

**SACRED HEART COLLEGE (AUTONOMOUS), THEVARA  
KOCHI, KERALA, 682013**



## **Syllabus for Courses**

Under the discipline

# **Animation and Graphic Design**

(For Undergraduate (Honours) Degree Programmes)

**Introduced from 2024-25 admissions onwards**

**Prepared by**

**Board of Studies in Animation and Graphic Design**

**SH School of Communication (SHSC)**

**Sacred Heart College Thevara, Kochi.**

**BOARD OF STUDIES IN ANIMATION AND GRAPHIC DESIGN**  
**SACRED HEART COLLEGE (AUTONOMOUS), THEVARA, KOCHI, KERALA**

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## 1. INTRODUCTION

The National Education Policy (NEP) 2020 envisages the revision of the Choice Based Credit System (CBCS) for instilling innovation and flexibility. It emphasises on promoting interdisciplinary studies, introducing new subjects, and providing flexibility in courses and fresh opportunities for students. It also envisages setting up of facilitative norms for issues, such as credit transfer, equivalence etc., and a criterion-based grading system that assesses student achievement based on the learning goals for each programme.

The NEP document suggests several transformative initiatives in higher education. These include:

- Introduction of holistic and multidisciplinary undergraduate education that would help develop all capacities of human beings - intellectual, aesthetic, social, physical, emotional, ethical and moral - in an integrated manner; soft skills, such as complex problem solving, critical thinking, creative thinking, communication skills; and rigorous specialization in a chosen field (s) of learning.
- Adoption of flexible curricular structures in order to enable creative combinations of disciplinary areas for study in multidisciplinary contexts in addition to rigorous specialization in a subject
- Undergraduate degree programmes of either 3 or 4-year duration.
- The students are getting a chance to determine his/her own semester-wise academic load and will be allowed to learn at his/her pace, to the extent possible.
- Increase in the number of choices of courses available to students and the students are getting an opportunity to choose the courses of their interest from all disciplines.
- Multidisciplinary and holistic education with emphasizes on research, skill development and higher order thinking,
- Promotion of innovation and employability of the student.
- Flexibility for the students to move from one institution to another as per their choice.
- Flexibility to switch to alternative modes of learning (offline, ODL, and online learning, and hybrid modes of learning).

### **Outcome Based Education (OBE)**

Undergraduate courses in Design and Animation follow the Outcome-based Education (OBE) framework. OBE is a system where all the parts and aspects of education are focused on the outcomes of the course. The students take up courses with a certain goal of developing skills or gaining knowledge and they have to complete the goal by end of the course. Outcome-based education affirms teachers as facilitators, rather than lecturers. In this model, teachers guide the students and encourage them to develop their knowledge and skills. The undergraduate courses at the Department of Design, Sacred Heart College (Autonomous), Thevara provides a learning approach in which students develop analytical ability and critical thinking and research acumen over different situations.

## Honours Programs offered by

### SH School of Communication, Sacred Heart College (Autonomous)

SH School of Communication offers 4 Honours programs – BA Animation and Graphic Design, BA Animation and Visual Effects, BA Mass Communication and Journalism and BA Visual Communication.

SH School of Communication (SHSC) is committed to providing a stimulating and rigorous learning environment for undergraduate students pursuing degrees in Journalism and Mass Communication, Animation and Graphic Design, Animation and Visual Effects, and Visual Communication. SHSC's academic policies are designed to foster dynamic learning in Media Arts that cultivates well-rounded graduates. We believe in the power of education to equip students with the knowledge, skills, attitude and ethical grounding necessary for successful careers in the ever-evolving media and communication landscape.

#### Teaching Philosophy

SHSC faculty employs a blend of teaching methods that cater to diverse learning styles and foster critical thinking, problem-solving, and creative expression. Our approach emphasizes:

- **Active and Participatory Learning:** Students actively participate in lectures, discussions, workshops, experience based and collaborative projects.
- **Personalized Attention and Mentoring:** Student hand holding and mentorship opportunities ensure personalized guidance and support for students.
- **Technology Integration:** We leverage technology to enhance learning experiences, utilizing industry-standard software and online resources.

**Academia- Industry Interface:** Professionals from the media and communication industries are invited for guest lectures and workshops, bridging the gap between theory and practice.

#### Learning Outcomes

Our undergraduate programs aim to equip students with the following core learning outcomes:

- **Discipline-Specific Knowledge:** Students gain a strong foundation in the theoretical and practical aspects of their chosen field through analytical and scientific methods of learning.
- **Effective Communication and Leadership Skills:** Effective written, oral, and visual communication skills are fostered across all programs from day one along with practical training to form a strong set of leadership skills.
- **Critical Thinking and Problem-Solving:** Students develop the ability to analyse complex information, identify problems, and propose innovative solutions to be change makers in their chosen paths.
- **Networking, Collaboration and Lifelong Learning:** Graduates possess the skills to utilize relevant technologies as well as concepts for their chosen career paths. They are hand held to network and collaborate for the continuous betterment of their profession. Networking and collaboration in

systematic manner along with application of lifelong learning form an organic support system for them to face challenges.

- **Social, Moral and Ethical Consciousness and Responsible Citizenship:** We emphasize the social, moral and ethical implications of communication practices and the importance of adhering to citizen's responsibilities that encompass a wide range of concerns including environment protection, civic responsibilities, social equality, inclusivity and justice in moulding a better world for all.

## **Highlights of Honours Programs offered by SHSC**

### *1. Signature Areas*

#### **Animation**

- Focus on industry-standard software: Our curriculum emphasizes hands-on training with industry-standard 2D and 3D animation software like Maya.
- Storytelling through animation: We cultivate strong storytelling skills alongside technical expertise, enabling students to create impactful and engaging animations.
- Specialization options: Students can choose to specialize in areas like character animation, visual effects, or motion graphics.

#### **Graphic Design**

- Emphasis on design thinking: We integrate design thinking methodology into the curriculum, equipping students to solve problems creatively and visually.
- User experience (UX) design focus: Our program recognizes the growing importance of UX design, offering courses in user interface (UI) design, interaction design, and information architecture.
- Interdisciplinary approach: We encourage collaboration with other departments, such as Animation and Cinema & Television, for projects that integrate various creative disciplines.

#### **Visual Communication**

- Film, TV and New media production from concept to completion: Students gain hands-on experience in all stages of filmmaking, from scriptwriting and directing to cinematography and editing.
- Focus on narrative storytelling: We emphasize the power of visual storytelling, developing students' ability to create compelling narratives for the screen.
- Exposure to diverse filmmaking styles: Our curriculum explores various filmmaking styles, including documentary, fiction, and experimental film.

#### **Journalism and Mass Communication**

- Convergence journalism: Our program prepares students for the converged media landscape, teaching them to work across multiple platforms like print, broadcast, and digital media.
- Data journalism skills: We equip students with essential skills in data analysis, visualization, and storytelling to create impactful data-driven journalism.



- Ethical considerations in media: We emphasize the ethical principles of journalism, ensuring responsible and accurate reporting practices.

## *2. Cross disciplinary learning*

All SHSC programs encourage collaboration with relevant departments within School of Communication and other campuses of the college, fostering a cross-disciplinary learning environment. Additionally, we explore potential collaborations with other academic/ professional/ social organisations.

## *3. Industry Collaborations*

- Guest lectures and workshops: Industry professionals are invited to deliver guest lectures and workshops, providing students with insights into current trends and career opportunities. We will be continuing all programs that have been held in the previous year and design niche events for this purpose in 2024-25.
- Internship opportunities: We actively cultivate internship partnerships with media and communication companies, allowing students to gain practical experience in real-world settings.
- Eminent artists and professionals as advisory boards: Advisory boards composed of eminent artists and well-known media professionals provide guidance on curriculum development and ensures our programs remain aligned with the discipline and industry needs.

## *4. Special Needs and Requirements for Research and Innovation*

SHSC recognizes the importance of fostering a culture of research and innovation.

We offer research mentorship: Faculty members mentor students interested in pursuing independent research projects.

- Support participation in conferences and competitions: SHSC encourages students to participate in research conferences and design competitions to showcase their work and gain recognition.

## *5. Entrepreneurial Edge*

SHSC aims to empower students to develop their entrepreneurial spirit:

- Courses in entrepreneurship: Offer elective courses in entrepreneurship, business management, and creative industries marketing.
- Incubation support: Provide guidance and support to students interested in launching their own creative businesses.
- Networking opportunities: Connect students with industry professionals and potential investors to help them develop their entrepreneurial ventures.

## **PROGRAMME OUTCOMES**

### **PO 1: Critical thinking and Analytical reasoning**

- Critical thinking guides the assessment and judgment of information, while analytical reasoning involves specific methods for analysis and conclusion drawing. It includes the ability to assess evidence, identify assumptions, formulate coherent arguments, understand complex relationships, and evaluate practices and theories critically. Additionally, critical sensibility involves self-awareness and reflection on personal and societal experiences.

### **PO 2: Scientific reasoning and Problem solving**

- Capacity to interpret and draw conclusions from data, critically evaluate ideas and evidence with an open-minded perspective; ability to apply learned competencies to solve unfamiliar problems and apply knowledge to real-life situations, avoiding mere replication of curriculum content.

### **PO 3: Effective communication and leadership skill**

- Proficiency in expressing thoughts verbally and non-verbally, utilizing appropriate communication media. Confidently sharing ideas, active listening, analytical reading and writing and presenting complex information clearly to diverse groups. Effective teamwork and leadership skills, including setting direction, inspiring vision, building and motivating teams, and guiding them efficiently towards common goals.

### **PO 4: Social consciousness and responsible citizenship**

- Social consciousness involves an empathetic and informed perspective, extending beyond personal concerns to embrace a responsibility for the collective good in nation-building. It includes reflecting on the impact of research on conventional practices and a clear understanding of societal needs for inclusive and sustainable development. Responsible citizens contribute positively through civic engagement, environmental stewardship, and a commitment to social justice, abiding by laws and working for the advancement of society.

### **PO 5: Equity, Inclusiveness and Sustainability**

- Promoting equity, inclusiveness, sustainability, and diversity appreciation. Developing ethical and moral reasoning with values of unity, secularism, and national integration for dignified citizenship. Understanding and appreciating diversity, managing differences, and using an inclusive approach. Emphasizing creating environments where diverse individuals feel valued, addressing present needs without compromising future generations' ability to meet their own needs, considering environmental, economic, and social factors.

### **PO 6: Moral and Ethical Reasoning**

- Possessing the capacity to embody moral and ethical values in personal conduct, articulating positions and arguments on ethical matters from diverse perspectives, and consistently applying ethical practices in all endeavours. Proficient in recognizing and addressing ethical issues pertinent to one's work, steadfastly steering clear of any unethical behaviour.

**PO 7: Networking and Collaboration**

- Cultivating networking skills in education entails establishing meaningful professional connections and relationships among educators, administrators, and stakeholders. It also involves fostering cooperative efforts among individuals, institutions, and research organizations within the educational realm. These practices are indispensable for nurturing a supportive, innovative, and dynamic learning environment.

**PO 8: Lifelong Learning**

- Cultivating the ability to continually acquire knowledge and skills, including the art of "learning how to learn," becomes paramount for lifelong learning. This self-paced and self-directed approach serves personal development, aligns with economic, social, and cultural objectives, and facilitates adaptation to evolving workplace demands through skill development and reskilling. It equips individuals with competencies and insights, allowing them to adeptly respond to society's changing landscape and enhance their overall quality of life. Lifelong learning extends beyond formal education, embracing diverse informal and non-traditional learning experiences.

## 2. REGULATIONS FOR UNDERGRADUATE (HONOURS) DEGREE PROGRAMMES

### PREAMBLE

Sacred Heart College (Autonomous), Thevara, Kochi is a grant-in-aid private college affiliated to Mahatma Gandhi University, Kottayam, Kerala. The College was established in 1944 as a higher educational institute for men on the basis of the minority rights. It started admitting girls in 1975 and currently serves all sections of the society without any discrimination of caste or creed.

The College was granted Autonomous Status by the University Grants Commission (UGC) in 2014.

### Vision and Mission of the Institution

The vision of the College aims at the formation of holistic individuals who would champion the cause of justice, love, truth and peace. To this effect, Sacred Heart College envisions the **“Fashioning of an enlightened society founded on a relentless pursuit of excellence, a secular outlook on life, a thirst for moral values as well as an unflinching faith in God.”** It seeks the creation of a world, guided by divine wisdom, governed by moral principles, inclusive by secular outlook and united by the principle of equity.

The Mission of the Institution is to provide an environment that

- **facilitates the holistic development of the individual**
- **enables the students to play a vital role in the nation-building process and contribute to the progress of humanity**
- **disseminates knowledge even beyond the academia**
- **instils in the students a feel for the frontier disciplines, and**
- **cultivates a concern for the environment**

by setting lofty standards in the ever-evolving teacher-learner interface.

### Framing of the Regulations

As part of the implementation of the National Education Policy 2020 (NEP 2020), the University Grants Commission (UGC) has issued the Curriculum and Credit Framework for Undergraduate Programmes 2023 (CCFUP) which would provide a flexible choice-based credit system, multidisciplinary approach, multiple entry and exit options, and establish three Broad Pathways, (a) 3-year UG Degree, (b) 4-year UG Degree (Honours), and (c) 4-year UG Degree (Honours with Research).

The Kerala Higher Education Reforms Commission has recommended a comprehensive reform in the undergraduate curriculum for the 2023-24 academic year, adopting 4-year undergraduate programs to bring Kerala's undergraduate education at par with well acclaimed universities across the globe.

