thinking and Programming - 1

Lists

- Tuples
- Introduction to Python modules

#### **UNIT TEST - 4**

- Lists
- Tuples
- Dictionary
- Python modules

#### **PERIODIC TEST 2**

- Lists
- Tuples
- Dictionary
- Python modules

## **Unit III: Society, Law and Ethics**

- Digital Footprints
- Digital society and Netizen
- Data protection
- Cyber-crime
- Cyber safety
- Safely accessing web sites
- E-waste management
- Indian Information Technology Act (IT Act)
- Technology & Society

Practical for all programs completed in the class

PRELIMINARY AND SECOND TERM EXAMINATION

Complete 2<sup>nd</sup> Term Syllabus

Practical for all programs completed in the class

## **ACCOUNTANCY**

#### **UNIT TEST - 1**

## Part A (FINANCIAL ACCOUNTING 1)

- 1) Unit I- Theoretical framework
- A) Introduction to accounting
- B) Basic accounting terms
- 2) Theory base of accounting
- A) Fundamental accounting assumptions
- B) Basis of Accounting- Cash Basis and Accrual Basis
- C) Accounting Standards: Applicability in Ind AS

#### **Periodic Test 1**

- 1) Unit I- Theoretical framework
  - A) Introduction to accounting
  - B) Basic accounting terms
- 2) Theory base of accounting
- A) Fundamental accounting assumptions
- B) Basis of Accounting- Cash Basis and Accrual Basis
- C) Accounting Standards: Applicability in Ind AS

#### FINANCIAL ACCOUNTING-I

#### **Unit -1 Theory base of Accounting**

Goods and Services Tax (GST)

Characteristics and Objective

#### **Unit -2 Accounting process**

- A) Accounting Equation
- B) Rules of Debit and Credit
- C) Recording of transactions Books of original Entry

(Journal Entries without GST)

- D) Ledger format
- E) Cash Book

#### Unit test -2

**Unit 2 -Accounting Process** 

- A) Subsidiary Books
- B) Journal Entries (with and Without GST)
- C) Bank Reconciliation Statement

#### **Preliminary and First Term Examination**

#### Part A- Financial Accounting 1

- Unit I Theoretical Framework
  - A) Introduction to Accounting
  - B) Theory Base Accounting

Unit 2 - Accounting Process

- A) Recording of Business transactions
- B) Bank Reconciliation Statement
- C) Deprecation, Provisions and Reserves
  - a) Depreciation concept, features causes and factors

- b) Meaning of depletion and amortisation
- c) Problems related to depreciation (Both SLM & WDV)
- d) Provisions of Reserves and different types
- e) Difference between Capital and revenue reserve

#### **Project work for Term I**

#### **SECOND TERM**

#### **UNIT TEST - 3**

PART A - (FINANCIAL ACCOUNTING I)

#### **UNIT-2 - ACCOUNTING PROCESS**

- A) Accounting for Bills of Exchange
  - 1) Features of Bills of Exchange and Promissory Note
  - 2) Various Terminologies used in Bills of Exchange
  - 3) Accounting treatment of Bills of Exchange under various circumstances
- B) Trial Balance and Rectification of Errors
  - 1) Trial Balance; Objectives and preparation
  - Errors: Errors of omission and commission and compensating Errors; Detection and rectification
  - 4) Preparation of Suspense Account

#### **UNIT TEST - 4**

#### PART B - FINANCIAL ACCOUNTING II

- 1) Meaning objectives and importance of revenue and capital receipts
- 2) Meaning of deferred revenue expenditure
- 3) Preparation of Trading and P&L A/C and Balance Sheet
- 4) Adjustments in preparation of financial statements
- 5) Preparation of financial statements with adjustments

#### Periodic test- 2, Preliminary Examination and Second

#### **Term Examination**

#### Part A- FINANCIAL ACCOUNTING I

**Accounting Process** 

Accounting for Bills of Exchange

Trial Balance and rectification of errors

#### Part B - FINANCIAL ACCOUNTING II

- Financial Statements for Sole Proprietorship from Complete and Incomplete records
- 2) Computers in Accounting

