THE M.D.T. HINDU COLLEGE, TIRUNELVELI 627 010

COURSE OUTCOMES - 2023-2024

Program Name	Course code	Course Name	Course Outcome
Part A	E1TL11	Pothu Tamil Paper - 1	சங்க இலக்கியத்தில் காணப்பெறும் வாழ்வியல் சிந்தனைகளை அறிந்து கொள்வர் அற இலக்கியம் மற்றும் தமிழ்க் காப்பியங்களின் வழி வாழ்வியல் சிந்தனையை பெறுவர் சக்தி இலக்கியங்களை கற்பதன் மூலம் பக்தி நெறியினையும் பகுத்தறிவு இலக்கியங்களை கற்பதன் வழி நல்லிணக்கத்தையும் தெரிந்து பின்பற்றுவர் மொழியறிவோடு சிந்தனைத் திறனைப் பெறுவர்
Part B	E2EN11	General English	Acquire self awareness and positive thinking required in various life situations Acquire the attribute of empathy Acquire creative and critical thinking abilities. Learn basic grammar Development and integrate the use of four language skills i.e., listening, speaking, readingand writing.
Part A	E1TL21	POTHU TAMIL	சிற்றிலக்கியங்களின் வழி இலக்கியச் சுவையினையும் பண்பாட்டு அறிவினையும் பெறுவர் புதுக்கவிதை வரலாற்றினை அறிந்து கொள்வர் திராவிட இயக்க இலக்கியங்களை கற்பதன் மூலம் மொழி உணர்வு இன உணர்வு சமத்துவம் சார்ந்த சிந்தனைகளை பெறுவர்
Part B	E2EN21	GENERAL ENGLISH	Realize the importarice of resilience Become good decision-makers Imbibe problem-solving skills Use tenses appropriately Use English effectively at the work place.
Part A	C1TL31	Kappiyam, Sittelakkiam	1. புராண, தொன்மையான தொடர் நிலைச் செய்யுள்களின் வழி, வாழ்வியல் சிக்கல்களுக்குத் தீர்வு காட்டுதல். 2. இக்கால இலக்கிய வகைகளைஅறிமுகப்படுத்தி, உத்திகளை உணர்த்தி படைப்பாற்றலை வளர்த்தல்.
Part B	C2EN31	English	*Have an appreciable understanding of English Grammar. *Acquire proficiency in LSRW skills and communicate effectively.
Part A	C1TL41	TAMIL	1. சங்க காலத் தமிழரின் பண்பாடு, கலாச்சாரங்களை அறியச் செய்தல். கவிதைக் களங்களின் அழகியலைஉணர்த்தி தமிழ் மொழியின் முக்கியத்துவத்தை அறியச் செய்தல. 2. இலக்கணங்களையும், எழுத ் துகளின் வகைகளையும், புணர்ச்சி நிலைகளையும் அறியச் செய்தல்.

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Part B	C2EN41	ENGLISH	* Get acquainted with short stories in English and to make them enjoy and appreciate the pieces. *students' enhance their knowledge in grammar and its usages.
B.A Economics, PHS & B.com	CNHI31	History - Freedom Movement in India	• Learn about the birth of Indian national congress • Knowledge about the non co - operation movement. • It explains about the poorna swaraj resolution. • It helps us to understand the round table conferences. • Understand the functions of independence Act of 1947.
	CNCS32	BASIC PROGRAMMING DESIGN	1: Define the basic design in programming 2:Summerize various techniques in program testing 3: To develop and evaluate Programming Languages 4: To analyze computer hardware and software programs 5: To evaluate the Internet Applications
	CNCS41	HTML	1.understand a wide array of linguistic diversity, systematic patterns and cross linguistic universals that constrain this diversity 2.demonstrate understanding of linguistic concepts, methods and approaches and apply this understanding to the construction and analysis of meanings in different modes of communication (spoken, written and multimodal) 3.assess the efficiency of the tools and knowledge that give a new perspective on language and linguistic 4.analyze and evaluate the influence of contextual and cultural factors in the production and reception of the English language, taking into account the relevant drivers of language change 5.examine their attitude towards language and the way it is used in society and culture
	CYOG31	Yoga	Understand the asanas • Understand the bandhas • Acquire knowledge on pranayama; • To know about kriyas • To know about meditation types
TBA Economics		**ODD**	

Program Name	Course code	Course Name	Course Outcome
	EMEC11	Micro Economics - I	• Should know the consumption and different types of laws. • Understand the indifference curve analysis. • Knowledge about the production and theories of population • Learn about production function.
	EMEC12	Statistics for Economics - I	Understand the overview of statistics and basic knowledge of statistical tools. Differentiate Types of Data and its Classification Explain the concept of Averages and its application
	EEEC12	Inroduction to Sociology	Understand the contributions of sociologists in the field of sociology Understand the basic aspects of Sociology Examine the impact of individuals, groups and society
	ESEC11	Demography	Describe the various theories of Population Growth Understand Demographic Indicators Assess the causes and impact of Migration on rural-urban population distribution
	EEEC11	Business Communication	Understand the basics of communication and its Process, Elements, and its importance. Acquire communication skills. Apply the art of writing Business Letters
		EVEN	
	EMEC21	MICRO ECONOMICS - II	Understand the meaning of cost and revenue concepts. • Should know to study the market theories. • Knowledge about distribution theory. • Learn about wage and wage theories.. • Learn about interest and profit.
	EMEC22	STATISTICS FOR ECONOMICS - II	Gain Knowledge on the Index Numbers Analyze the importance of Time Series Data and its measurement Understand the concept of Probability
	EEEC21	HISTOTY OF ECONOMIC THOUGHT	Acquire knowledge on the subject matter of History of Economic Thought. Understand the contributions of the Classical Ideas of Economics Describe Neo Classical and Institutional Economic Ideas
	ESEC21	ECONOMICS FOR INVESTORS	Describe the types and importance of savings and investments Explain the available investment avenues Understand the operations of different types of investment markets.
	ESEC22	COMPUTER APPLICATION IN ECONOMICS	Understand basic components of Computer and its functions. Gain Knowledge of MS Office. Outline data processing techniques of MS Excel.

Program Name	Course code	Course Name	Course Outcome
II BA Economics		**ODD**	
	CMEC31	Mathematics for Economics - I	Understand the meaning and rules of derivatives, application of derivatives in economics. • Student should know about partial derivatives and its application in economics. • Study the meaning and types of integrals, application of integrals in terms of consumer's surplus and producer's surplus. • Study the meaning, types and operations of matrices. • Study the applications of matrices in input-output analysis, Linear programming.
	CMEC32	International Economics - I	• Creates awareness among the students about the world economy. • Students can learn about the terms of trade and gains from the international trade. • Students can understand the procedures of the imports and exports with trade policies. • Dealt with international monetary systems and financial institutions • Shows terms and conditions of general agreements among the global institutions.(trims,trips ,etc)
	CAEC31	Entrepreneurial Development	Learn about the basic concept of Entrepreneurship, types of Entrepreneurs, their function and qualities and their role in economic development 2. Analyze factors affecting entrepreneurial growth, concept of women entrepreneurship, their functions and problems faced • Overview about Micro Small and Medium Enterprises, government policies, support measures, incentive schemes and problems encountered by these enterprises

Program Name	Course code	Course Name	Course Outcome
	CSEC31	Rural Economics	• Familiarizing the theories, concepts and practical cases of rurality, rural economics and rural economies in the world with country-specific examples. • Critically and creative thinking about the rural economies, rural economics • Acquainting the structure of rural economies – farming, industrialization and possible interactions, rural organizations and problems in rural economies
	CNCO31	Commerce: Introduction to Accountancy	• Provide knowledge to the students with the basic principles of accounting and the roles of debit and credit • Familiarize the students with the preparation of journals and subsidiary books • Educate them to prepare ledgers and balancing of ledger accounts • Know about the preparation of trial balance and its features and objectives • Create an idea about the preparation of final accounts with simple adjustments
	CNPE31	PhS: Principles of Physical Literacy	• Explain the concept of physical literacy • Describe the relationship between physical literacy, physical activity, and physical fitness • Identify the general course of motor skill (movement) development in childhood and the approximate age of adult proficiency • Describe the relationship between the development of movement competence, confidence, and motivation, in support of physical literacy development
	EVEN		

Program Name	Course code	Course Name	Course Outcome
	CMEC41	Mathematics for Economics - II	Understand the meaning and rules of derivatives, application of derivatives in economics. • Student should know about partial derivatives and its application in economics. • Study the meaning and types of integrals, application of integrals in terms of consumer's surplus and producer's surplus. • Study the meaning, types and operations of matrices. • Study the applications of matrices in input-output analysis, Linear programming
	CMEC42	International Economics - II	• International trade and its theories - creates awareness among the students about the global economy. • The students can learn about the terms of trade and gains from the international trade. • Balance of payments and trade policy – under this unit, Students can understand the procedures of the imports and exports with trade policies. • This chapter clearly shows the need of international monetary systems and financial institutions. • • International economic relations and agreements are dealt with terms and conditions of general agreements among the global institutions.
	CAEC41	Agricultural Economics	• Understand the Relevance of Agricultural Economics • Review the role of Agricultural Labour • Analyze the trends in Agricultural Prices and the importance of Finance in the Agricultural Sector • Evaluate the importance of Marketing in Agriculture • Identify the impact of Globalisation and WTO on Indian Agriculture

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	CSEC41	Human resource Development	• Understand the role and importance of Human Resource Management. • Learn about the evaluation of employee recruitment and selection plan and process. • Understand to develop the employability skills for the work place. • Demonstrate knowledge of human behavior in organization and the role of motivation strategies, including motivation theories. • Knowledge about the different method of performance evaluation.
	CNHI41	INDIAN POLITY	• To enable the learners aware of the rights and duties of Indian citizen. • To enhance their role as enlightened citizens. • To understand the importance of centre – state relations. • To focus more attention on constitutional amendments.
	CNCO41	FINANCIAL ACCOUNTING	Remember the concept of rectification of errors and Bank reconciliation statements Apply the knowledge in preparing detailed accounts of sole trading concerns Analyse the various methods of providing depreciation
III BA Economics	**ODD**		
	CMEC51	Macro Economics -I	Understand the meaning of Macro Economics, its Difference and importance • Learn about the National Income, Gross Domestic product, Gross National Product, Net National Product • Macro Economics is very useful for theory of employment oppounities • The student to know the importance and development of consumption Function. • Knowledge of multiplier and Accelerator models

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	CMEC52	Public Finance - I	• Secure adjustments in allocation of resources. • Secure adjustment in the distribution income and wealth with the help of revenue and expenditure process of the government. • Secure economic stabilization or to remove economic fluctuations and distortions in the economy. • Accelerate economic development. • Secure distribution justice.
	CMEC53	History of Economic Thought	• Understand modern economic concept of role of Entrepreneur Innovation, BusinessCycles and Capitalism and Socialism. • Ability to understand about Capital Formation, Disguised UnemploymentImperfectCompetition and Mathematical Economic Analysis • Understand the ideas ofPermanent Income Hypothesis, Revealed Preference Theory, Social Welfare Function and Samuelson's Utility Possibility Approach • Gain knowledge about the ideas of Modern Indian Economists-Regional Economics, Ecological Theory of Population - Economics of Growth and Development-Economics of Fast
	CMEC54	Tamilnadu economy	• As a student of Economics, one should know the relevance of Regional Economics and its share in the National Economy. • Tamilnadu is one of the industrialised States and a major economic power in South India. • This paper will give an interesting analysis of the occupational structure, the relative shares of the different Sectors in the SDP and the future thrust areas of the State Plan.
	CEEC51	Labour Economics	• To study the characteristics of labour. • Understand the concept of trade unions. • Acquire the knowledge of workers participation in management. • Learn about labour welfare. • Understand the concept of social security, social insurance and social assistance.

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	CCSB51	Personality Develpement	• Students will come to know the meaning,definition,determinants, Major traits of personality. They will also know the theories of personality. • Students will get an in-depth knowledge in Personality concepts. They will also know the meaning and process of perceptions. They will get an idea about factors influencing perception, errors in perception, attitudes and factors influencing attitudes.
	EVEN		
	CMEC61	MACRO ECONOMICS - II	• Learn about the theories of distribution • It covers from Investment approaches in various Aspects • It easily understand Applicability of Keynes theory of • Under developed countries • Students are growing influence in Macro Economics Policy with All Employment • Role of Monetary Policy in a Developing Economy is easy to learn
	CMEC62	PUBLIC FINANCE - II	• Secure adjustments in allocation of resources. • Secure adjustment in the distribution income and wealth with the help of revenue and expenditure process of the government. • Secure economic stabilization or to remove economic fluctuations and distortions in the economy. • Accelerate economic development. • Secure distribution justice.
	CMEC63	MONEY AND BANKING	• Understand the functions and role of commercial banks • Acquire the knowledge of banking system • Acquire the knowledge of banking operations • Understand the functions and role of central banks • Acquire the knowledge of modern banking technology AMEC64 Indian Economy-II

Program Name	Course code	Course Name	Course Outcome
	CMEC64	INDIAN ECONOMY	• Understand the availability of natural resources, problems of poverty and unemployment. • To explain the role of agriculture in Indian economy • To study the role of industrial sector • Acquire the knowledge of transport sector • Understand the concept of five year planning
	CEEC62	INDUSTRIAL ECONOMICS	• Acquire the knowledge of industrial growth in India. • To study the role of industrial sector • Understand the meaning, characteristics, objectives, functions and conditions of Industrial Relations. • Know about meaning, characteristics and functions of trade unions, • Learn about collective bargaining, its characteristics, need , principles and importance. • Learn about grievance and discipline procedure
I MA Economics		**ODD**	
	WESM11	Advanced Micro Economic	· Acquire the knowledge of consumer demand, elasticity of demand. · To understand the Theory of Production function. · To study about the perfect competition and imperfect competition. · To explain the concept of oligopoly, duopoly and price leadership · Learn about Pricing Theory
	WESM12	Indian Economic Development and policy	Understand the Structural change in Indian economy Assess the Performance of agricultural and Industrial sector Ability to learn the trends in the economy Understand the Impact of Poverty
	WESM13	Statistics for Economists	Summarize the basic Probability rules and understand theoretical distributions. Acquire knowledge on the various sampling methods and testing of Hypotheses Use t test and chi square for analysis

Program Name	Course code	Course Name	Course Outcome
	WESE11	Modern Economic thought - Elective 1	Understand modern economic concept of role of Entrepreneur Innovation, BusinessCycles and Capitalism and Socialism. Ability to understand about Capital Formation, Disguised UnemploymentImperfectCompetition and Mathematical Economic Analysis Understand the ideas ofPermanent Income Hypothesis, Revealed Preference Theory, Social Welfare Function and Samuelson's Utility Possibility Approach
	WESE14	Welfare Economics - Elective - 2	Summarize the Contribution to Welfare Economics Analyse the different approaches to Welfare Economics Interpret the development of Pareto Optimality Conditions Explain the compensation Criteria of Economics
		EVEN	
	WESE21	MONETARY ECONOMICS	To list out and outline the theories of money To explain construct and distinguish various determinate of money supply and multiplier. To label, explain and evaluate the capital market
	WESE24	LABOUR ECONOMICS	study the recent trends of labour and their productivity assess the determination of employment and wages Understand the trade unions and their impact on labour market
	WESM21	MATHEMATICAL ECONOMICS	Understand the mathematical structure of standard economic theoretical framework Equip students with mathematical tools to solve optimization problems appear in economic theory Equip students with tools to read the technical writing appear in standard economic journals
	WESM22	GENDER ECONOMICS - Elective 1	Understand the Gendered jobs and Social Inequality describes the Issues of wage discrimination and exploitation in unogranised sector Explain the Gender issues in Health, Environment, Family welfare Measures
	WESM23	ECONOMICS OF CLIMATE CHANGE - Elective - 2	To define and explain the science of climate change. To explain and identify the climate change policy. To illustrate and analyses the integrated assessment of climate changes. To classify, compare and evaluate climate change impact assessment

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	WESSE21	SOCIAL ETHICS AND RESPONSIBILITIES	Understand the importance of Ethics and outlining the various types of Ethical Issues in an organization Categories the ethical issues in the workplace Evaluate the need for Corporate Social Responsibility
II MA Economics		**ODD**	
	ZESM31	Agriculture Economics	• Expresses agricultural business, farmer, agricultural activities and the relationship between agricultural economy with other disciplines • Emphasizes the importance of agricultural economy • Describes the importance of farm enterprises to provide raw material of farm production and creates functional connections between output and inputs • Explains the importance of record keeping and calculates the cost of agricultural production • Introduces basic concepts on development, rural area and rural development
	ZESM32	Development Economics	• To study the importance of economic development and its measurement • To understand and study the different theories of growth • To study the importance theories of development • To study the sectoral aspects of development • To acquire the importance of resource allocation, planning and development
	ZESM33	Monetory Economics	• Explain and discuss why people hold money and why it is used in the trading process • Solve macroeconomic models and assess the role and efficacy of monetary policy for various types of models in both the classical and keynesian set-ups • Describe and explain the main channels of the monetary transmission mechanism, through which monetary policy can have real effects on the economy • discuss the merits and disadvantages of different monetary policies used by central banks

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	ZESM34	Research Methodology	• Understand the methodology of economic and social research. • To provide an environment and create aptitude towards research. • To make the students to understood the current Economic problems. • To important knowledge to the students about application statistical tools in Social Science. • To motivate the students to write a research paper
	ZESE31	Computer Applications in Economics	• To explain the Data Entry • To study the concept of Code Book, Data List and Begin Data • Acquire the knowledge of ANOVA • To understand analysis of Interpretation of Data
	ZESE32	Demography	• Knowledge about the meaning and scope of demography. • It explains the structure of population and its effect on developed and less developed nations. • The subject helps us to know about, Theories of migration and urbanization. • It gives the demographic data base in India in order to develop the country (Age structure of population, infant, Child mortality rates, etc.)
	EVEN		
	ZESM41	INDIAN ECONOMIC DEVELOPMENT AND POLICY	Understand the Structural change in Indian economy Assess the Performance of agricultural and Industrial sector Ability to learn the trends in the economy
	ZESM42	PUBLIC FINANCE	• Secure adjustments in allocation of resources. • Secure adjustment in the distribution income and wealth with the help of revenue and expenditure process of the government. • Secure economic stabilization or to remove economic fluctuations and distortions in the economy. • Accelerate economic development. • Secure distribution justice.

