

KENDRIYA VIDYALAYA SANGATHAN, PATNA REGION

SPLIT UP SYLLABUS

2019-20

SUBJECT – ACCOUNTANCY

CLASS - XII

| S.NO | CHAPTERS | PERIODS ALLOTTED | MONTH |
|------|--|------------------|------------------|
| 1. | Unit-1 Financial Statements of Not for Profit Organisations Unit-2 Accounting for Partnership Firms Partnership : Features, Partnership Deed, Provisions of Indian Partnership Act in absence of deed, fixed vs fluctuating account, profit & loss appropriation a/c, guarantee of profits, past adjustments | 25 90 | April |
| 2. | Goodwill, Change in Profit Sharing Ratio | | May |
| 3. | Admission of a partner, Retirement of a partner, Death of a partner | | July |
| 4. | Dissolution of Partnership Firm | | August |
| 5. | Unit-3 Accounting for Companies Accounting for Share Capital | 35 | August-September |
| 6. | Accounting for issue and redemption of debentures | | September |
| 7. | Unit -4 Analysis of Financial Statement | 30 | October |
| 8. | Unit-5 Cash Flow Statement | 20 | November |
| 9. | Project Work | 30 | |
| 10. | Revision and First Pre Board Exam | | December |
| 11. | Revision, Second Pre Board Exam and CBSE Practical | | January-February |

KENDRIYA VIDYALAYA SANGATHAN PATNA REGION

SPLIT UP SYLLABUS 2019-20

SUB: BIOLOGY(CLASS-12th)

| S · N o | Month | Expecte d No.of workin g Days | Name of Unit | Chapter No & Chapter | Detailed Split-up | Total No. of Periods |
|------------------|---------------------|---|---|-------------------------|---|----------------------------|
| 1 | April And May | 23+10 | UNIT-6 (Reproducti on | Chap- 1 to 4 | <p>Chapter-1: Reproduction in Organisms Reproduction, a characteristic feature of all organisms for continuation of species; modes of reproduction - asexual and sexual reproduction; asexual reproduction - binary fission, sporulation, budding, gemmule formation, fragmentation; vegetative propagation in plants.</p> <p>Chapter-2: Sexual Reproduction in Flowering Plants Flower structure; development of male and female gametophytes; pollination - types, agencies and examples; outbreeding devices; pollen-pistil interaction; double fertilization; post fertilization events - development of endosperm and embryo, development of seed and formation of fruit; special modes-apomixis, parthenocarpy, polyembryony; Significance of seed dispersal and fruit formation.</p> <p>Chapter-3: Human Reproduction Male and female reproductive systems; microscopic anatomy of testis and ovary; gametogenesis - spermatogenesis and oogenesis; menstrual cycle; fertilisation, embryo development upto blastocyst formation, implantation; pregnancy and placenta formation (elementary idea); parturition (elementary idea); lactation (elementary idea).</p> <p>Chapter-4: Reproductive Health Need for reproductive health and prevention of Sexually Transmitted Diseases (STDs); birthcontrol - need and methods, contraception and medical termination of pregnancy (MTP); amniocentesis; infertility and assisted reproductive technologies - IVF, ZIFT, GIFT (elementary idea for general awareness).</p> <p><i>Practicals-</i> <i>Study of T.S. of Blastula through permanent slide</i> <i>Exercise on controlled pollination- emasculation, tagging etc.</i> <i>Study and identify stages of gametic development i.e T.S. of Testis and T.S. of ovary from permanent slides.</i> <i>Study of flowers adapted to pollination by different agencies</i></p> | 33 |
| 2 | June & July | 8+26 | (Unit-VII) Genetics and Evolution | Chap-5,6,7 | <p>Chapter-5: Principles of Inheritance and Variation Heredity and variation: Mendelian inheritance; deviations from Mendelism–incompletdominance, co-dominance, multiple alleles and inheritance of blood groups, pleiotropy; elementary idea of polygenic inheritance; chromosome theory of inheritance; chromosomes andgenes; Sex determination - in humans, birds and honey bee; linkage and crossing over; sex linkedinheritance - haemophilia, colour blindness; Mendelian disorders in humans - thalassemia;chromosomal disorders</p> | 34 |

| | | | | | | |
|---|-----------|----|--|-------------------|---|----|
| | | | | | <p>in humans; Down's syndrome, Turner's and Klinefelter's syndromes.</p> <p>Chapter-6: Molecular Basis of Inheritance Search for genetic material and DNA as genetic material; Structure of DNA and RNA; DNA packaging; DNA replication; Central dogma; transcription, genetic code, translation; gene expression and regulation - lac operon; genome and human and rice genome projects; DNA fingerprinting.</p> <p>Chapter-7: Evolution Origin of life; biological evolution and evidences for biological evolution (paleontology, comparative anatomy, embryology and molecular evidences); Darwin's contribution, modern synthetic theory of evolution; mechanism of evolution - variation (mutation and recombination) and natural selection with examples, types of natural selection; Gene flow and genetic drift; Hardy - Weinberg's principle; adaptive radiation; human evolution.</p> <p><i>Practical- Study of pollen germination on a slide</i> <i>Isolation of DNA from available plant material</i> <i>Study of meiosis from prepared slides</i> <i>Study of pedigree from prepared charts</i></p> | |
| 3 | August | 23 | (Unit-VIII) Biology and Human welfare | Chap-8,9 | <p>Chapter-8: Human Health and Diseases Pathogens; parasites causing human diseases (malaria, dengue, chickengunia, filariasis, ascariasis, typhoid, pneumonia, common cold, amoebiasis, ring worm) and their control; Basic concepts of immunology - vaccines; cancer, HIV and AIDS; Adolescence - drug and alcohol abuse.</p> <p>Chapter-9: Strategies for Enhancement in Food Production Improvement in food production: Plant breeding, tissue culture, single cell protein, Biofortification, Apiculture and Animal husbandry.</p> <p><i>Practical- To identify common diseases</i> <i>Study the effect of different temperatures and three different pH on the activity of salivary amylase on starch</i></p> | 23 |
| 4 | September | 23 | Unit-VIII Conti.. Unit-IX (Biotechnolo gy) | Chap- 10,11,12 | <p>Chapter-10: Microbes in Human Welfare In household food processing, industrial production, sewage treatment, energy generation and microbes as bio-control agents and bio-fertilizers. Antibiotics; production and judicious use.</p> <p>Chapter-11: Biotechnology - Principles and processes Genetic Engineering (Recombinant DNA Technology).</p> <p>Chapter-12: Biotechnology and its Application Application of biotechnology in health and agriculture: Human insulin and vaccine production, stem cell technology, gene therapy; genetically modified organisms - Bt crops; transgenic animals; biosafety issues, bio piracy and patent.</p> <p><i>Practical- Study of pH , clarity and presence of any living organism in water sample</i> <i>Prepare a temporary mount of onion root tip to study mitosis.</i></p> | 23 |

| | | | | | | |
|---|----------------------------|----|---------------------|---------------------|--|----|
| 5 | October And November | 18 | (Unit-X) Ecology | Chap 13,14,15,16 | <p>Chapter-13: Organisms and Populations Organisms and environment: Habitat and niche, population and ecological adaptations; population interactions - mutualism, competition, predation, parasitism; population attributes - growth, birth rate and death rate, age distribution.</p> <p>Chapter-14: Ecosystem Ecosystems: Patterns, components; productivity and decomposition; energy flow; pyramids of number, biomass, energy; nutrient cycles (carbon and phosphorous); ecological succession; ecological services - carbon fixation, pollination, seed dispersal, oxygen release (in brief).</p> <p>Chapter-15: Biodiversity and its Conservation Biodiversity-Concept, patterns, importance; loss of biodiversity; biodiversity conservation; hotspots, endangered organisms, extinction, Red Data Book, biosphere reserves, national parks, sanctuaries and Ramsar sites</p> <p>Chapter-16: Environmental Issues Air pollution and its control; water pollution and its control; agrochemicals and their effects; solid waste management; radioactive waste management; greenhouse effect and climate change; ozone layer depletion; deforestation; any one case study as success story addressing environmental issues.</p> <p><i>Practicals-Collect and study soil, texture, moisture etc.</i> <i>Study pH and water holding capacity of different soil samples</i> <i>Study presence of suspended particulate matter in air</i> <i>Population density and population frequency by quadret method.</i> <i>Study and comment on Xerophytic and aquatic plants and animals</i></p> | 18 |
|---|----------------------------|----|---------------------|---------------------|--|----|

NOTE- Syllabus is to be completed by 31st October followed by Pre-Boards and extensive revision in the months of November, December and January.

