ID163490 HISTORY I

TEACHING SCHEME:Total contact period per week - lectures 2 + studio1 = 3

EXAMINATION SCHEME:

Paper: Nil Oral: Nil

Sessional Assessment: 50

Aim: Study of cultural anthropology of the Great Civilizations across the world, understanding their social, political and cultural influences, on art forms and architectural designs.

Objectives

- 1. To teach students the fundamental, theoretical and historical topics relevant to understanding of evolution of civilizations.
- 2. To make students aware about the importance of relationship between Sociology, Anthropology and evolution of human spaces.
- 3. To make students aware of the development of civilizations with respect to social, political and cultural backdrops.
- 4. Study and evolution of habitable spaces with indigenous materials and techniques, in different parts of the world.

Course outline

- 1. Study of Great civilizations of the world: Mesopotamian, Egyptian, Indus valley, Chinese, classical Greek and Roman periods.
- 2. Study of architectural features and buildings of these periods, their evolution and refinements.
- 3. Evolution of habitable spaces of the rulers and the commons, development of interior styles.
- 4. Development of indigenous art forms in different periods and parts of the world.

Assignments

- 1. Journal writing related to evolution of civilizations and habitable spaces.
- 2. Journal writing related to the great civilizations, Mesopotamian, Egyptian, Indus valley, Chinese, and civilizations in classical Greek and Roman periods.
- 3. Sheet work on architectural characters of the above periods, habitable spaces and indigenous art forms.

- History of architecture by Sir Bannister Fletcher
- Design through discovery.
- History of world architecture, Llyod S& Muller H.W., Publications; Faber & Faber Ltd.

ID163491 ELEMENTS OF FORM - I

TEACHING SCHEME: Total contact period per week - lectures 1 + studio 4 = 5

EXAMINATION SCHEME:

Paper: Nil Oral: 50

Sessional Assessment: 50 (Internal)

Aim:This course aims towards improving aesthetic sensitivity of the students, exploring forms andcreating spatial understanding.

Objectives:

- 1. To sensitize towards perception, appreciation and articulation of space and its elements.
- 2. To improve perception of space through understanding associative aspects related to space.

Course Contents:

- 1. An introduction to the elements and principles of design in 2D and 3D.
- 2. Understanding cognitive theories and Gestalt Laws of Psychology --- Laws of similarity, proximity etc. and application of Laws in spatial compositions.
- 3. Understanding and transforming space with volumetric division; surface transitions, radii manipulation etc.
- 4. Exploring the geometric relations using planes and solids through hands on assignments.
- 5. Creating abstract composition in given space.

Assignments

- 1. Collision of objects- exercises on 2D shapes and 3D forms.
- 2. Gestalt theory Exercises based on laws, exploring Gestalt in 3D.Explorations orientated towards abstract forms with compositional value.
- 3. Transformation of forms- Hands on exercised related to Radii manipulation.
- 4. Compositions in 3-dimensional space.

Exercises based on all above topics with special thrust on hands on explorations and models.

- Form, Space and Order by Francis D. K. Ching.
- Design Paradigm.
- Kepes, Gyorgy; Language of Vision, Dover Publications, 1995
- Geometry of Design: Studies in Proportion and Composition, Elam, Kimberly; Princeton Architectural Press, 2001
- The Poetics of Space, Publisher: Bachelard, Gaston; Jolas, Maria (Translator); Beacon Press; Reprint edition, 1994
- Elements of Design, Hannah, Gail Greet; Princeton Architectural Press, 2002

ID163492 MATERIALS AND PROCESSES I

TEACHING SCHEME:Total contact period per week - lectures 3 + studio 1 = 4

EXAMINATION SCHEME

Paper: Nil Oral: Nil

Sessional Assessment: 50

Aim:This course helps the students to understand materials, which are used in the interior space design, their properties and processes.

Objectives:

- 1. To provide an indepth understanding of materials Brick, Stone, Wood and its allied products like plywood, veneer and Glass, their properties in context of interior design.
- 2. To enhance the understanding of Materials- its origin, properties, processes and limitations
- 3. To acquaint students with the traditionally used and locally available materials, its history, availability, properties, acquainting them to the tools and machines required for its handling and processing.
- 4. Reinforcement of knowledge through lectures, site and workshop visits and Market Survey.