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	ZESM43	ENVIRONMENTAL ECONOMICS	• Acquire the knowledge of Environmental Economics. • Understand the approach of optimality of resources allocation • Acquire the knowledge of resource conservation. • Understand the concept and forms of pollution. • Acquire the knowledge on economic policies related to environmental protection
	ZESM45	LABOUR ECONOMICS	• To study the characteristics of labour. • Understand the concept of trade unions. • Acquire the knowledge of workers participation in management. • Learn about labour welfare. • Understand the concept of social security, social insurance and social assistance
	ZESM44	HEALTH ECONOMICS	• Understand the meaning of health economics. • Should know how to study theory of health economics. • Learn about public expenditure on health. • Learn about public expenditure on health • Knowledge about expenditure and effects on health.
TBSc Mathematics		**ODD**	
	EMMA11	Algebra & Trigonometry	CLO 1: Classify and Solve reciprocal equations CLO 2: Find the sum of binomial, exponential and logarithmic series CLO 3: Find Eigen values, eigen vectors, verify Cayley – Hamilton theorem. CLO 4: Expand the powers and multiples of trigonometric functions in terms of sine and cosine CLO 5: Determine relationship between circular and hyperbolic functions.
	EMMA12	Differential Calculus	CLO 1: Find the nth derivative, form equations involving derivatives and apply Leibnitz formula CLO 2: Find the partial derivative and total derivative coefficient CLO 3: Use the Lagrange"smethod of undetermined multipliers CLO 4: Find the envelope of a given family of curves CLO 5: Find the evolutes and involutes and to find the radius of curvature using polar coordinates

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	EEPH11	Allied Physics Paper - I	
	EFMA11	Bridge mathematics	CLO 1: Prove the binomial theorem and apply it to find the expansions of any (x + y)n and also, solve the related problems CLO 2: Find the various sequences and series and solve the problems related to them. Explain the principle of counting. CLO 3: Find the number of permutations and combinations in diff erent cases. Apply the principleof counting to solve the problems on permutations and combinations CLO 4: Explain various trigonometric ratios and find them for diff erent angles, including sum ofthe angles, multiple and submultiple angles, etc. Also, they can solve the problems using the transformations. CLO 5: Find the limit and derivative of a function at a point, the definite and indefinite integral of a function. Find the points of min/max of a function.
	ESMA11	Mathematics for competitive examination I	
	EEPHP1	Practical : Allied Physics	
		EVEN	
	EMMA21	Analitical gemetry - (Two and Three Dimention)	CLO 1: Find pole, polar for conics, diameters, conjugate diameters for ellipse and hyperbola CLO 2: Find the polar equations of straight line and circle, equations of chord, tangent and normal CLO 3: Explain in detail the system of Planes CLO 4: Explain in detail the system of Straight lines CLO 5: Explain in detail the system of Spheres
	EMMA22	Integral calculus	CLO 1: Determine the integrals of algebraic, trigonometric and logarithmic functions and to find the reduction formulae CLO 2: Evaluate double and triple integrals and problems using change of order of integration CLO 3: Solve multiple integrals and to find the areas of curved surfaces and volumes of solids of revolution CLO 4: Explain beta and gamma functions and to use them in solving problems of integration CLO 5: Explain Geometric and Physical applications of integral calculus
	ESMA21	Mathematics for competitive examinations-II	to equip students with a comprehensive understanding of advanced mathematical concepts, enabling them to solve complex problems efficiently, specifically designed to tackle the mathematics section of various competitive exams

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	ESMA22	SEC - LATEX	students can create and typeset professional-looking LaTeX documents, including complex mathematical formulas, tables, figures, references, and bibliographies, demonstrating proficiency in formatting text and elements within a LaTeX environment
	EEPH21	Allied Physics - II	Explain the concepts of interference diffraction using principles of superposition of waves. Outline the basic foundation of different atom models and various experiments
II BSc Mathematics		**ODD**	
	CMMA31	Sequences and series	accommodate the concept of different types of sequences and series. 2. know how to apply various tests to test the convergence of series.
	CAST11	Statistics - I	• To introduce the new concept Measures of central tendency to other major students. • To study about correlation, regression and to solve the simple problems. • Know formulas to find mean, median mode. • Understand correlation and regression.
	CAMA21	Vector Calculus - Skilled based	• To lay a good foundation of vector differentiation and vector integration. • To solve problems related to this • Recognize the importance of integration. • Relate the line integral, surface integral and volume integral
	CNBO31	Botany: Herbal medicine	• To provide the knowledge on diversity and importance of indigenous medicinal plants and their role in traditional medicinal systems. • To enrich the knowledge on identification, medicinal properties and their mechanism of action of locally available medicinal plants. • To analyze the chemical principles and their drug values, conservation and utilization of endangered medicinal plants.

Program Name	Course code	Course Name	Course Outcome
	CNCS31	Computer science: Basic Programming design	• Makes students gain a broad perspective about the uses of computers in engineering industry. • Develops basic understanding of computers, the concept of algorithm and algorithmic thinking. • Develops the ability to analyze a problem, develop an algorithm to solve it. • Develops the use of the C programming language to implement various algorithms, and develops the basic concepts and terminology of programming in general.
		EVEN	
	CMMA41	Abstract Algebra	• Students will be able to know Groups and Examples, Subgroups, Order of an elements. • Students will know to understand cyclic groups, cosets, partition of a group by cosets. • Students will know normal subgroups, quotient groups, homomorphism, isomorphisms. • Students will be able to understand Rings and examples, types of rings, ideals. • Students will know polynomial rings,unit factorization domain.
	CAST21	Allied Statistics II	• To understand Commodity Reversal test, Time reversal test and Circular test. • To know about difference of proportions and difference of means. • Acquires knowledge about Tests based on Chi-Square distribution and goodness of fit. • To know about Randomized block design, Latin square. • Acquires knowledge about various Chart like Control chart , Mean chart, Pchart, Range Chart and Product control.

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	CSMA41	Trignometry, Fourier series ans Laplace Transforms - Skilled	• Students will be able to discuss various applications of DeMoivere's theorem such as expansions of sinnx, cosnx, tannx and expansions of sinnx and cosnx. • Students will come to know Hyerbolic functions, inverse hyperbolic functions and the relations between them. They can find the sum of different tyes of trigonometrical series finite or infinite using C+iS method. • Students will understand the Laplace Transform and its existence. They will be come to find the Laplace transform and Inverse Laplace Transform of a functions. • They will be able use the method of Laplace transforms to solve initial value problems for linear differential equations with constant coefficients and simultaneous equations
	CNBO41	Food and Nutrition	• Identifying foods and their nutritional properties • Understanding the effects of food processing trends • Revising food properties, especially sensory characteristics • Understanding the structure and functioning of the human body • Learning the importance of a balanced diet and meal planning
		COMPUTER FOR DIGITAL ERA	
III BSc Mathematics		**ODD**	
	CMMA51	Linear Algebra - II	• Students gets introduction about Vector spaces and Subspaces. • Studied about Linear independence and Basis. • Acquired knowledge about Rank and Nullity • Studied about characteristic equation of a matrix and Cayley-Hamilton theorem. • Gets introduction about Inner Product Spaces and Gram Schmidt orthogonalisation Process.

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	CMMA52	Real analysis	• Students will be able to find the given sets are countable (or) not and they can give many examples for metric spaces. • Students will know to define the interior of a given set, and closure, limit points of a given set. They know how to use the above sets to derive some theorems. • Students will be able to find the given function is continuous (or) not. They can understand the different types of continuity.
	CMMA53	Statics	• To provide the basic knowledge of equilibrium of a particle • To develop a working knowledge to handle practical problems
	CMMA54	Integral Transforms & Z - Transforms	• To develop the knowledge of Transformations • To solve the problems connected
	CEMA53	Combinatorial Mathematics	• Students will learn about the binomial coefficients. They will know permutation. They will be able to understand ordered selection and unordered selection. • They will learn about pairing problems. They will learn to solve pairing within sets and pairing between sets. They will be able to solve optimal Assignment Problems. • They will learn about Recurrence. They will learn Fibonacci type relation using generating function.
	CEMA54	Operation research - I	• To introduce the various techniques of operations research • To make the students solve real life problems in Business Management • To understand different types of LPP

Program Name	Course code	Course Name	Course Outcome
	CCSB51	Personality Development	• Students will come to know the meaning,definition,determinants, Major traits of personality. They will also know the theories of personality. • Students will get an in-depth knowledge in Personality concepts. They will also know the meaning and process of perceptions. They will get an idea about factors influencing perception, errors in perception, attitudes and factors influencing attitudes. • Students will come to know the definition of leadership, leadership styles, theories and qualities of leadership. • Students will acquire an in-depth knowledge in skills. They will also know communication,importance and process of communication, methods of communication, barriers in communication and techniques of effective communication.
	EVEN		
	CMMA61	Complex Analysis	• Students will learn about the complex numbers. They will know to find nth root of a complex number. They will learn about circles, straight lines and regions in the complex plane. They will know about extended complex plane. • They will learn functions of complex variables. They will learn limits and differentiability. They will learn to apply C-R equations to check whether the function is differentiable or not. They will know analytic functions and harmonic functions. • They will learn elementary transformations. They will know about cross ratio. They will know to find the fixed points of bilinear transformations. They will learn some special bilinear transformations.

Program Name	Course code	Course Name	Course Outcome
	CMMA63	Number theory	• Students are able to know about Mathematical Induction and Binomial theorem. • Studies about Division algorithm and the Euclidean Algorithm. • Understands the Fundamental theorem of arithmetic and the Sieve of Eratosthenes. • Studies basic properties of congruence and linear congruence, The Chinese Remainder Theorem. • Gets knowledge about Fermet's theorem and Wilson's theorem.
	CMMA62	Graph theory	• Students will be able to know how to give the examples for graphs from the definition graphs. • Students will know to understand the degree sequences, and walks, Trails and paths, connectedness. • Students will know to draw Euler graphs, Hamiltonian graphs and they can understand the given the graphs are Eulerian (or) not. • Students will be able to give the examples of planar graphs and they can find the chromatic number for the given graphs. • Students will know to define the digraphs and connectedness in digraphs.
	CMMA64	Dynamics	• To provide a basic knowledge of the behaviour of objects in motion • To develop a working knowledge to handle practical problems
	CMMA65	Numerical methods	• To introduce the finite differences • To solve numerical problems by different methods
	CEMA61	Astronomy	• To introduce the exciting world of Astronomy to students • To understand the movements of the celestial sphere • To study the Kepler‟s laws of motion
I MSc Mathematics		**ODD**	

Program Name	Course code	Course Name	Course Outcome
	WMAM11	Group Theory	aims to equip students with the ability to recognize and analyze group structures, understand key concepts like subgroups, normal subgroups, homomorphisms, and isomorphisms, apply theorems like Lagrange's theorem, and utilize group theory to study symmetries in geometric objects, ultimately allowing them to classify and understand the structure of different groups, particularly in the context of abstract algebra
	WMAM12	Real Analysis - I	CLO1: Analyze and evaluate functions of bounded variation and Rectifiable Curves. CLO2: Describe the concept of Riemann-Stieltjes integral and its properties. CLO3: Demonstrate the concept of step function, upper function, Lebesgue function and their integrals. CLO4: Construct various mathematical proofs using the properties of Lebesgue integrals and establish the Levi monotone convergence theorem. CLO5: Formulate the concept and properties of inner products, norms and measurable functions.
	WMAM13	Ordinary Differential Equation	CLO1: Establish the qualitative behaviour of solutions of systems of differential equations . CLO2: Recognize the physical phenomena modelled by differential equations and dynamical systems. CLO3: Analyze solutions using appropriate methods and give examples. CLO4: Formulate Green’s function for boundary value problems. CLO5: Understand and use various theoretical ideas and results that underlie the mathematics in this course.
	WMAE11	Graph Theory and application - Elective	CLO 1: Demonstrate the concept of different structures and types about graphs and explain its applications. CLO 2: Determine the properties of trees and applications in network and study the concepts of connections in graphs. CLO 3: Acquire the knowledge about Euler Tours, Hamilton Cycles and matchings in Graphs. 22 CLO 4: Analyze the concept of edge colouring ,independent sets and cliques in Graphs CLO 5: Explain the concept of vertex colorings

Program Name	Course code	Course Name	Course Outcome
	WMAE15	Analytic Number Theory-Elective	CLO 1: Study the basic concepts of elementary number theory CLO 2: Explain several arithmetical functions and construct their relationships CLO 3: Apply algebraic structure in arithmetical functions CLO 4: Demonstrate various identities satisfied by arithmetical functions CLO 5:Determine the application to $\mu(n)$ & $\Lambda(n)$ and several equivalent form of prime number theorem
		EVEN	
	WMAE22	Advanced Algebra	CLO1: Prove theorems applying algebraic ways of thinking. CLO2: Connect groups with graphs and understanding about Hamiltonian graphs. CLO3: Compose clear and accurate proofs using the concepts of Galois Theory. CLO4: Bring out insight into Abstract Algebra with focus on axiomatic theories. CLO5: Demonstrate knowledge and understanding of fundamental concepts including extension fields, Algebraic extensions, Finite fields, Class equations and Sylow's theorem.
	WMAE25	Real Analysis	CLO1: Understand measurable function and Lebesgue outer measure CLO2: Explain Rieman and Lebesgue Integral. CLO3: Understand and describe the basic concepts of Fourier series and Fourier integrals with respect to the orthogonal system. Analyze and evaluate the difference between transforms of various functions. CLO4: Explain directional derivative, total derivative, matrix of linear function and sufficient condition for differentiability CLO5: Explain implicit functions and Extremum problems with side conditions.
	WMAM21	Partial differential Equations	CLO1: To understand and classify second order equations and find general solutions CLO2: To analyse and solve wave equations in different polar coordinates CLO3: To solve Vibrating string problem, Heat conduction problem, to identify and solve Laplace and beam equations CLO4: To apply maximum and minimum principle and solve Dirichlet, Neumann problems for various boundary conditions CLO5: To apply Green's function and solve Dirichlet, Laplace problems, to apply Helmholtz operation and to solve Higher dimensional problem

Program Name	Course code	Course Name	Course Outcome
	WMAM22	Mathematical statistics - Elective	CLO 1: Discuss the sets, functions of sets,randing variables and certain expectations CLO 2: Discuss binomial and related distributions CLO 3: To study various kinds of distributions CLO 4: Discuss additional distributions and order statistics and statistical applications CLO 5: To learn the convergence in distribution of a sequence of random variables
	WMAM23	Research Methodology and Statistics	
	WMASE21	Classical Mechanics - Elective	
II MSc Mathematics		**ODD**	
	ZMAM31	Measure and Integration	• Students will understand the concept of Lebesgue measure, outer and inner approximation and Borel Cantelli lemma. • Students will acquire knowledge about Lebesguemeasurable functions, littlewood's three principle, egoroff's theorem and Lusin's theorem. • Students will understand the concept of lebesgue integration and Riemann integral. Differentiability of Monotone Functions: Lebesgue's Theorem, Functions of Bounded Variation: Jordan's Theorem.
	ZMAM32	Topology - I	• Students are able to know about Topological Spaces and subspace topology • Studied about the Product Topology and Closed sets. • Acquired knowledge about continuous functions. • Gets knowledge about connected spaces and compact spaces. • It extends to limit point compactness and local compactness.
	ZMAM33	Advanced Algebra - I	• The aim of the paper is to introduce some of the most fundamental algebraic structures like inner product space, Determinants, etc. • student can understand the notion of Dual Spaces. • student can understand the algebra of Linear transformations

Program Name	Course code	Course Name	Course Outcome
	ZMAM34	Graph Theory	• Students will be able to understand the basic concepts of a tree, vertex and an edge. • Students will apply the concept of Eulerian and Hamiltonian graphs in real life problems. • Students will be able to understand the concept of Matching and Coloring. • Students will study the concept and properties of Ramsey numbers.
	ZMAM35	Algebric Number Theory	• To acquire knowledge about recent developments in Algebra have its impact on Number Theory and Number Theory too has its own contribution to the development of algebra. • To understand and appreciate the role played by Algebra in Number Theory. • Knowledge gained about various types of numbers such as algebraic Numbers, Pythagorean triples and representation of number as sum of positive squares
		EVEN	
	ZMAM41	Advanced Algebra - II	• Students will know the different types of rings and ideals. • Students will know the different types of Euclidean rings and they know how to give the examples for the Euclidean rings. • Students will be able to know to define the polynomial rings interms of rings. • Students will know how to define the different types of radicals of rings interms of rings. • Students will be able to know the different types of rings such as Quasi regular – J – semi-simple and direct sum of rings.
	ZMAM42	Complex Analysis	• Students will learn about the complex numbers. They will know to find nth root of a complex number. They will learn about circles, straight lines and regions in the complex plane. They will know about extended complex plane. • They will learn functions of complex variables. They will learn limits and differentiability. They will learn to apply C-R equations to check whether the function is differentiable or not. They will know analytic functions and harmonic functions.

