Department of Economics

Open Course:

EC5D03, BANKING

Objective of the course:

Basic concepts in banking enabling easy entry into a banking career.

Syllabus:

Module 1:

Banks - Economic Importance - Growth of Banking in India. Commercial Banking -Branch Banking Vs Unit Banking, Group Banking, Chain Banking, Mixed Banking, Clearance Banks - Balance sheet - Rules of Management of funds – Assets and Liabilities, Financial Intermediaries - Deposit Insurances - Merchant Banking

Module 2:

Negotiable Instruments, Cheques, Bills, Treasury bills - Acceptance Houses,
Discounts - Money Market - Peculiarities of Indian Money Market; Deposits;
Borrowings; Primary and Secondary sources - Loans, Practices in Lending, Credit creation, Limitations.

Module 3:

Accounts: Joint accounts, Partnership, Company guarantees, Individual Surety, Joint and Several Guarantee, Security, Exchange Securities, Life Policies, Payment and Collections of Cheques, Dishonouring, Negotiability, Crossing and Account payee.

Module 4:

Central Banking - Reserve Bank of India - Functions of RBI

Books for Reference:

- 1. R.S. Sayers, Modern Banking. Macmillan
- 2. M.D. Decock, Central Banking.
- 3. S.K. Basu, Banking in India.
- 4. Milnes Holdern, Studies in Practical Banking.
- 5. I.C. Dhingra, Indian Economy. Sulthan chand and sons

Department of English

Open Course

FEN5D03: Studies in Advertising

Pre requisites:

A flair for English

An aesthetic and creative sense

What do you learn:

A thorough understanding of the role of Advertising within the marketing communication mix

Analysis of advertising strategy, planning and production

An opportunity to explore your creative side

Scope:

The course covers the groundwork necessary for further studies and a career in the advertising field.

Syllabus:

Textbook: Vilanilam and Varghese. *Advertising Basics! A Resource Guide for Beginners*. Response books - A Division of Sage Publications, New Delhi, 2004.

Module I

Advertising - Definitions- - Origin and development of advertising - - economic impact of advertising - - new trends in advertising

Module II

Advertising as a process: four components: the advertiser, the advertisement, the

ad agency and the mass media. Ad.Agency: structure, function, and characteristics of a good ad agency-Media selection criteria -- Client satisfaction

Module III

Advertisement types: Product, Service, Industrial, Institutional, Public Service

Media wise category: Print media ads, Electronic media ads (Radio, TV and Film) and

New Media ads. Non-Mass Media ads: Graffiti, Billboards, Fliers, Novelties etc

Module IV

Copy writing , copy creativity , copy structure , text : Headline,slogan,body copy, Copy style, credibility , readability . Qualities of a good copy writer , Visualization of Advertisements : typography, Illustration,logo,trademarks,themes,graphics,appeals,animation, special effects and basic principle of designing.

Module V (Practical Oriented)

Practice in copy writing and visualization focusing on the fourth module. Practice in analyzing textual and visual effects of advertisements

Department of History

Open Course:

HIS5D02 HISTORICAL TOURISM.

Objective of the course:

After the degree some of the students choose carrier in aviation and Tourism industry and this course provides them as a foundation course.

Syllabus:

MODULE - I

HISTORICISING TRAVELS IN INDIA TRAVELOGUES - ANCIENT - MEGASTHENES ,PLINY, FA-HIEN MEDIEVAL - MARCOPOLO, IBN – BATTUTA MODERN - RALF FITCH ,BUCHANAN

MODULE - II

TOURIST DESTINATIONS IN INDIA RELIGIOUS DESTINATION- PURI, HARIDWAR, AJMIR, SABARIMALA SRAVANABELGOLA, VELANKANI. CULTURAL DESTINATION SHANTINIKETAN, WARDHA, THUNCHAN PARAMBA HISTORICAL DESTINATION UDAYAGIRI, KHANDAGIRI CAVES, EDAKKAL CAVES, HAMPI, MAHABALIPURAM, AJANTHA, ELLORA, TAJ MAHAL. LAND SCAPE DESTINATIONS SHIMLA, OOTY, ALAPPUZHA

SANCTUARY DESTINATIONS - VEDANTANGAL, GIR, SILENT VALLEY

MODULE - III

KERALA AND HER TOURIST POTENTIAL NATURAL AND CULTURAL HERITAGE HILL STATIONS OF IDUKKI AND WAYANAD FORTS - PALAKKAD, BEKAL, St. ANGELO PALACES - PADMANABHAPURAM, THRIPUNITHARA, MATTANCHERY, ARAKKAL SACRED KERALA -GURUVAYUR, CHERAMAN MOSQUE, MALAYATTUR, PARASSINIKADAVU FAIRS AND FESTIVALS -KODUNGALLUR BHARANI, THRISSUR POORAM, BOAT RACE. RECENT DEVELOPMENTS - MUZIRIS HERITAGE PROJECT

MAL5DO2

സെമുറ്റർ∞\′ ബപ്പൺ കോഴ്സ് സാഹിതൃവും സർഗ്ഗാത്മക്രചനയും

പഠനസമയാ

ം കണിക്കൂർ

പ്രെഡിറ്റ്

. . .