BIOLOGY (Code No. 044)

QUESTION PAPER DESIGN Class - XII (2019-20)

Time: 3 Hours

Max. Marks: 70

1) Board Examination - Theory

| S. No. | Typology of Questions | Very Short Answer (VSA) (1 Mark) | Short Answer-I (SA-I) 2 Marks | Short Answer-II (SA-II) (3 marks) | Long Answer (LA) (5 marks) | Total Marks | % Weightage |
|--------|---|----------------------------------|-------------------------------|-----------------------------------|----------------------------|---------------|-------------|
| 1. | Remembering- (Knowledge based Simple recall questions, to know specific facts, terms, concepts, principles, or theories, Identify, define, or recite, information) | 2 | 1 | 1 | - | 7 | 10% |
| 2. | Understanding- (Comprehension -To be familiar with meaning and to understand conceptually, interpret, compare, contrast, explain, paraphrase information) | - | 2 | 4 | 1 | 21 | 30% |
| 3. | Application (Use abstract information in concrete situation, to apply knowledge to new situations, Use given content to interpret a situation, provide an example, or solve a problem) | - | 2 | 4 | 1 | 21 | 30% |
| 4. | Evaluating & Analysis - Classify, Compare, Contrast, or differentiate between different pieces of information, Organize and/or integrate unique pieces of information from a variety of sources) | 2 | 1 | 1 | 1 | 12 | 17% |
| 5. | Creating - (Appraise, judge, and/or justify the value or worth of a decision or outcome, or to predict outcomes based on values) | 1 | 1 | 2 | - | 9 | 13% |
| | Total | 5x1=5 | 7x2=14 | 12x3=36 | 3x5=15 | 70(27) | 100% |

CLASS XII (2019-20) (THEORY)**Time: 3 Hours****Max. Marks: 70**

| Unit | Title | No. of Periods | Marks |
|-------------|------------------------------------|-----------------------|--------------|
| VI | Reproduction | 30 | 14 |
| VII | Genetics and Evolution | 40 | 18 |
| VIII | Biology and Human Welfare | 30 | 14 |
| IX | Biotechnology and its Applications | 30 | 10 |
| X | Ecology and Environment | 30 | 14 |
| | | 160 | 70 |

PRACTICALS (XII) (2019-20)**Time Allowed: Three hours****Max. Marks: 30**

| | |
|--|-----------------|
| One Major Experiment | 5 Marks |
| One Minor Experiment | 4 Marks |
| Slide Preparation | 5 Marks |
| Spotting | 7 Marks |
| Practical Record + Viva Voce (Credit to the students' work over the academic session may be given) | 4 Marks |
| Project Record + Viva Voce (Credit to the students' work over the academic session may be given) | 5 Marks |
| Total | 30 Marks |

KENDRIYA VIDYALAYA SANGATHAN, PATNA REGION

SPLIT UP SYLLABUS

2019-20

SUBJECT – BUSINESS STUDIES

CLASS - XII

| S.NO | CHAPTERS | PERIODS ALLOTTED | MONTH |
|-------------|---|-------------------------|------------------|
| 1. | Nature and Significance of Management | 12 | April |
| 2. | Principles of Management | 14 | April |
| 3. | Business Environment | 12 | May-June |
| 4. | Planning | 14 | July |
| 5. | Organising | 15 | July |
| 6. | Staffing | 16 | August |
| 7. | Directing | 15 | August |
| 8. | Controlling | 12 | September |
| 9. | Financial Management | 20 | September |
| 10. | Financial Market | 18 | October |
| 11. | Marketing Management | 30 | October-November |
| 12. | Consumer Protection | 12 | November |
| 13. | Revision and 1 st Pre board Exam | | December |
| 14. | Revision, 2 nd Pre board Exam and CBSE Practical | | January-February |
| | Project Work | 30 | |

KENDRIYA VIDYALAYA SANGATHAN, PATNA REGION, PATNA

**Split up syllabus
Class-XII(2019-20) Subject :- Chemistry**

| Sl.No | Unit | Topic/Chapter | Month | Marks | Topic for Practical |
|-------|------|---|--------------|----------|---|
| | | | | | Qualitative analysis |
| 1 | 1 | Solutions | April | 23 | Electrochemistry |
| 2 | 2 | Electrochemistry | April- May | | Thermochemistry |
| 3 | 3 | Chemical Kinetics | May | | Qualitative analysis (contd) |
| 4 | 4 | Surface Chemistry | June | | Surface Chemistry |
| 5 | 5 | General Principles and Process of Isolation of Elements | July | 19 | Chemical Kinetics |
| 6 | 6 | p-Block Elements | July | | Chromatography |
| 7 | 7 | d & f - Block Elements | July-Aug | | Volumetric Analysis |
| 8 | 8 | Coordination Compounds | August | | Preparation of inorganic compound |
| 9 | 9 | Halo- alkanes and haloarenes | August | 28 | Detection of functional groups |
| 10 | 10 | Alcohols, Phenols and Ethers | Aug. - Sept. | | Detection of functional groups |
| 11 | 11 | Aldehyde, Ketones and Carboxylic acid | September | | Investigatory project |
| 12 | 12 | Organic Compounds containing Nitrogen | Sept. - Oct. | | Qualitative analysis(Revision) |
| 13 | 13 | Biomolecules | October | | Volumetric Analysis |
| 14 | 14 | Polymers | November | | Test for carbohydrates, fast and proteins |
| 15 | 15 | Chemistry in everyday life | November | Revision | |
| | | Revision | December | | |
| | | First Pre-Board Examination | December | 70 | Revision |
| | | Revision and Second pre-Board Examination | January | 70 | |
| | | AISSC Practical Examination | Jan/Feb | 30 | |
| | | AISSC Theory Examination | March | 70 | |

KENDRIYA VIDYALAYA SANGATHAN, PATNA REGION, PATNA

Split up syllabus

Class-XI (2019-20) Subject:- Chemistry

| Sl.No | Unit | Topic/Chapter | Month | Marks | Topic for Practical |
|-------|------|--|-------------|-------|---|
| 1 | 1 | Some Basic Concepts of Chemistry | June | 8 | <u>A. Basic Laboratory Techniques</u> i. Cutting glass tube and glass rod ii. Bending a glass tube iii. Drawing out a glass jet iv. Boring a cork |
| 2 | 2 | Structure of Atom | June-July | | |
| 3 | 3 | Classification of Elements and Periodicity in Properties | July | 4 | |
| 4 | 4 | Chemical Bonding and Molecular Structure | July-Aug. | 20 | |
| | | First Periodic Test | Aug. | | Quantitative/Volumetric Expt |
| 5 | 5 | States of Matter: Gases and Liquids | Aug. | | Preparation of Standard soln. Use of |
| 6 | 6 | Chemical Thermodynamics | Aug. | | Chemical balance, Titration |
| 7 | 7 | Equilibrium | Sept. | | Investigatory Project |
| 8 | 8 | Redox Reactions | Sept. | 20 | Experiments based on Chemical Equilibrium, pH |
| | | Revision before Mid Term Examination | | | Qualitative Analysis, Salt Test |
| | | Mid Term Examination (Theory and Practical) | | | |
| 9 | 9 | Hydrogen | Oct. | | |
| 10 | 10 | s-Block Elements | November | | |
| 11 | 11 | Some p-Block Elements | Dec. | | |
| 12 | 12 | Organic Chemistry: Some basic Principles and Techniques | Dec.-Jan. | 18 | Detection of element in Organic Compounds |
| 13 | 13 | Hydrocarbons | Jan. - Feb. | | Salt Test |
| | | Second Periodic Test | January | | |
| 14 | 14 | Environmental Chemistry | February | | Revision |
| | | Session Ending Practical Examination | February | 30 | |
| | | Session Ending (Theory) Examination | March | 70 | |