Program Name	Course code	Course Name	Course Outcome
	ZMAM43	Functional Analysis	• Students will learn about Banach Spaces. They will be able to do examples of banach spaces. They will know continuous linear transformations. They will learn Hahn Banach Theorem and natural imbedding of N into N* • They will learn Open mapping theorem. They will know conjugate operator. They will study about Hilbert Spaces. They will learn simple properties and orthogonal complements.
	ZMAM44	Topology - II	• Students are able to know about Topological Spaces and subspace topology • Studied about the Product Topology and Closed sets. • Acquired knowledge about continuous functions. • Gets knowledge about connected spaces and compact spaces. • It extends to limit point compactness and local compactness
I BSc Physics		**ODD**	
	EMPH11	Proerties of matters& Acquestics	elasticity and working of torsion pendulum. □ Able to appreciate concept of bending of beams and analyze the expression, quantify and understand nature of materials. □ Explain the surface tension and viscosity of fluid and support the interesting phenomena associated with liquid surface, soap films provide an analogue solution to many engineering problems.
	EEMA11	Allied mathematics	
	EFPH11	Introductory Physics - FC	Apply concept of vectors to understand concepts of Physics and solve problems. Appreciate different forces present in Nature while learning about phenomena related to these different forces. Quantify energy in different process and relate momentum, velocity and energy. Differentiate different types of motions they would encounter in various courses and understand their basis. Relate various properties of matter with their behaviour and connect them with different physical parameters involved.
	EEPHP1	Allied Practical– I	Students can apply concepts of elasticity, viscosity, and surface tension to solve everyday problems. Students can understand the properties of matter, electricity, and electronics.

Program Name	Course code	Course Name	Course Outcome
	ESPH11	Physics for everyday life - SEC	apply physics concepts to solve problems, such as predicting motion, analyzing data, and understanding the behavior of sound and light. □ Understanding the impact of physics: Students may learn how physics and science impact society. □ Developing critical thinking skills: Students may learn to think critically and work independently
	EMPHP1	Major Practicals - I	□ Students can apply concepts of elasticity, viscosity, and surface tension to solve everyday problems.
		EVEN	
	EMPH21	Heat & thermodynamics and Statistical Physics	The course focuses to understand a basic in conversion of temperature in Celsius, Kelvin and Fahrenheit scales. Practical exhibition and explanation of transmission of heat in good and bad conductor. Relate the laws of thermodynamics, entropy in everyday life and explore the knowledge of statistical mechanics and its relation.
	ESPH21	Astro Physics - SEC - 2	□ The study of this course explores topics such as the birth, life and death of stars, planets, galaxies, nebulae and other objects in the universe.
	ESPH22	Physics of Medical Instruments - SEC -3	□ Understand the physics behind the devices used in medical diagnosis. □ Learn how to protect patients and workers from the risks of using medical devices. □ Use advanced theoretical and technical skills to apply medical physics knowledge in clinical practice
	EEMA21	Allied Mathematics Paper II	
	EMPHP2	Major Practical - II	Potentiometer – calibration of ammeter Series resonance circuit Parallel resonance circuit Zener diode - Diode characteristics Tangent galvanometer – Horizontal earth's magnetic induction
II BSc Physics		**ODD**	

Program Name	Course code	Course Name	Course Outcome
	CMPH31	Electricity & Elcctromagnetism	• Understand the basics and applications of Coulomb's law, Gauss' law and thermoelectric effects • Explain the Kohlrausch's bridge method for determining the specific conductivity of an electrolyte • Understand Ohm's law, Kirchoff's laws, growth and decay of current and charge in different circuits • Analyse LCR series resonance and LCR parallel resonance circuits with derivation • Understand the about magnetic vectors, B-H curve and Lorentz force • Explain the construction, working and application of moving coil Ballistic galvanometer and De Sauty's bridge • Understand the concepts of Faraday's laws, Owen's bridge and coefficient of coupling • Use of Earth inductor for finding horizontal component and vertical component of the Earth's magnetic field • Derive the Maxwell's equations for material medium and for free space • Explain the concepts of Hertz experiment for production and detection of EM waves and to understand Poynting vector and displacement current
	CSPH3A	Maintenance of Electrical Appliances - Skill Based	Understand the operations and safe handling of commonly used domestic appliances. Understand the basic ideas about the components used in electrical appliances. Understand the basic ideas about transformers and their types and working principles. Managing the appliances with safety precautions using switches and fuses.
	CACH11	Allied Chemistry - I	• Learn about atomic structure and bonding. • Learn the principles of reactions of organic compounds. • Study about photochemical reactions. • Learn about the importance of polymers and polymer science. • Study about lubricants and some cosmetics in the modern world
	CMPHP3	Major Practicals - I	• Learning the resonance concepts of series and parallel circuits and calibration of voltmeter and ammeter • Comparing the electromotive forces of given power supply sources • Determining the magnetic moments of a magnet

Program Name	Course code	Course Name	Course Outcome
	CACHP1	Allied chemistry Practical - I	• Enable the students to acquire the quantitative skills in volumetric analysis • Estimate the oxalic acid • Estimate the Na2CO3 • Estimate the hydrochloric acid • Estimate of ferrous ammonium sulphate, ferrous sulphate, oxalic acid using Permanganometry
	CNBO3B	Botany : Herbal Medicine	• To provide the knowledge on diversity and importance of indigenous medicinal plants and their role in traditional medicinal systems. • To enrich the knowledge on identification, medicinal properties and their mechanism of action of locally available medicinal plants. • To analyze the chemical principles and their drug values, conservation and utilization of endangered medicinal plants.
	CNCS3B	Computer science: Basic Programming design	• Makes students gain a broad perspective about the uses of computers in engineering industry. • Develops basic understanding of computers, the concept of algorithm and algorithmic thinking. • Develops the ability to analyze a problem, develop an algorithm to solve it. • Develops the use of the C programming language to implement various algorithms, and develops the basic concepts and terminology of programming in general.
		EVEN	
	CMPH41	Heat & thermodynamics	of hydrogen and helium gases and adiabatic demagnetization • The practical applications of the low temperature concepts to refrigerator, air-conditioning machine and super fluidity • Derive the expressions for pressure, gas laws, Maxwell's law of distribution of molecular velocities, viscosity and thermal conductivity

Program Name	Course code	Course Name	Course Outcome
	CACH21	Allied Chemistry	• Learn the chemistry of basic aromatic compounds. • Understand the nuclear particles and few nuclear reactions • Know about carbohydrates, amino acids, proteins and nucleic acid. • Study about fuels, fertilizers, cement and glass. • Know about some common diseases and the drugs used.
	CSPH31	Maintenance of Electronic appliances	• Get the fundamental knowledge about Resistance, Capacitance and Inductance and also how to measure the value of resistance, capacitance values. • Get the basic knowledge about Transformer and how is it working and testing the transformers and also how to construct the simple transformers and identify to solve their losses • Get knowledge about the home appliances like Grinder, Washing machine and oven • Know how to electrical wiring in home and also industries.
		Food and Nutrition	• Identifying foods and their nutritional properties • Understanding the effects of food processing trends • Revising food properties, especially sensory characteristics • Understanding the structure and functioning of the human body • Learning the importance of a balanced diet and meal planning
	CMPHP4	Major Practical - IV	• Finding the specific heat capacity of a liquid and verifying the Newton's law of cooling • Determining the specific resistance and thermal conductivity of a poor conductor • Estimating the temperature coefficient of a coil and absolute capacity of a capacitor
III BSc Physics		**ODD**	

Program Name	Course code	Course Name	Course Outcome
	CMPH51	Basic Electronics	current source. Explain Norton's theorem and Thevenin's theorem. Design a voltage regulator using Zener diode. Construct a half wave bridge rectifier using diodes and capacitors. Explain the forward bias and reverse bias action of a transistor. Analyse the circuit of aastable and monostable multivibrator. Explain the working of a Hartley and Colpitts Oscillator. Design the circuit for low and high pass filter and explain the frequency response curve.
	CMPH53	Atomic & Nuclear physics	Understand the concepts of free electron theory, band theory and positive rays Derive the expressions for electrical conductivity, thermal conductivity and to explain Hall effect and Hall coefficient. Understand the production, properties, usage of Xrays and various X-ray diffraction methods.
	CMPH52	Spectroscopy	Explain different types of motion. Classify molecules according to rotational modes. Discriminate the effect of isotopic substitution Discuss the 3 IR regions. Justify the interaction of rotations & vibrations on molecules. Analyzed the IR techniques & explain its importance in research Distinguish Rayleigh & Raman scattering Categorize classical & quantum theory of Raman effect Validate the rule of mutual exclusion Formulate Lamber- Beer Law & Calculate transmission from absorbance Relate the use of UV spectrum in research Explain magnetic resonance & its principles List the uses of MRI Interpret NMR spectra
	CEPH51	Computer Programming in C++	Understand the basics of C++ programming. Understand the applications of C++ modules. Understand the procedural and object-oriented paradigms with concepts like streams, classes, functions, and arrays. Understand the fundamental C++ file operations for single and multiple files.

Program Name	Course code	Course Name	Course Outcome
	CCSB51	Personality Development	• Emotional intelligence Helps you foster trust, engagement, and performance in any area of life • Time management Helps you increase productivity, reduce stress, and spend more time on what's important to you • Goal setting Helps you set clear and specific goals to keep you focused and moving forward • Self-awareness Helps you build a positive self-image and navigate personal and professional situations with ease • Resilience Helps you move on from difficult situations quickly and stay focused on your tasks until you achieve them • Leadership Helps you develop key competencies like decision-making, communication, and problem-solving • Motivation Helps you discover your life's purpose and happiness • Action plan development Helps you stay organized and focused on the steps needed to achieve your objectives
	CMPHP5	General Practical	• Thevenin's and Norton's theorem verification • Finding Young's modulus by forming Elliptical fringes • Calibration of high range voltmeter • Finding the temperature coefficient of a coil using potentiometer • Finding the absolute capacity of a condenser using ballistic galvanometer
		EVEN	
	CMPH61	Quantum Mechanics	Understand the quantum concepts of black body radiation, Planck's theory and photoelectric effect. Bohr's quantization concept of angular momentum to hydrogen atom. Acquire the knowledge of De Broglie's hypothesis and concepts of phase and group velocities. Explain the concepts of diffraction and interference of electrons and wave packet. Understand the Heisenberg's uncertainty principle and its proof between energy and time Understand the Heisenberg's uncertainty principle and its proof between energy and time.

Program Name	Course code	Course Name	Course Outcome
	CMPH62	Digital Electronics	Define binary number Differentiate the various codes in Binary system Construct the circuit for the basic logic gates Explain the half and full subtractor using logic gates Draw the circuit for frequency divider Analyse the circuit of aastable and monostable multivibrator Explain the function of a multiplexer and De- multiplexer Differentiate A/d and D/A converter
	CMPH63	Solid state physics	Explain the seven classes of crystals and to illustrate about the Bravais lattice in three dimensions. Imagine and elaborate about Simple cubic, Face centered cubic, Body centered cubic and Hexagonal closed packed structures. To make use of Braggs's law and reciprocal lattice to SCC, BCC and FCC lattices. Illustrate Langevin's theory of Paramagnetism, Weiss Paramagnetism. To analyze the concept of Ferromagnetism and to summarize about domain theory of ferromagnetism and anti magnetism.
	CEPH61	Energy physics - Elective	Understand the importance of conventional and non-conventional energy resources. Understand the applications, merits, and demerits of conventional and non-conventional energy resources. Understand the basic aspects of solar energy. Understand solar energy appliances with their merits and demerits. Understand the basic aspects of the photovoltaic principle. Understand the basic aspects of the photovoltaic principle. Learn about photovoltaic appliances and how they work.
	CMPHP7	General Practical VII	• Finding Hartman's constant using spectrometer and determining the angle of incidence and angle of emergence correspondence and oblique incidence • Determining the magnetic moment of a magnet and impedance of the given circuit
I MSc Physics		**ODD**	

Program Name	Course code	Course Name	Course Outcome
	WPHM11	Mathematical Physics	Understand use of bra-ket vector notation and explain the meaning of complete orthonormal set of basis vectors, and transformations and be able to apply them. Able to understand analytic functions, do complex integration, by applying Cauchy Integral Formula. Able to compute many real integrals and infinite sums via complex integration. Analyze characteristics of matrices and its different types, and the process of diagonalization. Solve equations using Laplace transform and analyze the Fourier transformations of different function, grasp how these transformations can speed up analysis and correlate their importance in technology. To find the solutions for physical problems using linear differential equations and to solve boundary value problems using Green's function. Apply special functions in computation of solutions to real world problems.
	WPHM12	Classical Mechanics & Relativity	equations of motion of physical systems. Apply the principles of Hamiltonian mechanics to solve the equations of motion of physical systems. Analyse the small oscillations in systems and determine their normal modes of oscillations. Understand and apply the principles of relativistic kinematics to the mechanical systems.
	WPHM13	Linear and Digital Ics and Applications	• Learn about the basic concepts for the circuit configuration for the design of linear integrated circuits and develops skill to solve problems • Develop skills to design linear and non-linear applications circuits using Op-Amp and design the active filters circuits. • Gain knowledge about PLL, and develop the skills to design the simple circuits using IC 555 timer and can solve problems related to it. • Learn about various techniques to develop A/D and D/A converters. • Acquire the knowledge about the CMOS logic,
	WPHE11	Energy Physics - Elective	To identify various forms of renewable and non-renewable energy sources. Understand the principle of utilizing the oceanic energy and apply it for practical applications. Discuss the working of a windmill and analyse the advantages of wind energy. Distinguish aerobic digestion process from anaerobic digestion. Understand the components of solar radiation, their measurement and apply them to utilize solar energy
	WPHL11	Practical -1	Hyperbolic fringes - Cornu's Method 2. B-H loop using Anchor ring. 3.Determination of Planck Constant – LED Method 4.Determination of Compressibility of a liquid using Ultrasonics 5.Measurement of Conductivity - Four probe method. 6. Measurement of wavelength of Diode Laser / He – Ne Laser using Diffraction grating

Program Name	Course code	Course Name	Course Outcome
		EVEN	
	ZPHM24	Statistical Mechanics	• Understand the statistical nature of concept about phase space, types of ensembles and equilibrium and connection between statistical and thermodynamical quantities. • Know the concept and role of indistinguishability in the theory of gases and the results expected from classical consideration (Maxwell-Boltzmann distribution). • Understand quantum statistical mechanics (Bose-Einstein, Fermi-Dirac distribution), where they are applicable, and how they differ from classical statistical mechanics.
	WPHM22	Quantum Mechanics - I	quantum mechanics which serve to formalize the rules of quantum Mechanics • Is able to apply and analyze the Schrodinger equation to solve one dimensional problems and three dimensional problems • Can discuss the various representations, space time symmetries and formulations of time evolution
	WPHE26	Advanced Optics - Elective III	□ Discuss the transverse character of light waves and different polarization phenomenon. □ Discriminate all the fundamental processes involved in laser devices and to analyze the design and operation of the devices. Demonstrate the basic configuration of a fiber optic – communication system and advantages. □ Identify the properties of nonlinear interactions of light and matter.
		Micro processor8085 and Micro Controller 8051 -Elective IV	microprocessor. Get knowledge of architecture and working of 8051 Microcontroller. Be able to write simple assembly language programs for 8085A microprocessor. Able to write simple assembly language programs for 8051 Microcontroller. Understand the different applications of microprocessor and microcontroller.
	WPHSE21	Physics for Competitive Exam - SEC - I	Understand the concepts of fundamental physics. Apply the concept of physics to solve various problems. Strengthen an appropriate problem-solving approach and assess a step to describe the quantitative analysis. Evaluate the results of new analytical problems and develop a correct solutions or conclusions.

Program Name	Course code	Course Name	Course Outcome
		Practical - II	1.Determination of Young's modulus and Poisson's ratio by Elliptical fringes - Cornu's Method 2. B-H curve using CRO 3.Measurement of Magnetic Susceptibility - Guoy's method 4.Determination of Refractive index of liquids using diode Laser/ He – Ne Laser 5. Hall Effect in Semiconductor. Determine the Hall coefficient, carrier concentration and carrier mobility 6. Equipotential lines of different shapes.
II MSc Physics		**ODD**	
	ZPHM31	Quantum Mechanics- I	Analyze the inadequacy of Classical mechanics to explain black body radiation, photoelectric effect, specific heat of solids and Compton effect and discuss the basic postulates of Quantum mechanics. Also derive Schrodinger wave equation and find its solution. Apply Schrodinger wave equation to one and three dimensional problems and develop abstract operator method for harmonic oscillator problem. Explain the different types of operators and develop basic ideas of complex abstract space and matrix theory in Quantum Mechanics. Derive the fundamental commutation relations, eigen values and eigen states of angular momentum operators, construct angular momentum matrices and discuss the theory of addition of angular momenta. Discuss the degenerate and non-degenerate perturbation theory for stationary states and also derive the time independent and dependent perturbation theories and apply it to selected examples of quantum systems.
	ZPHM32	Atomic and Molecular Spectroscopy	• This course gives detailed knowledge about various types of spectroscopy. • The structure of different chemical compounds can be determined by studying these types.
	ZPHM33	Condenced matter Physics	Student will be able to list out the crystal systems, symmetries allowed in a system and also the diffraction techniques to find the crystal structure Students will be able to visualize the idea of reciprocal spaces, Brillouin Zone and their extension to band theory of solids. Student will be able to comprehend the heat conduction in solids Student will be able to generalize the electronic nature of solids from band theories. Student can compare and contrast the various types of magnetism and conceptualize the idea of superconductivity.