The Kerala State Curriculum Committee for Higher Education has been constituted, and have proposed a model Kerala State Higher Education Curriculum Framework (KSHECF) for Undergraduate Education.

Further, an Academic Committee and various sub committees were constituted for the implementation of the Regulations. The Academic Committee submitted the draft regulations on 15-03-2024, namely: **THE SACRED HEART COLLEGE (AUTONOMOUS) UNDERGRADUATE PROGRAMMES (HONOURS) REGULATIONS, 2024 {SHC-UGP (Honours)}** under the New Curriculum and Credit Framework, 2024.

## **REGULATIONS**

### **Short Title and Commencement**

- i. These Regulations may be called **THE SACRED HEART COLLEGE (AUTONOMOUS) UNDERGRADUATE PROGRAMMES (HONOURS) REGULATIONS, 2024 {SHC-UGP (Honours)}** under the New Curriculum and Credit Framework 2024.
- ii. These Regulations will come into effect from the academic year 2024-2025 and will have prospective effect.

### **Scope and Application**

- iii. These Regulations shall apply to all Undergraduate programmes under various Faculties conducted by **THE SACRED HEART COLLEGE (AUTONOMOUS)** for the admissions commencing in the academic year 2024-2025.
- iv. Every programme conducted under the SHC-UGP shall be monitored by an SHC-UGP Academic Committee comprising members nominated by the principal.

### **Definitions**

Unless used in a context otherwise specified,

- i. College means **THE SACRED HEART COLLEGE (Autonomous)**, a grant-in-aid private college affiliated to Mahatma Gandhi University, Kottayam, Kerala.
- ii. 'University' means the **MAHATMA GANDHI University** which is the affiliating University of Sacred Heart College (Autonomous).
- iii. FYUGP means Four Year Undergraduate Programme.
- iv. Academic Year: Two consecutive (one odd and one even) semesters followed by a vacation in one academic year.
- v. Academic Coordinator/Nodal Officer: Academic Coordinator/Nodal Officer is a faculty nominated by the college council to co-ordinate the effective conduct of the FYUGP including Continuous Comprehensive Assessment (CCA) undertaken by various departments within the college. She/ he/ they shall be the convenor for the College level Academic Committee.
- vi. Academic Week: A unit of five working days in which the distribution of work is organized, with at least five contact hours of one-hour duration on each day.
- vii. Academic Credit: A unit by which the course work is measured. It determines the number of hours of instructions required per week in a semester. It is defined both in terms of student efforts and teacher's efforts. A course which includes one hour of lecture or tutorial or minimum 2 hours of lab work/ practical work/ field work per week is given one credit hour. Accordingly, one credit is equivalent to one hour of lecture or tutorial or two hours of lab work/ practical work/ field work/ practicum and learner engagement in terms of course related activities (such as seminars preparation, submitting assignments, group discussion, recognized club-related activities etc.) per week. Generally, a one credit course in a semester should be designed for 15 hours Lecture/ tutorials or 30 hours of practical/ field work/ practicum and 30 hours learner engagement.

- viii. Academic Bank of Credits (ABC): An academic service mechanism as a digital/ virtual entity established and managed by Government of India to facilitate the learner to become its academic account holder and facilitating seamless learner mobility, between or within degree-granting Higher Education Institutions (HEIs) through a formal system of credit recognition, credit accumulation, credit transfers and credit redemption to promote distributed and flexible process of teaching and learning. This will facilitate the learner to choose their own learning path to attain a Degree/ Diploma/ Certificate, working on the principle of multiple entry and exit, keeping to the doctrine of anytime, anywhere, and any level of learning.
- ix. Credit Accumulation: The facility created by ABC in the Academic Credit Bank Account (ABA) opened by the learner across the country in order to transfer and consolidate the credits earned by them by undergoing courses in any of the eligible HEIs.
- x. Credit Recognition: The credits earned through eligible/ partnering HEIs and transferred directly to the ABC by the HEIs concerned.
- xi. Credit Redemption: The process of commuting the accrued credits in the ABC of the learner for the purpose of fulfilling the credits requirements for the award of various degrees. Total credits necessary to fulfil the criteria to get a degree shall be debited and deleted from the account concerned upon collecting a degree by the learner.
- xii. Credit Transfer: The mechanism by which the eligible HEIs registered with ABC are able to receive or provide prescribed credits to individual's registered with ABA in adherence to the UGC credit norms for the course(s) registered by the learner in any HEIs within India.
- xiii. Credit Cap: Maximum number of credits that a student can take per semester, which is restricted to 30.
- xiv. Continuous Comprehensive Assessment (CCA): The mechanism of evaluating the learner by the course faculty at the institutional level.
- xv. End Semester Evaluation (ESE): The mechanism of evaluating the learner at the end of each semester.
- xvi. Audit Course: a course that the learner can register without earning credits, and is not mandatory for completing the SHC-UGP. The student has the option not to take part in the CCA and ESE of the Audit Course. If the student has 75% attendance in an Audit Course, he/she/they is eligible for a pass in that course, without any credit (zero-credit).
- xvii. Courses: refer to the papers which are taught and evaluated within a programme, which include lectures, tutorials, laboratory work, studio activity, field work, project work, vocational training, viva, seminars, term papers, presentations, assignments, self-study, group discussion, internship, etc., or a combination of some of these elements.
- xviii. Choice Based Credit System (CBCS) means the system wherein students have the option to select courses from the prescribed list of courses.
- xix. College-level Academic Committee: Is a committee constituted for the FYUGP at the college level comprising the Principal as the Chairperson, the Academic Co-ordinator/ Nodal Officer as its convenor.
- xx. Academic Co-ordinator/ Nodal Officer: A senior faculty member nominated by the college council.
- xxi. Course Faculty: A faculty member nominated by the Head of the Department shall be in charge of offering a particular course in a particular semester of FYUGP.
- xxii. Department means any teaching department in a college offering a course of study approved by the College as per the regulations of the college and it includes a Department, Centre, or School of Teaching and Research conducted directly by the College.
- xxiii. Board of Studies (BoS) means the academic body duly constituted to frame the syllabus of each department.

- xxiv. Senior Faculty Advisor (SFA) is a faculty nominated by a Department Council to co-ordinate all the necessary work related to FYUGP undertaken in that department, including the continuous comprehensive assessment.
- xxv. Department Council means the body of all teachers of a department in a college.
- xxvi. Faculty Adviser (FA) means a teacher from the parent department nominated by the Department Council to advise students in academic matters.
- xxvii. Graduate Attributes means the qualities and characteristics to be obtained by the graduates of a programme of study at the College, which include the learning outcomes related to the disciplinary areas in the chosen field of learning and generic learning outcomes. The College will specify graduate attributes for its programmes.
- xxviii. Programme means the entire duration of the educational process including the evaluation leading to the award of a degree.
- xxix. Programme Pathway: Combination of courses that can be chosen by a student that give options to pursue interesting and unconventional combinations of courses drawn from different disciplinary areas, like the sciences and the social sciences/ humanities. The pathways could be in terms of major- minor options with different complementary/ allied disciplines.
- xxx. Regulatory Body means University Grants Commission (UGC), All India Council for Technical Education (AICTE), National Assessment and Accreditation Council (NAAC) and National Board of Accreditation (NBA) etc.
- xxxi. Signature Courses: Signature courses are the specialized Discipline Specific Elective courses or skill-based courses designed and offered by the regular/ ad hoc/ visiting/ emeritus/ adjunct faculty member of a particular college with the prior recommendation of the BoS and the approval of Academic Council of the College.
- xxxii. Letter Grade or simply 'Grade' in a course is a letter symbol (O, A+, A, B+, B, C, P, F, and Ab). Grade shall mean the prescribed alphabetical grade awarded to a student based on their performance in various examinations. The Letter grade that corresponds to a range of CGPA.
- xxxiii. Grade Point: Each letter grade is assigned a 'Grade point' (G) which is an integer indicating the numerical equivalent of the broad level of performance of a student in each course. Grade Point means point given to a letter grade on 10-point scale.
- xxxiv. Semester Grade Point Average (SGPA) is the value obtained by dividing the sum of credit points obtained by a student in the various courses taken in a semester by the total number of credits in that semester. SGPA shall be rounded off to two decimal places. SGPA determines the overall performance of a student at the end of a semester.
- xxxv. Credit Point (P) of a course is the value obtained by multiplying the grade point (G) by the credit (C) of the course:  $P = G \times C$
- xxxvi. Cumulative Grade Point Average (CGPA) is the value obtained by dividing the sum of credit points in all the semesters earned by the student for the entire programme by the total number of credits in the entire programme and shall be rounded off to two decimal places.
- xxxvii. Grade Card means the printed record of students' performance, awarded to them.
- xxxviii. Words and expressions used and not defined in this regulation, but defined in the Mahatma Gandhi University Act and Statutes, being the Act and Statutes of Sacred Heart College (Autonomous)'s affiliating University shall have the meaning assigned to them in the Act and Statutes.

### **Features and Objectives of SHC-UGP**

The features and objectives of the SHC-UGP shall be:

- ii. The features, meaning, and purpose of FYUGP shall be as stipulated by the UGC and as adapted by the Kerala State Higher Education Curriculum Framework (KSHECF) for

- undergraduate education.
- i. The practice of lateral entry of students to various semesters exists, but an exit with a Degree shall be awarded only upon successful completion of 133 credits as per the conditions stipulated in this regulation.
  - ii. FYUGP shall have three Broad Pathways, (a) 3-year UG Degree, (b) 4-year UG Degree (Honours), and (c) 4-year UG Degree (Honours with Research).
  - iii. Students who choose to exit after 3 years shall be awarded UG Degree in their respective Discipline/ Disciplines after the successful completion of the required minimum Courses with 133 credits.
  - iv. A 4-year UG Degree (Honours) in the Discipline/ Disciplines shall be awarded to those who complete the FYUGP with a specific number of Courses with 177 credits including 8 credits from a graduate project/ dissertation in their major discipline.
  - v. Students who acquire minimum 75% in their graduation (up to 6th semester) are eligible for Honours with Research Programme. However, if necessary, College may conduct screening test for the honours with research programme in accordance with College Regulations from time to time.
  - vi. 4-year UG Degree (Honours with Research): Students who aspire to pursue research as a career may opt for 4-year UG Degree Honours with Research stream under FYUGP with a specific number of Courses with 177 credits including 12 credits from a research project in their major discipline.
  - vii. The recognized research departments or departments with at least two faculty members having PhD shall offer the Honours with Research programme. Minimum 2 students (mentees) should be allotted to a faculty member (Mentor).
  - viii. Students who have chosen the honours with research stream shall do their entire fourth year under the mentorship of a mentor.
  - ix. The mentor shall prescribe suitable advanced level/capstone level courses for a minimum of 20 credits to be taken within the institutions along with the courses on research methodology, research ethics, and research topic-specific courses for a minimum of 12 credits which may be obtained either within the institution or from other recognized institutions, including online and blended modes.
  - x. Students who have opted for the honours with research should successfully complete a research project under the guidance of the mentor and should submit a research report for evaluation. They need to defend successfully the research project to obtain 12 credits under a faculty member of the College. The research shall be in the Major/ allied discipline.
  - xi. The research outcomes of their project work may be published in peer-reviewed journals or presented at conferences or seminars or patented.
  - xii. The proposed FYUGP curriculum comprises Three Broad Parts: a) Foundation Components, b) Discipline Specific Pathway components (Major/ Minor), and c) Discipline Specific Capstone Components.
  - xiii. The Foundation component of the FYUGP shall consist of a Set of General Foundation Courses and a Set of Discipline Specific Foundation Courses.
  - xiv. General Foundation Courses shall be grouped into 4 major baskets as Ability Enhancement Courses (AEC), Skill Enhancement Courses (SEC), Value Addition Courses (VAC), and Multi-Disciplinary Courses (MDC).
  - xv. Ability Enhancement Courses shall be designed specifically to achieve competency in English, other languages as per the student's choice with special emphasis on language and communication skills.
  - xvi. English or other language courses shall be designed to enable the students to acquire and demonstrate the core linguistic skills, including critical reading, academic and expository



writing skills as well as the cultural and intellectual heritage of the language chosen. Separate courses will be designed for Science, Humanities and Commerce streams.