Course Contents:

- 1. Bricks as traditionally used material, its properties (physical, chemical), manufacturing process, storage and transportation.
- 2. Stone as a naturally available material, its type (sedimentary, metamorphic and igneous), its quarrying, transportation, tools used for its dressing, and understanding its use through history.
- 3. Wood, sourcing of wood, its structure and properties (physical and biological), types, seasoning, market forms, its machining, like cutting, plaining, gauging, preservation, making of ply wood, block boards, MDF, and allied products of wood.
- 4. Glass, manufacturingprocess, types, market forms and historic relevance.

Assignments:

- 1. Journal writing on all the above topics.
- 2. Documentation of manufacturing processes of Brick, Glass and allied wood products through Reports.
- 3. Market survey on topics 2,3 and 4.

- Engineering materials by K.P.Roy and Chaudhari.
- Materials of construction by D.N.Ghose.
- Architectural metals by I.William Zabner.
- Building construction by W.B.Mckay- Vol 1 to 4.
- Building construction by Chudley.
- Building materials bySushilkumar.

ID163493 CONSTRUCTION TECHNOLOGY I

TEACHING SCHEME:Total contact period per week - lectures 1 + studio 5= 6

EXAMINATION SCHEME

Paper: Nil Oral: 50

Sessional Assessment: 50

Aim:This course helps the students to understand the elements of buildings, structural systems, specific materials, and construction techniques used in the designing of the interior spaces.

Objective:

- 1. To help the student understand various elements of a building (exterior, interior and structural).
- 2. To understand the construction techniques used in standard construction practice of bricks, wood, stone, glass and textiles.

Course outline:

- 1. Introduction to the structural systems in a building -- load bearing and reinforced cement concrete.
- 2. Introduction to the elements of a building like foundations, slabs, beams, columns, walls, partitions, lintels, arches, doors and its types, windows and its types, ceilings, roof, timber roofs, chajjas, terraces, box windows, staircases, headroom, parapet walls, railings, service ducts etc.
- 3. Introduction to the vertical elements of interiors -- brick wall bonds L&Tjunctions in brick masonry.
- 4. Doors and its types -- Ledged, braced and battened doors, Paneled doors, Glazed doors, French doors, sliding doors, Folding doors, etc. and their construction details.
- 5. Windows and its types -- Ledged, braced and battened windows, Paneled windows, Glazed windows, Bay windows, Sliding windows, etc. and their construction details.
- 6. Carpentry with all types of joints --lengthening, widening joints, angle joints etc.

Assignments

- 1. Journal writing covering topics 1,2and 3
- 2. Manually drafted sheets on topics 4,5,& 6

The construction techniques syllabus is defined and detailed in relation to the subject Materials and Processes I, so that the material properties learnt in that subject are related to Construction Technology I.

- Architectural metals by Zabner and I. William
- Woodworkers guide to furniture design.
- Building construction by W.B.Mckay.
- Building construction by Chudley.

ID163494 DESIGN AND WORKING DRAWING I

TEACHING SCHEME:Total contact period per week - lectures 2 + studio 8 = 10

EXAMINATION SCHEME

Paper: Nil. Oral: 50.

Sessional Assessment: 50(Internal)

50(External)

Aim:To introduce students to design of single function interior space.

Objectives:

- 1. To make students understand the relationship between Ergonomics and interior space.
- 2. Understanding importance of services and structure as inseparable part of design process.
- **3.** To introduce students to the process of Design.

Ergonomics: To make students understand Anthropometry – human dimensions, its proportions and relevance in design.

- 1. To introduce the students to the principles of ergonomics with reference to humanfunctions and spaces.
- 2. To study and analyze human comfort criteria and its relation with interior space.

Design: To enable students to understand space in terms of volume and planes by designing a single function interior space.

- 1. To enable students to doresearch related to Design, and generate their own Design brief.
- 2. Give their design solutions throughpresentation of Design Projectwith all the drawing requirements, working drawings and models.

Design parameters in terms of typology: A Dentist clinic/ a Bachelor apartment/ small Office/ small Retail space, etc.