KENDRIYA VIDYALAYA SANGATHAN, PATNA REGION
SPLIT-UP SYLLABUS
SUBJECT- ECONOMICS
SESSION 2019-20
CLASS- XII

| S.N O. | Name of the Exam | Name of the Chapter/Topics | No. of periods required | Tentative working days | MONTH |
|--------|------------------|---|-------------------------|------------------------|----------|
| 1 | Monthly Test -1 | <p>Part A:</p> <p>Unit 1: National Income and Related Aggregates</p> <p>What is Macroeconomics? Basic concepts in macroeconomics: consumption goods, capital goods, final goods, intermediate goods; stocks and flows; gross investment and depreciation. Circular flow of income (two sector model); Methods of calculating National Income - Value Added or Product method, Expenditure method, Income method. Aggregates related to National Income: Gross National Product (GNP), Net National Product (NNP), Gross and Net Domestic Product (GDP and NDP) - at market price, at factor cost; Real and Nominal GDP. GDP and Welfare</p> | 20 | 22 | APRIL |
| 2 | Monthly Test -2 | <p>Unit 2: Money and Banking Money –</p> <p>meaning and supply of money- Currency held by the public and net demand deposits held by commercial banks. Money creation by the commercial banking system. Central bank and its functions (example of the Reserve Bank of India): Bank of issue, Govt. Bank, Banker's Bank, Control of Credit through Bank Rate, CRR, SLR, Repo Rate and Reverse Repo Rate, Open Market Operations, Margin requirement.</p> | 16 | 18 | MAY-JUNE |
| 3 | | <p>Unit 3: Determination of Income and Employment</p> <p>Aggregate demand and its components. Propensity to consume and propensity to save (average and marginal). Short-run equilibrium output; investment multiplier and its mechanism. Meaning of full employment and involuntary unemployment. Problems of excess demand and deficient demand; measures to correct them - changes in government spending, taxes and money supply.</p> | 25 | 26 | JULY |

| | | | | | |
|---|------------------|--|----|----|-----------|
| 4 | | <p>Unit 4: Government Budget and the Economy</p> <p>Government budget - meaning, objectives and components. Classification of receipts - revenue receipts and capital receipts; classification of expenditure – revenue expenditure and capital expenditure. Measures of government deficit - revenue deficit, fiscal deficit, primary deficit their meaning.</p> | 11 | 23 | AUGUST |
| 5 | | <p>Unit 5: Balance of Payments</p> <p>Balance of payments account - meaning and components; balance of payments deficit- meaning. Foreign exchange rate - meaning of fixed and flexible rates and managed floating. Determination of exchange rate in a free market.</p> | 12 | | |
| 6 | | <p>Part B:</p> <p>Unit 6: Development Experience (1947-90) and Economic Reforms since 1991</p> <p>A brief introduction of the state of Indian economy on the eve of independence. Common goals of Five Year Plans. Main features, problems and policies of agriculture (institutional aspects and new agricultural strategy, etc.), industry (industrial licensing, etc.) and foreign trade. Concepts of demonetization and GST</p> | 9 | 22 | SEPTEMBER |
| 7 | HALF YEARLY EXAM | <p>Unit 7: Current challenges facing Indian Economics</p> <p>Poverty- absolute and relative; Main programmes for poverty alleviation: A critical assessment;</p> <p>Rural development: Key issues - credit and marketing - role of cooperatives; agricultural diversification; alternative farming - organic farming</p> <p>Human Capital Formation: How people become resource; Role of human capital in economic development; Growth of Education Sector in India</p> <p>Employment: Formal and informal growth.</p> <p>Infrastructure: Meaning and Types: Case Studies: Energy and Health: Problems and Policies- A critical assessment;</p> <p>Sustainable Economic Development: Meaning, Effects of Economic Development on Resources and Environment, including global warming.</p> | 14 | 17 | OCTOBER |

| | | | | | |
|----|------------------|--|----|----|----------|
| 8 | HALF YEARLY EXAM | Unit 8: Development Experience of India A comparison with neighbours India and Pakistan India and China Issues: growth, population, sectoral development and other Human Development Indicators. | 20 | 24 | NOVEMBER |
| 9 | | Part C: Project in Economics PRE BOARD –I | | | DECEMBER |
| 10 | | PRE BOARD –II | | | JANUARY |
| 11 | | PRACTICE OF SAMPLE PAPERS AND BOARD QUESTION PAPERS | | | FEBRUARY |
| 12 | | SESSIONENDING EXAM-2020 | | | MARCH |

PROJECT TOPIC :

| | |
|--|--|
| • Micro and Small Scale Industries | • Food Supply Channel in India |
| • Contemporary Employment situation in India | • Disinvestment policy of the government |
| • Goods and Services Tax Act and its Impact on GDP | • Health Expenditure (of any state) |
| • Human Development Index | • Inclusive Growth Strategy |
| • Self-help group | • Trends in Credit availability in India |
| • Monetary policy committee and its functions | • Role of RBI in Control of Credit |
| • Government Budget & its Components | • Trends in budgetary condition of India |
| • Exchange Rate determination – Methods and Techniques | • Currency War – reasons and repercussions |
| • Livestock – Backbone of Rural India | • Alternate fuel – types and importance |
| • Sarva Siksha Abhiyan – Cost Ratio Benefits | • Golden Quadrilateral- Cost ratio benefit |
| • Minimum Support Prices | • Relation between Stock Price Index and Economic Health of Nation |
| • Waste Management in India – Need of the hour | • Minimum Wage Rate – approach and Application |
| • Digital India- Step towards the future | • Rain Water Harvesting – a solution to water crises |
| • Vertical Farming – an alternate way | • Silk Route- Revival of the past |
| • Make in India – The way ahead | • Bumper Production- Boon or Bane for the farmer |
| • Rise of Concrete Jungle- Trend Analysis | • Organic Farming – Back to the Nature |
| • Any other newspaper article and its evaluation on basis of economic principles | • Any other topic |

ECONOMICS (030)
CLASS – XII (2019-20)

THEORY : 80 MARKS

3 HOURS

PROJECT : 20 MARKS

| | | |
|---------------|---|-----------|
| Part A | Introductory Macroeconomics | 40 |
| Unit 1 | National Income and Related Aggregates | 10 |
| Unit 2 | Money and Banking | 06 |
| Unit 3 | Determination of Income and Employment | 12 |
| Unit 4 | Government Budget and the Economy | 06 |
| Unit 5 | Balance of Payments | 06 |
| Part B | Indian Economic Development | 40 |
| Unit 6 | Development Experience(1947-90) and Economic Reforms since 1991 | 12 |
| Unit 7 | Current Challenges facing Indian Economy | 20 |
| Unit 8 | Development Experience of India – A Comparison with Neighbours | 08 |
| Part C | Project Work | 20 |

SUGGESTED QUESTION PAPER DESIGN
ECONOMICS (CODE NO. 030)
CLASS XII (2019-20)
MARCH 2020 EXAMINATION

MARKS: 80

DURATION: 3HRS.

| SN | Typology of Questions | Objective Type/ MCQ 1 Mark | Short Answer I 3 Marks | Short Answer II 4 Marks | Long Answer 6 Marks | Marks |
|----|--|-------------------------------|---------------------------|----------------------------|------------------------|-------|
| 1 | Remembering: Exhibit memory of previously learned material by recalling facts, terms, basic concepts, and answers. | 5 | 1 | 2 | 1 | 22 |
| 2 | Understanding: Demonstrate understanding of facts and ideas by organizing, comparing, translating, interpreting, giving descriptions, and stating main ideas. | 5 | 1 | 2 | 1 | 22 |
| 3 | Application: Solve problems to new situations by applying acquired knowledge, facts, techniques and rules in a different way. | 5 | 1 | 1 | 1 | 18 |

| | | | | | | |
|---|---|---------|--------|--------|--------|---------|
| 4 | <p><u>Analysing and Evaluating:</u> Examine and break information into parts by identifying motives or causes. Make inferences and find evidence to support</p> <p><u>Generalizations.</u> Present and defend opinions by making judgments about information, validity of ideas, or quality of work based on a set of criteria.</p> <p><u>Creating:</u> Compile information together in a different way by combining elements in a new pattern or proposing alternative solutions.</p> | 5 | 1 | 1 | 1 | 18 |
| | Total | 20X1=20 | 4X3=12 | 6X4=24 | 4X6=24 | 80 (34) |

There will be Internal Choices in questions of 1 mark, 3 marks, 4 marks and 6 marks in both sections (A & B). In all, there will be total of 8 internal choices.