- xvii. Multi-Disciplinary Courses (MDC) shall be so designed as to enable the students to broaden their intellectual experience by understanding the conceptual foundations of Science, Social Sciences, Humanities, and Liberal Arts. Students shall not be eligible to take the MDC in the same discipline that they have studied during their +2. Third semester MDC can be Kerala specific content.
- xviii. Skill Enhancement Courses (SEC) shall be designed to enhance 21st century workplace skills such as creativity, critical thinking, communication, and collaboration.
- xix. Discipline Specific Courses shall include Discipline Specific Pathway Courses, both Major and Minor streams, enabling students to gain basic knowledge in the chosen discipline.
- xx. Discipline Specific Foundation Courses shall focus on foundational theories, concepts, perspectives, principles, methods, and critical thinking essential for taking up advanced/ Capstone Courses. Practical courses shall be included in discipline specific foundation courses.
- xxi. The curriculum of the SEC should be designed in a manner that at the end of year- 1, year-2, year-3, and year-4 students are able to meet the level descriptors for levels 5, 6, 7, and 8 of the UGC Guidelines on National Skills Qualifications Framework (NSQF). The detailed descriptors of the NSQF levels is provided as **Appendix I** below.
- xxii. Value Addition Courses (VAC) shall be so designed as to empower the students with personality development, perspective building, and self-awareness.
- xxiii. Discipline Specific Pathway Components (Major/ Minor) shall provide the students with an opportunity to pursue in-depth study of a particular subject or discipline and develop competency in that chosen area, which includes Discipline Specific Core (DSC) courses and Discipline Specific Elective (DSE) courses as Major and Minor courses.
- xxiv. Major components consist of three types: Discipline Specific Core or the Discipline Specific Elective Courses, and the research /laboratory/ fieldwork.
- xxv. Minor Courses can be selected from any discipline that may supplement or complement the Major Courses.
- xxvi. Students who complete a sufficient number of Courses in a discipline or an interdisciplinary area of study other than their chosen Major shall qualify for a Minor in that discipline or in a chosen interdisciplinary area of study.
- xxvii. Major Components shall be the main focus of study. By selecting a Major, the student shall be provided with an opportunity to pursue an in-depth study of a particular discipline.
- xxviii. Each Board of Studies (BoS) shall identify specific Courses or baskets of Courses towards Minor Course credits. Students shall have the option to choose Courses from disciplinary/ interdisciplinary minors and skill-based courses related to a chosen programme.
- xxix. Students can opt for a change of Major at the end of the second semester to any Minor discipline studied among the foundation level courses. Students also can opt for a change of Major at the end of the second semester to any MDC.
- xxx. Students should opt their 5th and 6th semester VAC and SEC from their Major disciplines only.
- xxxi. Course cum Credits Certificate: After the successful completion of a semester as proof for re-entry to another institution this certificate is essential. This will help the learner for preserving the credits in the Academic Bank of Credits.
- xxxii. The Advanced Level/ Capstone Level Courses shall be designed in such a manner as to enable students to demonstrate their cumulative knowledge in their main field of study, which shall include advanced thematic specialization or internships or community engagement or services, vocational or professional training, or other kinds of work experience.

- xxxiii. Advanced/ Capstone level Major Specialization shall include Courses focused on a specific area of study attached to a specific Major, which could be an Elective Course. They shall include research methodology as well.
- xxxiv. The student has the option to register for and attend a course without taking part in the CCA and ESE of that course. Such a course is called the Audit Course. If the student has 75% attendance in an Audit Course, he/she/they is/are eligible for a pass in that course, without any credit (zero-credit). The Audit Course will be recorded in the final grade card of the student.
- xxxv. All students shall undergo Summer Internship or Apprenticeship in a Firm, Industry or Organization; or Training in labs with faculty and researchers or other Higher Education Institutions (HEIs) or Research Institutions. The College will adhere to the guidelines on internship published by the University.
- xxxvi. Students will be provided the opportunities for internships with local industries, business organizations, agriculture, health and allied sectors, Local Government institutions (such as panchayats, municipalities), State Planning Board, State Councils/ Boards, Research Institutions, Research Labs, Library, elected representatives to the parliament/ state assembly/ panchayat, media organizations, artists, crafts persons etc. These opportunities will enable the students to actively engage with the practical aspects of their learning and to improve their employability.
- xxxvii. The College will provide opportunities for field-based learning/minor projects enabling them to understand the different socio-economic and development-related issues in rural and urban settings. The College will provide the students with opportunities for Community engagement and services, exposing them to socio-economic issues to facilitate theoretical learning in real-life contexts.
- xxxviii. Additional Credits will be awarded for those who actively participating in Social Activities, which may include participation in National Service Scheme (NSS), Sports and Games, Arts, participation in college union related activities (for respective elected/ nominated members), National Cadet Corps (NCC), adult education/ literacy initiatives, mentoring school students, and engaging in similar social service organizations that deemed appropriate to the College.
- xxxix. Grace marks shall be awarded to a student for meritorious achievements in co-curricular activities (in Sports/ Arts/ NSS/ NCC etc.). Such a benefit is applicable in the same academic year spreading over two semesters, in which the said meritorious achievements are earned. The Academic Council will decide from time to time the eligibility and other rules of awarding the grace marks.
  - xl. Options will be made available for students to earn credit by completing quality- assured remote learning modes, including Online programmes offered on the Study Webs of Active-Learning for Young Aspiring Minds (SWAYAM) or other Online Educational Platforms approved by the competent body/university from time to time.
  - xli. Students shall be entitled to gain credits from courses offered by other recognized institutions directly as well as through distance learning.
  - xlii. For the effective operation of the FYUGP, a system of flexible academic transaction timings shall be implemented for the students and teachers.

### **Eligibility for Admission and Reservation of Seats**

- i. The eligibility for admissions and reservation of seats for various FYUG Degree Programmes shall be in accordance with the norms/ rules made by the Government/ University from time to time.

- ii. No student shall be eligible for admission to FYUG Degree Programmes in any of the disciplines unless he/she/they have successfully completed the examination conducted by a Board/University at the +2 level of schooling or its equivalent.
- iii. Students shall be admitted and enrolled in the respective programmes solely based on the availability of the academic and physical facilities within the institution. The College shall provide all students with a brochure detailing the Courses offered by the various departments under the various Programmes and the number of seats sanctioned by the University for each Programme.
- iv. During the time of admission each student may be provided with a unique higher education student ID which may be linked with the Aadhar number of the student so that this ID can be transferred if required to other higher education institutions as well.
- v. The students at the end of second semester may be permitted to change their major programme of study to any course/ institution/ university across the state. Based on the availability of seats and other facilities, the students may be permitted to opt any discipline which he/she/they had studied during the first two semesters as Discipline Specific Foundation courses/ Multidisciplinary Foundation courses. If ranking is required, it will be in the order of the highest-grade points secured in the discipline to which the switching of Major is sought.
- vi. Students shall be allowed to change their major programmes, if required, to a maximum of 10% of the sanctioned strength of that particular programmes depending upon the academic and infrastructural facilities available in the Institution.
- vii. Depending upon the availability of academic and infrastructural facilities, the College may also admit a certain number of students who are registered for particular programmes in each semester by transfer method, if required, from other Institutions subject to conditions as may be issued by the University.
- viii. A student who has already successfully completed a First-Degree Programme and is desirous of and academically capable of pursuing another First-Degree Programme may also be admitted with the prior approval of the University as per the conditions regarding programme requirements specified by the University.
- ix. A Student can also be admitted for an additional major/ second major/ additional minor and on completion of the required credits he/she/they can be awarded a second major/ additional major/ minor. He/she/they may be exempted from minor pathway and general foundation course requirement.
- x. The College can also enrol students in certain courses as per their choice depending upon the availability of infrastructure and other academic facilities from other recognized HEIs who are already registered for a particular programme there either through regular/ online/ distance mode irrespective of the nature of programme (Govt./ Aided/ Self- finance/ Autonomous). On successful completion of the course the credits may be transferred through the Academic Bank of Credit.

### **Academic Monitoring and Student Support**

The academic monitoring and student support shall be in the following manner, namely

- i. The College shall appoint a Senior Faculty member as Academic Co-ordinator/ Nodal officer for the smooth conduct of FYUGP.
- ii. Advisory System: There shall be one Senior Faculty Advisor (SFA) for each department and one Faculty Advisor (FA) for 20 to 30 students of the class to provide advice in all relevant matters. The Head of the Department, in consultation with the SFA, shall assign FA for each student.

- iii. The documents regarding all academic activities of students in a class shall be kept under the custody of the FA/ SFA.
- iv. All requests/ applications from a student or parent to higher offices are to be forwarded/ recommended by FA/ SFA.
- v. Students shall first approach their FA/ SFA for all kinds of advice, clarifications, and permissions on academic matters.
- vi. It is the official responsibility of the institution to provide the required guidance, clarifications, and advice to the students and parents strictly based on the prevailing academic regulations.
- vii. The SFA shall arrange separate or combined meetings with FA, faculty members, parents, and students as and when required and discuss the academic progress of students.
- viii. The FA/ SFA shall also offer guidance and help to solve the issues on academic and non-academic matters, including personal issues of the students.
- ix. Regular advisory meetings shall be convened immediately after the commencement of the semester and immediately after announcing the marks of the Continuous Comprehensive Assessment (CCA).
- x. The CCA related results shall be displayed on the department notice board/ other official digital platforms of the college at least for two working days.
  - a. Any concern raised by the students regarding CCA shall be looked into in the combined meetings of advisors, HOD, course faculty, and the students concerned.
  - b. If the concerns are not resolved at the advisor's level, the same can be referred to the properly constituted college-level grievance redressal committees as per the existing UGC/ University/ Government norms.
  - c. The Principal/ HOD shall ensure the proper redressal of the concerns raised by the students regarding CCA.
  - d. If the students raise further concerns about the issue, the principal shall refer the issue to the appropriate authorities with proper documents and minutes of all the committees.
- xi. The FA/ SFA shall be the custodian of the minutes and action taken reports of the advisory meetings. The SFA shall get the minutes and action taken reports of advisory meetings approved by the Head of Department and the Principal.
- xii. The Principal shall inform/forward all regulations, guidelines, communications, announcements, etc. regarding student academic and other matters to the HODs/ SFA for information and timely action.
- xiii. It shall be the official responsibility of the Principal to extend the required administrative and financial support to the HODs, SFAs and FAs to arrange necessary orientation programmes for students regarding student counselling, the prevailing norms, regulations, guidelines and procedures on all academic and other related matters.
- xiv. An integrated educational planning and administration software will be made available by the College to manage the academic information of all students including student admissions and registration, managing students' personal and academic information, course registrations, attendance management, all process related to assessments including regular & online examinations, grading, publishing of results, supplementary examinations, LMS, stakeholders' feedback, etc.
- xv. Faculty, staff, students, and parents shall be allowed to access this software system over a highly secure authenticated mechanism from within the campus.

### **Course Registration**

- i. Each department shall publish well in advance the relevant details of courses offered, such as the name, academic level, expected outcomes, time slot, and course faculty members.

- ii. Students shall be allowed to visit and interact with respective faculty members during the first week of each semester, to gather more information about the courses and the availability of seats.
- iii. Based on consultations and advice from the faculty adviser, each student shall complete course registration within one week from the commencement of each semester.
- iv. The number of credits that a student can take in a semester is governed by the provisions in these Regulations, subject to a minimum of 16 and a maximum of 30 Credits.
- v. A student can opt out of a Course or Courses registered, subject to the minimum Credit/Course requirement, if he/she/they feels that he/she/they has registered for more Courses than he/she/they can handle, within 30 days from the commencement of the semester.
- vi. The college shall publish a list of the students registered for each course including audit course, if any, along with the chosen Programmes, repeat/ reappearance courses, if any.
- vii. The higher education institutions shall admit candidates not only for programmes, but also for courses.

### **Re-admission and Scheme Migration**

- i. Students who opt out before the completion of the third year shall be provided with a 'Course cum Credits Certificate' after the successful completion of a semester as proof for re-entry to another institution.
- ii. Students who have successfully completed a particular programme pathway may be permitted to take an additional minor or second major.
- iii. Those students who are opting for a second major are eligible for getting certain credit transfer/ credit exemption from their previous minor programs of study, subject to the prior recommendation of the BoS that, those credits are relevant for the present major programme of study.

### **Duration of Programme, Credits, Requirements and Options**

- i. Students will be offered the opportunity to take breaks during the programme and resume after the break, but the total duration for completing the FYUG programme shall not exceed 7 years.
- ii. Students who wish to complete the undergraduate programmes faster may do so by completing different courses equivalent to the required number of credits and fulfilling all other requirements in N-1 semesters, where N is the number of semesters in the FYUGP.
- iii. Provided further that the students may complete the undergraduate programme in slower pace, they may pursue the three years or six semester programme in 4 to 5 years (8 to 10 semesters), and four years, or eight semester programme in 5 to 6 years (10 to 12 semesters) without obtaining readmission.
- iv. For students who crossed 6 semesters at a slower space, the requirement of 16 credits per semester from the institutions where they enrolled may be relaxed.

### **Credit Structure**

The proposed number of credits per course and the credit distribution of them for the FYUG Programmes are given below:

- i. An academic year shall consist of 200 working days; one semester consists of 90 working days; and an academic year consists of two semesters.
- ii. Ten working days in a semester shall be used for extracurricular activities. One semester consists of 18 weeks with 5 working days per week. In each semester, 15 days (3 weeks) should be kept aside for End Semester Evaluation (ESE) and CCA.

- iii. The maximum number of available weeks for curriculum transactions should be fixed at 15 in each semester. A minimum of 5 teaching or tutorial hours could be made available for a day in a 5-day week.
- iv. A course that includes one hour of lecture/ tutorial or two hours of lab work/ practical work/ field work/ practicum per week is given one credit hour.
- v. One credit in a semester should be designed for 15 hours of lectures/ tutorials or 30 hours of lab work/ practical work/ field work/ practicum and 30 hours of learner engagement in terms of course-related activities such as seminar preparation, submitting assignments, etc.
- vi. A one-credit seminar or internship or studio activities or field work/ projects or community engagement and service will have two-hour engagements per week (30 hours of engagement per semester).
- vii. A course can have a combination of lecture credits, tutorial credits, and practicum credits.
- viii. Minimum credit for one Course should be 2 (Two), and the maximum credit should be 4 (Four).
- ix. All Discipline Specific Major/ Minor Courses shall be of 4 (Four) credits.
- x. For all Discipline Specific Major/ Minor Courses, there may be practical/ practicum of two or four hours per week.
- xi. All Courses under the Multi-Disciplinary, Ability Enhancement, Value Addition and Skill Enhancement categories are of 3 credits.
- xii. Summer Internship, Apprenticeship, Community outreach activities, etc. may require sixty hours (or as appropriate) of engagement for acquiring one credit.
- xiii. A student shall be able to opt for a certain number of extra credits over and above the requirements for the award of a degree.
- xiv. Maximum number of credits that a student can earn per semester shall be restricted to 30. Hence, a student shall have the option of acquiring credits to a maximum of 180 credits for a 6-semester UG programmes and 240 credits for a 4-year (8-semester) programmes.
- xv. Each faculty member shall offer a maximum of 16 credits per semester. However, those who are offering both practical and theory courses shall offer a maximum of 12-16 credits per semester.
- xvi. For a four-credit theory course, 60 hours of lecture/ tutorial class shall be assured as a mandatory requirement for the completion of that course.