Program Name	Course code	Course Name	Course Outcome
	ZPHM34	Numerical methods & Programming in C++	Recall the transcendental equations and analyze the different root finding methods. Understand the basic concept involved in root finding procedure such as Newton Raphson and Bisection methods, their limitations. Relate Simultaneous linear equations and their matrix representation Distinguish between various methods in solving simultaneous linear equations. Understand, how interpolation will be used in various realms of physics and Apply to some simple problems Analyze the newton forward and backward interpolation Recollect and apply methods in numerical differentiation and integration. Assess the trapezoidal and Simpson's method of numerical integration. Understand the basics of C++-programming and conditional statements.
	ZPHL31	Advanced Physics Experiments - I	UV spectrum of various molecules. Understand the working of phototransistors. Differentiate linear and nonlinear circuit elements.
	ZPHL32	Microprocessor Experiments	• Understanding the basics Students should understand the fundamentals of microprocessors and the construction of a microcomputer system • Comparing microprocessors and microcontrollers Students should be able to compare the two and understand the structural differences between them • Programming Students should be able to program in assembly or advanced level • Understanding the internal design Students should understand the internal design of a microcontroller and its features • Designing applications Students should be able to design interfacing applications using microcontrollers and peripherals • Understanding the strengths and limitations Students should be able to demonstrate the strengths and limitations of different types of microcontrollers • Building systems Students should be able to build systems using microcontrollers for real-time applications • Understanding the architecture Students should be able to describe the architecture and organization of a microprocessor • Understanding the instruction set Students should be able to understand and classify the instruction set of a microprocessor • Understanding addressing modes
		EVEN	

Program Name	Course code	Course Name	Course Outcome
	ZPHM41	Quantum Mechanics - II	Analyze the different stationary state approximation methods and apply them to solve the Schrodinger equation for various quantum systems.Understand the concept of Scattering theory and evaluate scattering cross-section, scattering amplitude by using Born approximation and partial wave analysis methods. Distinguish between bosons and fermions and develop the Pauli's exclusion principle and also explain the theory of identical particles and solvethe dynamics of two electron atom using the idea of identical particles. Establish the Schrodinger and Heisenberg formulations of time development and their applications and explain symmetries in Quantum mechanics and also derive Wigner – Eckart theorem Discuss the central concept and principles ofrelativistic quantum mechanicsand explain electron.
	ZPHM42	Nuclear and Particle physics	Gain knowledge about the concepts of helicity, parity, angular correlation and internal conversion. Demonstrate knowledge of fundamental aspects of the structure of the nucleus, radioactive decay, nuclear reactions and the interaction of radiation and matter. Use the different nuclear models to explain different nuclear phenomena and the concept of resonances through Briet-Weigner single level formula
	ZPHM43	Research Methedology	research methodologies specific to theoretical, experimental, and computational physics. Gain proficiency in designing robust research projects and experiments in physics, balancing flexibility with scientific rigor. Master various data collection methods and statistical analysis techniques relevant to experimental physics to ensure accurate and reliable results.
	ZPHE44	Renewable energy Sources - Elective	To identify various forms of renewable and non-renewable energy sources. Understand the principle of utilizing the oceanic energy and apply it for practical applications. Discuss the working of a windmill and analyse the advantages of wind energy. Distinguish aerobic digestion process from anaerobic digestion. Understand the components of solar radiation, their measurement and apply them to utilize solar energy
	ZPHL41	Practical - VII Advanced physics Experiment II	Evaluate the basic properties of semiconductor, magnetic and dielectric materials. Find out the fixed points, draw stability and bifurcation diagram. Form diffraction grating inside liquid. Analyze and interpret experimental data using graphs.

Program Name	Course code	Course Name	Course Outcome
	ZPHL42	Practical - VIII C++ Programming	• Understanding programming paradigms: Students can understand the differences between structured and object-oriented programming. • Writing programs: Students can write, compile, and debug programs in C++. They can also write programs using classes and objects, and implement overloading concepts. • Using object-oriented features: Students can understand and apply object-oriented features, such as inheritance, polymorphism, and virtual functions. • Using data types and control structures: Students can use data types and control structures in C++. They can also understand tokens, expressions, and arrays.
I BSc Chemistry		**ODD**	
	EMCH11	General Chemistry	CO1: explain the atomic structure, wave particle duality of matter, periodic properties bonding,and properties of compounds. CO2: classify the elements in the periodic table, types of bonds, reaction intermediates electroniceffects in organic compounds, types of reagents. CO3: apply the theories of atomic structure, bonding, to calculate energy of a spectral transition,Δx, Δp electronegativity, percentage ionic character and bond order. CO4: evaluate the relationship existing between electronic configuration, bonding, geometry ofmolecules and reactions; structure reactivity and electronic effects CO5: construct MO diagrams, predict trends in periodic properties, assess the properties of elements, and explain hybridization in molecules, nature of H – bonding and organic reaction mechanisms.
	EFCH11	Foundation course-Chemistry	CO1: learn about atom structure and periodic properties. CO2: gain knowledge on types of chemical bonding CO3: explain different states of matter CO4: discussion on nomenclature and isomerism in organic compounds CO5: knowledge on electromagnetic radiation and its interation with matter
	ESCH11	Food chemistry SEC	

Program Name	Course code	Course Name	Course Outcome
	EMCHP1	Major practicals - Quantitative inorganic Estimation & Inorganic Preparation	CO1: explain the basic principles involved in titrimetric analysis and inorganic preparations. CO2: compare the methodologies of different titrimetric analysis. CO3: calculate the concentrations of unknown solutions in different ways and develop the skillto estimate the amount of a substance present in a given solution. CO4: assess the yield of different inorganic preparations and identify the end point of various titrations.
		EVEN	
	EMCH21	General Chemistry - II	CO1: explain the concept of acids, bases and ionic equilibria; periodic properties of s and pblock elements, preparation and properties of aliphatic and aromatic hydrocarbons CO2: discuss the periodic properties of sand p- block elements, reactions of aliphatic andaromatic hydrocarbons and strength of acids CO3: classify hydrocarbons, types of reactions, acids and bases, examine the properties s and pblock elements, reaction mechanisms of aliphatic and aromatic hydrocarbons CO4: explain theories of acids, bases and indicators, buffer action and important compounds of s-block elements CO5: assess the application of hard and soft acids indicators, buffers, compounds of s and p- block elements and hydrocarbons
	ESCH21	Dairy Chemistry	CO 1: understand about general composition of milk – constituents and its physical properties. CO 2: acquire knowledge about pasteurization of Milk and various types of pasteurization -Bottle, Batch and HTST Ultra High Temperature Pasteurization. CO 3: learn about Cream and Butter their composition and how to estimate fat in cream andGhee CO 4: explain about Homogenized milk, flavoured milk, vitaminised milk and toned milk. CO 5: have an idea about how to make milk powder and its drying process - types of drying
	ESCH22	Cosmetics and Personal Grooming	CO1: know about the composition of various cosmetic products □ CO2 understand chemical aspects and applications of hair care and dental care and skincare products. □ CO3 understand chemical aspects and applications of perfumes and skin care products. □ CO4 to understand the methods of beauty treatments their advantages and disadvantage □ CO5 understand the hazards of cosmetic products.

Program Name	Course code	Course Name	Course Outcome
	EMCHP1	Major practicals - Qualitative organic Analysis and prepartion of organic compounds	CO1: observe the physical state, odour, colour and solubility of the given organic compound. CO2: identify the presence of special elements and functional group in an unknown organic compound performing a systematic analysis. CO3: compare mono and dicarboxylic acids, primary, secondary and tertiary amines, mono and diamides, mono and polyhydric phenols, aldehyde and ketone, reducing and non- reducing sugars and explain the reactions behind it. CO4: exhibit a solid derivative with respect to the identified functional group.
II BSc Chemistry		**ODD**	
	CMCH31	Physical Chemistry -I	• Understand the gaseous behavior using the kinetic molecular model. • Analyze the difference between thermal and photochemical reaction & its laws. • Gain knowledge in nuclear chemistry, applications of radioisotopes & its reaction mechanism • Explain the concept of crystal lattices and structure of crystals. • Demonstrate the concept behind dilute solutions and its properties.
	CSCH31	Food chemistry (Skilled Based)	• To acquire the basic knowledge of food chemistry • Have knowledge on and be able to use food regulations. • Explain properties and reactions of carbohydrates, lipids and proteins during storage and processing of food and how these influence the quality and properties of the food. • Explain the importance of water for stability and quality of foods.
	CNBO31	Botany-Herbal Medicine	• To enrich the knowledge on identification, medicinal properties and their mechanism of action of locally available medicinal plants. • To analyze the chemical principles and their drug values, conservation and utilization of endangered medicinal plants
		EVEN	

Program Name	Course code	Course Name	Course Outcome
	CMCH41	Inorganic chemistry - II	• To study the theories in coordination chemistry • To study the chemistry of metal carbonyls To understand the role of metal ions in biological systems • To study the basic principles of photoinorganic chemistry
	CSCH42	Industrial Chemistry	• Basic electricity laws and their directional conventions are emphasized. • Elemental theory of magnetism, the properties of various magnetic materials and introduction about electromagnetism are underscored. • The properties and working principles of electronic components such as diodes, transistors and electronic devices such as amplifier, oscillators are given. Number systems and logical circuits are discussed.
		Allied Physics - II	
	CMCHP3	Major practicals - Inorganic Qualitative Analysis	• Enable the students to understand various procedures in Interfering acidic radicals and Basic radicals. • Create awareness on ecofriendly approach in salt analysis • Use modern instruments, techniques & able to record the results of the experiments • Design, carry out, record & analyze the results of chemical experiments. • Knows the proper procedure & regulations for safe handling & use of chemicals
		Allied Physics - Practical	
		COMPUTER FOR DIGITAL ERA	
III BSc Chemistry		**ODD**	
	CMCH51	Organic chemistry - III	• To learn about stereochemistry • To understand aromaticity • To study dyes
	CMCH52	Physical chemistry - II	• To learn about basic concepts and I and II law of thermodynamics • To understand chemical equilibrium and electrochemistry • To study solutions

Program Name	Course code	Course Name	Course Outcome
	CECH5A	Polymer Chemistry	• To know the concept of polymerization and types of polymers • To understand the characteristics of polymers • To acquire knowledge about the polymerization techniques and polymer processing • To know the chemistry of individual polymers • To have an idea about the recent advances in polymer sciences
	CECH5C	Inorganic Chemistry II	• To study the theories in coordination chemistry • To study the chemistry of metal carbonyls To understand the role of metal ions in biological systems • To study the basic principles of photoinorganic chemistry
	CMCHP5	Major Practical: Organic Analysis & Physical constant Determination	• To identifying the formula of a compound, its elemental composition, and functional groups. • The basic aims of organic qualitative analysis are to detect and identify organic compounds.
	CMCHP6	Major Practicals: Inorganic gravimetric estimation and Inorganic Preparations	• Be skilled in concept of qualitative and gravimetric analysis • Learn estimation by gravimetric method • Estimate of Lead as lead chromate • Estimate of barium as barium chromate • Estimate of copper as lead cuprous thiocyante
		EVEN	
	CMCH61	Inorganic Chemistry - III	• To study the theories in coordination chemistry • To study the chemistry of metal carbonyls To understand the role of metal ions in biological systems • To study the basic principles of photoinorganic chemistry
	CMCH62	Organic Chemistry - IV	• To learn about natural products • To understand chemistry of aromatic compounds • To study spectroscopy
	CMCH63	Physical Chemistry - IV	• To learn about basic concepts in spectroscopy • To understand chemical equilibrium and phase equilibrium • To study nano chemistry

Program Name	Course code	Course Name	Course Outcome
	CECH62	Nono chemistry - Elective	• To give an insight into the basics of nanochemistry. • To understand the difference between bulk material and nanomaterial and learn the synthesis, application and fabrication of nanostructure. • To study the importance of nanocatalyst, nanocomposites and fibers. • To make the students familiar with the characterization and applications of nanomaterials
I BSc Zoology		**ODD**	
	EMZO11	Invertabrata	Understand the basic concepts of invertebrate animals and recall its structure and functions. Illustrate and examine the systemic and functional morphology of various groups of invertebrata. Differentiate and classify the animal's mode of life in various taxa and estimate the biodiversity. To compare and distinguish the various physiological processes and organ system in lower animals. Infer and integrate the parasitic and economic importance of invertebrate animals.
	EMZOP1	Major Practical I: Invertabrata	Identify and label the external features of different groups of invertebrate animals. Illustrate and examine the nervous system and reproductive system of invertebrate animals. Differentiate and compare the structure, function and mode of life of various groups of animals. Compare and distinguish the dissected internal organs of lower animals. Prepare and develop the mounting procedure of economically important invertebrates.
	EFZO11	Introduction to Zoology - FC	identify and classify diverse animal groups, understand fundamental animal structures and functions, explain basic evolutionary concepts within the animal kingdom, recognize the importance of animal adaptations to their environment, and apply basic principles of scientific inquiry to the study of animals; including knowledge of animal taxonomy
	ESZO11	Ornamental Fish Farming and management - SEC	The students will be able to identify, culture, maintain and market the commercially important ornamental fishes. The knowledge and skills gained on the different aspects of ornamental fish keeping will enable the students to develop entrepreneurship potential and help in self employment.
		EVEN	

Program Name	Course code	Course Name	Course Outcome
	EMZO21	chordata	Classify, identify and recall the name and distinct features of different subphylum belonging to phylum Chordata. Explain, and relate the origin, structural organization and evolutionary aspects of vertebrates. Analyze, compare and distinguish the developmental stages and describe the important biological process. Correlate the different modes of life and parental care among different vertebrates. Summarise the morphology and ecological adaptations in vertebrates and list out the economic importance.
	EMZOP2	Chordata Lab	Identify and lable the external features of different groups of invertebrate animals. Illustrate and examine the nervous system and reproductive system of invertebrate animals. Differentiate and compare the structure, function and mode of life of various groups of animals. Compare and distinguish the dissected internal organs of lower animals. Prepare and develop the mounting procedure of economically important invertebrates.
	ESZO21	Biocomposting for Entrepreneurship	Biocomposting. Students will be able to demonstrate Biocomposting techniques for various end applications like solid waste management, industrial waste recycling using sugarcane bagasse, etc. To learn about the economic cost of establishing small Biocompost units as a cottage industry.
	ESZO22	Animal Behaviour	Recall and record genetic basis and evolutionary history of behaviour. Classify movement and migration behaviours and explain environmental influence upon behaviour. Analyze and identify innate, learned and cognitive behaviour and differentiate between various mating systems. Assess complexity involved in behavioural traits and evaluate hormones and their role in aggression and reproduction. Discuss the rhythmicity of behavioural expressions and the scientific concepts in behaviour and behavioural ecology.
II BSc Zoology		**ODD**	
	CMZO31	Cell Biology& Bio Chemistry	• To observe the giant chromosomes in chronomous larva. • To prepare human and frog blood • To observe the simple mendelian fruit in man • Observation and study of polygenic inheritance of quantitative traits to be interpreted in graphs. • To analyse the blood group in a population with 30 students. • To study the model of genetic significance.

Program Name	Course code	Course Name	Course Outcome
	CSZO31	Home Aquarium - Skill based	• It explains the importance and construction techniques of Home Aquarium. • It discusses about ornamental fishes and plants used in aquarium tanks. • To know the different species of ornamental fishes. • It states the facts about reproductive biology and the diseases of ornamental fishes. • It emmorates the taxonomy and morphology of other ornamental organisms and some aquatic plants.
	CABO11	Plant Diversity & medicinal Botany - Allied	• Understanding the Characters and importance of Algae and Fungi. • Provides the basic features and importance of Lichen and Bryobhytes. • Gives the Basic knowledge about Pteridophytes and Gymnosperms. • Familiar with Angiosperm Classification and typical families. • Acquire knowledge about some Medicinal Plants Morphology,Parts used and Medicinal uses of Selective plants.
	CMZOP3	Major Practical : Cell Biology & Bio Chemistry	• To measure the rate of O2 consumption in a fish. • Calculate the Q 10 with the effect of temperature on the opercullar movement of fish. • To demonstrate the blood pressure using sphygmonometer.
	CABOP1	Plant Diversity & medicinal Botany - Allied PRACT	• Acquire the knowledge on Identification of common Plants and their Families. • To describe the Angiospermic plants in technical terms. • Demonstrate the Embryo dissection. • To increase the knowledge in Micropreparation skills. • How to identify the Medicinal Plants. • Acquire the knowledge on Identification of Specimens prescribed in the syllabus

Program Name	Course code	Course Name	Course Outcome
	CNPH31	Physics : Basic physics	• Get the fundamental knowledge about Motion, Force, Newton law and also conservation of energy. • Get the basic knowledge about Pascal'law and Archimedes Principle and their applications. • Get basic knowledge about Heat and Sound and also to measure the heat and temperature and sound • Get the basic knowledge about Light like reflection, refraction, polarisation, Interference, double refraction. • Get the fundamental knowledge about Resistance and how to measure the value of resistance values
		EVEN	
	CMZO41	Genitics	Correlate changes in genetics makeup and phenotypic changes in progeny. Analyse the causes of variations in genetic material and predict the effect in a population using different techniques. Explain the role of cellular processess and different techniques. Compile the factors which contribute to changes in gene expression and specify the changes which contribute to
	CSZO42	Vermitechnology	Improve the knowledge for identification of earthworms. Find out Vermicomposting is an eco-friendly, economically and socially acceptable technology. Apply Vermitechnology to convert the rural and urban garbage into nutrient rich ecofriendly organic manure. Justify and prove that the earthworms are having the capacity to observe heavy metals into their tissues. Improve Vermitechnology to manufacture the vermicompost in small scale industry.
	CABO21	Embroyology, Plant anatomy, Physiologyand Biotechnology	identify and classify diverse animal groups, understand fundamental animal structures and functions, explain basic evolutionary concepts within the animal kingdom, recognize the importance of animal adaptations to their environment, and apply basic principles of scientific inquiry to the study of animals

Program Name	Course code	Course Name	Course Outcome
	CNPH41	Basic physics - II	• Get the fundamental knowledge about Nucleus and their properties and also about Radioactivity like α.β.γ rays and their properties • Get the basic knowledge about Magnets and their types and properties and also Solids and their characterization • Get basic knowledge about Light like LASER and their properties and types. • Get the basic knowledge about Theory of Relativity • Get the fundamental knowledge Number systems in Digital electronics
	CMZOP4	Major Practical - Genitics	To describe, examine and interpret the organization of genomic material and to research theories of genetics inheritance. To prepare samples of genetics molecules and to determine their purity, structure and characteristics. To experiment with genomic preparations and device techniques to distinguish genetic material in different organisms to survey biodiversity. To assess the changes in genetic material and to predict and consider the consequences of those changes. To report and justify the results of molecular and genetic experiments in an accurate and meaningful manner.
III BSc Zoology		**ODD**	
	CMZO51	Developemental Zoology	to equip students with a comprehensive understanding of animal development from fertilization to the formation of adult structures
	CMZO52	Micro Biology & Immunology	Students will gain knowledge about the different cell organelles of microorganisms and their detailed functions. 2. Students will also study the growth and control of microbes as well as different bacteriological techniques involved in microbiology.
	CMZO53	Animal Physiology	• To organize the students knowledge of chemistry around the physiological functions of whole animal systems with a special reference human being. • To know the anatomy and interactions between different organ systems. • To understand the classification, structure and functions of the basic nutrients. • To have an eye on the mechanism of enzymes on metabolism. • Understanding of endocrinology with special reference to man.