KENDRIYA VIDYALAYA SANGATHAN PATNA REGION
Split-Up Syllabus 2019-20
Class-XII English

| Month | Syllabus to be Covered | |
|---|--|--|
| | Textbook/Section | Lessons/Topic/Activity |
| April | Flamingo | My Mother at Sixty-Six |
| | | The Last Lesson |
| | | Lost Spring |
| | Reading Skill | Note making & Summarizing |
| | Vistas | The Third Level |
| | Writing Skill | Notice Writing |
| Official Letters- Enquiries, Complaints, Asking & Giving Info., Placing Orders, Replies | | |
| May | Writing Skill | Article Writing |
| | Vistas | The Tiger King |
| June | Flamingo | An Elementary School Classroom in a Slum |
| | Reading | Reading Comprehension |
| July | Flamingo | Keeping Quiet |
| | | Deep Water |
| | | The Rattrap |
| | Vistas | Journey to the end of the Earth |
| | | The Enemy |
| | Writing Skill | Advertisement |
| Debate | | |
| August | Flamingo | A Thing of Beauty |
| | | Indigo |
| | | Poets and Pancakes |
| | Vistas | Should Wizard Hit Mommy? |
| | Writing Skill | Invitations & Replies |
| Letter to Editor | | |
| September | Flamingo | Roadside Stand |
| | | The Interview |
| | Vistas | On the face of it |
| | Writing Skill | Speech Writing |
| | | Report Writing |
| Job Application | | |
| October | Vistas | Evans Tries an O-Level |
| | Flamingo | Aunt Jennifer's Tigers |
| | | Going Places |
| | Reading Skill | Note making & Summarizing |
| Writing Skill | Poster Designing | |
| November | Reading Skill | Reading Comprehension |
| | Vistas | Memories of Childhood |
| | Practice of Listening & Speaking Skills (ASL) & Revision for Pre-Board-1 Exams | |
| December | Revision for Pre-Board-2 Exams | |
| Jan-Feb | Assessment of Listening & Speaking Skills (ASL) & Revision for AISSCE-2020 | |

KENDRIYA VIDYALAYA :: MUZAFFARPUR
(PATNA REGION)
(SPLIT - UP SYLLABUS 2019-20)

CLASS - XII

SUBJECT - GEOGRAPHY

| Month | Book-I, Fundamentals of Human Geography | Periods | Book-II, India: People & Economy | Periods | Practical work in Geography Part-II | Periods |
|-----------|--|---------|--|---------|--|---------|
| April | Human Geography: Nature & Scope People *The World Population, Distribution, Density & Growth *Population Composition | 23 | People *Population: Distribution , Density , Growth & Composition *Migration: types; causes & consequences | 12 | nil | |
| May/ June | *Human Development | 4 | *Human Development | 5 | Processing of Data & Thematic Mapping *Data -Its sources & compilation | 6 |
| July | Human Activities: *Primary Activities *Secondary Activities *Tertiary, Quaternary & Quinary Activities | 21 | Human Settlements Resources & Development: *Land Resources & Agriculture | 14 | *Data Processing | 6 |
| August | Transport, Communication & Trade: *Transport & Communication *International Trade | 16 | Resources & Development: *Water Resources *Mineral & Energy Resources | 16 | * Graphical Representation of Data | 8 |

| | | | | | | |
|------------------|---|-----------|--|---------------------------|--|-----------|
| September | Human Settlements | 10 | *Manufacturing Industries *Planning & Sustainable Development in Indian Context. | 18 | Thematic Mapping | 8 |
| October | | | Transport, Communication & International Trade: *Transport & Communication *International Trade | 12 | *Use of computer in Data Processing & Mapping | 10 |
| November | Map Work (revision) | 4 | Geographical Perspectives on Selected Issues & Problems *Map work (revision) | 12 4 | Field Survey/ Spatial Information Technology | 15 |
| | Revision | | | | | |
| December | Pre-Board 1(only Theory exam) Entire Syllabus:30(Book1)+5(world map for identification only) +30 (book 2)+5(India map for locating & labeling), Tentative date- 02-10 December,2019 | | | | | |
| January | Pre-Board 2(only Theory exam) Entire Syllabus:30(Book1)+5(world map for identification only) +30 (book 2)+5(India map for locating & labeling), Tentative date- 16-23 January,2020 | | | | | |
| February | Pre-Board 3(only Theory exam) Entire Syllabus:30(Book1)+5(world map for identification only) Tentative date-February,2020 | | | | | |

+30 (book 2)+5(India map for locating & labeling),

Note:- Bold letters indicate units & (*) mark indicates chapters.

PREPARED BY : SANJEEV KUMAR SINHA, PRINCIPAL , KV. MUZAFFARPUR

KENDRIYA VIDYALAYA SANGATHAN

PATNA REGION

SPLIT UP SYLLABUS

SESSION: 2019-20

Subject: History

Class: XI

Full Marks:100

| Parts | S. No. | Name of the chapter | Month | No. of Working days | Learning Outcome | No. of periods | Weightage of Marks | Test/Exam |
|----------------------------------|--------|-----------------------------------|---|---------------------|---|----------------|--------------------|--|
| | 1 | Introduction to world History | June | 10 | | 8 | | |
| Part I Early society | 2 | From the Beginning of Time | | | Early human species, Evidences Chronological developments, Food habits, Differences, Tool, Making-art and Craft | 40 | 19 | |
| | 3 | Writing and City Life | | | Early city, Planning, Writing style, Evidences, Clay tablets, Texts, Early Library | | | |
| Part II Empire | 4 | An Empire across three continents | July | 26 | Roman empire, Polity, Economy, Rules and Rulers, Social life and slaves, Architecture | 50 | 19 | 1 st Periodic test Unit –1 and 2 |
| | 5 | Central Islamic Lands | | | August | | | 23 |
| | 6 | Nomadic Empires | Extension of Nomadic Empire, Rulers, Contribution, Yasa, Ghensin Khan | | | | | |
| Part – III Changing Tradition | 7 | Three Orders | September | 23 | Feudal system, Manor, Society in France and England, Life of peasants | 50 | 19 | Half- yearly 3 rd & 4 th week of oct. Syllabus – upto sept. |
| | 8 | Changing Cultural Traditions | | | Revival of Italian cities, Humanism, Artists and realism, Universities and new subjects, Renaissance, Martin Luther protestant Movement | | | |
| | 9 | Confrontation of Cultures | October | 15 | Maya, Inca and Aztecs, Civilizations, Colonization of America by Spain | | | |

| | | | | | | | | |
|---|----|-------------------------------------|-----------------------|----|---|-----|-----|--|
| Part- IV Towards modernization | 10 | The Industrial Revolution | November | 23 | Industrial Revolution, New machine and technology, Transport and communication, -Factory system | 52 | 19 | |
| | 11 | Displacing Indigenous People | December | 17 | Natives and settlers. Gold Rush, American Natives and Europeans, Growth of Industry, Australia | | | |
| | 12 | Paths to Modernization | January | 17 | Japan ,Political system, Meiji Restoration and Reforms, China, Republic, communist party, cultural revolution, Taiwan | | | 2 nd Periodic Test Chapters 8,9,10 |
| | 13 | Revision Session Ending Exam | February March | | | | | Session Ending Examination will include entire Syllabus. |
| | 14 | Map Work(All Units) | | | | 10 | 4 | |
| | 15 | Project Work | | | | 10 | 20 | |
| | | Total | | | | 220 | 100 | |
| <p>Note:-</p> <p>1. 3 comprehension questions can be taken from any of the above Parts- I, II, III, IV. - 2 Accordingly, teacher can reduce weightage of the corresponding sections.</p> <p>2. For detailed information related to completion of Project, go through the Guidelines given by CBSE(www.cbse.nic.in)</p> | | | | | | | | |