Course outline:

- 1. Introduction to single function interior space.
- 2. Study of human anthropometry and ergonomics through study of products, furniture and spaces, related to the Design Programme.
- 3. Study and analysis of anthropometric data related to the Design Programme.

Stage I (Data Collection-25%)

- 4. Analytical study of typical interior layouts with respect to activities, functions and needs. (Case Studies)-----Stage II (10%)
- 5. Site Analysis6. Formulation of Design brief.
- 7. **Design conceptualization and ideation** Form, function and space requirements in interior space. ------**Stage IV (35%)**

Assignments and Assessment

The assessment of Design Project to be done at the given assignment stages with due weightages to each stage.

- Basic design and Anthropometry by Shirish Vasant Bapat.
- The measure of men and women human factors in design by Allvin R. Tilley and henry Dreyfuss and associates.
- Visual Dictionary of Architecture by D. K. Ching.
- Interior design by Ahmed Kasu.
- Interior design by DKChing.
- Time savers standards of interior design
- Neuferts standards.

ID163495 INTERIOR DRAWINGS AND GRAPHICS I

TEACHING SCHEME:Total contact period per week - lectures 1 + studio4 = 5

EXAMINATION SCHEME

Paper: Nil. Oral: Nil

Sessional Assessment: 50 (Internal)

50 (External)

Aim:To equip students with the skill of making drawings, understanding graphic language and communicating through drawings in alegible and effective manner.

Objective:

1. To understand different methods and techniques of making drawings.

- 2. Techniques of representing various building elements.
- 3. To understand the different methods and techniques of making rendered drawings.

Course outline:

Technical Drawing

- 1. To introduce the students to the units and modes of measurements, scales and use of appropriate scales for various drawings.
- 2. To introduce students to the use of orthographic projections as a tool for drawing architectural plans, sections, elevations showing the interior layouts in detail.
- 3. Drawing Isometric and Axonometric views in interior spaces.
- 4. Use of lettering, texting and dimensioning as an effective way of communicating the drawings.

Illustration techniques

- 5. Understanding the graphical representation of materials on the drawings through various symbols, rendering techniques.
- 6. Sketching and rendering techniques essential for communicating the landscape, furniture and interior space elements.
- 7. Learning the techniques of making a presentation drawing with renderings in different mediums like water colours, pencil colors, graphite pencils, and charcoal.

Note: 80% weightage to be given to Assignments related to Technical Drawings. 20% weightage to be given to Illustration techniques.

Assignments on Technical drawing

- 1. Assignment on use of Scales, by increasing and reducing scales to draft drawings and details on appropriate scale.
- 2. Exercise on Standard lettering and dimensioning styles for execution drawings.
- 3. Assignment on Measurement drawings- Measurement and drawing of studio and drafting it on Scale.
- 4. Introducing technical drawings of Interior spaces, drawing Plans and Sections and execution drawing layouts.
- 5. Exercise on drafting any one room from their Design, using all the above techniques learnt.
- 6. Making 3D Isometric and Axonometric views with furniture of the above room.

Assignments on Illustration techniques

Rendering of Plan, Sections, Elevations and Views with various mediums like water colours, pencil colours and inking of drawings.

- 1. Rendering with pen and ink by Robert W Gill
- 2. The architectural course by Thames and Hudrey.
- 3. Geometrical drawings for arts students by I.H.Morris and William Jesse.
- 4. Presenting architectural designs by Koos Eissen.

ID 163496 WORKSHOP SKILLS I

TEACHING SCHEME:Total contact period per week - studio 1= 1

EXAMINATION SCHEME

Paper: Nil Oral: Nil

Sessional Assessment: 50 (Internal)

Aim:This course equips the students with the skill of using the materials, handling machine tools to make and understand wooden joineries.

OBJECTIVE:

- 1. To Learn to work with machines and understand capabilities and limitations of machines in processing of wood.
- 2. To Learn various types of joints in wood.
- 3. Learn safe workshop practices

COURSE OUTLINE:

- 1. To introduce different types of joints in wood, joinery details related to the course of Construction Technology I.
- 2. Introduction to Engraving, carving and jaali work.

ASSIGNMENTS

Hands on exercises related to above topics.