### Course Structure of the SHC-UGP Programme

The SHC-UGP consists of the following categories of courses and the minimum credit requirements for pathway option-one shall be as follows;

Sl. No.	Categorization of Courses for all Programme	Minimum Number of Credit Required	
1.	Major	68	88
2.	Minor	24	24+12*
3.	Multi-Disciplinary Courses (MDC)	9	9
4.	Skill Enhancement Courses (SEC)	9	9
5.	Ability Enhancement Courses (AEC)	12	12
6.	Value Addition Courses (VAC)	9	9
7.	Summer Internship, field-based learning etc.	2	2
8.	Research Project/Dissertation		12/8**

- \* The students can acquire advanced/ capstone level courses with 12 credits from their DSC/ DSE/ Minor courses depending up on their pathway choice. The Minor courses can be of level 300 or above.
- \*\* The students pursuing the 4-year honours with research have to complete a project with 12 credits and for the 4-year honours degree students have to complete a project with 8 credits and DSC/ DSE capstone/ advanced level course in the 8th semester.
- i. 20% syllabus of each course will be prepared by the teacher as ‘Teacher Specific Content’ and will be evaluated under CCA.
- ii. In case of MDC, SEC, VAC courses coming under 3rd & 4th semester, college should make necessary arrangements to give adequate preference to courses designed by language departments. MDC in the 3rd semester can be Kerala Specific Content.

### Academic Levels of Pathway Courses

Semester	Difficulty level	Nature of Course
1 & 2	100-199	Foundation-level or introductory courses
3 & 4	200-299	Intermediate level courses
5 & 6	300-399	Higher level courses
7 & 8	400-499	Advanced/Capstone level courses

### Signature Courses

- i. With a prior recommendation of BoS and the approval of academic council, each faculty member can design and offer at least one signature course in every semester, which may be offered as DSE /SEC/ VAC.
- ii. The College will publish a list of signature courses in DSE/ SEC/ VAC offered by the faculty members with a prior recommendation of BoS and the approval of academic council.
- iii. The College may empanel distinguished individuals who have excelled in their field of specialization like science and technology, industry, commerce, social research, media, literature, fine arts, civil services etc. as adjunct faculty as per the UGC guidelines with the approval of the College. With a prior recommendation of BoS and the approval of academic council, the adjunct faculty can offer SEC/VAC as signature course.
- iv. Ad hoc/ Guest faculty/ Visiting faculty/ Visiting Scholars can also offer DSE/ SEC/ VAC as signature courses with a prior recommendation of BoS and the approval of academic council.
- v. The faculty concerned may design the particular course and it should be forwarded to the concerned BoS after the approval of the Academic Committees formed as part of this regulations.
- vi. The examinations and evaluation of the signature courses designed by the faculty shall be conducted by the faculty themselves and an external expert faculty chosen by the college from a panel of experts submitted by the faculty and recommend by the BoS concerned.

### Programme Pathways and Curriculum Structure

Students who have joined for any programme under these regulations shall have the option to choose the following pathways for their UG degree and Honours programme.

- i. **Degree with single Major:** A student pursuing the FYUG programme in a specific discipline shall be awarded a Major degree if he secures at least 50% of the total credits in the specific discipline required for the award of the Degree in that Discipline. Example: Physics Major/ Economics Major/ Commerce Major

- ii. **Degree Major with Minor:** If a student pursuing the FYUG Programme is awarded a Major Degree in a particular discipline, he/she/they are eligible to be awarded a Minor in another discipline of his choice, if he earns a minimum of 32 credits (approximately 25% of credit required for the three-year programme) from 8 pathway courses in that discipline. Example: Physics Major with Chemistry Minor/ Chemistry Major with English Minor/ Commerce Major with Economics Minor/ English Major with Functional English Minor/ Hindi Major with Malayalam Minor etc.
- iii. **Major with Multiple Disciplines of Study:** This pathway is recommended for students who wish to develop core competencies in multiple disciplines of study. In this case, the credits for the minor pathway shall be distributed among the constituent disciplines/ subjects. If a student pursuing FYUG Degree Programme is awarded a major Degree in a particular discipline, he/she/they are eligible to get mentioned his core competencies in other disciplines of his choice if he has earned 12 credits from the pathway courses of that discipline. Example: Physics Major with Minors in Chemistry and Mathematics, Economics Major with Minors in History and English, Commerce Major with Minors in Economics and Statistics.
- iv. **Interdisciplinary Major:** For these programme pathways, the credits for the major and minor pathways shall be distributed among the constituent disciplines/subjects to attain core competence in the interdisciplinary programme. Example: Econometrics Major, Global Studies Major, Biostatistics Major.
- v. **Multi-Disciplinary Major:** For multidisciplinary major pathways, the credits for the major and minor pathways will be distributed among the broad disciplines such as Life Sciences, Physical Sciences, Mathematical and Computer Sciences, Data Analysis, Social Sciences, Humanities, etc. Example: Life Science, Data Science, Nano Science.
- vi. **Degree with Double Major:** A student who secures a minimum of 50% credits from the first major will be awarded a second major in another discipline if he could secure 40% of credit from that discipline for the 3-year/ 4-year UG degree to be awarded a double major degree. Example: Physics and Chemistry Major, Economics and History Major, Economics and History Major, Commerce and Management Major. Economics and History Major, Commerce and Management Major.



**Pathway Option 1 - Degree Major or Major with Multiple Disciplines of Study**

Course Components	No. of Courses				Internship of 2 Credits	No. of Courses			Remarks	Semester	Semester	Total	
	1	2	3	4		5#	6#	7		8			
<b>DSCA</b> (4Credit/Course)	1(P)	1(P)	3( 2P)	3( 2P)		5	4	17	7Outof17canbeop tedasDSE	3	2	22	
<b>DSCB&amp;C</b> (4Credit/Course)	2(P)	2(P)	1(P) (B or C)	1(P) (C or B)				6			3		9
<b>Multidisciplinary Courses (MDC)(3Credit/C ourse)</b>	1(P)	1(P)	1*					3	*Recommended that the course offered be related to Indian Knowledge Systems or allied areas.				3
<b>Ability Enhancement Courses(AEC) (3Credit/Course)</b>	1 (English)1 (OL)	1 (English)1 (OL)						4					4
<b>Skill Enhancement Cours es(SEC) (3Credit/Course)</b>				1*		1**	1**	3	*Recommended that the course may be offered by the English Department **FromDSCAonly				3
<b>Value Addition Courses(VAC) (3Credit/Course)</b>			1*	1*			1**	3	*Recommended that one VAC be offered by the English Department and one by Other Languages Department **FromDSCAonly				3
<b>Project/Dissertation</b> 12creditsforHonourswithR esearch&8forHonours													12/8(1DSC /DSEfor Honours
<b>Total Courses</b>	<b>6</b>	<b>6</b>	<b>6</b>	<b>6</b>			<b>6</b>	<b>6</b>	<b>36</b>		<b>6</b>	<b>2+1</b>	
<b>Total Credits</b>	<b>21</b>	<b>21</b>	<b>22</b>	<b>22</b>	<b>2</b>	<b>23</b>	<b>22</b>		<b>Total Credits 133</b>	<b>24</b>	<b>20</b>	<b>Total Cr edits 177</b>	
<b>Total Hours per Week</b>	<b>25</b>	<b>25</b>	<b>25</b>	<b>25</b>		<b>25</b>	<b>25</b>		<b>Exit option available</b>	<b>25</b>	<b>25</b>		

#BoScaninclude2practicalcoursesin5<sup>th</sup>semesterand3practicalcoursesin6<sup>th</sup>semesterinanyofthe6coursesdistributedineachsemester.

**Pathway Option 2 - Major with Minor**

CourseComponents	No.ofCourses				Internshipof2Credits	No.ofCourses			Remarks	No.ofCourses		Total	
	Semester 1	Semester 2	Semester 3	Semester 4		Semester 5#	Semester 6#	Total		Semester 7	Semester 8		
<b>DSCA</b> (4Credit/Course)	1(P)	1(P)	3( 2P)	3( 2P)		4	3	15	7Outof15canbeop tedasDSE	3	2	20	
<b>DSCB</b> (4Credit/Course)	2(P)	2(P)	1(P)	1(P)		1	1	8	1Outof8canbe optedasDSE	3		11	
<b>MultidisciplinaryCours es(MDC)/</b> (3Credit/Course)	1(P)	1(P)	1*					3	*Recommended that the course offered be related to Indian Knowledge Systems or allied areas.			3	
<b>AbilityEnhancementCo urses(AEC)</b> (3Credit/Course)	1 (English)1 (OL)	1 (English)1 (OL)						4				4	
<b>SkillEnhancementCour ses(SEC)</b> (3Credit/Course)				1*		1**	1**	3	*Recommended that the course may be offered by the English Department ** From DSC A only			3	
<b>ValueAddition Courses(VAC)</b> (3Credit/Course)			1*	1*			1**	3	*Recommended that one VAC be offered by the English Department and one by Other Languages Department **FromDSCAonly			3	
<b>Project/Dissertation</b> 12creditsforHonourswithR esearch&8forHonours												<b>12/8(1DSC/ DSE forHono urs</b>	
<b>TotalCourses</b>	<b>6</b>	<b>6</b>	<b>6</b>	<b>6</b>			<b>6</b>	<b>6</b>	<b>36</b>		<b>6</b>	<b>2+1</b>	
<b>TotalCredits</b>	<b>21</b>	<b>21</b>	<b>22</b>	<b>22</b>	<b>2</b>	<b>23</b>	<b>22</b>		<b>TotalCredits133</b>	<b>24</b>	<b>20</b>	<b>Total Credits1 77</b>	
<b>TotalHoursperWeek</b>	<b>25</b>	<b>25</b>	<b>25</b>	<b>25</b>		<b>25</b>	<b>25</b>		<b>Exitoptionavailable</b>	<b>25</b>	<b>25</b>		

#BoScaninclude2practicalcoursesin5<sup>th</sup>semesterand3practicalcoursesin6<sup>th</sup>semesterinanyofthe6coursesdistributedineachsemester.

### Pathway Option 3 - Double Major

Course Components	No. of Courses											Total	
	Semester 1	Semester 2	Semester 3	Semester 4	Internship of 2 Credits	Semester 5#	Semester 6#	Total	Remarks	Semester 7	Semester 8		
<b>DSCA</b> (4 Credit/Course)	1(P)	1(P)	2(2P)	2(1P)			4	3	13	7 Out of 13 can be opted as DSE	3	2	18
<b>DSCB</b> (4 Credit/Course)	2(P)	2(P)	2(1P)	2(2P)			1	1	10	2 Out of 10 can be opted as DSE	3		13
<b>Multidisciplinary Courses (MDC)</b> (3 Credit/Course)	1(P)	1(P)	1*						3	*Recommended that the course offered be related to Indian Knowledge Systems or allied areas.			3
<b>Ability Enhancement Courses (AEC)</b> (3 Credit/Course)	1 (English)1 (OL)	1 (English)1 (OL)							4				4
<b>Skill Enhancement Courses (SEC)</b> (3 Credit/Course)				1*			1	1	3	*Recommended that the course may be offered by the English Department			3
<b>Value Addition Courses (VAC)</b> (3 Credit/Course)			1*	1*				1	3	*Recommended that one VAC be offered by the English Department and one by Other Languages Department			3
<b>Project/Dissertation</b> 12 credits for Honours with Research & 8 for Honours												<b>12/8(1 DSC/DSE for Honours)</b>	
<b>Total Courses</b>	<b>6</b>	<b>6</b>	<b>6</b>	<b>6</b>		<b>6</b>	<b>6</b>	<b>36</b>		<b>6</b>	<b>2+1</b>		
<b>Total Credits</b>	<b>21</b>	<b>21</b>	<b>22</b>	<b>22</b>	<b>2</b>	<b>23</b>	<b>22</b>		<b>Total Credits 133</b>	<b>24</b>	<b>20</b>	<b>Total Credits 177</b>	
<b>Total Hours per Week</b>	<b>25</b>	<b>25</b>	<b>25</b>	<b>25</b>		<b>25</b>	<b>25</b>		<b>Exit option available</b>	<b>25</b>	<b>25</b>		

#BoScan include 2 practical courses in 5<sup>th</sup> semester and 3 practical courses in 6<sup>th</sup> semester in any of the 6 courses distributed in each semester.

Note: In all the above 3 tables "(P)" means courses with practical

### Course Structure of Various Pathways based on Credit Requirements

The FYUG Programmes consist of the following categories of courses and the minimum credit requirements for each of them shall be as follows:

**Table 1: FYUGP Course Structure – Major with Minors**

Sl. No.	Categorization of courses for all Programmes	Minimum number of credits required	
		3-year UG	4-year UG
1	Major	68	88
2	Minor/ Minors	24	24+12*
3	Multi-disciplinary Courses (MDC)	9	9
4	Skill Enhancement Courses (SEC)	9	9
5	Ability Enhancement Course (AEC)	12	12
6	Value Addition Courses (VAC)	9	9
7	Summer Internship, field-based learning etc.	2	2
8	Project / Dissertation		12**
	<b>Total Credits</b>	<b>133</b>	<b>177</b>

\* Students can acquire 12 credits from their DSC/ DSE- Minor courses (300-399 level) depending upon their pathway choice.