ഉദ്ദേശ്യവക്ഷ്യങ്ങൾ:

 ധാസ്ത്രം, മാനവിക വിഷയങ്ങൾ, വാണിജ്യശാസ്ത്രം എന്നിവ ഐച്ഛിക വിഷയങ്ങളായി എടുത്ത് ബീരുദനലത്തിൽ പഠിക്കുന്ന വിദ്യാർത്ഥികൾക്ക് മലയാള സാഹിത്യത്തെപ്പറ്റി സാമാന്യബോധം ലഭിക്കുക
 സർഗ്ഗാരയക രചനകളുടെ പ്രേരണകളെപ്പറ്റി രചയിതാക്കളുടെ അനുഭവങ്ങൾ അറിയുക

മൊഡ്യൂൾ 1

എഴുത്തിന്റെ പ്രേരണകൾ, എഴുത്തിന്റെ വഴികൾ, എഴുത്തുകാരുടെ രചനാ<mark>നുഭവങ്ങളെ പരിച</mark>യപ്പെടൽ

വിഗദപഠനത്തിന്

₁√എന്റെ കഥകളെപ്പറ്റി ഞാൻ തന്നെ-ഉറുണ്

(ഉറുബിന്റെ കതരഞ്ഞെടുത്ത കഥകളുടെ ആമുഖാ)

🗸 എൻ കവിതയെപ്പറ്റി-സുഗതപുമാരി

(ഇറ്റൾച്ചിറകുകളുടെ ആമുഖം)

3 ഒറു കഥ ജനിക്കുന്നു-എം ടി. വാസുദേവൻ നായർ (കാഥിക്കൻ കല)

മൊഡ്യൂൾ 2

മലയാള സാഹിതൃത്തിലെ വിവിധ സാഹിത്യരൂപങ്ങൾ, എഴുത്തുകാർ എന്നിവയെപ്പറ്റിയുള്ള സാമാന്യ ബോധം

വിശദപഠനത്തിന് കവിതകൾ

കോഴി - കടമ്മനിട്ട

ചിത്തരോഗാശുപത്രിയിലെ ദിനങ്ങൾ - അയ്യപ്പൻ ടച്ച്സ്ക്രീൻ - ക്ൽപ്പറ്റ നാരായണൻ

കഥകൾ

പുവമ്പഴം

-ബഷീർ

കോലാട്

–മാധവിക്കുട്ടി

ഡൽഹി 81

-മുകുന്ദൻ

ഇട

-സിതാര

നോവൽ

മഞ്ഞ് - എo.ടി

യാത്രാവിവരണം

അകലങ്ങളിൽ മനുഷ്യർ - രവിന്ദ്രൻ

- പൊതുവിഷയങ്ങളെ സംബന്ധിച്ച ഉപന്യാസ രചന-മൂന്നു പുറത്തിൽ കുറയാതെ ഉത്തരം എഴുതുക
- 2. സത്ത ചോർന്നുപോകാതെ മൂന്നിലൊന്നായി സംഗ്രഹിക്കുക
- 3. പത്രാധിപർക്കുള്ള കത്ത് തയ്യാറാക്കുക
- 4. നിവേദനം തയ്യാറാക്കുക
- 5. പരാവർത്തനം തയ്യാറാക്കുക
- 6. വാചകങ്ങളിലെ തെറ്റ് തിരുത്തുക

Department of Chemistry

Open Course:

CHE5D01 - Environmental Chemistry

Course Outcomes:

At the end of the course, students will be able to:

- CO 1: Recall the technical/scientific terms involved in pollution.
- CO 2: Understand the causes and effects of air pollution.
- CO 3: Understand the sources, types and effects of water pollution.
- CO 4: Describe water quality parameters.
- CO 5: Study various pollution control measures.
- CO 6: General awareness about major environmental movements in India

Syllabus:

Module – I. The environment

- Introduction
- Concept and scope of environmental Chemistry
- Segments of the environment
- Pollutants
- Contaminants
- Classification of pollutants

Module - II. Air Pollution

- Major regions of the atmosphere
- Tropospheric and stratospheric pollution
- Major air pollutants
- Oxides of C, N, S CFCs
- London smog and photochemical smog
- Acid rain
- Green house effect
- Ozone hole
- Control of air pollution
- alternate refrigerants
- · Bhopal tragedy
- Air-borne diseases-chicken pox, influenza, measles and tuberculosis.