Program Name	Course code	Course Name	Course Outcome
	CMZO54	Ecology	CO1: recall the principles, applications and concepts of ecology and ecosystem, how biotic and abiotic factors that are related to ecosystem. CO2: understand how the animals interact with each other and their natural environment. CO3: analyse and compare the differences in the structure and function of different types of ecosystem. CO4: emphasize the role of key factors responsible for changes in natural ecosystem such as pollution and urbanization and capable of pollution and other effects. CO5: interpret the diversity of species in relation to natural process and sustenance of life.
	CCSB52	Effective Communication-Skill Based	• To improve the student communicative competence in English in speaking and writing. • Providing them with down-to-earth sensible and stimulating guidance.: carry on conversation in different communication contexts such as face to face communications, telephonic communication, viva voce interview etc., • To increase their ability to participate actively in group discussions and exchange ideas or attempt to reach a decision on shared problems. • Improve their ability to read fast with better understanding.
	CMZOP5	Major Practical : V	• Students becomes well aware of the interaction and interdependence among environmental factors and living organisms. • It explain the characters and features of ecological population and community. • It explains the importance of wild life conservation, • Uses of remote sensing technique in ecology a urbanization. • Student gain knowledge about the ill effects and health hazards of toxic agents released to the environment.
	CMZOP6	Major practicals: VI Animal Physiology	• To measure the rate of O2 consumption in a fish. • Calculate the Q 10 with the effect of temperature on the opercullar movement of fish. • To demonstrate the blood pressure using sphygmonometer.

Program Name	Course code	Course Name	Course Outcome
	CMZOP7	Major Practicals: VII Ecology	• Students becomes well aware of the interaction and interdependence among environmental factors and living organisms. • It explain the characters and features of ecological population and community. • It explains the importance of wild life conservation, • Uses of remote sensing technique in ecology a urbanization. • Student gain knowledge about the ill effects and health hazards of toxic agents released to the environment.
		EVEN	
	CMZO61	Evolution	To understand the Primordial earth and theories on origin of life. To integrate and assess Lamarckism - Neo Lamarckism - Darwinism. To analyse various fossil records of man and fossil records of horse, various types of rocks - Geological time scale. To explain the Nature of fossils - Dating of fossils, evidences of evolution, Adaptive radiation in reptiles and mammals. To construct and compile the role of Human Genome Project, Evolution in the diagnosis, and treatment of diseases.
	CMZO62	Animal Bio technology	To describe the methodologies for handling animals cells based on their diverse characteristics and identify the correct biotechnological tools to obtain the desired products from the cells. To develop and explain the protocols for genetically manipulating cells and produce transgenic animals. To select the apt molecular techniques to evaluate and analyze animal traits and diseases at the genomic level and devise methods for easy taxonomical identification and classification for biodiversity and environmental studies. To choose the correct methods of transgenesis and to consider their use in improving animal husbandry nationally and globally. To speculate on the environmental implications of animal biotechnological methods and design responsible, ethical solutions to livvestock production and health issues.
	CMZO63	Apiculture	Identify and characterize the members of the colony. Describe the structure and management of the colony. Adopt suitable methods to handle the bees safely. Plan to develop a modern apiary and marketing honey with self involvement and interest. Motivate to start an apiary unit.
	CEZO63	Bio statistics, Computer application and Bio informatics	Students learn to apply statistical methods to biological data, including sampling methods, graphical representation, and hypothesis testing.

Program Name	Course code	Course Name	Course Outcome
	CEZO64	Major Elective: Sericulture	Understand the scope of sericulture and mulberry cultivation practices. Gain knowledge on diseases of silkworms and pests of mulberry. Understand the classification, life cycle and physiology of silkworms. Apply the rearing methods, harvesting of cocoon and cocoon marketing. Decide to start sericulture unit / reeling unit in the local area and become notable entrepreneur.
	CMZOP8	Major Elective: Apiculture	• The importance, Biology and management of bees. • To demonstrate bee keeping management skills. • To apply the knowledge on bee biology and management to the development of the bee industry. • To evaluate bee keeping project for cost effectiveness and sustainability. • To kindly the interest of students to take up the beekeeping of their profession.
	CEZOPA	Practical : Sericulture & Apiculture	CO1: understand the scope sericulture and mulberry cultivation practices. CO2: gain knowledge on diseases of silkworms and pests of mulberry. CO3. understand the classification, life cycle and physiology of silkworm. CO4. apply the rearing methods, harvesting of cocoon and cocoon marketing. CO5: examine process of reeling, producing raw silk and marketing. CO6: decide to start sericulture unit/reeling unit in the local area and become notable entrepreneur.
FBSc Computer		**ODD**	
	EMCS11	Python Programming	CO1 Learnthebasicsofpython,Dosimpleprogramsonpython, Learnhowtouseanarray. CO2 Developprogramusingselectionstatement,WorkwithLooping and jump statements, Do programs on Loops and jump statements. CO3 Concept of function, function arguments, Implementing the conceptstringsinvariousapplication,SignificanceofModules, Work with functions, Strings and modules. CO4 Workwith List,tuplesanddictionary,Writeprogramusinglist, tuplesand dictionary.

Program Name	Course code	Course Name	Course Outcome
	EECS11	Discreat Mathematics - Elective	CO1:Know how to solve various problems on discrete mathematics CO2:Use approximation to solve problems CO3:Differentiationandintegrationconceptare applied CO4:Apply, direct methods for solving linear systems CO5:Discretesolution of ordinary problems
	ESCS11	SEC- Office Automation	s. CO2:Understand and apply the basic concepts of word processing package. CO3:Understandandapplythebasicconceptsofelectronicspreadsheetsoftware. CO4: Understand and applythe basic concepts of database management system. CO5:Understand andcreate apresentationusingPowerPoint tool.
	EFCS11	FC- Problem Solving Techniques	CO1 StudythebasicknowledgeofComputers. Analyze the programming languages. CO2 Studythedatatypesandarithmeticoperations. Know about the algorithms. Developprogramusingflowchartandpseudocode. CO3 Determinethevariousoperators. Explain about the structures. Illustratetheconceptof Loops CO4 Studyabout Numericdataand character-based data. Analyzeabout Arrays. CO5 Explain about DFD Illustrateprogrammodules. CreatingandreadingFiles
	EMCSP1	Practicals: Python Programming	CO1 DemonstratetheunderstandingofsyntaxandsemanticsofPYTHON language CO2 Identifytheproblemand solveusingPYTHONprogramming techniques. CO3 Identifysuitableprogrammingconstructsforproblem solving. CO4 AnalyzevariousconceptsofPYTHONlanguagetosolvetheproblminan efficient way. CO5 DevelopaPYTHONprogramfora givenproblem andtestforitscorrectness.
		EVEN	

Program Name	Course code	Course Name	Course Outcome
	EMCS21	DATA STRUCTURE AND ALGORITHMS(PART III)	CO1 Understand the concept of Dynamic memory management,datatypes,algorithms,BigOnotation CO2 Understandbasicdatastructuressuchasarrays,linked lists, stacks and queues CO3 Describethehashfunctionandconceptsofcollisionand itsresolutionmethods CO4 Solveprobleminvolvinggraphs,treesandheaps CO5 ApplyAlgorithmforsolvingproblemslikesorting, searching,insertionanddeletionofdata
	EMCSP3	DATA STRUCTURE AND ALGORITHMS LAB(PART III)	Understandbasicdatastructuressuchasarrays,linked lists,stacksand queues Describethehashfunctionandconceptsofcollisionand itsresolutionmethods Solveprobleminvolvinggraphs,treesandheaps ApplyAlgorithmforsolvingproblemslikesorting, searching,insertionanddeletionofdata
	EMCSP4	WEB DESIGN LAB (PART III)	Students should be able to design static and dynamic web pages using HTML, CSS, and JavaScript Students should be able to understand web application terminologies, internet tools, e-commerce, and other web services
	EECS21	DIGITAL LOGIC FUNDAMENTALS(PART III)	CO1 Understandtheconceptofvariousnumber systems CO2 Understandbasicconceptsofdigitalsystems CO3 Describethestoragestructures CO4 SolveproblemsusingSOPandPoS CO5 Applyconceptsforsimplifications
	ESCS21	INTRODUCTION TO HTML(PART IV)	CO1 Understandtheconceptofvarious tags CO2 Understandbasicdesigning CO3 Describethehashfunctionandconceptsof tables,designingetc CO4 Solveprobleminvolvingstylesheets CO5 Applytheattributesindesigningwebpages
	ESCS22	UNDERSTANDING INTERNET(PART IV)	CO1 Understandtheconceptof network CO2 Understandbasiclanguages CO3 Describethesecurityhashfunctionandconceptsof securitymethods CO4 Solveprobleminvolving malware CO5 ApplyAlgorithmforsecurenetwork
II BSc Computer Science		**ODD**	

Program Name	Course code	Course Name	Course Outcome
	CMCS31	JAVA PROGRAMMING(PART III)	Programming CO2: To apply the tools of Object – Oriented Paradigm in Java programming CO3: To understand the fundamentals of applet, event – driven programming CO4: To analyze the ability to develop Applet programs with tools of Java CO5: To design the skills to develop software
	CMCSP3	JAVA PROGRAMMING LAB (PART III)	to develop software CO2: Develop Java application programs using OOP principles.. CO3: Apply Constructors and Overriding methods CO4: Develop Multithreaded programs CO5: To implement error handling techniques using exception handling.
	CACS31	SCRIPTING LANGUAGES (PART III)	CO2: To demonstrate programming skills in scripting languages. CO3: To construct the skill of designing GUI in scripting languages CO4: To categorize CSS files
	CACSP3	SCRIPTING LANGUAGES LAB (PART III)	CO2: To demonstrate programming skills in scripting languages. CO3: To construct the skill of designing GUI in scripting languages CO4: To categorize CSS files
	CSCS31	DIGITAL DESIGN (PART III)	various number systems and simplify Boolean functions and to distinguish logical and combinational circuits. CO2:Illustrate the concept of digital and binary systems CO3: Be able to develop combinational logic circuits. CO4: Be able to design and analyze sequential logic circuits. CO5: Construct and implementation of digital circuits and systems.
	CNCO32	CONSUMER PROTECTION	CO1: Regarding the intellectual property rights and consumer protection CO2: Students about a better quality of living as consumer
	CNMA31	Maths:Mathematics for competitive examinations - I	• Students will be able to simplify simple expressions and they can apply the knowledge of average to solve real world Problems. • Students will acquire skill of solving day today life situation problems involving Ratio and Proportion. • Students will get an in-depth knowledge in partnership and percentage. • Students will come to know how to calculate profit and loss and how business operate in perfectly competitive markets. • Students will be able to solve mathematical problems on numbers.

Program Name	Course code	Course Name	Course Outcome
	CNPH31	Physics: Basic physics - I	• Students will be able to simplify simple expressions and they can apply the knowledge of average to solve real world Problems. • Students will acquire skill of solving day today life situation problems involving Ratio and Proportion. • Students will get an in-depth knowledge in partnership and percentage. • Students will come to know how to calculate profit and loss and how business operate in perfectly competitive markets. • Students will be able to solve mathematical problems on numbers.
	CNBO32	Botany: Herbal medicine	• To provide the knowledge on diversity and importance of indigenous medicinal plants and their role in traditional medicinal systems. • To enrich the knowledge on identification, medicinal properties and their mechanism of action of locally available medicinal plants. • To analyze the chemical principles and their drug values, conservation and utilization of endangered medicinal plants.
		EVEN	
	CMCS41	DATA STRUCTURE	CO2: To acquire the knowledge about stack, Queues and Linked list. CO3: To have general understanding of the network structures through trees and graph. CO4: To make the students to understand the basic algorithms for sorting. CO5:Define data structure Algorithms
	CACS41	MACHINE LEARNING TECHNIQES	CO1:To introduce students to the basic concepts of Machine Learning. CO2: To acquire various techniques in Machine learning. CO3:To have a thorough understanding of the Supervised and Unsupervised learning techniques CO4: To study the probability based learning techniques CO5: To understand graphical models of machine learning algorithms
	CSCS41	COMPUTER ARCHITECTURE	Organization CO2: Know the various Technologies behind the Computer Architecture CO3: An ability to apply knowledge about hardware implementation and algorithms CO4: To evaluate various input output organisations CO5: To develop the architecture using various memories

Program Name	Course code	Course Name	Course Outcome
	CMCSP4	Major practicals : DATA STRUCTURE	CO1: To develop skills in implementing sort and search data structure algorithms CO2: To implement queue and stack techniques CO3: To design tree traversals CO4: To implement binary search tree CO5: To Compile sorting algorithms
	CACSP4	Allied Practicals: PHYTHON	CO2: To understand the concepts and develop python programs CO3: To acquire the knowledge about menu driven programs CO4: To improve the knowledge in CSV files CO5: To understand the functions of python
	CNBO41	Botany: FOOD AND NUTRITION	• Identifying foods and their nutritional properties • Understanding the effects of food processing trends • Revising food properties, especially sensory characteristics • Understanding the structure and functioning of the human body • Learning the importance of a balanced diet and meal planning
III BSc Computer Science		**ODD**	
	CMCS51	Relational database management system	CO1: To outline relational database concepts CO2: To relate transaction management concepts in database system. CO3: To utilize Normalizations techniques. CO4: To write SQL programs that use: procedure, function, package, cursor and Exceptions. CO5: To Use current techniques and tools necessary for complex computing practices.
	CMCS52	Data communication and Computer Network	CO1:To define the concepts in Computer Network and Data Communication CO2:To outline the various protocols used in network CO3:To compare OSI Layers in Computer networks CO4:To list about Switching Techniques CO5: To discuss wireless LAN‘s
	CMCS53	PHP and MYSQL	CO1: To define and use open source database management system MySQL CO2: To explain dynamic web pages and websites. CO3: To identify web pages with database. CO4: To compare the concepts of open sources CO5: To assess the knowledge about Arrays
	CECS53	Cloud Computing - Elective	CO1:To understand the History of cloud computing CO2: To know in detail about the various Cloud Computing concepts CO3: To enquire cloud computing Architecture CO4: To understand SOA components CO5:To know about cloud security and privacy

Program Name	Course code	Course Name	Course Outcome
	CECS52	INTRODUCTION TO SECURITY IN COMPUTING(PART III) MAJOR ELECTIVE	CO1: To relate the concepts of basic concepts in security in computing CO2: To explain about the various encryption and decryption security algorithms CO3: To enquire Number theory and key algorithms CO4:To list the authentication CO5: To identify the intruder of security in computing
	CCSB51	Personality Development	CO1:Develop an understanding of self and others CO2: Take resonponsibility and accept criticisms CO3: Understand effective decision making skills CO4: Gain complete control over emotions
	CMCSP5	PHP Lab	CO1: To develop knowledge about basic PHP Programs. CO2: To evaluate PHP scripts and functions CO3: To develop arrays in PHP CO4: To design loops in PHP CO5: To compare the scripts and functions in PHP
	CMCSP6	Practicals: Machine Learning	design and Development of computing systems CO2: To make use of applications to multidisciplinary problems. CO3: To discuss the knowledge about various algorithms CO4: To interpret the knowledge about various datasets CO5: Develop data frames in Machine Leaning
	CMCSP7	Green foot Lab	CO2: To develop two- dimensional graphical applications CO3: To design multimedia animations CO4:. To know the knowledge about video works in multimedia applications CO5:. To implement interactive games.
		EVEN	
	CMCS61	OPERATING SYSTEM	CO1: To acquire the fundamental knowledge of the operating system architecture and components and to know the various operations performed by the operating system. CO2: Understand the basic working process of an operating system. CO3: Understand the importance of process and scheduling. CO4: To explain the issues in synchronization and memory management. CO5: To discuss about mass storage structures
	CMCS62	SOFTWARE ENGINEERIG AND TESTING	Engineering CO2: To classify the various testing methods. CO3: To analyze various software life cycle models CO4:To interpret User Interface design CO5:To select software project managements