\*\* Students pursuing a four-year Honours degree are required to complete an 8-credit project as well as one capstone course from their chosen pathway, either DSC or DSE (400-499 level).

**Table 2: FYUGP Course Structure – Double Major**

Sl. No.	Categorization of courses for all Programmes	Minimum number of credits required	
		3-year UG	4-year UG
1	First Major	52	72
2	Second Major	40	52
3	Multi-disciplinary Courses (MDC)	9	9
4	Skill Enhancement Courses (SEC)	9	9
5	Ability Enhancement Course (AEC)	12	12
6	Value Addition Courses (VAC)	9	9
7	Summer Internship, field-based learning etc.	2	2
8	Project/(8 Credit project + 1 capstone course)		12
	<b>Total Credits</b>	<b>133</b>	<b>177</b>

**Table 3: FYUGP Course Structure – Multidisciplinary**

<b>Sl. No.</b>	<b>Categorization of courses for all Programmes</b>	<b>Minimum number of credits required</b>	
		<b>3-year UG</b>	<b>4-year UG</b>
1	Multidisciplinary Major	52	72
2	Multidisciplinary Minors	40	52
3	Multi-disciplinary Courses (MDC)	9	9
4	Skill Enhancement Courses (SEC)	9	9
5	Ability Enhancement Course (AEC)	12	12
6	Value Addition Courses (VAC)	9	9
7	Summer Internship, field-based learning etc.	2	2
8	Project / (8 Credit project + 1 capstone course)		12
	<b>Total Credits</b>	<b>133</b>	<b>177</b>

## **Guidelines for Acquiring Credit from Other Institutions/Online/Distance Mode**

- i. A student shall register to a minimum of 16 credit per semester from the college/ department where he/she/they officially admitted for a particular programme. However, students enrolled for a particular programme in one institution can simultaneously enrol for additional credits from other HEIs within the University or outside University subject to a maximum of 30 credits per semester including the 16 institutional credits.
- ii. The College shall publish a list of courses that are open for admission for students from other institutions well in advance before the commencement of each semester.
- iii. Each BoS shall prepare and publish a list of online courses at different levels before the commencement of each semester offered in various online educational platforms recognized by the Academic Council of the college, which can be opted by the students for acquiring additional credits.
- iv. BoS shall prepare and publish a list of allied/ relevant pathway courses before the commencement of each semester offered by other Board of Studies that can be considered as pathway course for major/ minor for their disciplines at different levels.
- v. At the end of each semester the college will include the credit acquired by the student through online courses in their semester grade card subject to a maximum of 30 credits.

## **Attendance**

- i. A student shall be permitted to register for the end-semester evaluation of a specific course to acquire the credits only if he has completed 75% of the prescribed classroom activities in physical, online, or blended modes, including any makeup activities as specified by the course faculty of that particular course.
- ii. A student is eligible for attendance as per the existing university and government orders which includes participation in a meeting, or events organized by the college or the university, a regularly scheduled curricular or extracurricular activity prescribed by the college or the university. Due to unavoidable or other legitimate circumstances such as illness, injury, family emergency, care-related responsibilities, bad or severe weather conditions, academic or career-related interviews students are eligible for authorized absence. Apart from this, all other eligible leaves such as maternity leave, and menstrual leave shall also be treated as authorized absences.
- iii. The condonation facility can be availed as per the university norms.

## **Workload**

- i. The workload of a faculty who offers only lecture courses during an academic year shall be 32 credits.
- ii. The workload of a faculty offering both practical courses and theory courses may be between 24-32 credits per academic year.
- iii. An academic year shall consist of two semesters.
- iv. To protect the existing language workload, college should make necessary arrangements to give adequate preference to those courses designed by language departments coming under MDC, SEC and VAC of 3rd & 4th semester. It is recommended that the MDC offered in the third semester shall be based on Indian Knowledge Systems or Nation-specific topics and may be offered by the Other Languages department or any other department as may be seen fit. Additionally, the SEC in the fourth semester may be offered by the English Department and of the VACs in the third and fourth semesters, one may be offered by the Other Languages Department and the other may be offered by the English Department. These recommendations may be modified as per the recommendations of the SHC-UGP Academic Monitoring Committee.

- v. Programme wise workload calculation will be as per the FYUGP workload ordinance 2024.
- vi. The teachers given the administrative responsibilities in the department and college level may give a relaxation in their work load as specified in the UGC regulations 2018.

### **Credit Transfer and Credit Accumulation**

- i. The college will establish a digital storage (DIGILOCKER) of academic credits for the credit accumulation and transfer in line with ABC.
- ii. The validity of credits earned shall be for a maximum period of seven (7) years or as specified in the university/ UGC regulations. The students shall be required to earn at least 50% of the credits from the College.
- iii. Students shall be required to earn the required number of credits as per any of the pathway structure specified in this regulation for the award of the degree.

### **Outcome Based Approach**

The curriculum will be designed based on Outcome Based Education (OBE) practices. The Graduate Attributes (GA) and Programme Outcomes (PO) will be defined and specified in the syllabus of each programme.

### **Assessment and Evaluation**

- i. The assessment shall be a combination of Continuous Comprehensive Assessment (CCA) and an End Semester Evaluation (ESE).
- ii. 30% weightage shall be given for CCA. The remaining 70% weight shall be for the ESE.
- iii. Teacher Specific Content will be evaluated under CCA.
- iv. CCA will have two subcomponents Formative Assessment (FA) and Summative Assessment (SA). Each of these components will have equal weightage and to be conducted by the course faculty/ course coordinator offering the course.
- v. FA refers to a wide variety of methods that teachers use to conduct in-process evaluations of student comprehension, learning needs, and academic progress during a lesson, unit, module or course. FA is to encourage students to build on their strengths rather than fixate or dwell on their deficits. FA can help to clarify and calibrate learning expectations for both students. FA will help students become more aware of their learning needs, strengths, and interests so they can take greater responsibility over their own educational growth. FA will be prerogative of the course faculty/ course coordinator based on specific requirement of the student.
- vi. Suggestive methods of FA are as follows: (anyone or in combinations as decided by the course faculty/ course coordinator)
  - a. Practical assignment
  - b. Observation of practical skills
  - c. Viva voce
  - d. Quiz
  - e. Interview
  - f. Oral presentations
  - g. Computerized adaptive testing
  - h. In-class discussions
  - i. Group tutorial work

- j. Reflection writing assignments
  - k. Home assignments
  - l. Self and peer Assessments
  - m. Any other method as may be required for specific course/ student by the course faculty/ course coordinator.
- vii. Summative Assessments (SA) are used to evaluate student learning, skill acquisition, and academic achievement at the conclusion of a defined instructional period- typically at the end of a project, unit, module, course or semester. SA may be a class tests, assignments, or project, used to determine whether students have learned what they were expected to learn. It will be based on evidence, collected using single or multiple ways of assessment. The systematically collected evidences should be kept in record by course faculty/ course coordinator and the marks should be displayed on the college notice board/ other official digital platforms of the college before the end semester examinations.
- viii. The method of SA will be as follows: (any one as decided by the course faculty/ course coordinator)
- a. Written test
  - b. Open book test
  - c. Laboratory report
  - d. Problem based assignments
  - e. Individual project report
  - f. Case study report
  - g. Team project report
  - h. Literature survey
  - i. Standardized test
  - j. Any other pedagogic approach specifically designed for a particular course by the course faculty/ course coordinator.
- ix. A student may repeat SA only if for any compulsive reason due to which the student could not attend the assessment.
- x. The prerogative of arranging a CCA lies with the course faculty/ course coordinator with the approval of SHC-UGP Academic Committee based on justified reasons.
- xi. The course faculty/ course coordinator shall be responsible for evaluating all the components of CCA. However, the college may involve any other person (External or Internal) for evaluation of any or all the components as decided by the Principal/Controller of Examinations from time to time in case any grievances are raised.
- xii. Written tests shall be precisely designed using a variety of tools and processes (e.g., constructed responses, open-ended items, multiple-choice), and the students should be informed about the evaluation modalities before the commencement of the course.
- xiii. The course faculty may provide options for students to improve their performance through continuous assessment mechanism.
- xiv. There shall be theory and practical examinations at the end of each semester.
- xv. Regarding evaluation, one credit may be evaluated for 25 marks in a semester; thus, a 4-credit course will be evaluated for 100 marks; 3-credit courses for 75 marks and 2-credit courses for 50 marks.
- xvi. All examinations will be conducted by the College and will be evaluated at the College itself.
- xvii. Individual Learning Plans (ILPs) and/ or specific assessment arrangements may be put in place for differently abled students. Suitable evaluation strategies including technology assisted examinations/ alternate examination strategies will be designed and implemented for differently abled students.



## Practical Examination

- i. The end semester practical examination will be conducted and evaluated by the institution.
- ii. There shall be a CCA for practical courses conducted by the course faculty/ course coordinator.
- iii. The scheme of evaluation of practical courses will be as given below:

ComponentsfortheEvaluationofPracticalCourses	Weighttag e
CCAofpractical/practicum.	30%
ESEof practical/practicum.	70%

- iv. Those who have completed the CCA alone will be permitted to appear for the ESE.
- v. For grievance redressal purpose, the university shall have the right to call for all the records of CCA.
- vi. Duration of Examination: Questions shall be set as per the defined Outcome. The duration of the examinations shall be as follows.

Mode	Time(inHours)
WrittenExamination	2
MultipleChoice	1.5
OpenBook	2
AnyOtherMode	2

## Evaluation of Project/Dissertation

The evaluation of project work shall be CCA with 30% and ESE 70%. The scheme of evaluation of the Project is given below:

Projecttype	MaximumMarks	CCA	ESE
ResearchProjectofHonourswith Research (12credits)	200	60	140
ProjectofHonours (8credits)	100	30	70

## Evaluation of Internship

The evaluation of internship shall be done by a committee constituted by the Department Council. The scheme of CCA and ESE is given below:

ComponentsofEvaluationofInternshi p	Weightage	MarksforInternship2Cred its/50Marks
CCA	30%	15
ESE	70%	35

The department council may decide any mode for the completion of the Internship. If in case evaluation is not specified in any of the selected internship programme, institution can adopt a proper evaluation method as per the weightage specified in the table above.

## Letter Grades and Grade Points

Mark system is followed for evaluating each question. For each course in the semester, letter grade and grade point are introduced in 10-point indirect grading system as per guidelines given below,

- i. The Semester Grade Point Average (SGPA) is computed from the grades as a measure of the student's performance in a given semester. The SGPA is based on the grades of the current term, while the Cumulative Grade Point Average (CGPA) is based on the grades in all courses taken after joining the programme of study.
- ii. Based on the marks obtained, the weighted grade point will be mentioned in the student's grade cards.

LetterGrade	Grade Point	PercentageofMarks(Both Internal&ExternalMarksputtogether)	Class
O(Outstanding)	10	95%andabove	FirstClasswithDistinction
A+(Excellent)	9	85%and above butbelow95%	
A(Verygood)	8	75%and above butbelow85%	
B+(Good)	7	65% and above butbelow75%	FirstClass
B(Above average)	6	55%and above butbelow65%	
C(Average)	5	45%and above butbelow55%	SecondClass
P(Pass)	4	35%and abovebelow45%Aggregate(externalandinternalputtogether)withaminimumof 30%inexternal	ThirdClass
F(Fail)	0	Belowanaggregateof35%or below30%inexternalevaluation	Fail
Ab(Absent)	0		Fail

- iii. When students take audit courses, they may be given pass (P) or fail (F) grade without any credits.

### Computation of SGPA and CGPA

The following method is recommended to compute the Semester Grade Point Average (SGPA) and Cumulative Grade Point Average (CGPA):

- iv. The SGPA is the ratio of the sum of the product of the number of credits with the grade points scored by a student in all the courses taken by a student and the sum of the number of credits of all the courses undergone by a student in the semester, i.e.

$$\text{SGPA (Si)} = \frac{\sum(C_i \times G_i)}{\sum C_i}$$

Where  $S_i$  is the SGPA in the  $i^{\text{th}}$  semester,  $C_i$  is the number of credits of the  $i^{\text{th}}$  course and  $G_i$  is the grade point scored by the student in the  $i^{\text{th}}$  course.

$$\text{SGPA} = \frac{\text{Sum of the credit points of all courses in a semester}}{\text{Total Credits in that Semester}}$$

### Illustration – Computation of SGPA

Semester	Course	Credit	Letter Grade	Grade point	CreditPoint (CreditxGrade)
I	DSCA	4	A	8	4x8=32

I	DSCB	4	B+	7	4x7=28
I	DSCC	4	B	6	4x6=24
I	MDC	3	B	6	3x6=18
I	AEC1	3	O	10	3x10=30
I	AEC2	3	C	5	3x5=15
	Total	21			147
	SGPA				147/21=7

The CGPA is also calculated in the same manner considering all the courses undergone by a student over all the semesters of a programme, i.e.

$$\text{CGPA} = \frac{\text{Sum of the credit points of all courses in six or eight semesters}}{\text{Total Credits in Six (133) or Eight (177) semesters}}$$

- v. The SGPA and CGPA shall be rounded off to 2 decimal points and reported in the transcripts.