- Building construction by D.K.Ching.
- Building illustration by W.B.Mckay.
- Building construction by Sushil kumar.
- Interior design by D.K.Ching
- Wood worker's guide to furniture design by graves and grates.

ID 163497 COMPUTERS I

TEACHING SCHEME: Total contact period per week - lectures 1 + studio 2 = 3

EXAMINATION SCHEME

Paper: Nil Oral: Nil

Sessional Assessment: 50(Internal)

Aim:This course equips the students with computer aided skills essential for the presentation of the concepts/ideas,of the final design.

Objective:

1.To introduce the students to the use of computer aided design tools for drafting and presentations.

2. To use computer as a tool in visual perception of Interior spaces.

Course content:

- 1. Demonstrations of the tools in the CAD software and their applications to produce 2Ddrawings.
- 2. Equipping students to produce detailed CAD drawings.
- 3. Equipping students with Printing techniques in the software.
- 4. Learning allied drawing software's like Sketch Up to generate quick interior modelling spaces.

Assignment

- 1. Assignment on each CAD tool to be covered during class.
- 2. Drafting plans, sections, elevations in model space with all necessary tools, for effective drawing communication like, layers, line thicknesses, text, dimension styles, hatching etc.
- 3. Exercise on Sketch up- interior view, applying materials, shadows etc.
- 4. Printing the drawing to Scale.

Recommended readings: -

User manual of related software.

ID163498 MODEL MAKING.

TEACHING SCHEME:Total contact period per week - lectures 1 + studio 1 = 2

EXAMINATION SCHEME

Paper: Nil. Oral: Nil.

Sessional Assessment: 50 (Internal)

Aim: It equips the students with the skills of making study and finished models.

Objective:

1.To develop the skills of making models by using different methods, techniques and materials.

2. To develop skills of making quick presentation models.

Course content:

- 1 The introduction to different materials like paper, Styrofoam, file boards, foam boards, plaster of parisetc which can be used to make models.
- 2 Understanding properties of materials suitable for different types of models.
- 3 Methods of drawing/transferring the drawings and techniques of cutting, pasting and finishing the study models.
- 4 Apply the skills to make scaled study models of the interior using appropriate materials.

Assignments

Above topics to be explored with different materials.

ID163499 EXPOSURE TO LIBERAL ARTS I

TEACHING SCHEME: Total contact period per week - lectures 1 = 1

EXAMINATION SCHEME

Paper: Nil Oral: Nil

Sessional Assessment: 50(Internal)

Aim:This course enables the students to study liberal arts.It helps them to understand the relevance of other mediums of expression.

Objectives:

1. To inculcate the ability of reading, appreciating and experiencing the works of people from different walks of life.

Course Contents:

- 1. To give exposure to the students to the other medium of expression, communication and art forms like music, painting, visual communication, photography.
- 2. To give exposure to the students to the thought and works of the contemporary artists.

Assignment

Exercise based on workshop conducted.

Recommended authors.

- John Berger Ways of Seeing
- Documentary by BBC How art made the world.
 Books by regional authors e.g,
- Anil Avchat --- Chhandanvishayi.
- Prabhakar Barve --- Kora Canvas.
- Vasant Potdar --- Kumar and Bhimsen.

ID163500 HISTORY II.

TEACHING SCHEME:Total contact period per week - lectures 2 + studio 1 = 3

EXAMINATION SCHEME:

Paper: 100 Oral: Nil

Sessional Assessment: 50

Aim:ToExplore the evolution and salient characteristics of architectural forms, design expressions and its influence on the interior spaces in the Indian subcontinent, understanding the various timelines, social, cultural, political and regional influences, design development under various rulers and timelines.

Objectives

- 1. To teach students the fundamental, theoretical and historical topics relevant to development of culture and civilization in the Indian subcontinent.
- 2. Study and evolution of habitable spaces in connection with regional and geographical contexts, lifestyle, culture, indigenous materials and techniques, responses and expressions.
- 3. To enable students to use methodological tools and develop their analytical capacities, so that they can grasp the bonds that link the development in various periods and timelines, with respect to social, political and regional backdrops.