Program Name	Course code	Course Name	Course Outcome
	CMCS63	COMPUTER GRAPHICS AND VISUALIZATION	visualization CO2: To acquire the fundamental knowledge of Computer Graphics and Visualization. CO3: To understand the Algorithms in Computer Graphics CO4: To acquire the transformation technique in Graphics CO5: To understand the Interactive methods easily
	CECS62	INTRODUCTION TO DIGITAL IMAGE PROCESSING	Digital Image Processing. CO2: To explain the features present in Digital Image Processing. CO3:To outline the enhancement of spatial domain CO4:To analyze the color Image processing CO5: To interpret the image using compression
	CMCSP8	PRACTICAL: COMPUTER GRAPHICS	CO2: To apply multimedia concepts CO3:To compile the algorithms to draw line,circle etc CO4:To develop image using Scaling, Rotating and translation technique CO5: To demonstrate the image using random and bouncing balls
	CMCSP9	PRACTICAL: MySQL	CO1: To illustrate skills in database CO2: To apply database concepts CO3:To create database and operate update, remove etc CO4:To develop various query functions CO5: To demonstrate the security by setting password and its previlages
	CECS6P	PROJECT: DIGITAL IMAGE PROCESSING	CO1: To get knowledge about the basic programs on Digital Image Processing CO2: To acquire the knowledge from Thresholding Technique CO3: To read the colour image and separate the planes CO4: To perform the brightness of th image CO5:To manipulate the contrast image.
I BSc Physical Education, Health Education & Sports		**ODD**	
	EMPE11	Foundation of Physical Education and Sports	Students will learn the basics of physical education, its importance, and its scope in modern India. Students will learn the psychological and sociological concepts, principles, and strategies that apply to physical activity. Students will learn about the history of physical education in India.
	EEPE11	Anotomy and Physiology	Students can describe the functions of human systems, including the respiratory system, and how to measure body temperature
		EVEN	

Program Name	Course code	Course Name	Course Outcome
	EMPE21	Organization, Administration and Methods in Physical Edn.	aims to equip students with the knowledge and skills to effectively plan, organize, manage, and execute physical education programs, including understanding the principles of administration, facility management, record-keeping, scheduling, budgeting, and appropriate teaching methods to deliver diverse physical activities across different levels and settings
	EEPE21	Health Education, Safty Education and First Aid	irst aid: Students learn how to assess a victim, perform CPR, use an AED, and manage bleeding and injuries. They also learn how to care for victims with breathing emergencies and sudden illnesses. Safety: Students learn how to identify, formulate, and solve technical and scientific problems related to occupational safety and health. They also learn how to design systems, processes, and programs to meet needs. Communication: Students learn how to communicate effectively with a range of audiences.
	ESPE21	Principles of Motor Development - SEC 2	to equip students with a comprehensive understanding of how human movement skills develop across the lifespan, including key concepts like the stages of motor development, factors influencing motor learning, the principles of practice scheduling, different types of motor skills
II BSc Physical Education, Health Education & Sports		**ODD**	
	CMPE31	Methods in Physical Education	• Understand the meaning, scope and nature of psychology and sociology of physical education and sports. • analyse the factors which affect the learning process, role of perception in physical education and sports. • analyse the role of motivation in physical education and sports and • Interpret the sports and social problem, behavior of sportsmen and spectators and leadership through physical education and sports. • To Know about the Autogenic Training

Program Name	Course code	Course Name	Course Outcome
	CAPE31	Theories of Games -II - Allied III Badmintan, Ball Badmintan & Tennis	• The pass out would be oriented with the rules and regulations of the chosen game. • The pass out would be able to lay-out and mark the dimensions of the court. • Students would be able to organize the concerned sports event and officiate in it. • Students would be oriented in the art of coaching the sports team
	CSPE31	Principles of Sports Training - Skill based	• The learners will be able to identify the fundamental concepts, theories and principles of human body training related to sports performance. • The learners will be able to demonstrate the skills to train different fitness components and related planning. • The learners will be able to understand the organization to achieve high performance in sports.
	CMPEP3	Major Pratical - III Badmintan, Ball Badmintan & Tennis	• The pass out would be oriented with the rules and regulations of the chosen game. • The pass out would be able to lay-out and mark the dimensions of the court. • Students would be able to organize the concerned sports event and officiate in it. • Students would be oriented in the art of coaching the sports team
	CNEC31	Economics : Economics for competitive Examination I	• Sustainability - a rate of growth which allows an increase in living standards with • out undue structural and environmental difficulties. 'Economic growth' will be studied later on in this • book. • Full employment -where those who are able and willing to have a job can get one, given that • there will be a certain amount of frictional and structural unemployment. • Price stability -when prices remain largely stable, and there is not rapid inflation or deflation.
		EVEN	

Program Name	Course code	Course Name	Course Outcome
	CMPE41	Organization, Administration and Methods in Physical Edn.	• Understand the meaning of methods in physical education; analyse the factors influencing methods; • Understand the presentation technique and teaching aids; • Study about the lesson play in physical education; • Understand the methods of teaching physical activities • Enable the students to know the procedures in conducting the tournaments in league and knock out basis and to study about games tours, incentives, awards and classifications.
	CSPE41	Sports Psychology and Sociology	• Understand the meaning, scope and nature of psychology and sociology of physical education and sports. • Analyse the factors which affect the learning process, role of perception in physical education and sports. • Analyse the role of motivation in physical education and sports and • Interpret the sports and social problem, behavior of sportsmen and spectators and leadership through physical education and sports. • To Know about the Autogenic Training
	CAPE41	Sports Biomechanics and Kinesiology - Allied	• Understand the meaning, aim and objectives and importance of kinesiology and bio mechanics for Physical Education and Sports • Acquire the fundamental concepts of kinesiology for Physical Education and Sports • Acquire knowledge of various types of motions and application of motion in games and sports • Interpret the principles of Biomechanics with suitable examples • Understand the levers, equilibrium and centre of gravity

Program Name	Course code	Course Name	Course Outcome
	CNEC41	Economics : Economics for competitive Examination II	• Sustainability - a rate of growth which allows an increase in living standards with • out undue structural and environmental difficulties. 'Economic growth' will be studied later on in this • book. • Full employment -where those who are able and willing to have a job can get one, given that • there will be a certain amount of frictional and structural unemployment. • Price stability -when prices remain largely stable, and there is not rapid inflation or deflation.
	CNHI41	History : Indian Polity	• To enable the learners aware of the rights and duties of Indian citizen. • To enhance their role as enlightened citizens. • To understand the importance of centre – state relations. • To focus more attention on constitutional amendments
III BSc Physical Education, Health Education & Sports		**ODD**	
	CMPE51	Exercise physiology	• Understand the meaning, nature and scope of exercise physiology • Analyse the effects of exercise physiology on various system of the body • Analyse the factors affecting skills, motor ability, warm-up and metabolic process and co4 interpret the physiological principles on physical education and sports. • understand the physiological aspects, high altitude, effect of alcohol, drugs and smoking

Program Name	Course code	Course Name	Course Outcome
	CMPE52	Test,Measurement & Evaluation in Physical Education &n Sports	• To Know about the Meaning of Test, Measurements and Evaluation. • To Understand the Classification of Test. • To Know about Teacher mode test and Standardised Test • To Understand the Health related and Skill related Fitness. • To Know about motor Skill Tests & Tests of Specific Sports Skills
	CMPE53	Theories of Track & Field	• Trace the history of sports and games in India • Learn the strategy and tactics in sports • Learn various skills in track and field • Be familiar with rules and regulations, and learn the method of officiating for all track and field events. • Learn standard and non standard track, lay out and maintenance
	CEPE51	Principles of Motor Development	• Understand the basic Motor development • Know about physical growth, maturation and aging • Understand and study the motor skills and movement concepts • Understanding the concept of Constraints in Motor Development.
	CMPEP5	Practical: Track and Field Events	• To study the fundamental movements for Track & Field events. • To apply training means and methods and techniques in Track & Field events • To study advance level of techniques in Track & Field events • To understand the laying of competition area and officiating.
	CMPEP6	Practical: Measurement and Evalution in Human performance	• The students will be able to recognize and relate the concept of test,measurement and evaluation in the context of Physical Education. • Construct and conduct the physical fitness and sports skill test. • The students will be able to implement the criteria of test selection. • Develop the art of applications of test, measurement and evaluation in sports. • Development of practical competency in conducting physical fitness and skill tests.
		EVEN	

Program Name	Course code	Course Name	Course Outcome
	CMPE61	Athletic Care,Sports injuries and Rehabilitation	• Relate the different types of tests and measurement in physical education • Identify thesports performance usingdifferent sports skilltests • Compare and contrast the results of different test measurements • Determine the value of sportsskilltests • Improveand modifytheexistingskilltestusingcomputera pplication
	CMPE62	Theories of Games -III- (Basketball, Football,Hockey, Cricket, Vollyball)	• Trace the history and working federations • Develop the fundamental skills and techniques • Acquire the physiological training, warming-up and motor qualities • Become familiar with the rules and regulations and their interpretations. • Learn the method of officiating play field, equipment specifications and scoring
	CMPE63	Elementry Statistics in Physical Education	• Understand the meaning, nature, need and importance of statistic in physical education and sports • Know about frequency distribution, measure of central tendency and grouped data • Understand the measure of variability, range and quartile deviation • Know about percentiles, deciles and quartiles • Understand the measure of relationship, correlation and rank order correlation
	CEPE61	Sports Nutrition - Elective II	• To Know about Meaning and Importance of Nutrition • To Understand the Basics of Nutrition • To Know about Nutrition Value of Food Stuffs. • To Understand about Principles of Weight Control • To Know about Energy requirement in sports.
I BCom		**ODD**	
	EMCO11	Financial Accounting - I	Remember the concept of rectification of errors and Bank reconciliation statements Apply the knowledge in preparing detailed accounts of sole trading concerns Analyse the various methods of providing depreciation

Program Name	Course code	Course Name	Course Outcome
	EMCO12	Principles of management	Demonstrate the importance of principles of management. Paraphrase the importance of planning and decision making in an organization. Comprehend the concept of various authorizes and responsibilities of an organization. Enumerate the various methods of Performance appraisal
	EECO11	Business communication - Elective	Acquire the basic concept of business communication. Exposed to effective business letter Paraphrase the concept of various correspondences.
	ESCO11	Skill enhancement course: Digital Banking	Explainthe need fordigital bankingproducts and theusage ofcards. Classifytheusageof variouspaymentsystems. Discusstheprofitability,riskmanagementandfraudsof mobileandinternetbanking.
	EFCO11	Foundation Course: Fundementals of Business Studies	Tomakethestudentsfamiliarwiththebasicconceptsof c o m m e r c e , and Management Fields. ToencourageandmotivatetheStudentsforthecommerceEducatio n. Tomakethestudentsawaretowardsthevariousbranchesofcommer ceforExample,Acc ounts,Bankingand Auditing.
		EVEN	
	EMCO21	Financial Accounting - II	To evaluate the Hire purchase accounts and Instalment systems To prepare Branch accounts and Departmental Accounts To understand the accounting treatment for admission and retirement in partnership
	EMCO22	Business Law	Explain the Objectives and significance of Mercantile law Understand the clauses and exceptions of Indian Contract Act. Outline the contract of indemnity and guarantee
	EECO21	Business Envoronment - Elective	Remember the nexus between environment and business. Apply the knowledge of Political Environment in which the businesses operate. Analyze the various aspects of Social and Cultural Environment.
	ESCO22	Stock Market Operations	Explain the basic concept of Securities Market Practice Trading on Stock Market Analyse the legal Frame work of Securities Market

Program Name	Course code	Course Name	Course Outcome
	ESCO23	New venture planning and development	Generateabusinessideausingdifferenttechniquesanddescribesources ofinnovative ideas Evaluateadvantagesof acquiring anongoingventurewithacasestudy; Presentacomparativeanalysisofvariousgovernmentschemeswhicharesuitableforth ebusinessidea
II Bcom		**ODD**	
	CMCO31	Advanced Financial accounting	To understand the accounting system of branch and departmental accounts. 2. To know the preliminaries before admitting a person as a partner
	CMCO32	Banking theory law & practice	To understand the basic concept used in banking. 2. To know the various kinds of banking and their functions.
	CACOP1	Computer Applications in Business - Lab	To familiarize in MS Word 8. To familiarize in MS PowerPoin
	CSCO31	Business communication	good business communication 2. To know the various kinds of business correspondence and to include the important points to be covere
	CNEC31	Economics:Economics for Competitive examinations	basic concepts of economics. CO 2: Apply the Law of diminishing Marginal utility and Law of demand in practical life and identify the exceptions to the law of demand
		EVEN	
	CMCO41	QUANTITATIVE TECHNIQUES	To analyse the practical applications of Analytical Geometry in business field. 2. To know about matrix algebra, scalar multiplication and also to find out the inverse of a matrix.
	CMCO42	LOGISTIC MANAGEMENT	To introduce basic concepts in logistics with special emphasis on maritime shipping. 2. To understand multimodal transport concept and inventory services.
	CACOP2	TALLY IN ACCOUNTING	impart the basic principles and concepts of computerized accounting
	CNEC42	ECONOMIC DEVELOPMENT OF INDIA	the growth process of the Indian economy by giving a clear idea of factors influencing economic development
	CSCO41	ENTREPRENEURSHIP DEVELOPMENT	To understand the significance of entrepreneurial skills. 2. To know about the developing ideas and techniques of business.
		Economics for competitive Examination II	
	CNHI41	History : Indian Polity	• To enable the learners aware of the rights and duties of Indian citizen. • To enhance their role as enlightened citizens. • To understand the importance of centre – state relations. • To focus more attention on constitutional amendments.
III Bcom		**ODD**	
	CMCO51	Corporate Accounting - I	To understand about the issue of shares and debentures.

Program Name	Course code	Course Name	Course Outcome
	CMCO52	Cost Accounting	To explain the elements of cost. To adapt appropriate method for material contro
	CMCO53	Business law	To differentiate the Contracts and Agreements. To validate offer, acceptance and consideratio
	CECO53	Income Tax Law & Practice - I	To know the residential status and tax exemptions
	CMCO54	Personality Development	integrated sense of personal identity ,positive sense & personal code of ethics
	CCSB51	Reserch methodology	To know the criteria for good research. To recognise the various research design
		EVEN	
	CMCO61	Special Accounts	To identify the processes of Holding companies.
	CMCO62	Management Accounting	Tounderstand the basic concepts of management accounting and types of ratios canbe applied for evaluating the performance and financial position of a firm.
	CMCO63	Industrial Law	To know the provisions of Factories Act 2. To know about the welfare, safety and health of workers.
	CMCO64	Auditing &n Corporate Governance	To understand Basic Principles of Auditing, Internal Control, Vouching and verification
	CECO61	Business Taxation	To understand basic concept and importance of indirect taxes. 2. To understand the various concept and types of Goods and Service Tax
	CMCO6P	Project	To eliminate a problem by providing a workable solution
I MCom		**ODD**	
	WKCM11	Business finance	Explain the important finance concepts Estimate risk and determine its impact on return Examine leasing and other sources of finance for startups Summarise cash,receivable and inventory management techniques
	WKCM12	Digital Marketing	Explain the dynamics of digital marketing Examine online marketing mix Compare digital media channels Explain online consumer behavior
	WKCM13	Banking and Insurance	Relate the transformation in banking from traditional to new age Apply modern techniques of digital banking Evaluate the role of insurance sector
	WKCE12	Operations Research - Elective	Apply Linear Programming Identify models for problem solving Apply sequencing and game theory
	WKCE14	Export Import procedure and documentation	Explain Preliminaries for Exports and Imports Choose the appropriate technique for Export Import Documentation Make use of Export Import Documentation
		EVEN	
	WKCM21	Strategic Cost Manaegment	Explain strategic cost management and QC Choose the appropriate technique for cost control Make use of activity based costing in practice

Program Name	Course code	Course Name	Course Outcome
	WKCM22	Corporate Accounting	Determine profit and financial position by preparing financial statements of companies as per schedule III of Companies Act, 2013 Apply the provisions of IRDA Regulations in the preparation of final accounts of Life Insurance and General Insurance Companies. Determine the overall profitability and financial position by preparing consolidated financial statements of holding companies in accordance with AS21.
	WKCM23	Setting up of business entries	Compare the various avenues of acquiring finance to setup a business entity Recall the legal requirements for Section 8 Company Examine the provisions for LLP and joint venture
	WKCE21	Business ethics and corporate sustainability	Apply the concepts of business ethics in practice Demonstrate ethical decision making by applying various theories
	WKCE24	Logistics and supply chain management	Recall the concepts and features of SCM Summarize global and Indian perspectives of SCM Explain strategic warehousing for SCM
	WKCSL21	Advanced Excel	Explain Managing the Work book Select the Advanced Tables Make use of Working with Macros
II MCom		**ODD**	
	ZKCM31	Advanced Corporate Accounting	• Learn advanced problems on Issue, Forfeiture and Redemption of shares and Debentures, underwriting, Valuation of Goodwill and shares • Know about Amalgamation, Absorption and Reconstruction of Companies • Acquire knowledge on Final Accounts of Companies, Liquidators final statement and Accounts of Holding Companies • Create an idea about Banking and Insurance Companies and Double Account System • Learn about meaning, objectives and benefits of Accounting Standards, Accounting Standards Board of India, Accounting Standards issued by the Institute of Chartered Accountants of India, International Financial Reporting Standards, its benefits and scenario in India

Program Name	Course code	Course Name	Course Outcome
	ZKCM32	Taxation and Tax planning	• Learn about basics of Income tax act, residential status of assesse, incidence of tax and exempted income • Know about computation of taxable income under heads of Salary, House Property, Business, Capital Gains and Other sources • Acquaint with provisions of Clubbing of Income, set off & carry forward of losses, deductions from Gross Total Income and calculation of tax liability • Learn about tax planning and tax management of individuals, Hindu Undivided Family and Association of Persons • Gather idea about Income
	ZKCM33	Computerised Accounting with Tally - Lab	• Introducing basic concepts on Tally like Screen Components, company creation, ledger and voucher creation, Inventory vouchers, stock groups and categories, Cost categories and centers. Also know about Point of Sales, Trial Balance and Final accounts • Learn the concept of Value Added tax, computation, Classification, ledger and voucher creation, input credit adjustment for capital goods and rules relating to composite dealer • Know about Tax Deducted at Source, Tax Collected at Source and Service Tax • Acquaint with concept of Excise Dealer and Bank Reconciliation statement
	ZKCM34	Human Resource Management	• Learn about meaning, definition, need for Human Resource Management, its trends and role of HR managers • Conceptual understanding of Job Design, Job Analysis, Job description, job specification, recruitment, selection procedure, types of tests, interviews and qualities of a successful interviewer • Know about meaning, importance, benefits and need for training and assessment methods. Objectives of management development • Acquaint with Job Evaluation, Salary Administration, factors affecting wage levels, Fringe Benefits, its objectives and types