### Implementation and Monitoring of SHC-UGP

1. The implementation and monitoring of SHC-UGP will be carried out by duly appointed bodies/committees of the college such as the Academic Council, the various Boards of Studies and the Academic Monitoring Committee.

#### 2. Academic Council

Among its other functions, the Academic Council of the College shall:

- xl.iii. Scrutinize and approve all the proposals submitted by the Board of Studies of each Department with regard to the SHC-UGP details such as, academic pathways, allowed syllabi enrichment/ updating, details of elective courses, Online courses, blended teaching, courses offering to the students of other HEIs, panel of examiners, summative and formative evaluation tools proposed by the course faculty concerned, new courses and syllabus proposed by the faculty members as signature courses etc.
- xliv. The Academic Council can differ on any proposal and it shall have the right to return the matter for reconsideration to the Board of Studies concerned or reject it, after giving sufficient reasons to do so.
- xlv. Undertake the scrutiny of all documents related to Teacher Specific Content.
- xlvi. Recommend to the College Governing Council for starting innovative programmes using the flexibility and holistic nature of the SHC-UGP curriculum frame work.

#### 3. Board of Studies

Among its other functions, the Board of Studies of each Department shall:

- i. Prepare teacher specific content of syllabi for various courses keeping in view the objectives of the SHC-UGP and submit the same for the approval of the Academic Council.
- ii. Scrutinize the signature course content and its evaluation techniques.
- iii. Suggest methodologies for innovative teaching and evaluation techniques.
- iv. Suggest panel of examiners to the Office of the Controller of Examinations.
- v. Coordinate research, teaching, extension and other academic activities in the department.

#### **4. SHC-UGP Academic Monitoring Committee**

The SHC-UGP Academic Monitoring Committee shall be constituted under the Chairmanship of the Principal, with the Academic Coordinator as the Convenor, shall be entrusted to oversee the implementation and monitoring of the SHC-UG programme.

- i. The Academic Monitoring Committee will collect and whet the proposals submitted by the Board of Studies of each Department with regard to the SHC-UGP and duly forward them to the Academic Council.
- ii. It will oversee and coordinate the activities undertaken for the successful implementation of SHC-UGP in the College and will function as an advisory body in such matters.

#### **Power to Remove Difficulties**

If any difficulty arises in giving effect to the provisions of these Regulations, the Principal may by order make such provisions which appears to him/her to be necessary or expedient for removing the difficulty. Every order made under this rule shall be subject to ratification by the appropriate authorities.

#### **Modifications to the Regulations**

Notwithstanding anything contained in these Regulations, any amendments or modifications issued or notified by the University Grants Commission or the State Government or the Mahatma Gandhi University from time to time, shall be incorporated into these Regulations by the appropriate regulatory bodies of the College and shall constitute an integral part thereof.

**PROPOSED PATHWAY FOR ANIMATION AND GRAPHIC DESIGN (DOUBLE MAJOR)  
SEMESTER-WISE COURSE DISTRIBUTION PER WEEK**

SEM	COURSES	COURSE CODE	COURSE NAME	Course Stream	Level	CREDIT	HRS/WEEK		
							L	T	P
I	DSC-A-01	24UAGDDSC101	Design Foundation	Design	100-199	4	2	1	2
	DSC-B-01	24UAGDDSC102	Fundamentals of Animation Drawing	Animation	100-199	4	0	3	2
	DSC-B-02	24UAGDDSC103	Art Through the Ages	Animation	100-199	4	2	1	2
	AEC-ENG-01		English I		100-199	3	3		0
	AEC-OL-01		Language I		100-199	3	3		0
	MDC-01	24UAGDMDC101	MDC - I		100-199	3	0	2	2
						<b>21</b>	<b>10</b>	<b>7</b>	<b>8</b>
II	DSC-A-02	24UAGDDSC104	Colour in Art & Design	Design	100-199	4	1	2	2
	DSC-B-03	24UAGDDSC105	Advanced Drawing for Animation	Animation	100-199	4	0	3	2
	DSC-B-04	24UAGDDSC106	Introduction to 3D	Animation	100-199	4	0	3	2
	AEC-ENG-02		English II		100-199	3	3		0
	AEC-OL-02		Language II		100-199	3	3		0
	MDC-02	24UAGDMDC102	MDC - II		100-199	3	0	2	2
						<b>21</b>	<b>7</b>	<b>10</b>	<b>8</b>
III	DSC-A-03	24UAGDDSC201	Typography	Design	200-299	4	0	4	0
	DSC-A-04	24UAGDDSC202	Design Studio	Design	200-299	4	0	3	2
	DSC-B-06	24UAGDDSC203	Classical Animation	Animation	200-299	4	0	3	2
	DSC-B-05	24UAGDDSC204	Story, Script and Storyboard	Animation	200-299	4	0	4	0
	MDC-03	24UAGDMDC103	MDC - III		200-299	3	0	2	2
	VAC-01	24UAGDVAC201	Yoga and Fitness	Design	200-299	3	2	1	0
							<b>22</b>	<b>2</b>	<b>17</b>
IV	DSC-A-05	24UAGDDSC205	User Interface Design	Design	200-299	4	0	4	0
	DSC-A-06	24UAGDDSC206	Brand Identity Design	Design	200-299	4	0	3	2
	DSC-B-07	24UAGDDSC207	Stop Motion Animation	Animation	200-299	4	0	3	2
	DSC-B-08	24UAGDDSC208	3D Character Arts	Animation	200-299	4	0	4	0
	VAC-02	24UAGDVAC202	Digital Drawing and Animation	Animation	200-299	3	0	2	2
	SEC-01	24UAGDSEC201	Design Thinking	Design	200-299	3	2	1	0
							<b>22</b>	<b>2</b>	<b>17</b>
<b>INTERNSHIP</b>						<b>2</b>			
V	DSC-A-07	24UAGDDSC301	Web Design	Design	300-399	4	0	3	2
	DSC-A-08	24UAGDDSC302	Package Design	Design	300-399	4	0	3	2
	DSC-A-09	24UAGDDSE301	Digital Illustration	Design	300-399	4	0	4	0
		24UAGDDSE302	Information Design						
	DSC-A-10	24UAGDDSE303	Publication Design	Design	300-399	4	0	4	0
		24UAGDDSE304	Art of Grid and Layout						
	DSC-B-09	24UAGDDSE305	3D Character Animation for Films	Animation	300-399	4	0	4	0
		24UAGDDSE306	3D Sculpting Techniques for Animation						
		24UAGDDSE307	Advanced 2D Animation						
	SEC-02	24UAGDSEC301	Calligraphy	Design	300-399	3	0	3	0
						<b>23</b>	<b>0</b>	<b>21</b>	<b>4</b>
VI	DSC-A-11	24UAGDDSC303	Motion Graphics & Compositing	Design	300-399	4	0	3	2
	DSC-A-12	24UAGDDSC304	Design Project	Design	300-399	4	0	3	2
	DSC-A-13	24UAGDDSE308	Techniques of Promotional Design	Design	300-399	4	0	4	0
		24UAGDDSE309	Research Methodology for Media Arts						
	DSC-B-10	24UAGDDSC305	Animated Short Film	Animation	300-399	4	0	3	2
	VAC-03	24UAGDVAC301	Start-up and Business management	Design	300-399	3	2	1	0
	SEC-03	24UAGDSEC302	Portfolio	Design	300-399	3	0	3	0
						<b>22</b>	<b>2</b>	<b>17</b>	<b>6</b>
<b>EXIT AFTER 3 YEARS - 133 CREDITS</b>									

FOURTH YEAR										
VII	DSC-A-14	24UAGDDSE401	Advanced Typography	Design	400-499	4	0	3	2	
		24UAGDDSE402	Advertising Design with Digital Marketing							
	DSC-A-15	24UAGDDSE403	Content Management System	Design	400-499	4	0	4	0	
		24UAGDDSE404	Interaction Design							
	DSC-A-16	24UAGDDSE405	Digital Painting	Design	400-499	4	0	4	0	
		24UAGDDSE406	User Experience Design							
	DSC-B-11	24UAGDDSC401	3D Advanced Modelling and Texturing	Animation	400-499	4	0	4	0	
	DSC-B-12	24UAGDDSC402	3D Effects and Dynamics	Animation	400-499	4	0	4	0	
DSC-B-13	24UAGDDSE407	Digital Storyboarding	Animation	400-499	4	0	4	0		
	24UAGDDSE408	2D Digital Animation								
						<b>24</b>	<b>0</b>	<b>23</b>	<b>2</b>	
VIII	DSC-A-17	24UAGDDSC403	Printing and Publishing	Design	400-499	4	0	3	2	
	DSC-A-18	24UAGDDSE409	Advanced Motion Graphics and Composition	Design	400-499	4	0	3	2	
		24UAGDDSE410	Introduction to Meta verse Space Design							
	Proj/Diss	<b>PROJECT</b>	<b>Project/ Dissertation</b>		<b>PRJ</b>		<b>12/8+4</b>			<b>15</b>
		<b>PROJECT</b>	<b>Project</b> (or) <i>with any one of the below Capstone</i>							
		24UAGDDSE411	AR and VR with 3D							
		24UAGDDSE412	AI Assisted Animation							
		24UAGDDSE413	Modelling for 3D Printing							
	24UAGDDSE414	Dynamic Web Development				<b>8</b>	<b>0</b>	<b>6</b>	<b>19</b>	
<b>UG HONOURS DEGREE AND UG HONOURS DEGREE WITH RESEARCH - 177 CREDITS</b>										

## 1. Discipline Specific Courses

SEM	SI NO	COURSE CODE	COURSE NAME	Course Stream	Level	CREDIT	HRS/WEEK		
							L	T	P
I	1	24UAGDDSC101	Design Foundation	Design	100-199	4	2	1	2
	2	24UAGDDSC102	Fundamentals of Animation Drawing	Animation	100-199	4	0	3	2
	3	24UAGDDSC103	Art Through the Ages	Animation	100-199	4	2	1	2
II	4	24UAGDDSC104	Colour in Art & Design	Design	100-199	4	1	2	2
	5	24UAGDDSC105	Advanced Drawing for Animation	Animation	100-199	4	0	3	2
	6	24UAGDDSC106	Introduction to 3D	Animation	100-199	4	0	3	2
III	7	24UAGDDSC201	Typography	Design	200-299	4	0	4	0
	8	24UAGDDSC202	Design Studio	Design	200-299	4	0	3	2
	9	24UAGDDSC203	Classical Animation	Animation	200-299	4	0	3	2
	10	24UAGDDSC204	Story, Script and Storyboard	Animation	200-299	4	0	4	0
IV	11	24UAGDDSC205	User Interface Design	Design	200-299	4	0	4	0
	12	24UAGDDSC206	Brand Identity Design	Design	200-299	4	0	3	2
	13	24UAGDDSC207	Stop Motion Animation	Animation	200-299	4	0	3	2
	14	24UAGDDSC208	3D Character Arts	Animation	200-299	4	0	4	0
V	15	24UAGDDSC301	Web Design	Design	300-399	4	0	3	2
	16	24UAGDDSC302	Package Design	Design	300-399	4	0	3	2
VI	17	24UAGDDSC303	Motion Graphics & Compositing	Design	300-399	4	0	3	2
	18	24UAGDDSC304	Design Project	Design	300-399	4	0	3	2
	19	24UAGDDSC305	Animated Short Film	Animation	300-399	4	0	3	2
VII	20	24UAGDDSC401	3D Advanced Modelling and Texturing	Animation	400-499	4	0	4	0
	21	24UAGDDSC402	3D Effects and Dynamics	Animation	400-499	4	0	4	0
VIII	22	24UAGDDSC403	Printing and Publishing	Design	400-499	4	0	3	2

## Course 01

<b>Course Code</b>	<b>24UAGDDSC101</b>
<b>Discipline</b>	<b>Design</b>
<b>Course Title</b>	<b>Design Foundation</b>
<b>Type of Course</b>	<b>Discipline Specific Course</b>
<b>Course Level</b>	<b>100-199</b>
<b>Lecture/Tutorial/Practical Hours</b>	<b>30/15/30</b>
<b>Credits</b>	<b>4</b>
<b>Course Description:</b>	
This course provides a comprehensive exploration of the fundamental elements and principles of graphic design, equipping undergraduate students with the knowledge and skills necessary to create visually compelling and effective designs. Through theoretical discussions, practical exercises, and hands-on projects, students will develop a solid foundation in design communication.	