Course outline

- 1. Development and evolution of civilization and culture in Vedic periods.
- 2. Study of architectural features and art forms in Buddhist and Hindu periods; e.g, Pallavas, Cholas, Guptas, Hoyslas, Jain etc.and their sociopolitical influences in the realm of design.
- 3. Introduction to temple architecture of India-Dravidian, Nagra and Vesara styles, characteristic features, influences, expressions.
- 4. Mughal invasions and development of Mughal architecture in India, influence of their lifestyle on the architectural styles in Akbar, Shahjahan and Lodhi period, and eventually the interiors, art forms, artefacts, motifs, sculptures, patterns etc.
- 5. Development of Forts, Palaces and other building forms.
- 6. Elements of interior design, art forms, materials and finishes of these periods.
- 7. Study of habitable spaces and design features of regional typologies from different regions of India e.g; Pols of Gujrat, Bhungas of Rajasthan, Wadas of Maharashtra, etc.

Assignments

- 1. Journal writing with sketches on topic 1,2 and 3.
- 2. Sheet works on 2, 4, 5, 6 and 7.

- Indian architecture Buddhist and Indo period by Percy Brown.
- Indian Architecture (Islamic Period) by Percy Brown.

ID163502 ELEMENTS OF FORM-- II

TEACHING SCHEME: Total contact period per week - lectures 1 + studio 4 = 5

EXAMINATION SCHEME:

Paper: Nil Oral: 50

Sessional Assessment: 50(Internal)

Aim:To give students spatial understandingand articulation of formwith the help of colour, texture, light and finishes.

Objectives:

- 3. To sensitize towards perception, appreciation and articulation of the form and space.
- 4. To provide fundamental tools for creatively influencing a given form or shapeusing colour, material, texture, light, shadow etc.
- 5. To explore colour interactions through different mediums on various materials in different light condition.

Course Contents:

- 1. Introduction to color theory, colour terminologies, understanding of colour wheel.
- 2. Color psychology.
- 3. Exploring color interactions on various mediums, colour percentage and colour schemes in 2D.
- 4. Exploring spatialand form expression of color in 3Dto make students understand the visual impact of colour with material, texture and finishes.
- 5. To make students understand the visual appreciation of form in different light conditions.
- 6. Color Abstraction.

Assignments

Exercises based on all above topics with special thrust on hands on explorations and models.

- Basic design and anthropometry by Shirish Vasant Bapat.
- Interior design by Ahmed Kasu.
- Principles of color design: designing with electronic color by Wucius Wong.
- Color by Paul Zelanski and Mary Pat Fisher.
- Color in graphics by Labudovic, Ana
- Advances in color harmony and contrast for the home decorator by Michael Wilcox.
- Elements of Design and the Structure of Visual Relationships, H. G. Greet and R. R. Kostellow, Architectural Press, NY, 2002

ID163503 MATERIAL AND PROCESSES II

TEACHING SCHEME:Total contact period per week - lectures 3 = 3

EXAMINATION SCHEME:

Paper: 100 Oral: Nil

Sessional Assessment:50

Aim:This course helps the students to understand materials, which are used in the interior space design, their properties and processes.

Objectives:

- 1. To enhance the understanding of materials- their origin, properties, processes and limitations.
- 2. To provide an understanding of materials and their properties in the context of interior design (Concrete, metals, tiles, and natural materials, clay, terracotta, bamboo, thatch, jute).

Course Contents:

- 1. Concrete as a building material (sand, cement, aggregate).
- 2. Metals used in the interior constructions iron, steel mild steel, galvanized iron, aluminum, copper, bronze. Their properties, strength,manufacturing, machining handling.etc.
- 3. Tiles, as a flooring material, its manufacturing process, types ceramic, porcelain, vitrified, terracotta, etc. Its availability, sizes available in market, process of laying etc.
- 4. Clay as a natural material its properties and utility.
- 5. Terracotta as a natural material its properties and qualities.
- 6. Bamboo its availability, properties, application.

Assignments

- 1. Journal writing on all the above topics.
- 2. Documentation of manufacturing processes of 3,4 and 5 through Reports.
- 3. Market survey on topics 2,3.
- 4. Documentation of Bamboo, as a material, availability and application.

