

JEXPO Syllabus

Latest revised syllabus on Mathematics and Physical Science upto Class X under West Bengal Board of Secondary Education (WBBSE) shall be followed for JEXPO. Topic-wise syllabus is given below:

- **Mathematics** Real Numbers, Laws of Indices, Graph, Co-ordinate Geometry - Distance Formula, Linear Simultaneous Equations, Properties of Parallelogram, Polynomial, Factorisation, Transversal & Mid-Point Theorem, Profit & Loss, Statistics, Theorems on Area, Construction of a Parallelogram whose measurement of one angle is given and equal in area of a Triangle, Construction of a Triangle equal in area of a quadrilateral, Area & Perimeter of Triangle & Quadrilateral shaped region, Circumference of Circle, Theorems on concurrence, Area of circular region, Co-ordinate Geometry - Internal and External Division of Straight Line Segment, Co-ordinate Geometry - Area of Triangular Region, Logarithm.

Quadratic Equations with one variable, Simple Interest, Theorems related to circle, Rectangular Parallelepiped or Cuboid, Ratio and Proportion, Compound Interest and Uniform Rate of Increase or Decrease, Theorems related to Angles in a Circle, Right Circular Cylinder, Quadratic Surd, Theorems related to Cyclic Quadrilateral, Construction of circumcircle and incircle of a triangle, Sphere, Variation, Partnership Business, Theorems related to Tangent to a Circle, Right Circular Cone, Similarity, Construction of tangent to a circle, Real life Problems related to different Solid Objects, Trigonometry - Concept of Measurement of Angle, Construction - Determination of Mean Proportional, Pythagoras Theorem, Trigonometric Ratios and Trigonometric Identities, Trigonometric Ratios of Complementary angle, Application of Trigonometric Ratios - Heights & Distances, Statistics - Mean, Median, Ogive, Mode and Numerical Aptitude.

- **Physical Science:** Measurement, Force & Motion, Atomic Structure, Mole Concept, Matter - Structure and Properties, Solution, Acids, Bases & Salts, Work, Power & Energy, Sound, Heat, Separation of Components of Mixtures, Water.

Concerns about our Environment, Behaviour of Gases, Light, Periodic Table and Periodicity of the Properties of Elements, Ionic and Covalent Bonding, Chemical Calculations, Thermal Phenomena, Current Electricity, Electricity and Chemical Reactions, Inorganic Chemistry in the Laboratory and in Industry, Metallurgy, Atomic Nucleus, Organic Chemistry and General Awareness.