



SYLLABI FOR ADMISSION CUM SCHOLARSHIP TEST - 2024

FOR CHALLENGER BATCH

Complete Syllabus of Class XII in NEET & JEE Pattern.

FOR CLASS - XI

- 1. Mathematics (40 Marks):** Number Systems, Polynomials, Pair of linear equation in two variable, Quadratic equation, Arithmetic Progression, Co-ordinate Geometry, Trigonometry up to Application, Probability, Triangle, Quadrilaterals, Circle, Mensuration, Statistics.
- 2. Science (60 Marks):**
 - a) Physics: - Light reflection & Refraction, Electricity, Magnetic effects of electric current.
 - b) Chemistry:- Atoms & Molecules, Structure of the atom, reactions & Equations, Acids, Bases and Salts, Metals & Non-Metals, Carbon and Its Compounds, Periodic Classification of Elements.
 - c) Biology:- Sexual Reproduction in plants and Humans (How do Organisms reproduce), Control & Coordination, Life Processes, Heredity & Evolution, Our Environment, Human eye & Colourful world.
- 3. English (25 Marks):** Tense, Voice, Vocabulary & Error Correction, Preposition, Tag Question, Article & Determiners and Parts of speech
- 4. GK & Reasoning (25 Marks):** _____

FOR CLASS - IX

- 1. Mathematics (40 Marks):** Linear equation in one variable, Formation of Angles by compass, Quadrilaterals (All type) with properties, Data handling, Comparing Quantities, Algebraic expression and identities, Mensuration, Factorisation, Introduction to graph.
- 2. Science (60 Marks):**
 - a) Physics:- Kinematics- The concept of scalar and vector quantities, Distance and displacement, Speed, Velocity, acceleration, Equations of motion; Newton's law of motion- Concept of force, Newton's 1st, 2nd and 3rd law; Friction: NCERT; Sound: NCERT; Light: Reflection of light.
 - b) Chemistry: Metals and non metals, Combustion and flame, Coal and Petroleum, Synthetic fibre and plastics.
 - c) Biology: Crop production: types of crops, uses and importance of manures and different type of fertilizers, cropping processes; About microorganisms: its types, usefulness and harmfulness, about fermentation, Pasteurization, vaccine and its working process, antibiotics, antibodies - antigens, diseases caused by microorganisms and its prevention, nitrogen cycle; Conservation of wildlife: Its importance, and the methods of conserving of wildlife; Basic concept of cell: types of cells, different cell organelles and their functions, gene, animal cell and plant cell difference; Basic concept of Reproduction in Animals: About male reproductive organ and female reproductive organs, process of fertilization, types of reproduction; Concept of Adolescence: Changes during adolescence, Hormones and their functions during adolescence, concept of sex determination in a baby; About population and its Harmfulness: soil pollution, air pollution, water pollution, Global warning, acid rain, what can be done to minimize pollution.
- 3. English (25 Marks):** Tense, Determiner, Preposition, Voice change, Tag questions, Vocabulary (Synonyms and Antonyms)
- 4. GK & Reasoning (25 Marks):** _____

FOR CLASS - VIII

- 1. Mathematics (40 Marks):** Fractions and Decimal, Simple equation, Comparing quantities, Rational numbers, Perimeter and Area, Algebraic expressions, Exponent and Power.
- 2. Science (60 Marks):**
 - a) Physics:- Electric Current and its effects, Light, Motion and Time.
 - b) Chemistry:- Fibre to fabric, Acids, Bases and Salts, Physical and Chemical changes.
 - c) Biology:- Food, Components of food, Digestive system in human, Respiratory system in humans, Respiration and Breathing, Transportation of food and water in plants, Human circulatory system, Human excretory system, Types of reproduction in plants, Vegetative reproduction in plants, Reproductive organs in plants.
- 3. English (25 Marks):** Tense, Voice, Preposition, Article, Affirmative-Interrogative-Negative Sentences & Vocabulary.
- 4. GK & Reasoning (25 Marks):** _____