- Engineering materials by K.P.Roy and Chaudhari.
- Materials of construction by D.N.Ghose.
- Architectural metals by I.William Zabner.
- Building construction by W.B.Mckay- Vol 1 to 4.
- Building construction by Chudley.
- Building materials by Sushilkumar.

ID163505 CONSTRUCTION TECHNOLOGY II

TEACHING SCHEME:Total contact period per week - lectures 1 + studio 4 = 5

EXAMINATION SCHEME

Paper: Nil. Oral: 50.

Sessional Assessment: 50(Internal)

Aim : This course helps the students to understand the concept of staircases, furniture and hardwarein the interior spaces of a building.

Objective:

- 1. To help the students to understand staircases, and its types and its various elements.
- 2. To understand the importance and relevance of hardware, its use and application.

Course outline:

- 1. Introduction to staircases, itselements, and all type of staircases. Parts of the staircase like railing, balusters. Calculations of treads, risers, headroom. Staircases in various material combinations, its application, detailing and fixing.
- 2. Role of hardware in furniture making, various types of hardware eg.telescopic channels, types of hinges, aldrop, tower bolts, handles, door stopper, nails and screws, hydraulic hinges etc.
- 3. Making details of furniture eg. a bed in teakwood, wardrobe or cabinet using plywood or allied wood products and application of hardware in the same.

Assignments

- 1. Manually drafted sheets on topics 1,2 and 3
- 2. Market survey covering topic 2 &3.
- 3. Documentation of types of staircases, styles and materials.

- Architectural metals by Zabner and I. William
- Woodworkers guide to furniture design.
- Building construction by W.B.Mckay.
- Building construction by Chudley.

ID163506 BUILDING SERVICES I.

TEACHING SCHEME:Total contact period per week - lectures 2+ studio1= 3

EXAMINATION SCHEME

Oral: 50

Sessional Assessment: 50(Internal).

Aim:To impart the knowledge and skill required for understanding the Building services, Water Supply & Sanitation.

Objectives:To acquaint students to the concept of services in architectural buildings, by introducing them to the basic systems of water supply and sanitation.

Course Content:

Water Supply

- 1. Introduction to water as a resource, its quality, source, storage, purification, and transportation.
- 2. Water supply at plot level, at city level. Pipes and its types and materials.
- 3. Storage of water, Tanks, its types and materials, Pumping of water, and types of pumps.
- 4. Water pressure and water supply (Hot & Cold) through pipes at building level, its accessories and fixtures. Electrical Geysers, Gas Geysers, Solar Panels, water Purifiers.
- 5. Plumbing fixtures, accessories. e.g Taps and its types, valves, foot valve, ferule etc.
- 6. Toilets layout, anthropometry, elements and criteria of the design of toilets.

Sanitation

- 7. Drainage systems, pipes used for the purpose its types, and principles .eg. two pipe system, one pipe system, etc.
- 8. Plumbing fixtures and accessories eg. Water closet, commodes, wash hand basin, bath tubs, Jacuzzi, shower cubicles, urinals, squatting pans etc.
- 9. Types of traps, inspection chambers, laying of drain pipe, its slope. Collection of Sewage, Sewer line, septic tank, soak pit etc.
- 10. Garbage chutes and kitchen garbage.
- 11. Learning through lectures, site visits, market survey and applying the same through various assignments.
- 12. Anthropometry related to the above accessories and fixtures etc.

Assignments

- 1. Journal writing on all the above topics.
- 2. Report on visit to water treatment plant, of site visits of plumbing and sanitation.
- 3. Market survey on 4, 5 8 and 9.
- 4. Sheet work on 6 and 12.
- 5. Sheet work on water supply and sanitation layout on site, connecting to Municipal drain.

- Building construction by W.B.Mackey
- Building construction by Chudley
- Sanitary Engg. Vol I & II by R.S. Deshpande
- Water Supply and Sanitary Engg, by S. Birdi, Dhanpat Rai & Sons

ID163507 CLIMATOLOGY, ENVIRONMENT AND ECOLOGY

TEACHING SCHEME:Total contact period per week - lectures 1 + studio 2 = 3

EXAMINATION SCHEME:

Paper: Nil Oral: Nil

Sessional Assessment: 50

Aim:This subject will introduce students to the climate related, environmental and ecological aspects of design, to make them understand the relationship between man and his environment.