Project work - IInd term

## **ENTREPRENEURSHIP**

## **Unit Test-1**

Unit 1 - Entrepreneurship- what, why and how

#### **Periodic Test-1**

Unit 1 - Entrepreneurship- what, why and how

Unit 2 - An entrepreneur

## **Unit Test-2**

Unit 3 - Entrepreneurship journey

Unit 4 - Entrepreneurship as innovation and problem solving

#### **Preliminary and First Term Examination**

Unit 1 - Entrepreneurship- what, why and how

Unit 2 - An entrepreneur

Unit 3 - Entrepreneurship journey

Unit 4 - Entrepreneurship as innovation and problem solving

Project work for Term -1

## **SECOND TERM**

## **Unit Test-3**

Unit 5 - Understanding the market

## **Unit Test-4**

Unit 6 - Business finance and arithmetic

## Periodic Test-2, Preliminary Examination and Second Term

## **Examination**

Unit 5 - Understanding the market

Unit 6 - Business finance and arithmetic

Unit 7 - Resource Mobilisation

Project work in Term-2

## **ECONOMICS**

## **FIRST TERM**

## **Unit Test-1**

#### **Statistics for Economics**

1. Statistical Tools and Interpretation-Mean, Median and Mode

#### **Periodic Test-1**

#### **Introductory Microeconomics**

- 1. Introduction
- 2. Consumers Equilibrium Utility approach and Indifference curve approach

#### **Statistics for Economics**

- 1. Introduction
- 2. Statistical Tools and Interpretation-Mean, Median and Mode

#### **Unit Test-2**

#### **Statistics for Economics**

1. Collection, Organisation and presentation of Data

#### **Introductory Microeconomics**

1. Demand and Elasticity of Demand

#### **Preliminary and First Term Examination**

#### **Statistics for Economics**

- 1. Introduction
- 2. Collection, Organisation and Presentation of Data
- 3. Statistical Tools and Interpretation-Arithmetic Mean. Median, Mode

#### **Introductory Microeconomics**

- 1. Introduction
- 2. Consumers Equilibrium and Demand

**Project Work for Term-1** 

#### **SECOND TERM**

#### **Unit Test-3**

#### **Statistics for Economics**

1. Statistical Tools and Interpretation-Measures of Dispersion, Correlation, Index numbers

#### **Unit Test-4**

#### **Introductory Microeconomics**

Producer Behaviour and Supply

#### Periodic Test-2, Preliminary and Second Term Examination

#### **Statistics for Economics**

1. Statistical Tools and Interpretation-Measures of Dispersion, Correlation, Index numbers

#### **Introductory Microeconomics**

- 1. Producer Behaviour and Supply
- 2. Forms of Market and Price Determination under perfect competition with simple applications

Project work for Term-2

## **BUSINESS STUDIES**

## **FIRST TERM**

#### **Unit Test -1**

Chapter 1 Evolution and Fundamentals of Business

Chapter 2 Forms of business organisation

#### **Periodic Test-1**

Chapter 2 Forms of business organisation

Chapter 7 Formation of company

Chapter 3 Private, Public and Global Enterprise

#### **Unit Test-2**

Chapter 4 Business Services

Chapter 5 Emerging Modes of Business

#### **Preliminary and First Term Examination**

Chapter 1 Evolution and Fundamentals of Business

Chapter 2 Forms of business organisation

Chapter 7 Formation of company

Chapter 3 Private, Public and Global Enterprise

Chapter 4 Business Services

Chapter 5 Emerging Modes of Business

Chapter 6 Social Responsibility of Business and Business Ethics

Project Work for Term-1

## **SECOND TERM**

#### **Unit Test -3**

Chapter 8 Sources of Business Finance

Chapter 9 Small Business and Entrepreneurship Development

#### **Unit Test-4**

Chapter10 Internal Trade

#### Periodic Test-2, Preliminary and Second Term Examination

Chapter 8 Sources of Business Finance

Chapter 9 Small Business and Entrepreneurship Development

Chapter10 Internal Trade

Chapter 11 International Business

Project Work for Term-2

## **APPLIED MATHEMATICS**

#### **UNIT TEST I**

**Sets and Relations** 

## PERIODIC TEST 1

- 1.Sets and Relations
- 2. Sequences and Series
- 3. Functions

#### **UNIT TEST II**

1.Calculus

## PRELIMINARY EXAMINATION

- 1. Numbers, quantification and numerical applications
- 2.Algebra
- 3. Mathematical Reasoning
- 4.Calculus
- 5.Descriptive Statistics

## TERM 1

- 1. Numbers, quantification and numerical applications
- 2.Algebra
- 3.Mathematical Reasoning

**Permutations And Combinations** 

#### **UNIT TEST IV**

Probability

#### **PERIODIC TEST II**

- 1.Permutations and Combinations
- 2.Differentiation
- 3.Probability
- 4.Basics of Financial Mathematics

## PRELIMINARY EXAMINATION

- 1.Permutations and Combinations
- 2.Differentiation
- 3.Probability
- 4.Basics of Financial Mathematics
- 5.Coordinate Geometry

## TERM 2

- 1.Permutations and Combinations
- 2.Differentiation
- 3.Probability
- 4.Basics of Financial Mathematics
- 5.Coordinate Geometry

Project work in term 2