Program Name	Course code	Course Name	Course Outcome
	ZKCM35	Business Research Methods	• To provide basic knowledge about the concept, tools and techniques of business research • To help develop the skills of students to be able to apply research techniques for business decision making • To teach the preparation of questionnaire and Interview Schedule and formulate & Test the Hypothesis • To help adopt appropriate statistical tools for drawing Inference • To teach students as to write a Research Report
	ZKCE31	Consumer Rights & Education	• To give the students a clear understanding of the terms Consumers, Consumerism, Consumer movement • To give an understanding of the provisions of the Consumer Protection Act • To know the methods of creating awareness and education • To familiarize students on various aspects of consumer related Legislations and Organizations • To make the students aware about the rights and responsibilities of consumers
		EVEN	
	ZKCM41	Applied Costing	• To familiarise the students with the various cost concepts, and elements of cost • To enable the students to prepare cost sheets • To apply different methods and techniques of cost control • To gain knowledge of different methods of payment of wages and incentives • To acquaint the students in the application of Marginal costing for Business decision making
	ZKCM42	Indirect Taxation	• To provide a basic knowledge about GST. • To expose the students with the latest development in GST. • To train the students to calculate GST • To assist in indirect tax planning • To develop an understanding on customs law

Program Name	Course code	Course Name	Course Outcome
	ZKCM43	E-Commerce	• To buildup basic knowledge on electronic business. • To educate students on online marketing. • To make e commerce and internet marketing familiar with students. • To make the students to devise marketing strategies for concerns engaged in ecommerce. • To understand the current status of ebusiness
	ZKCM44	Financial Market & Institution	• To introduce the basic concepts of financial markets • To impart knowledge on the working of commercial paper market, including bill market • To teach the students on the evolution of capital market • To acquaint the students with the knowledge on the functioning of various financial institutions such as NABARD, EXIM bank, etc • To teach students on the working of various credit rating agencies such as CRISIL, etc
I BA English		**ODD**	
	EMEN11	INTRODUCTION TO LITERATURE	1.Appreciate and analyse and the basic elements of poetry, including meter, rhyme, and theme. 2.Gain knowledge of the elements of fiction including narrative structure, character analysis and comparison between different but related texts. 3. Explore the features of literary language
	EMEN12	INDIAN WRITING IN ENGLISH	1.On completion of this course, students will; 2.Appreciate the historical trajectory of various genres of Indian Writing in English from colonial times to till the present 3.Analyze Indian literary texts written in English in terms ofcolonialism, postcolonialism, regionalism, and nationalism 4.Explore the role of English as a medium for political awakening and the use of English in India for creative writing 5.Analyze how the sociological, historical, cultural and political
	EFEN11	FOUNDATION COUESE	1.Recall the fundamentals of English Grammar 2 . Understand the formal and informal usages to obtain proficiency 3.Analyze Sentence structure, synthesis and usages 4.Recognize and use of Auxiliary and module verbs in writing

Program Name	Course code	Course Name	Course Outcome
	EEEN11	SOCIAL HISTORY OF ENGLAND - I	1.Gain knowledge of various features of social and political history of England. 2.Awareness of the relation between socio- religious events and socio-politicalworks. 3. Compare history with Literature 4.Enable to assess the emergence, reasons, development and the impact of social movements. 5.
	ESEN11	ENGLISH AND COMMUNICATION	1.Identify the basic principles of communication 2 .Analyze the various types of communication 3 . Make use of the essential principles of communication 4 .Identify the prominent methods and models of Communication. 5.Learn about the four skills of language and get familiarized with
		EVEN	
	EMEN21	BRITISH LITERATURE - I	1 .Demonstrate knowledge of the major social, political,philosophical, and scientific events forming the back drop for the development of early BritishLiterature. 2 Synthesize, integrate, and connect information by Writing essays using techniques of criticism and evaluation. 3.Read and discuss the themes, approaches, styles, and contributions to the development of British literature from,the Medieval Period to the end of the eighteenth-century 4.Distinguish between the characteristics of British literary movements in discussing and writing about British literature. 5 .Critically appreciate literature using standard literary terminology and other literary conventions.
	EEEN21	SOCIAL HISTORY OF ENGLAND - II	1.Recognize the milestones of British History from 18th century till the modern age and can relate how these movements influence the English society and Literatures of that period. 2. Identify the various revolutions and movements of English society leading to form a crucial opinion for the benefit of humanity. 3.Examine the causes and consequences of the war of Americans and French. 4.Evaluate the effects of the revolutions and their impacts in literature in and better perspective. 5.Analyze the reforms and the development of education,

Program Name	Course code	Course Name	Course Outcome
	EMEN22	AMERICAN LITERATURE - I	1.Analyze and discuss works of American literature from a range of genres (e.g. poetry, nonfiction, slave narrative, captivity narrative, literary fiction, genre fiction, sermon, public proclamations, letters, etc.). 2.Identify relationships between moments in American history,colonialism, and culture and their representation in works ofAmerican literature. 3.Articulate ways that American literature reflects complex historical and cultural experiences. 4. Produce a mix of critical, creative, and/or reflective worksabout American literature to1865. 5.Analyze and describe about American literature using standard literary terminology and other literary conventions.
	ESEN22	DIGITAL LITERACY AND CONCEPTS	1 .Gain knowledge of digital literacy. 2 .Acquire skills in text literacies and language. 3 . Acquire skills in information digital literacy. 4 .Build confidence in using digital literacy. 5 . Aware of the various types socio-economic factors in digital literacy.
	ESEN21	PUBLIC SPEAKING SKILL	1.Demonstrate an understanding of the principles of public speaking. 2.Recognize barriers to public speaking and identify howto avoid them 3. Understand how to give effective verbal and non-verbal Feedback 4. Learn about planning speech organization for the intended audience 5.Practice effective group delivery and speech in formal context.
II BA English		**ODD**	
	CMEN31	BRITISH PROSE	1.understand the various kinds of thoughts and ideologies of each period and each written. 2.analyze the writing style and the vocabulary used by the writers. 3.develop skills to critically appreciate the writings 4.make them analyze the socio-cultural background of each writer. 5.enhance their power of comprehension and literary competence.

Program Name	Course code	Course Name	Course Outcome
	CMEN32	INDIAN ENGLISH LITERATURE - I	Indian Writing in English through the study of selected literary texts 2.analyze the artistic and rhetorical devices used by the writers. 3.cultivate a literary sensibility for a proper critical appreciation of literature. 4.make them reflect critically on the human and social concerns and values embedded in the texts. 5.enhance the overall literary and linguistic
	CMEN33	AMERICAN LITERATURE - I	1.identify the key ideas, events and characteristics of different periods and regions. 2.understand values and themes that impact culture and society. 3.analyze and juxtapose the unique literary styles and structures of American authors. 4. improve reading skills leading to literary analyses. 5.write poems and short stories and also enact scenes from the plays prescribed.
	CAEN31	AFRICAN LITERATURE	1.understand the uniqueness of African Literature in terms of form and content. 2.analyze the genre and its contemporary form in African Literature while reflecting on sub -genres and narrative modes. 3.understand how African theatre evolved during post-colonial period 4.evaluate the cultural, thematic and aesthetic representations in African literature 4.assess and compare the genres of Non-fiction, fiction, drama and poetry of African literature.
		EVEN	
	CMEN41	BRITISH FICTION	• To familiarize the students wih the evolution of the genre of fiction in britain • To enhance vocabulary and usage of english through reading • To develop their reading ability through various fictions • To enrich the power of character analysing • To mould them in solving the critical circumstances
	CEMEN42	INDIAN ENGLISH LITERATURE - II	1 .Comprehend the ethical values of the society 2 .Compare and contrast the characters of the novels 3 .Analyze the plot construction and techniques employed in the novels 4 . Interpret the different meanings and messages in the novels 5 . Assess the literary value of each novel

Program Name	Course code	Course Name	Course Outcome
	CMEN43	AMERICAN LITERATURE - II	1.remember the origin and History of the Indian Writing in English and appreciate the literary devices used in the texts 2.examine a broad cross section of regions and cultures in India 3.understand the broad view of culture as seen from outside the culture 4.make familiar with the contributions made by modern Indian writers writing in English 5.critically engage with Indian literary texts written in English in terms of colonialism, post colonialism, regionalism and nationalism
	CAEN41	LANGUAGE AND LINGUISTICS	1 .Become acquainted with the historical and literary elements in American literature. 2 .Read and retain themes and ideas in the literary texts. 3 .Attain knowledge of various literary styles in relation to their cultural context and literary forms 4 . View literary works in the context of the tremendous social and political changes throughout American history 5 .Participate in creative activities related to the literaryworks
III BA English		**ODD**	1: To recall the basic concepts of Web design using HTML. 2: To learn the various tags used in HTML 3:To make use of Dynamic HTML 4: To compare the lists in HTML. 5:To build Frames
	CMEN51	GENRE STUDIES	1.understand the importance of context in the creation of a text 2.understand the socio-cultural boundaries of the literary texts 3.identify and apply the stereotypic patterns of different literary genre 4.analyse generic rules and conventions and their relationship with social contexts 5.understand the significance of genre in the communicative function of a literary text
	CMEN52	SHAKESPEARE	1.understand the plays studied in different critical contexts, including historical, theoretical, and theatrical 2.apply various emerging literary theories to the study of Shakespeare 3.appraise the universal values embedded in the plays of Shakespeare 4.recall the nuclei of each play and analyze them with the historical, philosophical and literary factors 5.challenge the existing ideas with the realms of the contemporary literary scenario

Program Name	Course code	Course Name	Course Outcome
	CMEN53	RESEARCH METHODOLOGY	1.make a systematic and theoretical approach during the process of research. 2.collect and analyze data through surveys, interviews and observation. 3. enhance critical thinking. 4. perform literature reviews 5.write research article
	CMEN54	TRANSLATION THEORY AND PRACTICE	1understand the fields of translation principles, methods, procedures and techniques of translating 2 .Identify the nuances of the SL texts and enrich the adequate skills to address the issues of transition encountered by translators worldwide. 3 .apply the acquired skills to translate specific structures and formulate suitable procedures for translation. 4 .analyse the grammatical classes, syntactic and semantic structures of the language concerned and re-text and render the Source language text. 5 .evaluate any translated text in the light of the principles, methods, techniques and procedures learnt.produce translated texts to promote cultural exchange and connectedness.
	CMEN5A	ENVIRONMENT AND LITERATURE	1.understand the significance and implications of environmental writing with varied perspectives of both literary and scientific criticism 2.interpret and relate literary texts by using essential terms from Environment studies 3.value the significance of the latest schools of criticism through the new approach used practically. 4.make close reading, critical thinking and analytical writing through which the students will be able to investigate the literary and cultural forms that shape the observation of the readers and the way in which they relate themselves with nature and environment. 5.develop awareness of how literature can articulate humanity's relationship with the environment.
	CMEN55	INDIAN LITERATURE IN TRANSLATION	1.understand how English gets Indianised in translation. 2.analyse with the major ancient medieval and modern literary movements in India and their influence on literature. 3.understand different literary techniques employed by various Indian regional language writers. 4.compare the features and peculiarities of Indian societies, culture and language. 5.engage in the vast possibilities of translating literary texts from their own languages into English.

Program Name	Course code	Course Name	Course Outcome
	CCSB51	PERSONALITY DEVELOPMENT	1. Effective communication, active listening, and conflict resolution skills. 2. Developed empathy, assertiveness, and interpersonal skills. 3. Improved relationships, teamwork, and leadership skills. 4. Enhanced social skills, adaptability, and cultural
		EVEN	
	CMEN61	LITERARY CRITICISM	1 . Understand the origin and development of the art of literary interpretation. 2 . Comprehend the qualities of canonical literary texts 3 . Gain an understanding about various modes and methods of literary interpretation 4 . Trace the interdisciplinary nature of literary criticism evolved in the twentieth century 5 . Improve their ability to read the literary texts critically and analyze them and write well-structured analysis of literary
	CMEN62	CANADIAN LITERATURE	1.improve their ability to read the literary texts critically and analyse them and write well-structured analysis of literary texts 2.trace the interdisciplinary nature of literary texts evolved in the twentieth century 3.gain an understanding about various modes and methods of literary interpretation 4 .comprehend the qualities of canonical literary texts 5.understand the origin and development of the art of literary interpretation
	CMEN63	AUSTRALIAN LITERATURE	1.understand the origin and development of the art of literary interpretation 2.improve their ability to read the literary texts critically and analyse them and write well-structured analysis of literary texts 3.gain an understanding about various modes and methods of literary interpretation 4. comprehend the qualities of canonical literary texts 5.trace the interdisciplinary nature of literary texts evolved in the twentieth century.
	CMEN64	FANTACY LITERATURE	1. Expand their imagination and enhance creativity 2 . Contextualize and understand the author's themes and ideas 3 . Explore the uniqueness and differences between the subgenres of fantasy 4 . Appreciate the artistry of the works and analyze them

Program Name	Course code	Course Name	Course Outcome
	CMEN6B	LITERATURE AND PSYCHOLOGY	1.understand the parallelism between Psychology and Literature and their relevance in one's life. 2.apply the motivations of authors and their fictional figures to comprehend the human condition. 3.analyse the human consciousness and the different phenomena in the human psyche. 4.analyze the causes and connections to recover meanings. 5. evaluate the production of a text and real life. 6.create characters and situations to highlight the psychological dimension of human reality.
	CMEN6P	PROJECT	1 . Meaningfully retain information from reading academic articles. 2. Analyse and evaluate retained information in meaningful ways. 3 . Develop meaningful theses from the information gathered
I BCA		**ODD**	
	EMCA11	**PYTHON PROGRAMMING**	Learn the basics of python, Do simple programs on python Develop program using selection statement, Work with Looping and jump statements, Do programs on Loops and
	EFCA11	**Structured Programming Language in C**	Analyze the various methods of solving a problem and choose the best method Code, debug and test the programs with appropriate test cases
	EECA11	**DISCRETE MATHEMATICS**	Torecallbasicconceptsforclearunderstandingof mathematicalprinciples Toexplainpracticalproblems
	ESCA11	**FUNDAMENTALS OF INFORMATION TECHNOLOGY**	Learnthebasicsofcomputer, Constructthestructureoftherequired thingsin computer, learn how to useit.
		EVEN	
	EMCA21	**OBJECT ORIENTED PROGRAMMING CONCEPTS USING C++**	Analyze the various methods of solving a problem Code, debug and test the programs with appropriate test
	EECA21	**OPTIMIZATION TECHNIQUES**	ApplyPERTandCPMtechniquestofindtheoptimalsolution.
	ESCA21	**INTRODUCTIONTO HTML**	Knows Design concept. ConceptofMeta Data Understandtheconceptof savethefiles.
	ESCA22	**PHP PROGRAMMING**	Create PHP programs that use various PHPlibraryfunctions Manipulatefilesanddirectories.
II BCA		**ODD**	
	CMCA31	**JAVA PROGRAMMING**	programming language. To understand how to design applications with threads in Java.