Objective:

- 1. To teach students the fundamentals of Climatology, and how human dwellings evolved and responded to climates of various places.
- 2. To make students explore livable interior spaces by analysis of climatic factors.
- 3. To introduce environment friendly and passive design features and its applications.

Course outline:

- 1. Introduction to components of environment.
- 2. Introduction to different aspects of land, water and vegetation.
- 3. Analytical study of climatic factors like sun path, wind flows etc.
- 4. Introduction of various climatic zones of India and settlements responding to these zones.
- 5. Relationship between environment and settlement, through study of vernacular architecture of India.
- 6. Effect of landscape elements on site and micro climate.
- 7. Application of above said parameters to current or previous design by the student.

Assignment

- 1. Journal writing on all the topics.
- 2. Sheet work on 3,4 and 7.

- 1. Manual of tropical housing by Koensberger.
- 2. Interior Design by Ahmed Kasu

ID163508 DESIGN AND WORKING DRAWING II

TEACHING SCHEME:Total contact period per week - lectures 2 + studio 8 = 10

EXAMINATION SCHEME:

Paper: Nil. Oral: 50.

Sessional Assessment: 50(Internal).

50(External).

Aim:Understanding Design as a synthesis of multiple levels, multiple functions thereby respecting its services, existing structural limitations and architectural attributes.

Objectives:

- 1. To make students understand the relationship between Ergonomics and interior space.
- 2. Introduce students to design of multilevel, multifunctional residential interior spaces.
- 3. Understanding importance of services and structure as inseparable part of design process.
- 4. To enable students to make their own Design Briefs, Case Studies, Design Process, portfolio of proposed design, working drawings, details and models.

Ergonomics: To make students understand Anthropometry – human dimensions, its proportions and relevance in design.

- 3. To introduce the students to the principles of ergonomics with reference to human functions and spaces.
- 4. To study and analyze human comfort criteria and its relation with interior space.

Design : To enable students to understand space in terms of volume and planes by designing a multi-function, multi-level interior space.

- 3. To enable students to doresearch related to Design, and generate their own Design brief.
- 4. Give their design solutions throughpresentation of Design Projectwith all the drawing requirements, working drawings and models.

Design parameters in terms of typology: Residence + Clinic/Small work area/ boutique etc.

Course outline:

- 9. Introduction to single function interior space.
- 10. Study of human anthropometry and ergonomics through study of products, furniture and spaces, related to the Design Programme.

11. Study and analysis of anthropometric data related to the Design Programme.

Stage I _ (Data Collection-25%

- 12. Analytical study of typical interior layouts with respect to activities, functions and needs. (Case Studies)-----Stage II (10%)
- 13. Site Analysis
 14. Formulation of Design brief.

 Stage III (10%)
- 15. **Design conceptualization and ideation** Form, function and space requirements in interior space. ------**Stage IV (35%)**

Assignments and Assessment

The assessment of Design Project to be done at the given assignment stages with due weightages to each stage.

- Basic design and Anthropometry by Shirish Vasant Bapat.
- The measure of men and women human factors in design by Allvin R. Tilley and henry Dreyfuss and associates.
- Visual Dictionary of Architecture by D. K. Ching.
- Interior design by Ahmed Kasu
- Interior design by D.K. Ching
- Time savers standards of interior design
- Neuferts standards.

ID 163509 INTERIOR DRAWINGS AND GRAPHICS II

TEACHING SCHEME:Total contact period per week - lectures 1 + studio 2 = 3

Paper: Nil. Oral: Nil.

Sessional Assessment: 50(Internal)

50 (External)

Aim:To equip students with the skill of making drawings essential for communicating the Design.

Objectives: To acquaint students with the technique of making perspective drawings, sciography and advanced rendering techniques.

Course content:

Technical Drawing

- 1. Detail interior drawings with furniture details showing material and finish specifications. (to be linked with Construction Technology)
- 2. To introduce students to the theory of perspective drawings one point perspective, two point perspective.
- 3. To introduce Principles of sciography .Sciography of simple 3-D objects.
- 4. To introduce the application of the sciography in interior drawings.