Module - III. Water Pollution

- Water cycle
- Importance of water
- Water pollutants
- Pollution due to sewage
- Industrial effluents
- Agricultural discharge
- Soaps and detergents
- Eutrophication
- Water quality parameters
- DO,BOD, COD
- Total hardness
- Chloride
- Toxic metals in water- cadmium, lead and mercury
- Minamata disaster
- Water-borne diseases- cholera, dysentery and typhoid

Module – IV. Soil, noise, thermal and radiation Pollution.

- Sources, effects and control measures of
- Soil pollution- solid wastes, plastics, pesticides, E- waste, etc.
- non- degradable, degradable and bio degradable wastes
- Noise pollution
- Thermal pollution
- Radiation pollution
- Hiroshima, Nagasaki and Chernobyl accidents
- Endosulfan disaster in Kerala

Module - V . Pollution control measures.

Air pollution control measures

- Gravitational settling
- Fabric filter
- Wet scrubber
- Catalytic converter

- Cyclone collectors
- Cotrell electrostatic precipitator, etc.

Water treatment methods

- Primary treatments
- Secondary treatments
- Tertiary treatment methods
- Aerobic and anaerobic oxidation
- Sedimentation, coagulation, filtration and disinfection
- Desalination and ion exchange
- UASB process and deep well injection
- Solid waste management
- Introduction to green chemistry
- Pollution Control Board duties and responsibilities
- Environmental movements
- Chipco movement
- Narmada movement
- Silent valley movement
- Plachimada movement

Department of Physics

Open Course:

PH5 D01 (1): NON CONVENTIONAL ENERGY SOURCES (36 Hours Credit – 2) (Problems not required)

Objectives:

To develop scientific temper and attitude in students from other streams.

Pre requisites

Since the course does not require a solid base in physics only qualitative & elementary ideas of the subject are expected from the students.

What do you learn:

In this world of energy crisis every one of you must have a knowledge about our energy sources. Apart from conventional energy sources this open course gives a better idea of nonconventional energy sources and how it is useful for our life.

Syllabus:

Text Books:

- 1. Non Conventional Energy Resources by G. D. Rai, Khanna Publishers, 2008.
- 2. Solar Energy Fundamentals and application by H.P. Garg and J. Prakash, Tata McGraw-Hill Publishing company ltd, 1997.
- 3. Solar energy by S. P. Sukhatme, Tata McGraw-Hill Publishing company ltd, 1997.
- 4. Solar energy by G.D. Rai, 1995.

UNIT I.

Solar energy: 10 Hrs Max mark 20

Solar constants, Solar radiation measurements, solar energy collector,

Physical principle of the conversion of solar radiation in to heat, solar cookers, solar distillation, solar furnaces, solar greenhouses, solar electric power generation(no need of mathematical equations)

(2:1,2;2,2:5,3:1,-3:3,3:7,3:8,5:6,5:8,5:10-12 Nonconventional sources of Energy by G D Rai,Khanna publishers)

UNIT II.

Wind energy: 7Hrs Max mark 14

Basic principle of wind energy conversion, basic components of wind energy conversion system, wind energy collectors. Application of wind energy.

(6:1,6:2.1,6:5,6:7,6:8.1,6:8.2,6:8.4,6:13 Nonconventional sources of Energy by G D Rai, Khanna publishers)

UNIT III.

Geothermal energy and energy from biomass: 10 Hrs Max mark 18

Geothermal sources, geo-pressured resources, advantages and disadvantages of geothermal energy over other energy forms, application of geothermal energy. Introduction to biomass Method of obtaining energy from biomass.

(8:4,8:6,8:12,8:13,7:1,7:23 Nonconventional sources of Energy by G D Rai, Khanna publishers)

UNIT IV

Energy from Oceans and Chemical energy resources: 9 Hrs Max mark 16

Ocean thermal electric conversion. Energy from tides, Basic principle of tidal power, advantages and limitation of tidal power generation, advantages and disadvantages of wave energy wave energy conversion devices. Batteries, advantages of battery for bulk energy storage

(9:1,9:2.1-9:2.4,9:3.1,9:3.2,9:3.9,9:4.2,9:4.4,10:3.1-10;3.3,10:3.7 Nonconventional sources of Energy by G D Rai, Khanna publishers)

Department of Mathematics

Open Course:

MAT5D03: Mathematics for Social Sciences.