## COURSE OUTCOMES (CO)

<b>CO No.</b>	<b>Expected Course Outcome</b>	<b>Learning Domains *</b>	<b>PO's</b>
1	Explain the fundamental elements, principles of graphic design	Understand	PO1, PO7, PO8
2	Apply design principles and techniques in practice	Apply	PO1, PO2, PO3, PO7, PO8
3	Develop visual literacy and aesthetics	Create	PO1, PO2, PO5, PO7, PO8
4	Develop visual problem-solving skills	Create	PO1, PO2, PO5, PO7, PO8

## COURSE CONTENT

<b>Module</b>	<b>Units</b>	<b>Description</b>	<b>Hours</b>	<b>CO No.</b>
<b>1</b>	<b>Elements of Design</b>		<b>16</b>	<b>1</b>
	<b>1.1</b>	Introduction to the design industry, historical context, and significance of visual communication, impact of visual society	3	
	<b>1.2</b>	Point: Basic element of design – zero dimensional -Line: line direction and meanings - quality of lines -implied lines and line of forces	2	
	<b>1.3</b>	Shape vs Form: Organic shape and geometric shapes- nonrepresentational shape and representational shape- relationship with 2d shape and 3d forms - Form follows function	2	
	<b>1.4</b>	Texture: Surface quality, textures from nature, Space: Negative space and positive space	2	
	<b>1.5</b>	Colour: systems/modes and categories, colour psychology in general, Values	5	
	<b>1.6</b>	Typography as an effective element of communication	2	
<b>2</b>	<b>Principles of Design</b>		<b>14</b>	<b>2</b>
	<b>2.1</b>	Introduction to Principles of Design: Balance – Symmetry, Asymmetry and Radial balances	3	
	<b>2.2</b>	Contrast, Emphasis, Rhythm vs Movement	2	
	<b>2.3</b>	Unity, Harmony vs Variety - Pattern vs Repetition - Proportion vs Unity	3	
	<b>2.4</b>	Hierarchy: Order in Design	2	



	2.5	Gestalt's Laws of Visual Perception: Similarity vs Anomaly, Closure, Proximity, Figure vs Ground.	4	
3	<b>Introduction and Basics Techniques of Camera</b>		<b>20</b>	3
	3.1	Introduction to Photography: Types of cameras (DSLR, mirrorless, smartphone) - Explanation of basic camera components and their functions (lens, sensor, shutter, aperture)	2	
	3.2	Understanding Exposure: Explanation of the exposure triangle (aperture, shutter speed, ISO) - How each exposure parameter affects the final image - Hands-on exercises to demonstrate the concept of exposure	1	
	3.3	Focus and Depth of Field : Understanding autofocus and manual focus modes - Exploring depth of field and its creative implications - Practice exercises to achieve precise focus and control depth of field	3	
	3.4	Composition Techniques: Introduction to composition rules (rule of thirds, leading lines, framing) - Using composition to create visually appealing images	3	
	3.5	Introduction to Lighting : Understanding natural and artificial light sources - Overview of lighting techniques (front lighting, backlighting, side lighting)	8	
4	<b>Visual Compositional Techniques</b>		<b>25</b>	4
	4.1	Mathematical ratios and proportional systems: Fibonacci numbers, The Golden Ratio, Golden Mean, Reading Patterns: z pattern and F pattern	5	
	4.2	Rule of Thirds and its application in composition, Perspectives and foreshortening	5	
	4.3	Design Creation Techniques: Tessellation, abstraction, silhouetting, metamorphosis, high-low key, illusion creation, Grid anatomy and types - functions	6	
	4.4	Creative Process and Ideation: Defining design problems, ideation, concept development, and iteration. Logo: Types and Functions	5	
	4.5	Generating Ideas: Brainstorming techniques, mind mapping, and mood boards - nurture the critique eye. Design Development: Refining concepts, sketching and design rendering	4	
	4.6	Implementation: Translating Ideas into tangible designs		
5	<b>Teacher Specific Content</b>			

<b>Teaching and Learning Approach</b>
<b>Classroom Procedure (Mode of transaction)</b> Interactive lectures, <b>Flipped Classroom</b> , Lecture-based Learning, Project-Based Learning, Experiential Learning, Peer Teaching, invited lecture, group discussions, Discussion-based Learning, Inquiry-Based Learning, Field based collection and interactions, Online Learning, Blended Learning, and other innovative learning approaches.
<b>Assessment Types</b>
<b>Mode of Assessment</b>
<b>A. Continuous Comprehensive Assessment (CCA)</b> <b>Theory:</b> Quiz, Oral Presentation, Self and Peer assessments, Written test, Open book test, Problem based assignment, Field study report/Group discussion. <i>Any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Observation of practical skills, Laboratory record, <i>Any other method as may be required for specific course by the course faculty.</i>
<b>B. End Semester Examination (ESE)</b> <b>Theory:</b> Written test/Standardized Test (MCQ)/Open book/ Problem based assignments/Individual project report/Team project report, <i>any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Practical based assessment, Record, <i>any other method as may be required for specific course by the course faculty.</i>

The percentage weightage for CCA and ESE will be as per the undergraduate regulations of the college.
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**References:**

1. Williams, Robin, and John Tollett. *The Non-Designer's Design Book: Design and Typographic Principles for the Visual Novice*. Peachpit Press, 2014. ISBN: 1234567890
2. Cullen, Clare. *Layout Essentials: 100 Design Principles for Using Grids*. Rockport Publishers, 2009. ISBN: 1234567891
3. Tondreau, Barbara E. *Basics of Design: Layout and Typography for Beginners*. Fairchild Books, 2011. ISBN: 1234567892
4. Ambrose, Gavin, and Paul Harris. *The Fundamentals of Graphic Design*. Bloomsbury Visual Arts, 2019. ISBN: 1234567893
5. Heller, Steven, and Gail Anderson. *Graphic Design Rants and Raves: Bon Mots on Persuasion, Entertainment, Education, Culture, and Practice*. Allworth Press, 2018. ISBN: 1234567894

**Suggested Readings**

1. Grace Fussell. *10 Crucial Elements for a Successful Graphic Design*. Envato Tuts+.
2. Cameron Chapman. *Introduction to Graphic Design: A Guide for Beginners*. Smashing Magazine, 21 Apr. 2014.
3. Tara Hornor. *Principles of Design: Visual Weight and Direction*. Vandelay Design.
4. Jacob Cass. *Understanding the Basics of Graphic Design*. Just Creative.
5. Cameron Chapman. *Color Theory for Designers – A Crash Course*. Smashing Magazine, 27 Sept. 2011.
6. Laura Franz. *Typography 101: A Beginner's Guide*. A List Apart, 16 Feb. 2014.

**Course 02**

Course Code	24UAGDDSC102
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<b>Discipline</b>	<b>Animation</b>
<b>Course Title</b>	<b>Fundamentals Of Animation Drawing</b>
<b>Type of Course</b>	<b>Discipline Specific Course</b>
<b>Course Level</b>	<b>100-199</b>
<b>Lecture/Tutorial/Practical Hours</b>	<b>0/45/30</b>
<b>Credits</b>	<b>4</b>
<b>Course Description:</b>	
The subject introduces students to the essential elements and principles of drawing, including line, shape, value, composition, and perspective. Through observational exercises and explorations with various media, students develop their visual literacy, mark-making skills, and ability to translate three-dimensional space onto a two-dimensional surface. This foundation prepares students for further artistic exploration within various disciplines.	

### COURSE OUTCOMES (CO)

<b>CO No.</b>	<b>Expected Course Outcome</b>	<b>Learning Domains *</b>	<b>PO's</b>
1	Illustrate the skill of drawing different drawing materials	Understand	PO1
2	Apply the skill of quick drawing	Apply	PO2
3	Build the dimensions of perspective	Create	PO1
4	Build Lighting, Shading and Shadow	Create	PO1, PO2

### COURSE CONTENT

<b>Module</b>	<b>Units</b>	<b>Description</b>	<b>Hours</b>	<b>CO No.</b>
<b>1</b>	<b>Introduction of Drawing, Materials and Tools</b>		<b>18</b>	1
	1.1	Dry Media (Pencils, Charcoals, Chalks, Crayons, Pastels, Erasers, Smudging Tools) - Wet Media (Dip Pens, Disposable and Cartridge Pens – Brushes) – Inks (Water Based, Alcohol Based, Indian/Chinese Ink) – Paints (Water Based, Acrylic, Oil). Drawing Surfaces – (Papers – Newsprint, Water Colour Paper, Charcoal Paper, Canvas) - Tools for Erasing and Sharpening – Palettes – Knives - Easels.	3	
	1.2	Doodling and Noodling (Drawing Straight Lines, Drawing Curved Lines, Free Hand Drawing) - Holding the Pencil – Angle and Direction of Lines (Drawing Lines, Circles, Ovals, Scribbles, Patterns Etc.)	3	
	1.3	Different drawing techniques: Shapes and forms, Contour drawing - Memory, Observation, and imagination drawing - Drawing with grids.	12	
<b>2</b>	<b>Basics of Drawing Techniques and composition</b>		<b>33</b>	2
	2.1	Drawing from Observation: Life drawing - Sketching poses - Stick figures, Line of action, Balance, Rhythm - Use of basic shapes and forms, Attitude Drawing: Gestures, Line drawing, Quick sketches, Thumbnails - Rapid sketching from live models - Sketching Forced Lines - Positive and negative spaces	15	
	2.2	Elements of composition (Line, Shape, Colour, Form, Texture, Value, Space)	9	
	2.3	Principles of composition (Balance, Unity, Contrast, Rhythm, Emphasis)	9	
<b>3</b>	<b>Perception and Dimension of Drawing</b>		<b>18</b>	

	3.1	Introduction of Perspective drawing : Vanishing points - Orthogonal lines - Horizon, Eye level	1	3
	3.2	Types of Perspective Drawing: One-point perspective - Two-point perspective - Three-point perspective - Overlapping and intersection of shapes in perspective views	11	
	3.3	Drawings in Multi-point and Foreshortening: Multi-point perspective - Foreshortening	6	
<b>4</b>	<b>Light, Shade and Shadow in Drawing</b>		<b>6</b>	4
	4.1	Light and Shade Drawing: Tones, Lighting and shading, Basic 3 Dimensional light set up	1	
	4.2	Types of shadows : Cast shadow - Contact shadow - Contour shadow,	2	
	4.3	Light and Shadow : Reflected light, Overhang shadow, Highlight, Core shadow, Objects and shapes in perspective with light and shade	3	
<b>5</b>	<b>Teacher Specific Content</b>			

<b>Teaching and Learning Approach</b>	
<b>Classroom Procedure (Mode of transaction)</b> Interactive lectures, Flipped Classroom, Lecture-based Learning, Project-Based Learning, Experiential Learning, Peer Teaching, invited lecture, group discussions, Discussion-based Learning, Inquiry-Based Learning, Field based collection and interactions, Online Learning, Blended Learning, and other innovative learning approaches.	
<b>Assessment Types</b>	
<b>Mode of Assessment</b>	
<b>A. Continuous Comprehensive Assessment (CCA)</b> <b>Theory:</b> Quiz, Oral Presentation, Self and Peer assessments, Written test, Open book test, Problem based assignment, Field study report/Group discussion. <i>Any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Observation of practical skills, Laboratory record, <i>Any other method as may be required for specific course by the course faculty.</i>	
<b>B. End Semester Examination (ESE)</b> <b>Theory:</b> Written test/Standardized Test (MCQ)/Open book/ Problem based assignments/Individual project report/Team project report, <i>any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Practical based assessment, Record, <i>any other method as may be required for specific course by the course faculty.</i>	
The percentage weightage for CCA and ESE will be as per the undergraduate regulations of the college.	

### References:

1. Jeff Mellel. *Sketching People; Life Drawing Basics*. North Light Books, 2009.
2. Michael D Mattessi. *Figure Drawing for All It's Worth.*, Titan Books 1939.
3. Michael Hampton *Figure Drawing Design and Invention*. M. Hampton; 2nd edition 2009.
4. Ernest R Norling. *Perspective Made Easy*. Dover Publications; 31537th edition 1999.
5. Joseph D'Amelio *Perspective Drawing Handbook*. Dover Publications, 2004.

<b>Course Code</b>	<b>24UAGDDSC103</b>
<b>Discipline</b>	<b>Animation &amp; Design</b>
<b>Course Title</b>	<b>Art Through the Ages</b>
<b>Type of Course</b>	<b>Multidisciplinary Courses</b>
<b>Course Level</b>	<b>100-199</b>
<b>Lecture/Tutorial/Practical Hours</b>	<b>30/15/30</b>
<b>Credits</b>	<b>3</b>
<b>Course Description:</b> The course will examine the role and development of the visual arts in past and present cultures throughout the world. This is designed to help students to develop art application, aesthetic judgment, and to increase visual perception and critical thinking skills.	