KENDRIYA VIDYALAYA SANGATHAN
PATNA REGION
SPLIT UP SYLLABUS
Session: 2019-20

Class: XII

Subject: History

Full marks: 100

| S. No. | Name of the chapter | Month | No. of Working days | Learning Outcome | No. of periods | Weightage of Marks | TEST AND EXAMS |
|--------|---|--------|---------------------|--|----------------|---|----------------|
| 1 | Bricks, Beads and Bones (Harappan Civilisation) | April | 23 | Ancient Urban Center as economic and social institution, Sources, Planning, Major sites | 13 | Part- I (25) Including one comprehensive | MONT HLY TEST |
| 2 | Kings, Farmers and Towns | June | 10 | From 600 BCE to 600 CE the political trends and economic history of the sub-continent .Inscriptional sources and others | 14 | | |
| 3 | Kinship, Caste and Class | | | Mahabharat as a source to know the social History of 600 BC to 600 CE, Textual analysis and reconstructing social history | 14 | | |
| 4 | Thinkers, Beliefs and Buildings | | | Cultural and religious trends from 600 BCE to 600 CE, Jainism and Buddhism and Hinduism, teachings and principles, monuments and reconstructing religious histories. | 14 | | MT |
| 5 | Through the Eyes of Travellers | July | 26 | Medieval society through traveler's account, Al Beruni, Ibn-Batuta and Bernier | 13 | Part- II (24) Including one comprehensive | |
| 6 | Bhakti-Sufi Traditions | | | Religious developments in medieval period, Bhakti Sufi traditions features saints, texts and teachings | 13 | | |
| 7 | An Imperial Capital: Vijayanagara | | | Imperial city Vijaynagar, history, Rulers, Buildings, Colin Meckengie's findings | 13 | | MT |
| 8 | Peasants Zamindars and the State | August | 23 | 15 TH to 17 TH century, Mughal period, Sources, Ain-i- Akbari, Administration Revenue records & Revenue system village community and artisans, Panchayat and Zamindars, Trade and commerce | 13 | comprehensive | |
| 9 | Kings and Chronicles | | | Mughal court and Mughal cronicles , Akbarnama and Padsahnama, limitations | 13 | | |
| 10 | Colonialism and the country side | | | Life of Zamindars, Peasants and artisans. Revenue settlements, official records, fifth report, Deccan Riot report | 13 | | MT |

| | | | | | | | |
|----|---|-----------|----|--|-----|--|------|
| 11 | Rebels and the Raj. | September | 23 | Representation of the Revolt of 1857, sources, causes, Leaders, Centres, repressive measures, prophesies | 13 | Part-III (25) Including one comprehension | |
| 12 | Colonial cities | | | Modern urban centers established by the colonial govt., Black and White township, other buildings, Architectural styles. | 13 | | MT |
| 13 | Mahatma Gandhi and the nationalist Movement | October | 15 | Nationalist Movement and Gandhian leadership, Ideals of Gandhiji, movements, Sources to know about Gandhiji. | 13 | | |
| 14 | Understanding partition(Politics, Memories and Experiences) | | | About partition, Factors, Growth of Communalism, oral histories, limitations, effects. | 14 | | MT |
| 15 | Framing the Constitution(The Beginning of New Era) | November | 23 | Indian constitution, Ideals, Objective Resolution, leaders, committees, members, features, Language and Minority issue. | 14 | | MT |
| | | December | 17 | REVISION | | | PB-1 |
| | | January | 17 | REVISION | | | PB-2 |
| | | February | | REVISION | | | |
| 16 | Map Work(All Units) | | | | 10 | 6 | |
| 17 | Project Work | | | | 10 | 20 | |
| 18 | Total | | | | 220 | 100 | |

Note: There is no change in the syllabus. 3 comprehension questions can be taken from any of the above Parts- 1,2,3 Accordingly teacher can reduce weightage of the corresponding sections.

KENDRIYA VIDYALAYA SANGATHAN, PATNA REGION

SPLIT-UP SYLLABUS
SUB: COMPUTER SCIENCE (083)
CLASS - XI (NEW SYLLABUS)
SESSION 2019-20

DISTRIBUTION OF MARKS

| UNIT | UNIT NAME | MARKS |
|------|--|------------|
| 1 | Computer System and Organization | 10 |
| 2 | Programming and Computational Thinking | 35 |
| 3 | Data Management | 15 |
| 4 | Society, Law and Ethics | 10 |
| 5 | Practicals | 30 |
| | TOTAL | 100 |

MONTH- WISE DISTRIBUTION

| Month | Topics to be covered | Th. | Pr. |
|-----------|--|-----|-----|
| June-July | <ul style="list-style-type: none"> <input type="checkbox"/> Unit 1: Computer Systems and Organization Basic computer organisation: description of a computer system and mobile system, CPU, memory, hard disk, I/O, battery. <input type="checkbox"/> Types of software: application, System, utility. <input type="checkbox"/> Memory Units: bit, byte, MB, GB, TB, and PB. <input type="checkbox"/> Boolean logic: OR, AND, NAND, NOR, XOR, NOT, truth tables, De Morgan's laws <input type="checkbox"/> Information representation: numbers in base 2, 8, 16, binary addition <input type="checkbox"/> Strings: ASCII, UTF8, UTF32, ISCII (Indian script code), Unicode <input type="checkbox"/> Basic concepts of Flowchart <input type="checkbox"/> Concept of Compiler & Interpreter <input type="checkbox"/> Running a program: Notion of an operating system, how an operating system runs a program, idea of loading, operating system as a resource manager. <input type="checkbox"/> Concept of cloud computing, cloud (public/private), introduction to parallel computing. | 30 | 25 |
| August | <p>Unit 2: Computational Thinking and Programming</p> <ul style="list-style-type: none"> <input type="checkbox"/> Basics of Computational Thinking: Decomposition, Pattern Recognition/ Data representation, Generalization/ Data Abstraction and algorithm. <input type="checkbox"/> Familiarization with the basics of Python programming: a simple "hello world" program, process of writing a program (Interactive & Script mode), running it, and print statements; simple data-types: integer, float, string <input type="checkbox"/> Features of Python, Python Character Set, Token & Identifiers, Keywords, <input type="checkbox"/> Literals, Delimiters, operators. <input type="checkbox"/> Comments: (Single line & Multiline/ Continuation statements), Clarity & <input type="checkbox"/> Simplification of expression. <input type="checkbox"/> Introduce the notion of a variable, and methods to manipulate it (concept of Lvalue and R-value even if not taught explicitly). <input type="checkbox"/> Knowledge of data types and operators: accepting input from the console, assignment statement, expressions, operators and their precedence. <input type="checkbox"/> Operators & types: Binary operators-Arithmetic, Relational operators, Logical Operators, Augmented Assignment operators. | 25 | 25 |

| | | | |
|-----------|--|----|----|
| September | <input type="checkbox"/> Conditional statements: if, if-else, if-elif-else; simple programs: e.g.: absolute value, sort 3 numbers, and divisibility. <input type="checkbox"/> Notion of iterative computation and control flow: for(range()),len()), while, flowcharts, suggested programs: interest calculation and factorials, etc. <input type="checkbox"/> Idea of debugging: errors and exceptions; debugging: pdb, break points. | 25 | 20 |
| October | HALF YEARLY EXAMINATION | | |
| | <input type="checkbox"/> Lists, tuples and dictionary: finding the maximum, minimum, mean; linear search on list/tuple of numbers, and counting the frequency of elements in a collection using numbers and names. | 10 | 06 |
| November | <input type="checkbox"/> Sorting algorithm: bubble and insertion sort; count the number of operations while sorting. <input type="checkbox"/> Strings: Traversing, compare, concat, substring. <input type="checkbox"/> Introduction to Python modules: Importing math (sqrt, cell, floor, pow, fabs, sin, cos, tan, random (random, randint, randrange), statistics (mean, median, mode) modules. | 20 | 10 |
| December | Unit 3: Data Management <input type="checkbox"/> Relational databases: Concept of a database, relations, attributes and tuples, keys- candidate key, primary key, alternate key, foreign key; Degree and cardinality of a table. <input type="checkbox"/> Use SQL – DDL/ DML commands to CREATE TABLE, INSERT INTO, UPDATE TABLE , DELETE FROM, ALTER TABLE, MODIFY TABLE, DROP FROMWHERE-ORDER BY along with BETWEEN, IN, LIKE, (Queries only on single table) <input type="checkbox"/> Aggregate functions – MIN,MAX,AVG,COUNT,SUM <input type="checkbox"/> Basics of NoSQL databases. | 30 | 24 |
| January | UNIT 4: Society , Law and Ethics - Cyber Safety <input type="checkbox"/> Cyber safety: safely browsing the web, identity protection, confidentiality, social networks, cyber trolls and bullying <input type="checkbox"/> Appropriate usage of social networks: spread of rumours, and common social networking sites (Twitter, LinkedIn, and Facebook) and specific usage rules. <input type="checkbox"/> Safely accessing web sites: adware, malware, viruses, Trojans <input type="checkbox"/> Safely communicating data: secure connections, eavesdropping, phishing and identity verification. | 10 | |
| Feb-March | Revision, Project Work , Session Ending Practical Examination & SE Exam | | |