Illustration techniques

5. Introduction to advance rendering mediums and advanced rendering techniques used for making presentable perspective views.

Assignments of technical drawing

- 1. Exercise on detail furniture layout of interior space with showing plans, section, elevation and details with material specification, finishes and levels.
- 2. Drafting of one point and two point perspectives with furniture of interior spaces.
- 3. Sciography of basic forms and their combinations.

Assignments of illustration techniques

- 1. Exercise on exploring different rendering tools, like dry pastels, soft pastels, Alcoholmarkers, rendering with inks etc.
- 2. Application of above mediums in perspective drawings.
- 3. Application of sciography in plan, sections, elevations, furniture's and interior views.

Note: 80% weightage to be given to Assignments related to Technical Drawings. 20% weightage to be given to Illustration techniques.

- 5. Rendering with pen and ink by Robert W Gill
- 6. The architectural drawing course by Thames and Hudrey.
- 7. Geometrical drawings for arts students by I.H.Morris and William Jesse.
- 8. Presenting architectural designs by Koos Eissen.

ID163510 WORKSHOP SKILLS II

TEACHING SCHEME:Total contact period per week - studio1= 1

EXAMINATION SCHEME

Paper: Nil Oral: Nil

Sessional Assessment: 50 (Internal)

Aim:This course equips the students with the skill of using the materials, handling machine tools to make and understand metal joineries.

Objective:

- 4. To Learn to work with machines and understand capabilities and limitations of machines in processing of metals.
- 5. To Learn various types of joints in metal.
- 6. Learn safe workshop practices

Course outline:

- 3. To introduce different types of joints in metal, welding and other joinery details etc.
- 4. Introduction to Engraving, carving in metals.

Assignments

Hands on exercises related to above topics.

- Building construction by D.K.Ching.
- Building illustration by W.B.Mckay.
- Building construction by Sushil kumar.
- Interior design by D.K.Ching
- Wood worker's guide to furniture design by graves and grates.

ID163511 COMPUTERS II

TEACHING SCHEME: Total contact period per week - lectures 1 + studio 2 = 3

EXAMINATION SCHEME

Paper: Nil Oral: Nil

Sessional Assessment: 50(Internal).

Aim:This course equips the students with the computer aided skills essential for the presentation of the concepts/ideas,of the final design.

Objective:

1.To introduce the students to the use of different computer aided design tools for creating 3D views, renderings.

2. To use computer as a tool in visual perception of Interior spaces.

Course content:

- 5. Demonstrations of the tools in the CAD software and their applications to produce 3D drawings.
- 6. Demonstrations of the tools in the software and its application to produce 3d drawings with renderings to create presentation drawings.
- 7. Introducing students to basics of Coral.
- 8. Equipping students towards making rendered presentation drawings in the digital media.

Assignments

- 5. Assignment on each CAD tool to be covered during class.
- 6. Drafting views and rendering them.
- 7. Exercises related to Coral software, use of various tools etc.
- 8. Presentation drawings, importing CAD drawings in Coral and rendering.
- 9. Printing the drawing to Scale.

Recommended readings: -

User manual of related software.

ID163512 EXPOSURE TO LIBERAL ARTS II

TEACHING SCHEME: Total contact period per week - lectures 1 = 1

EXAMINATION SCHEME:

Paper:Nil Oral: Nil

Sessional Assessment: 50(Internal).

Aim:This course enables the students to study liberal arts.It helps the students to understand the relevance of other mediums of expression.

Objectives:

2. To inculcate the ability of reading, appreciating and experiencing the works of people from different walks of life.

Course Contents:

- 3. To give exposure to the students to the other medium of expression, communication and art forms like Sculpture, Installation design etc.
- 4. To give exposure to the students to the thought and works of the contemporary artists.

Assignment

Exercise based on workshop conducted.

Recommended authors.

- John Berger Ways of Seeing.
- Documentary by BBC How art made the world.
- By Nature's Design -an Exploratorium Book, Neill, William (Photographer); Murphy, Pat;
 Publisher: Chronicle Books, 1993
- Objects of Design, Publisher: Antonelli, Paola; Museum of Modern Art, 2003
- The Continental Aesthetics Reader, Clive Cazeaux; Routledge, 2011