Pre requisites:

10th standard mathematics and basics of calculus

What do you learn:

- For B A and B Com students, the course gives a better mathematical idea of the topics they study for their degree course
- For B Sc students, the course gives an opportunity to apply the topics they have studied in Plus Two level in real life situations

Syllabus:

Text Book: Edward T. Dowling: Calculus for Business, Economics and Social Sciences, Schaum'sOutline Series, TMH, 2005.

Module I: Equations and Graphs (16 hrs)

- 2.1 Equations 2.2 Cartesian Coordinate System 2.3 Graphing linear equations
- 2.4 The slope of art line 2.5 Solving linear equations simultaneously
- 2.6 Solving quadratic equations 2.7 Practical applications Functions
- 3.1 Concepts and definitions 32. Functions and graphs
- 3.3 The Algebra of Functions 3.4 Applications of linear functions
- 3.5 Facilitating non-linear graphs 3.6 Applications of non-linear functions
 The derivative 4.1 Limits 4.2 Continuity 4.3 Slope of a Curvilinear function
- 4.4 Rates of change

Module II: Uses of Derivative (20 hrs)

- 4.5 The derivative 4.6 Differentiability and Continuity 4.7 Application Differentiation 44 5.1 Derivative rotation 5.2 Rules of differentiation
- 5.3 Derivation of the rules of differentiation 5.4 Higher order derivatives
- 5.5 Higher order derivative notation 5.6 Implicit differentiation 5.7 Applications
- 6.1 Increasing and decreasing functions 6.2 Concavity 6.3 Extreme points
- 6.4 Inflexion points 6.5 Curve sketching Exponential and Logarithmic functions
- 7.1 Exponential functions 7.2 Logarithmic functions
- 7.3 Properties of exponents and logarithms
- 7.4 Natural exponential and Logarithmic functions
- 7.5 Solving natural exponential and logarithmic functions.
- 7.6 Derivatives of natural exponential and logarithmic functions.
- 7.7 Logarithmic differentiation 7.8 Applications of exponential functions
- 7.9 Application of Logarithmic functions Integration 8.1 Anti derivative
- 8.2 Rules for indefinite integrals Multivariable Calculus
- 9.1 Functions of several variables 9.2 Partial Derivatives

Department of Zoology

Open Course:

ZO5D 02T - NUTRITION, HEALTH AND HYGIENE

Syllabus:

Section-A. NUTRITION

- 1. Introduction
- 2. Components of food, classification of foodstuffs, Balanced diet.
- 3. Dietary recommendations to a normal adult, infant, pregnant woman and aged.
- 4. Malnutrition disorders.
- 5. Significance of breast feeding.
- 6. Importance of fibers in food.
- 7. Food toxins, food adulteration, food processing and preservation.
- 8. Defects of modern food habits, mention food additives
- 9. Nausea, Vomiting, diarrhea, Constipation, piles, anorexia, starvation, acidity flatulence, ulcer
- 10. Fasting and its significance.
- 11. BMI and its significance.
- 12. Different feeding habits: vegetarians, non-vegetarians and vegans
- 13. Human digestive system.

Section-B. HEALTH and HYGIENE

- 1. The need for health education
- 2. Factors influencing health
- 3. Physical health, psychological health, sociological health, Genetic influence on health, overcoming environmental influences. Three elements of health programmes: environment-education-surveillance

- 4. Consumerism and health, Health products.
- 5. Fitness-body conditioning, principles of exercise programmes, sports, use of leisure time.
- 6. Alcoholism: Alcoholic beverages, physiological effects of alcohol, abuse of alcohol, treatment of chronic abuse of alcohol; Smoking: rights of non smokers, composition and effects of tobacco smoke, the smoking habits (active and passive smoking), legislation; Drug addiction.
- 7. Familiarization of various diseases and disorders of human body.
- a. Communicable and non-communicable diseases (brief account) :

Bacterial, viral, fungal, protozoan, helminth

b. Parasites and their diseases (life cycle not expected):

Mode of infection, pathogenecity, diagnosis, treatment and prophylaxis of Entamoeba histolytica, Taenia solium, Schistosoma haematobium, Ancylostoma duodenale,

Wuchereriabancrofti, Enterobius vermicularis

c. Vector borne diseases and their control:

Anopheles, Culex, Aedes, Xenopsylla, Cimex, Pediculus(name of any 2diseases transmitted by the above vectors