Program Name	Course code	Course Name	Course Outcome
	CMCA32	**FINANCIAL ACCOUNTING**	including income and expenditure statement, balance sheet etc. • To locate and analyze financial data from annual reports of corporations.
	CACA31	**DATA STRUCTURES**	An understanding of the basic data structures. To describe Data structures like stack, queue, tree and graph.
	CSCA31	**PROGRAMMING WITH PHP & MYSQL**	To observe and understand the role, structure, control flow, classes and concepts in PHP and tables in MySQL To implement the concepts in PHP and queries in MySQL.
		EVEN	
	CMCA41	**PYTHON Programming**	• Analyzing the structures of list, tuples and maintaining dictionaries
	CMCA42	**SOFTWARE ENGINEERING**	• An ability to apply knowledge of mathematics, science, and engineering. • An ability to design and conduct experiments, as well as to analyze and interpret data.
	CACA41	**ACCOUNTING SOFTWARE – TALLY**	• Company Setup & Configurations. • Charts of Accounts Setup.
	CSCA41	**MICROPROCESSOR**	write programs to run on 8086 microprocessor-based systems.· Design system using memory chips and peripheral chips for
III BCA		**ODD**	
	CMCA51	**MACHINE LEARNING WITH PYTHON**	Explain the fundamentals of Classification and probability theory Analyse the supervised learning techniques Analyse the un-supervised learning techniques Illustrate Big Data using machine learning Develop applications using Hadoop and Map Reduce
	CMCA52	**WEB TECHNOLOGY**	Employ fundamental computer theory to basic programming techniques. Use fundamental skills to maintain web server services required to host a website
	CMCA53	**Relational Database Management Systems**	Master the basic concepts and appreciate the applications of databasesystems.· Master the basics of SQL and construct queries usingSQL.
	CECA53	**CYBER SECURITY**	• Evaluate the computer network and information security needs of anorganization. • Assess cyber security risk management policies in order to adequately protect an organization's critical information andassets.
		EVEN	

Program Name	Course code	Course Name	Course Outcome
	CMCA61	Cloud Computing	Understand the basics of Cloud Computing Comprehend the concepts of Virtualization and the design of Cloud Services
	CMCA62	Data Communications and Networking	and correction Analyze the requirements for a given organizational structure
	CMCA63	VB.NET	Understanding the basic concepts of visual programming Able to Design simple applications using VB.Net
	CECA63	SOFTWARE PROJECT MANAGEMENT	• Employ Analytical and Modern project development methodology for the process of project management in delivering successful Real time IT projects. • Evaluate a project to develop the scope of work, provide accurate cost estimates, software development size, effort, and schedule and network diagram for new program proposals or enhancements to existing Software.
I B.Com Corp		**ODD**	
	EMCO11	**FINANCIAL ACCOUNTING I**	Remember the concept of rectification of errors and Bank reconciliation statements Apply the knowledge in preparing detailed accounts of sole trading concerns
	EMCO12	**PRINCIPLES OF MANAGEMENT**	Demonstrate the importance of principles of management. Paraphrase the importance of planning and decision making in an organization.
	ESCO11	**DIGITAL BANKING**	ofcards. Classifytheusageofvariouspaymentsystems.
		EVEN	
	EMCO21	**FINANCIAL ACCOUNTING-II**	To evaluate the Hire purchase accounts and Instalment systems To prepare Branch accounts and Departmental Accounts
	EMCO22	**BUSINESS LAW**	Explain the Objectives and significance of Mercantile law Understand the clauses and exceptions of Indian Contract Act.
	EECR22	**BUSINESS ENVIRONMENT**	Evaluate the parameters in Economic Environment. Create a conducive Technological Environment for business to operate globally.
	ESCO22	**STOCK MARKET OPERATIONS**	Explain the basic concept of Securities Market Practice Trading on Stock Market Analyse the legal Frame work of Securities Market Explain different segment of Stock Exchange

Program Name	Course code	Course Name	Course Outcome
II B.Com Corp		**ODD**	
	CMCO31	**ADVANCED FINANCIAL ACCOUNTING**	1. To understand the accounting system of branch and departmental accounts. 2. To know the preliminaries before admitting a person as a partner.
	CMCR32	**SECRETARIAL PRACTICE - I**	1. To know the provisions of Company Secretaries Act 1980. 2. To understand about the role of company secretaries.
	CNEC32	**GENERAL ECONOMICS**	Demonstrate the ability to collect,process and interpret data including Statistical inference
	CSCO31	**BUSINESS COMMUNICATION**	1. To know the barriers of communication and essentials of a good business communication 2. To know the various kinds of business correspondence and to include the important points to be covered.
		EVEN	
	CMCO41	**QUANTITATIVE TECHNIQUES**	1. To analyse the practical applications of Analytical Geometry in business field. 2. To know about matrix algebra, scalar multiplication and also to find out the inverse of a matrix.
	CMCR42	**SECRETARIAL PRACTICE - II**	1. To know about the rights and liabilities of members. 2. To know the secretarial duties in connection with the resolution, agenda and minutes.
	CACOP2	**APPLICATION OF TALLY IN ACCOUNTING**	1. To develop the computerised knowledge in accounting. 2. To impart the basic principles and concepts of computerized accounting.
	CSCO41	**ENTREPRENEURSHIP DEVELOPMENT**	1. To understand the significance of entrepreneurial skills. 2. To know about the developing ideas and techniques of business.
III B.Com Corp		**ODD**	
	CMCO51	**CORPORATE ACCOUNTING**	To understand about the issue of shares and debentures. To understand about the redemption of preference shares. To understand the calculation of profit prior To practice the maintenance of final accounts as per revised accounting standards.practice the maintenance of final accounts as per revised accounting standards.incorporation.
	CMCO52	**COST ACCOUNTING**	To explain the elements of cost. To adapt appropriate method for material control. To understand the different types of overheads. To apply the process costing. To debate about the variances of various costing.

Program Name	Course code	Course Name	Course Outcome
	CMCO53	**BUSINESS LAW**	1. To differentiate the Contracts and Agreements. 2. To validate offer, acceptance and consideration.
	CMCO54	**RESEARCH METHODOLOGY**	1. To know the criteria for good research. 2. To recognise the various research designs
	CECO51	**INCOME TAX LAW & PRACTICE**	1. To know the residential status and tax exemptions.. 2 To compute the taxable salary.
	CCSB51	**PERSONALITY DEVELOPMENT**	self awareness allows individuals to identify their strength &weakness to improve positive changes
		EVEN	
	CMCO61	**SPECIAL ACCOUNTS**	1. To identify the processes of Holding companies. 2. To recognize the Banking company accounts.
	CMCO62	**MANAGEMENT ACCOUNTING**	1. To understand the basic concepts of management accounting and types of ratios can be applied for evaluating the performance and financial position of a firm. 2. To evaluate the performance of a firm using fund flow cash flow statement.
	CMCO63	**INDUSTRIAL LAW**	1. To know the provisions of Factories Act 2.To know about the welfare, safety and health of workers.
	CMCO64	**AUDITING AND CORPORATE GOVERNANCE**	1. To understand Basic Principles of Auditing, Internal Control, Vouching and verification 2. To understand the Positions and status of Statutory Auditors under the Companies Act 2013.
	CECO61	**BUSINESS TAXATION**	1. To understand basic concept and importance of and indirect taxes. 2. To understand the various concept and types of Goods and Service Tax.
	CMCR6P	**MAJOR PROJECT**	Develop the ability to evaluate new ideas,reasearch finding evaluation to business &commerce related issues
I MA Tamil		**ODD**	
	WTLM11	இக்கால இலக்கியம்	இக்கால இலக்கிய வரலாற்றை நன்கு அறிதல். கவிதை, புனைக்கதை ஆகியவற்றின் வடிவம், பொருள், இலக்கிய அழகுகள் முதலியவற்றை பகுத்தறிந்து மதிப்பிடும் பயிற்சியை பெறுதல்
	WTLM12	அற இலக்கியம்	தமிழின் அற இலக்கிய வரலாற்றில் பரந்த நிலையிலான புலமை பெறுதல் பதினெண்கீழ்கணக்கின் பிற அற இலக்கியங்கள் முன்வைக்கும் அறக்கருத்துகளை உணர்தல்.
	WTLM13	தொல்காப்பியம் - எழுத்ததிகாரம்	தமிழ்மொழியில் உள்ள எழுத்துகளின் வகையையும், மொழியை திறம்பட கையாளும் முறையையும் கற்றல்
	WTLE11	சிறப்புத்தாள் 1 : நாட்டார் வழக்காற்றியல் அடிப்படைகள்	நாட்டார் வழக்காற்றியல் புலத்தை நன்கறிந்து கொள்ளுதல் வாய்மொழி இலக்கியங்கள், நிகழ்த்து கலைகள் குறித்த தெளிவான அறிவினைப் பெறுதல்

Program Name	Course code	Course Name	Course Outcome
	WTLE12	சிறப்புத்தாள் 2: அயலகத் தமிழ் இலக்கியம்	உலகலாவிய நிலையில் தொல்குடி நிலையிலும் புலம்பெயர்ந்த நிலையிலும் தமிழர்கள் வளங்குதலை அறிதல் மலேசியா, சிங்கப்பூர் தமிழ் இலக்கியங்கள் குறித்து அறிதல்
		EVEN	
	WTLE21	உரையாசிரியர்கள்	மரபிலக்கணங்களுக்கு எழுதப்பட்டுள்ள உரைகளின் இன்றியமையாமையையும், உரைவகைகளையும் உரைத் திறன்களையும் மாணவர்கள் அறிந்திடுவர்
	WTLE22	பண்பாட்டு மானுடவியல்	மானிடவியல் துறையை மாணாக்கர் அறிந்து கொள்வர் தமிழகப் பண்பாட்டு மாற்றம் குறித்து மாணவர்கள் அறிவர்
	WTLM21	பக்தி இலக்கியம்	தமிழின் பக்தி இலக்கியப் புலத்தில் தேர்ந்த புலமை பெறுதல் சைவ இலக்கியங்களின் இலக்கிய அழகுகளையும் கருத்து நலன்களையும் யாப்புச் சிறப்பையும் தனித்தன்மைகளையும் உணர்தல்
	WTLM22	காப்பிய இலக்கிம்	தமிழில் சயமங்களுக்கும் காப்பியங்களுக்கும் இடையிலான உறவை பங்களிப்பை அறிதல் தடமிழ்க் காப்பியங்களின் தனித்தன்மைகளை ஆழமாக அறிதல்
	WTLM23	சொல்லதிகாரம்	தமிழில் உள்ள சொற்களின் வகைகளை அடையாளம் காணப் பழகுதல் தமிழ் மொழியின் சொல் அமைப்பினையும் தொடர்பினையும் அறிதல்
	WTLSE21	தகவல் தொடர்பியல்	மக்கள் தகவல் தொடர்பியலையும், அதன் உள்ளடக்கங்களையும் அறிந்து கொள்வர். ஊடக்த் தொடர்பு கோட்பாடுகளையம் கற்றுணர்வர்.
II MA Tamil		**ODD**	
	ZTLM31	காப்பிய இலக்கியம்	• தமிழ்க்காப்பியங்களின் இலக்கணம் பற்றி மாணவர்கள் அறிந்து கொள்வார்கள். தமிழ்க்காப்பியத் தோற்றம் வளர்ச்சி, பயன்படுத்தும் உத்திகள் பற்றியும் மாணவர்களால் அறிந்து கொள்ள முடியும். • சிலப்பதிகார மதுரைக்காண்டத ்தில் கோவலன் கண்ணகி பற்றிய செய்திகளையும் சீவக சிந்தாமணி, மணிமேகலை ஆகியவற்றின் காப்பியச் செய்திகளை நயங்களுடன் அறியமுடியும். • பெரியபுராணம், கந்தபுராணம் போன்ற சைவ காப்பியங்கள் பற்றி மாணவர்கள் அறிந்து கொள்வார்கள். • வைணவ காப்பியச் செய்திகளையும், இசுலாமிய, கிறித்தவக் காப்பியச் செய்திகளையும் மாணவர்களால் அறிந்து கொள்ள முடியும். • இருபதாம் நூற்றாண்டுக் காப்பியங்கள் பற்றி மாணவர்கள் தெரிந்து கொள்வார்கள்.

Program Name	Course code	Course Name	Course Outcome
	ZTLM32	இலக்கணம் III தொல்காப்பியம் - பொருள் (இயல் 1- 5)	• சங்ககால மக்களின் களவு வாழ்க்கை பற்றியவற்றை அறிந்து கொள்ள பயன்படுகிறது • பொருளியல் சார்ந்த நிலைகளை அறிந்து கொள்ள உதவுகிறது • அன்பின் 7 திணைக்குப் புறமான 7 புறத்திணை பற்றி அறிய முடிகிறது • தொல் - நம்பியில் ஏற்பாட்ட மாற்றங்களை ஒப்பிட்டு உதவப˙ பயன்படுகிறது • கால மாற்றத்தில் விளைந்த புறச் செய்திகளை ஒப்பிட்டு விளங்கிக் கொள்ள பயன்படுகிறது
	ZTLM34	உரையாசிரியர்களும் உரைமரபும்	• உரைகளின˙ தோற்ற வளர்நிலைகளை மாணவர்கள் அறிந்திடுதல் • பல்வேறு இலக்கண உரையாசிரியர்களின் உரைத்திறனை மாணவர்கள் தெரிதல் • பல்வேறு இலக்கிய உரையாசிரியர்களின் உரைத்திறனை மாணவர்கள் தெரிதல் • சமயநூல் உரையாசிரியர்களின˙ உரைத்திறனை மாணவர்கள் புரிந்துணர்தல் • அண்மைக்கால உரையாசிரியர்களின் உரைகளையும் மாணவர்கள˙ கண்டுணர்தல
	ZTLM33	ஆராய்ச்சி நெறிமுறைகள்	• அணுகுமுறை பற்றிய விளக்கம், அணுகுமுறையின் வகைகள˙, வேறுபாடு பற்றி மாணவர்கள் அறிதல். • அணுகுமுறையின் பயன்பாடு, தமிழ்இலக்கியத்தில் அணுகுமுறையின் தேவை பற்றி ஆய்வாளர்க்ள அறிதல். • அணுகுமுறையின் அடிப்படையில் சமூகம் எவ்வாறு செயல்படுகிறது என்பதை மாணவர்கள் அறிந்து கொள்வார்கள். • மேலை நாட்டினரின் ஒப்பியல் அணுகுமுறை பற்றி அறிதல் • வரலாற்றியல் அணுகுமுறை மற்றும் மானிடவியல் அணுகுமுறை பற்றிய செய்திகளை மாணவர்கள் தெரிந்து கொள்தல்.
	ZTLE31	தமிழிலக்கிய மானிடவியல்	• இலக்கிய மானுடவியல் அறிமுகம், இனவரைவியலும் படைப்பாளியும், படைப˙பும் இனவரைவியலும் ஆகியன அறிதல் • இலக்கிய இனவரைவியலின் வகை, இயல்பு குறித்த செய்திகளைத் தெரிந்து அதன் முக்கியத்துவத்தை உணர்தல் • படிமலர்ச்சி கோட்பாடுகள் அடிப்படைகள், கொள்கைகளை அறிந்து மொழி, இலக்கியப்படிமலர்ச்சியினை அறிதல

Program Name	Course code	Course Name	Course Outcome
	ZTLE32	ஒப்பிலக்கியமும் மொழிபெயர்ப்பும்	1. ஒப்பிலக்கியத்தின் தேவையை அறிதல். 2. பிரஞ்சுக் கோட்பாடு,அமெரிக்கக் கோட்பாட்டைக் கற்றறிதல். 3. ஒப்பிலக்கியத்தில் புதிய பரிமாணம் பற்றி அறிதல். 4. மொழிபெயர்ப்பின் இயல்பும், மரபும், மொழிபெயர்ப்பாளரின் தகுதிகள், கடமைகள் பற்றிக் கண்டறிதல். 5. மொழிபெயர்ப்புக் கோட்பாடுகள்,மொழிபெயர்ப்பு உத்திகள், மொழிபெயர்ப்புச் சிக்கல்கள் ஆகியவற்றை அறிதல்.
		EVEN	
	ZTLM41	பண்டைய இலக்கியம்	1. தமிழரின் அகப்புறக் கோட்பாடுகளை அறிவதன் மூலம் பழந்தமிழர் மாண்பை அறிதல். 2. பழந்தமிழரின் நெய்தல், குறிஞ்சி, பாலைத் திணை ஒழுக்கங்களையும் வாழ்வியலையும், நிலப்பரப்பின் தன்மைகளையும் அறிதல். 3. மருதநிலம், முல்லைநில மக்களின் வாழ்வியல் கூறுகளை அறிதல். 4. தொன்மையான முருக வழிபாடு, சேர மன்னர்களின் வரலாற்றுச் செய்திகள், பாண்டியர் பரம்பரையின் பெருமை உணர்தல்.
	ZTLM42	இலக்கணம் தொல்காப்பியம் - பொருள்	மனித உணர்வுகளின் வெளிப்பாடாக அமையும் மெய்ப்பாட்டியலையும் உவமைகள் குறித்த கருத்துக்களையும் அறிந்து கொள்கின்றனர். 2. பழந்தமிழரின் செய்யுள் இயற்றும் முறைமையினையும் மரபியல் வழி சுற்றுச்சூழலையும் அறிந்து கொள்கின்றனர். 3. தொல்காப்பியர் காலத்தில் இருந்து பிற்கால யாப்பு விதிகள் காலந்தோறும் அடைந்து வரும் மாற்றங்களை அறிகின்றனர். 4. தமிழ்ச் செய்யுள் மரபின் நூல் மரபுகளின் தனித்தன்மைகளை அறிகின்றனர்.
	ZTLM43	இலக்கிய திறனாய்வியல்	இலக்கியத்தின் அடிப்படைத்தன்மை, பயன்கள், பாகுபாடுகளை அறிந்து வாழ்க்கைக்கும் இலக்கியத்திறத்துமான உறவை அறிதல். 2. எந்தவொரு இலக்கியத்தின் கொள்கை கோட்பாடுகளை அறிந்து, இலக்கிய வகை, வரலாற்றை உணர்ந்து வெளிப்படுத்தவும் முடியும்.
	ZTLM44	தமிழ் நாடகக்கலை	1. தமிழ் நாடக மரபை வரலாற்று அடிப்படையில் அறிகின்றனர். நாடகம் மூலம் சமுதாயக் கருத்தை மக்களுக்கு தெரியப்படுத்துதல். 2. 20ஆம் நூற்றாண்டு நாடக வளர்ச்சியினையும் போக்கினையும் மதிப்பீடு செய்து அறிந்து கொள்கின்றனர். 3. கூத்துப்பிரதியின் வாசிப்பு அனுபவத்தையும் காலப்போக்கில் சீர்திருத்த நாடகத்தின் தேவைகளையும் உணர்ந்து கொள்கின்றனர்.

Program Name	Course code	Course Name	Course Outcome
	ZTLP41	ஆய்வேடு	1. ஆய்வேடு இலக்கிய, பண்பாட்டு, மானுடவியல், நாட்டார் வழக்காற்றியல் போன்ற களங்களைத் தேர்வு செய்து ஆய்வு செய்யத் தூண்டுகிறது. 2. ஆய்வுத் தலைப்பிற்கு ஏற்ற நூல்களைத் தேர்வு செய்து ஆய்வு நோக்கத்தை உணர்த்துகிறது. 3. கற்றறிந்த நூல்களை ஆய்வுக்கு ஏற்ப பொருத்தமுற பயன்படுத்த வழிகோல்கிறது. 4. சமூக வரலாற்றையும் பண்பாட்டு விழிப்புணர்வையும் அடைய உதவுகிறது. 5. ஆய்வு மெய்மைகள் தற்சார்பற்றதாகவும் சமூகத்திற்கு பயன்படுவதாகவும், பின் ஆய்வுகளுக்குத் தூண்டுவதாகவும் அமைதல் வேண்டும்.