PRACTICAL WORK CLASS – XI : COMPUTER SCIENCE (083)

DISTRIBUTION OF MARKS

| S.No. | UNIT NAME | MARKS |
|-------|--|-------|
| 1 | Lab Test (12 marks) | |
| | Python programs to test PCT (60% logic + 20% documentation +20% code quality) | 8 |
| | SQL program (at least 4 queries) | 4 |
| 2 | Report File + viva (10 marks) | |
| | Report file: Minimum 20 Python programs (PCT + DH) and at least 8 SQL commands. | 7 |
| | Viva voce (based on the report file) | 3 |
| 3 | Project Work (that uses most of the concepts that have been learnt) Project may be allotted to group of 2-3 students. | 8 |

KENDRIYA VIDYALAYA SANGATHAN, PATNA REGION**SPLIT-UP SYLLABUS****SUB: INFORMATICS PRACTICES (065)****CLASS - XI (NEW SYLLABUS)****(SESSION 2019-20)****DISTRIBUTION OF MARKS**

| UNIT | UNIT NAME | MARKS |
|------|---------------------------------|------------|
| 1 | Introduction of Computer System | 5 |
| 2 | Introductory Python Programming | 30 |
| 3 | Data Handling | 10 |
| 4 | Data Management | 15 |
| 5 | Society, Law and Ethics | 10 |
| 6 | Practicals | 30 |
| | TOTAL | 100 |

MONTH- WISE DISTRIBUTION

| Month | Topics to be covered | Th. | Pr. |
|-----------|--|-----|-----|
| June-July | Unit 1: Introduction of Computer System <ul style="list-style-type: none"><input type="checkbox"/> Basic computer organisation: Computer system – I/O Devices, CPU, memory, hard disk, battery, power, transition from a calculator to a computer and further to smart devices.<input type="checkbox"/> Trouble shooting with parts of computer and basic operations of operating system<input type="checkbox"/> Basic concept of Data representation: Binary, ASCII, Unicode Unit 2: Introduction Python Programming <ul style="list-style-type: none"><input type="checkbox"/> Familiarization with the basic of Python programming: a simple "hello world" program, process of writing a program, running it, and print statements; simple data-types: integer, float, string. Introduce the notion of variable, and methods to manipulate it (concept of L-value and R-value even if not taught explicitly). Tokens - keywords, identifiers, Literals, Delimiters. Knowledge of data type and operators: accepting input from the console, assignment statement, expressions, operators (assignment, arithmetic, relational and logical) and their precedence. | 30 | 20 |
| August | <ul style="list-style-type: none"><input type="checkbox"/> Conditional statements: if, if-else, if-elif-else; simple programs: e.g.: absolute value, sort 3 numbers, divisibility.<input type="checkbox"/> Notion of iterative computation and control flow: for (range() , len()), while, flowcharts.<input type="checkbox"/> Suggested programs: finding average and grade for given marks, amount calculation for given cost-qty-discount, perimeter-wise/ area-wise cost calculation, interest calculation, profit-loss, EMI, tax calculation (example from GST/Income Tax). | 20 | 20 |

| | | | |
|--------------|--|----|----|
| September | <input type="checkbox"/> List and dictionary: finding the maximum, minimum, mean; linear search on a list of numbers, and counting the frequency of elements in a list using a dictionary. <input type="checkbox"/> Text handling: compare, concat, and substring operations (without using string module). | 20 | 20 |
| October | HALF YEARLY EXAMINATION | | |
| | <input type="checkbox"/> Introduction to Python modules: importing math (sqrt, ceil, floor, pow, fabs), random (random, randint, randrange), statistics (mean, median) modules. | 10 | 05 |
| Nov | Unit 3: Data Handling <input type="checkbox"/> Numpy 1D array, 2D array Arrays: slices, joins, and subsets. Arithmetic operations on 2D arrays. | 20 | 15 |
| December | Unit 4: Data Management <input type="checkbox"/> Relational databases: Concept of a database, relations, attributes and tuples, keys - candidate key, primary key, alternate key, foreign key; Degree and Cardinality of a table. <input type="checkbox"/> Use SQL - DDL/DML commands to CREATE TABLE, INSERT INTO, UPDATE TABLE, DELETE FROM, ALTER TABLE, MODIFY TABLE, DROP TABLE, keys, and foreign keys; to view content of a table: SELECT-FROM-WHERE-ORDER BY alongwith BETWEEN, IN, LIKE. (Queries only on single table) <input type="checkbox"/> Aggregate Functions : MIN , MAX, AVG, COUNT, SUM | 30 | 20 |
| January | Unit 5: Society, Law and Ethics <input type="checkbox"/> Cyber safety: safely browsing the web, identity protection, confidentiality, social networks, netiquettes, digital footprint, cyber trolls and bullying. Appropriate usage of social networks: spread of rumours, and common social networking sites (Twitter, LinkedIn, and Facebook) and specific usage <input type="checkbox"/> Safely accessing web sites: adware, malware, viruses, Trojans. Safely communicating data: secure connections, eavesdropping, and phishing and identity verification. | 10 | |
| Feb.- Mar | Revision, Project Work , Session Ending Practical Examination & SE Exam | | |

PRACTICAL WORK CLASS – XI : INFORMATICS PRACTICES (065)

DISTRIBUTION OF MARKS

| S.No. | UNIT NAME | MARKS |
|-------|---|-------|
| 1 | Lab Test (15 marks) | |
| | Problem solving using Arithmetic operators, conditional statement & Iteration using Python (60% logic + 20% documentation +20% code quality) | 6 |
| | Problem solving using NumPy | 4 |
| | SQL program (at least 5 queries) | 5 |
| 2 | Report File + viva (10 marks) | |
| | Report file: Minimum 20 Python programs (PCT + DH) and at least 20 SQL queries | 6 |
| | Viva voce (based on the report file) | 4 |
| 3 | Project Work (that uses most of the concepts that have been learnt) | 5 |

KENDRIYA VIDYALAYA SANGATHAN, PATNA REGION**SPLIT-UP SYLLABUS****SUB: COMPUTER SCIENCE (083)****CLASS - XII (NEW SYLLABUS)****(SESSION 2019 - 20)****DISTRIBUTION OF MARKS**

| UNIT | UNIT NAME | MARKS |
|------|--|------------|
| 1 | Programming and Computational Thinking-2 | 30 |
| 2 | Computer Network | 15 |
| 3 | Data Management-2 | 15 |
| 4 | Society, Law and Ethics-2 | 10 |
| 5 | Practicals | 30 |
| | TOTAL | 100 |

MONTH- WISE DISTRIBUTION

| Month | Topics to be covered | Th. | Pr. |
|-----------|--|-----|-----|
| April | Unit 1: Programming and Computational Thinking-2 <input type="checkbox"/> Revision of the basics of Python <input type="checkbox"/> Functions: scope, parameter passing, mutable/immutable properties of data objects, pass arrays to functions, return values, functions using libraries: mathematical, and string functions. | 30 | 20 |
| May-June | <input type="checkbox"/> File handling: open and close a file, read, write, and append to a file, standard input, output, and error streams, relative and absolute paths. <input type="checkbox"/> Using Python libraries: create and import Python libraries | 20 | 10 |
| July | <input type="checkbox"/> Recursion: simple algorithms with recursion: factorial, Fibonacci numbers; recursion on arrays: binary search <input type="checkbox"/> Idea of efficiency: performance defined as inversely proportional to the wall clock time, count the number of operations a piece of code is performing, and measure the time taken by a program. Example: take two different programs for the same problem, and understand how the efficient one takes less time. | 30 | 25 |
| August | <input type="checkbox"/> Data visualization using Pyplot: line chart, pie chart, and bar chart. <input type="checkbox"/> Data-structures: lists, stacks, queues. | 25 | 25 |
| September | Unit 2: Computer Network (CN) <input type="checkbox"/> Structure of a network: Types of networks: local area and wide area (web and internet), new technologies such as cloud and IoT, public vs. private cloud, wired and wireless networks; concept of a client and server. <input type="checkbox"/> Network devices such as a NIC, switch, hub, router, and access point. <input type="checkbox"/> Network stack: amplitude and frequency modulation, collision in wireless routing. IP addresses: (v4 and v6), routing table, router, DNS, and web URLs, TCP: basic idea of retransmission, and rate modulation when there is congestion (analogy to a road network), Protocols: 2G, 3G, 4G, Wi-Fi. What makes a protocol have a higher bandwidth? | 25 | 20 |