- d. Disorders of blood vascular system: Hypotension and hypertension, coronary thrombosis, cerebral thrombosis, stroke, arteriosclerosis,
- atherosclerosis, angina pectoris, myocardial infarction, ischemia, sickle cell anaemia; mention ECG, EEG, pace maker, heart lung machine, angioplasty, bypass surgery.
- e. Disorders of respiratory system: COPD, crib death, asthma, bronchitis.
- f. Disorders of excretoryand reproductive system: nephritis, UTI, vulvo vaginitis, STD
- g. Cancer, hepatitis, jaundice, diabetes type landII, insulinoma, hyperinsulinism, Aids (briefaccount)
- h. Early intervention in autism, dyslexia and mental retardation.
- 8 .First aid

Snake bite (add a note on identification of poisonous and non poisonous

snakes from the bite mark and observing the snake, mention

Haemotoxic and neurotoxic venom, anti venom, poly venom

(preparation); dog bite; Scorpion/ bee/ wasp sting; burns, road accidents, drowning.

- 9 . Proper use of drugs-ill-effects of self medication.
- 10. Hygiene : Hygiene and health factors at home, personal hygiene, Oral hygiene and sex hygiene.

Topics for Assignments and Seminars;

- 1. Vitamins, hypovitaminosis, hypervitaminosis
- 2. Substance abuse (alcohol, tobacco, resins, solvents, narcotics)
- 3. Blood pathology: anaemia, polycythemia, leucocytosis, leucopaenia, leukemia.
- 4. Genetic disorders, mental illness, rehabilitation.
- 5. Drug abuse in sports and athletics.

Department of Commerce

Open Course:

Basics of Entrepreneurship & Management.

Objective of the course:

This course gives a brief idea about entrepreneurship & management, and the difference between these two

Syllabus:

Module – I. Foundation of Business

Concept of Business, Commerce & Industry

Basic considerations in setting up a business enterprise

Social responsibilities of business

Forms of business organizations

Module -II. Entrepreneurship

Concept of entrepreneurship

Characteristics of entrepreneurship

Types & functions of entrepreneur

Difference between entrepreneur & manager

Role & importance of entrepreneurship development programme

Module -III. Management Concepts

Meaning, nature & characteristics of management

Management is science as well as art

Management & administration

Levels of management

Henry Fayol's principles of management.

Module -IV. Functions of Management

Meaning, importance & steps in planning

Types of plan

Nature, purpose & types of organizations

Centralization v/s decentralization, authority v/s responsibility

Directing, leadership, controlling & span of control.

Department of Physical Education

Open Course:

Physical Activity, health and wellness.

Pre requisites:

Interest to study the aspects of Physical activities and heath in a scientific way.

Objective of the course:

- To introduce the fundamental concepts of Physical Education, health.
- To provide general understanding in nutrition, first aid and stress management.
- To familiarize yoga and other activities for developing fitness.
- To create awareness regarding hypo kinetic diseases and various measures of fitness and health assessment.

Syllabus:

Module I: Concepts of physical education and fitness.

Definition, aim, objectives and importance of physical education.

Physical fitness components – speed, strength, endurance, flexibility and coordinative abilities.

Types of physical fitness-Health related physical fitness, Performance related physical fitness and Cosmetic fitness.

Fitness balance.

Module II:

Exercise principles, First Aid and nutrition Principles of exercise programme, Exercise and heart rate zone, BMR Definition of First Aid, Aim of First Aid, Principles of First Aid, RICE, ABC of First

Aid, First Aid for Fracture, Bleeding, Drowning and Snake Bi t e. Nutritional balance, Nutritional deficiency diseases.

Module III:

Yoga, stress management and postural deformities. Definition and meaning of Yoga, Asana and Pranayama. Eight limbs of Ashtanga Yoga— Yama, Niyama, Asana, Pranayma, Prathy ahara, Dharana, Dhyanam, Samadhi Asanas- Ten Asanas and its effects.

Pranayamas – Three Pranayamas and its effects 1)Surya Bedhana (Heating), 2) Chandra bedhana (Cooling) 3) Nadi sudhi (Balancing)

Postural deformities and corrective measures

Meaning of good posture, causes of poor posture, importance of good posture. Postural deformities - Kyphosis, Lordosis, Scoliosis, Bow leg, Knock knee, Flat foot.

Stress Management – Definition of stress, causes of stress and stress management

Module IV:

Vital signs, Life style / Hypo kinetic diseases and its management. Vital signs- Pulse rate, Respiratory rate, Blood pressure, Body temperature, Diseases- Diabetes, Hyper tension, Obesity, Osteoporosis, CHD, Back pain. Fitness assessment –Body mass index, Waist to Hip Ratio.