| | | | |
|--------------------|---|----|----|
| | <input type="checkbox"/> Basic network tools: traceroute, ping, ipconfig, nslookup, whois, speed-test. <input type="checkbox"/> Application layer: HTTP (basic idea), working of email, secure communication: encryption and certificates (HTTPS), network applications: remote desktop, remote login, HTTP, FTP, SCP, SSH, POP/IMAP, SMTP, VoIP, NFC. | | |
| October october | HALF YEARLY EXAMINATION | | |
| | Unit 3: Data Management (DM-2) <input type="checkbox"/> Write a minimal Django based web application that parses a GET and POST request, and writes the fields to a file - flat file and CSV file. <input type="checkbox"/> Interface Python with an SQL database SQL commands: aggregation functions – having, group by, order by. | 15 | 05 |
| November NOV | UNIT 4: Society , Law and Ethics (SLE-2) <input type="checkbox"/> Intellectual property rights, plagiarism, digital rights management, and licensing (Creative Commons, GPL and Apache), open source, open data, privacy. <input type="checkbox"/> Privacy laws, fraud; cyber-crime- phishing, illegal downloads, child pornography, scams; cyber forensics, IT Act, 2000. <input type="checkbox"/> Technology and society: understanding of societal issues and cultural changes induced by technology. <input type="checkbox"/> E-waste management: proper disposal of used electronic gadgets. <input type="checkbox"/> Identity theft, unique ids, and biometrics. <input type="checkbox"/> Gender and disability issues while teaching and using computers. Revision, Project Work Submission | 15 | 05 |
| Dec- Jan | <input type="checkbox"/> Pre-Board Examination | | |
| Feb | <input type="checkbox"/> Revision & AISSCE Practical Examination | | |

GUIDELINES FOR PRACTICAL WORK COMPUTER SCIENCE (065) :CLASS - XII

DISTRIBUTION OF MARKS

| S.No. | UNIT NAME | MARKS |
|----------|---|-------|
| 1 | Lab Test (10 marks) | |
| | Python programs to test PCT (60% logic + 20% documentation +20% code quality) | 7 |
| | Small Python program that sends a SQL query to a database and displays the result. A stub program can be provided. | 3 |
| 2 | Report File + viva (09 marks) | |
| | Report file: Minimum 21 Python programs. Out of this at least 4 programs should send SQL commands to a database and retrieve the result; at least 1 program should implement the web server to write user data to a CSV file. | 7 |
| | Viva voce (based on the report file) | 2 |
| 3 | Project + viva (11 marks) * | |
| | Project Work (that uses most of the concepts that have been learnt) | 8 |
| | Project Viva Voce. | 3 |

*Refer CBSE Curriculum for detailed guidelines for Project work.

KENDRIYA VIDYALAYA SANGATHAN, PATNA REGION**SPLIT-UP SYLLABUS****SUB: INFORMATICS PRACTICES (065)****CLASS - XII (NEW SYLLABUS)****(SESSION 2019 - 20 ONWARD)****DISTRIBUTION OF MARKS**

| UNIT | UNIT NAME | MARKS |
|------|----------------------------|------------|
| 1 | Data Handling - 2 | 30 |
| 2 | Basic Software Engineering | 15 |
| 3 | Data Management-2 | 15 |
| 4 | Society, Law and Ethics-2 | 10 |
| 5 | Practicals | 30 |
| | TOTAL | 100 |

MONTH- WISE DISTRIBUTION

| Month | Topics to be covered | Th. | Pr |
|-----------|--|-----|----|
| April | Unit 1: Data Handling -2 : Python Pandas <input type="checkbox"/> Advanced operations on Data Frames: pivoting, sorting, and aggregation <input type="checkbox"/> Descriptive statistics: min, max, mode, mean, count, sum, median, quartile, var | 25 | 20 |
| May -June | <input type="checkbox"/> Create a histogram, and quantiles. <input type="checkbox"/> Function application: pipe, apply, aggregation (group by), transform, and apply map. <input type="checkbox"/> Reindexing, and altering labels. | 15 | 20 |
| July | Numpy <input type="checkbox"/> 1D array, 2D array <input type="checkbox"/> Arrays: slices, joins, and subsets <input type="checkbox"/> Arithmetic operations on 2D arrays <input type="checkbox"/> Covariance, correlation and linear regression | 30 | 25 |
| August | Plotting with Pyplot <input type="checkbox"/> Plot bar graphs, histograms, frequency polygons, box plots, and scatter plots. Unit 2: Basic Software Engineering (BSE) <input type="checkbox"/> Introduction to software engineering <input type="checkbox"/> Software Processes: waterfall model, evolutionary model, and component based model | 25 | 25 |
| September | <input type="checkbox"/> Delivery models: incremental delivery, spiral delivery <input type="checkbox"/> Process activities: specification, design/implementation, validation, evolution <input type="checkbox"/> Agile methods: pair programming, and Scrum <input type="checkbox"/> Business use-case diagrams <input type="checkbox"/> Practical aspects: Version control system (GIT), and do case studies of software systems and build use-case diagrams | 25 | 20 |

| HALF YEARLY EXAMINATION | | | |
|-------------------------|--|----|----|
| October | <p>Unit 3: Data Management (DM-2)</p> <ul style="list-style-type: none"> <input type="checkbox"/> Write a minimal Django based web application that parses a GET and POST request, and writes the fields to a file - flat file and CSV file. <input type="checkbox"/> Interface Python with an SQL database <p>SQL commands: aggregation functions – having, group by, order by.</p> | 10 | 05 |
| November | <p>UNIT 4: Society , Law and Ethics (SLE-2)</p> <ul style="list-style-type: none"> <input type="checkbox"/> Intellectual property rights, plagiarism, digital rights management, and licensing (Creative Commons, GPL and Apache), open source, open data, privacy. <input type="checkbox"/> Privacy laws, fraud; cyber-crime- phishing, illegal downloads, child pornography, scams; cyber forensics, IT Act, 2000. <input type="checkbox"/> Technology and society: understanding of societal issues and cultural changes induced by technology. <input type="checkbox"/> E-waste management: proper disposal of used electronic gadgets. <input type="checkbox"/> Identity theft, unique ids, and biometrics. <input type="checkbox"/> Gender and disability issues while teaching and using computers. <input type="checkbox"/> Role of new media in society: online campaigns, crowdsourcing, smart mobs <input type="checkbox"/> Issues with the internet: internet as an echo chamber, net neutrality, internet addiction <input type="checkbox"/> Case studies - Arab Spring, WikiLeaks, Bit coin <p>Revision, Project Work</p> | 15 | 05 |
| Dec- | <ul style="list-style-type: none"> <input type="checkbox"/> Pre-Board Examination | | |
| | <ul style="list-style-type: none"> <input type="checkbox"/> Revision & AISSCE Practical Examination | | |

PRACTICAL WORK
INFORMATICS PRACTICES (065) : CLASS - XII
DISTRIBUTION OF MARKS

| S.No. | UNIT NAME | MARKS |
|----------|---|-------|
| 1 | Lab Test (10 marks) | |
| | Python programs to test PCT (60% logic + 20% documentation +20% code quality) | 7 |
| | Small Python program that sends a SQL query to a database and displays the result. A stub program can be provided. | 3 |
| 2 | Report File + viva (09 marks) | |
| | Report file: Minimum 21 Python programs. Out of this at least 4 programs should send SQL commands to a database and retrieve the result; at least 1 program should implement the web server to write user data to a CSV file. | 7 |
| | Viva voce (based on the report file) | 2 |
| 3 | Project + viva (11 marks) * | |
| | Project Work (that uses most of the concepts that have been learnt) | 8 |
| | Project Viva Voce. | 3 |

*Refer CBSE Curriculum for detailed guidelines for Project work.

KENDRIYA VIDYALAYA SANGATHAN, PATNA REGION

SPLIT UP OF SYLLABUS FOR THE SESSION 2019-20

SUBJECT :- MATHS

CLASS :- XII

| S.No. | MONTHS | CHAPTERS/TOPICS |
|---|------------|--|
| 1. | APRIL | 1. RELATIONS AND FUNCTIONS 2. INVERSE TRIGONOMETRIC FUNCTIONS |
| 2. | MAY & JUNE | 3. MATRICES |
| 3. | JULY | 4. DETERMINANTS 5. CONTINUITY AND DIFFERENTIABILITY |
| 4. | AUGUST | 6 APPLICATIONS OF DERIVATIVES 7. INTEGRALS |
| 5. | SEPTEMBER | 8. APPLICATIONS OF INTEGRALS 9. DIFFERENTIAL EQUATIONS |
| HALF YEARLY EXAM 17/10/2019 TO 26/10/2019 | | |
| 6. | OCTOBER | 10. VECTORS 11. THREE-DIMENSIONAL GEOMETRY |
| 7. | NOVEMBER | 12. LINEAR PROGRAMMING 13. PROBABILITY |
| 8. | DECEMBER | I st PRE BOARD AND REVISION |
| 9. | JANUARY | II nd PRE BOARD AND REVISION |
| 10. | FEBRUARY | REVISION AND PRACTICE OF MODEL QUESTION PAPERS (3 rd Pre Board if necessary) |
| 11. | MARCH | FINAL BOARD EXAMINATION |

KENDRIYA VIDYALAYA SANGATHAN, PATNA REGION

SPLIT UP OF SYLLABUS FOR THE SESSION 2019-20

SUBJECT :- MATHS

CLASS :- XI

| 3 | MONTHS | CHAPTERS/TOPICS |
|-----|---|--|
| 1. | JUNE & JULY | 1 Sets 2 Relations & Functions 3 Trigonometric Functions UPTO graphs of trigonometric functions |
| 2. | FIRST UNIT TEST 01/08/2019 TO 08/08/2019 | |
| 3. | AUGUST | 4. Trigonometric Functions CONTINUED 5. Principle of Mathematical Induction 6. Complex Numbers and Quadratic Equations |
| 4. | SEPTEMBER | 7. Linear Inequalities 8. Permutations and Combinations 9. Binomial Theorem |
| 5. | HALF YEARLY EXAM 17/10/2019 TO 26/10/2019 | |
| 6 | OCTOBER | 10. Sequence and Series |
| 7. | NOVEMBER | 11. Straight Lines 12. Conic Sections 13. Introduction to Three-dimensional Geometry |
| 8. | DECEMBER | 14. Limits and Derivatives 15. Mathematical Reasoning |
| 9. | SECOND UNIT TEST 13/01/2020 TO 18/01/2020 | |
| 10. | JANUARY | 16. Statistics |
| 11. | FEBRUARY | 17. Probability REVISION AND PRACTICE OF MODEL QUESTION PAPERS |
| 12. | MARCH | YEARLY EXAM 04/03/2020 TO 19/03/2020 |

KENDRIYA VIDYALAYA SANGATHAN
SPLIT UP SYLLABUS (2019-2020)
SUB: PHYSICS CLASS: XII
REVIEWED SPLIT-UP SYLLABUS

| MONTH | W.Day | UNIT & CHAPTER | Chap Wise Classes required | MARKS | PERIOD ALLOTTED | EXAM | PRACTICALS |
|-------------------|-------|--|----------------------------|-------|-----------------|---|---|
| APRIL 2019 | 22 | 1. ELECTRIC CHARGES AND FIELDS. | 11 | 16 | 22 | --- | 1. To determine resistance per cm of a given wire by plotting a graph for potential difference versus current. 2. To find resistance of a given wire using metre bridge and hence determine the resistivity (specific resistance) of its material ACTIVITY -1 AND ACTIVITY-2 |
| | | 2. ELECTROSTATIC POTENTIAL AND CAPACITANCE | 11 | | | | |
| MAY AND JUNE 2019 | 18 | 3. CURRENT ELECTRICITY | 18 | | 20 | Monthly Test-1 May 1-6, 2019 | 3. To verify the laws of combination (series) of resistances using a meter bridge. ACTIVITY -3 AND ACTIVITY- 4 4. To verify the laws of combination (parallel) of resistances using a meter bridge 5. To compare the EMF of two given primary cells using potentiometer. |
| JULY 2019 | 26 | 4. MOVING CHARGES AND MAGNETISM | 14 | 17 | 22 | MONTHLY TEST-2 July 1-6, 2019 | 6. To determine the internal resistance of given primary cell using potentiometer. 7. To determine resistance of a galvanometer by half-deflection method and to find its figure of merit. 8. To find the value of v for different values of u in case of a concave mirror and to find the focal length. |
| | | 5. MAGNETISM AND MATTER | 08 | | | | |

| | | | | | | | |
|--------------------------------------|---|---|------------|-----------|-------------|--|--|
| AUG 2019 | 24 | 6.ELECTROMAGNETIC INDUCTION | 12 | 18 | 20 | MONTHLY TEST -3 Aug 1-6, 2019 | 9.To find the focal length of a convex mirror, using a convex lens. 10.To find the focal length of a convex lens by plotting graphs between u and v or between $1/u$ and $1/v$. ACTIVITY -5 11. To find the focal length of a concave lens, using a convex lens. |
| | | 7.ALTERNATING CURRENT | 8 | | | | |
| | 8. ELECTROMAGNETIC WAVES | 4 | 04 | | | | |
| SEPT 2019 | 22 | 9. RAY OPTICS AND OPTICAL INSTRUMENTS 10. WAVE OPTICS | 27 | 12 | 27 | MONTHLY TEST -4 Sep 1-6, 2019 | 12.To determine angle of minimum deviation for a given prism by plotting a graph between angle of incidence and angle of deviation. 13.To determine refractive index of a glass slab using a travelling microscope. 14.To find refractive index of a liquid by using convex lens and plane mirror. |
| OCT 2019 | 17 | 11. DUAL NATURE OF RADIATION & MATTER | 8 | 7 | 8 15 | MONTHLY TEST -5 Oct 1-5, 2019 | 15. To draw the I-V characteristic curve for a p-n junction in forward bias and reverse bias. 16. To draw the characteristic curve of a zener diode and to determine its reverse breaks down voltage. 17. To find the frequency of AC mains with a Sonometer. 18. To convert the given Galvanometer into a Voltmeter of desired range and to verify the same. |
| | | 12. ATOMS | 7 | | | | |
| | | 13. NUCLEI | 8 | | | | |
| 15 th NOV 2019 | 24 | 14. SEMICONDUCTORS ELECTRONICS: MATERIALS, DEVICES AND SIMPLE CIRCUITS. | 12 | | 12 | | 19. To convert the given Galvanometer into an Ammeter of desired range and to verify the same. 20.To determine the wave length of a laser beam by diffraction. |
| Total | 153 | | 150 | 70 | 150 | | |
| DEC 2019 | FIRST PRE-BOARD AS PER CBSE CURRICULUM 2 – 10 DECEMBER,2019 (Whole Syllabus) | | | | | | |
| JAN 2020 | SECOND PRE-BOARD AS PER CBSE CURRICULUM, 16 – 23 JANUARY, 2020. | | | | | | |
| Feb 2020 Upto 10th | AISSE 2020 Practicals from 2nd half of January upto 1st half of February | | | | | | |

NOTE: 1. As per CBSE Curriculum (2019-2020) 15 experiments [with a minimum of 6 from each section] has to be performed by students & at least 5 activities [with a minimum of 2 Activities each from section A and section B], should be demonstrated by teacher .Mentioned experiments are for reference only. Teacher may choose any 15 experiments from the list of practical provided by CBSE (2019-2020).

2. One investigatory project must be completed by the students and should be submitted at the time of AISCE practical examination.

Passing criterion: As per CBSE norms.

EXAMINATION PATTERN (CLASS-XII -Physics) 2019-2020

| EXAM→ | MONTHLY TEST | PRE- BOARD EXAM | PRACTICAL EXAMINATION |
|------------------------------|---------------------------------------|---------------------------------------|--|
| DURATION→ | 3- HRS | 3- HRS | 3-HRS |
| PATTERN OF QUESTIONS→ | 20X1=20 7X2=14 7X3=21 3X5=15 | 20X1=20 7X2=14 7X3=21 3X5=15 | 1) TWO EXPERIMENTS (ONE FROM EACH SECTION) = 2X8 =16 2) RECORD (EXPT+ACTIVITY) = 06 3) INVESTIGATORY PROJECT = 03 4)VIVA = 05 |
| MARKS→ | 70 MARKS(37 QUESTIONS) | 70 MARKS(37 QUESTIONS) | (30 MARKS) |