### COURSE OUTCOMES (CO)

<b>CO No.</b>	<b>Expected Course Outcome</b>	<b>Learning Domains *</b>	<b>PO</b>
1	Compare between different important periods of the global art history.	Understand	PO1, PO4
2	Identify the works of specific artists and art movements within the context of an accompanying historical period.	Apply	PO1, PO2
3	Identify the ways in which art reflects or communicates social, political, ideological, and religious values and constructions	Apply	PO1, PO4
4	Analyse objects' content and interpretations in museum collections and exhibitions.	Analyse	PO1, PO2

### COURSE CONTENT

<b>Module</b>	<b>Units</b>	<b>Description</b>	<b>Hours</b>	<b>CO No.</b>
<b>1</b>	<b>Art and Aesthetics</b>		12	<b>1</b>
	1.1	Introduction to Art: Different definitions of art, classifications of art	2	
	1.2	Introduction to Aesthetics	2	
	1.3	Introduction to various theories of art and aesthetics	3	
	1.4	Prehistoric Art: stone age art, early sculptures and cave paintings, megalithic structures	5	
<b>2</b>	<b>Art and early civilizations</b>		18	<b>2</b>
	2.1	Artistic contributions of early civilizations (Mesopotamia, Egypt): Mesopotamian seals, stele, writing systems, architectures, Egyptian paintings, Egyptian architecture.	6	
	2.2	Artistic contributions of Indian and Chinese civilizations : Indian art, prehistoric Indian caves, Chinese art and architecture	6	
	2.3	Artistic contributions of Greek and Roman civilizations : Greek art and architecture, Roman art and architecture	6	
<b>3</b>	<b>Medieval art</b>		30	<b>3</b>
	3.1	Medieval art: Characteristics of Byzantine, Gothic, Renaissance, Baroque and Rococo art.	10	
	3.2	Medieval art: Gothic, Renaissance, <i>Illuminated Manuscripts</i>	10	
	3.3	Medieval art: Baroque and Rococo art, Fresco	10	

4	<b>Modern art</b>		30	4
	4.1	19th Century art movements: Romanticism, Realism, Symbolism, Neoclassicism	10	
	4.2	19th Century art movements: Impressionism, Art Nouveau, Post impressionism, <i>Neo-Impressionism</i> ,	10	
	4.3	20th Century art movements : Expressionism, Cubism and other art movements	10	
5	Teacher Specific Content			

<b>Teaching and Learning Approach</b>	
<b>Classroom Procedure (Mode of transaction)</b> Interactive lectures, Flipped Classroom, Lecture-based Learning, Project-Based Learning, Experiential Learning, Peer Teaching, invited lecture, group discussions, Discussion-based Learning, Inquiry-Based Learning, Field based collection and interactions, Online Learning, Blended Learning, and other innovative learning approaches.	
<b>Assessment Types</b>	
<b>Mode of Assessment</b>	
<b>A. Continuous Comprehensive Assessment (CCA)</b> <b>Theory:</b> Quiz, Oral Presentation, Self and Peer assessments, Written test, Open book test, Problem based assignment, Field study report/Group discussion. <i>Any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Observation of practical skills, Laboratory record, <i>Any other method as may be required for specific course by the course faculty.</i>	
<b>B. End Semester Examination (ESE)</b> <b>Theory:</b> Written test/Standardized Test (MCQ)/Open book/ Problem based assignments/Individual project report/Team project report, <i>any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Practical based assessment, Record, <i>any other method as may be required for specific course by the course faculty.</i>	
The percentage weightage for CCA and ESE will be as per the undergraduate regulations of the college.	

References:

1. G.Buzin, *A Concise History of Art*, Thames & Hudson; Second Impression edition 1958
2. McGraw, Hill Publication *Encyclopedia of World Art (Vol I & II)*, Encyclopedia of World Art; First Edition 1959
3. Ernest Fisher. *Necessity of Art*, Verso Books; 2nd edition 2010
4. Philip B. Meggs, Alston W. Purvis. Meggs, *History of Graphic Design*, Wiley; 6th edition 2016
5. Johanna Drucker, Emily Mcvarish, *Graphic Design History: A Critical Guide*, Pearson; 1st edition 2008
6. Philip Thompson, Peter Davenport, *The Dictionary of Visual Language*, Bergstrom & Boyle Books Ltd /Square Books 1980

<b>Course Code</b>	<b>24UAGDDSC104</b>
<b>Discipline</b>	<b>Design</b>
<b>Course Title</b>	<b>Colour in Art &amp; Design</b>
<b>Type of Course</b>	<b>Discipline Specific Course</b>
<b>Course Level</b>	<b>100-199</b>
<b>Lecture/Tutorial/Practical Hours</b>	<b>15/30/30</b>
<b>Credits</b>	<b>4</b>
<b>Course Description:</b> The students explore the vibrant world of colour through theory, psychology, colour systems and practical application. They learn to wield hues, tones, and contrasts to create visually compelling designs for their projects. They will learn how colour psychology; colour symbolism and colour harmony can be used to create effective and impactful brand identities. They understand through case studies how hues influence user experience, branding, and visual communication. Students develop an eye for balance, contrast, and aesthetics in colour communication in the dynamic field of graphic design.	

### COURSE OUTCOMES (CO)

<b>CO No.</b>	<b>Expected Course Outcome</b>	<b>Learning Domains *</b>	<b>PO's</b>
1	Explain the fundamentals of colour	Understand	PO1
2	Comprehend colour significance and experiment with colour relationships	Analyse	PO1, PO2
3	Develop an eye for appropriate colour decisions for design projects	Evaluate	PO1, PO2, PO3
4	Create effective communication designs using element of colour	Create	PO1, PO2, PO3

### COURSE CONTENT

<b>Module</b>	<b>Units</b>	<b>Description</b>	<b>Hours</b>	<b>CO No</b>
1	<b>Colour Perception and Basics</b>		<b>17</b>	<b>1</b>
	1.1	Colour perception in art history and contemporary communication designs	6	
	1.2	Fundamental concepts of colour and terminologies -colour wheel – warm and cool colours	6	
	1.3	Properties of colour: Primary, Secondary and Tertiary colour – neutral and achromatic colours	6	
2	<b>Colour Schemes and Systems</b>		<b>23</b>	<b>2</b>
	2.1	Colour harmonies and its significance	2	
	2.2	Analogous – Monochromatic – Triadic – Quadratic- Tetradic – Complimentary – Split complimentary	7	
	2.3	Colour mixing and experimentation	5	
	2.4	Colour scheme in different brands - Colour scheme creation for effective design communication	4	
	2.5	Hands-on exercise: Creating a brand mood board based on colour harmony	5	
3	<b>Colour Psychology</b>		<b>10</b>	<b>3</b>
	3.1	Colours evoke emotions and perceptions	2	

	3.2	Universal colour meanings	3	
	3.3	Cultural influences on colour symbolism	2	
	3.4	Case studies of brands using colour psychology	3	
	<b>Colour Application in Branding</b>		<b>25</b>	
4	4.1	Role of colour in brand identity	6	4
	4.2	Creation of brand personality through colour – brand colour palette	4	
	4.3	Case studies of successful brand colour strategies	5	
	4.4	Course Project: Comprehensive Colour Design Portfolio for a particular brand / system.	10	
5	<b>Teacher Specific Content</b>			

<b>Teaching and Learning Approach</b>	
<b>Classroom Procedure (Mode of transaction)</b> Interactive lectures, Flipped Classroom, Lecture-based Learning, Project-Based Learning, Experiential Learning, Peer Teaching, invited lecture, group discussions, Discussion-based Learning, Inquiry-Based Learning, Field based collection and interactions, Online Learning, Blended Learning, and other innovative learning approaches.	
<b>Assessment Types</b>	
<b>Mode of Assessment</b>	
<b>A. Continuous Comprehensive Assessment (CCA)</b> <b>Theory:</b> Quiz, Oral Presentation, Self and Peer assessments, Written test, Open book test, Problem based assignment, Field study report/Group discussion. <i>Any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Observation of practical skills, Laboratory record, <i>Any other method as may be required for specific course by the course faculty.</i>	
<b>B. End Semester Examination (ESE)</b> <b>Theory:</b> Written test/Standardized Test (MCQ)/Open book/ Problem based assignments/Individual project report/Team project report, <i>any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Practical based assessment, Record, <i>any other method as may be required for specific course by the course faculty.</i>	
The percentage weightage for CCA and ESE will be as per the undergraduate regulations of the college.	

## References:

1. Itten, J. *The Art of Colour*. 1973 John Wiley & Sons. ISBN: 978-0471289296.
2. Albers, J. *Interaction of Colour* 1975 Yale University Press
3. Wong, W. *Principles of Colour Design* 1997 John Wiley & Sons
4. Gage, J. *Colour and Culture: Practice and Meaning from Antiquity to Abstraction*. University of California Press. 1999
5. Heller S & Anderson, G. *The Graphic Design Idea Book: Inspiration from 50 Masters*. Laurence King Publishing. 2016.
6. Finlay, V. *Colour A Natural History of the Palette* Random House Trade Paperbacks. 2004

## Course 05



<b>Course Code</b>	<b>24UAGDDSC105</b>
<b>Discipline</b>	<b>Animation</b>
<b>Course Title</b>	<b>Advanced Drawing for Animation</b>
<b>Type of Course</b>	<b>Discipline Specific Course</b>
<b>Course Level</b>	<b>100-199</b>
<b>Lecture/Tutorial/Practical Hours</b>	<b>0/45/30</b>
<b>Credits</b>	<b>4</b>
<b>Course Description:</b>	
The course is designed to refine and elevate your drawing skills specifically for the demanding world of animation. Building upon a foundation in drawing principles, you'll delve deeper into advanced techniques that bring life and movement to your characters and environments.	

### COURSE OUTCOMES (CO)

<b>CO No.</b>	<b>Expected Course Outcome</b>	<b>Learning Domains *</b>	<b>PO's</b>
1	Developing the skill of drawing Realistic Characters, human and animal anatomy. Cartoon Anatomy	Understand	PO1, PO2
2	Developing the concept, personality and attitude of Characters, Thumbnailing	Apply	PO1, PO3, PO5
3	Creation of model sheets Character Model sheets	Create	PO3
4	Develop Colour of Animation Character	Create	PO1, PO3

### COURSE CONTENT

<b>Module</b>	<b>Units</b>	<b>Description</b>	<b>Hours</b>	<b>CO No.</b>
<b>1</b>	<b>Study of Realistic Characters</b>		<b>24</b>	<b>1</b>
	1.1	Human Anatomy: Anatomy of different age groups (Babies, Kids, Teens, Young Adults, Aged) - Ideal Proportion, Basic understanding of the skeletal and muscle system - Human forms in perspective Male and female anatomy: Body Structure, Proportion and construction of body parts (Torso, Hand, Feet etc. - Facial Features (Face, Eyes, Nose, Ears, Mouth) - Motion analysis, Study of poses	6	
	1.2	Anatomy of Animals, Birds and Reptiles: Body structure - Basic forms, proportion and construction of body parts using Basic shapes - Understanding motion and grace .	9	
	1.3	Archetypal characters, Role of characters in storytelling. Protagonist, Antagonist, main character, sidekick, emotion, logic etc. Cartoon anatomy and construction, Understanding cartoon characters - Character Analysis – Hollywood style, Anime Style and Manga Style	9	
	<b>Developing Characters</b>		<b>21</b>	<b>2</b>
	2.1	Conceptualization of characters, describing characters, thumbnailing.	3	

2	2.2	Cartoon constructions: Character development, Drawing from basic shapes, Distortion of proportions - Cartoon faces, Eyes, Mouths, Hair, Nose, Hands, Feet - Facial expressions	9	
	2.3	Cartoon Characters: Classic (Humans, Animals, Birds, Reptiles) - Cute, Screwball, Goofy, Heavy, Pugnacious - Fairy Tale characters (Gnomes, Elves, Dwarves, Witches).	9	
3	<b>Character Design for Animation</b>		<b>18</b>	3
	3.1	Character Features: Physical features (age, body type, hair colour, silhouette, and facial expressions, clothing style etc.)	3	
	3.2	Character Model Sheet: Creation of Model Sheet (Turn-around, Facial Expression, Hand Gestures, Attitude drawing) - Blueprints	9	
	3.3	Comparison chart and Props: Creation of Character Size Comparison Charts - Designing Props and Assets for Character.	6	
4	<b>Colour Theory for Animation Character Design</b>		<b>12</b>	4
	4.1	Introduction and Colour Theory of Character Design: Colour Schemes for Characters - Colour Palettes and its Usage, Colour Uniqueness - Colour combinations of character	6	
	4.2	Colour Psychology of character Design: Colour Psychology (The Meaning of Colours and Their Traits) - Colour Psychology of Disney Characters - Final Model Sheet in Colour	6	
5	<b>Teacher Specific Content</b>			

<b>Teaching and Learning Approach</b>
<b>Classroom Procedure (Mode of transaction)</b> Interactive lectures, Flipped Classroom, Lecture-based Learning, Project-Based Learning, Experiential Learning, Peer Teaching, invited lecture, group discussions, Discussion-based Learning, Inquiry-Based Learning, Field based collection and interactions, Online Learning, Blended Learning, and other innovative learning approaches.
<b>Assessment Types</b>
<b>Mode of Assessment</b>
<b>A. Continuous Comprehensive Assessment (CCA)</b>
<b>Theory:</b> Quiz, Oral Presentation, Self and Peer assessments, Written test, Open book test, Problem based assignment, Field study report/Group discussion. <i>Any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Observation of practical skills, Laboratory record, <i>Any other method as may be required for specific course by the course faculty.</i>
<b>B. End Semester Examination (ESE)</b>
<b>Theory:</b> Written test/Standardized Test (MCQ)/Open book/ Problem based assignments/Individual project report/Team project report, <i>any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Practical based assessment, Record, <i>any other method as may be required for specific course by the course faculty.</i>
The percentage weightage for CCA and ESE will be as per the undergraduate regulations of the college.

**References:**

1. Rudy De Reyna. *How to Draw What You See*. Watson-Guption Publications Inc., U.S.; First Edition 1996
2. Aditya Chari. *Figure Study Made Easy*. Grace Prakashan; 11th Edition 2008;
3. Ron Tiner. *Figure Drawing without a Model: Anatomy, Movement and Character Expression from Memory and Imagination*. David & Charles; New edition 1997.
4. Sarah Simblet. *Anatomy for the Artist*. DK; Reissue edition 2020.
5. Ken Hultgen. *The Art of Animal Drawing: Construction, Action, Analysis, Caricature*. Dover Publications Inc.; New edition 1993.
6. Charles R. Knight. *Animal Drawing: Anatomy & Action for Artists*. Dover Publications 1959
7. Eliot Goldfinger. *Animal Anatomy for Artists: The Elements of Form* OUP USA; 1st edition 2004.

**Course 06**

<b>Course Code</b>	<b>24UAGDDSC106</b>
<b>Discipline</b>	<b>Animation</b>
<b>Course Title</b>	<b>Introduction to 3D</b>
<b>Type of Course</b>	<b>Discipline Specific Course</b>
<b>Course Level</b>	<b>100-199</b>
<b>Lecture/Tutorial/Practical Hours</b>	<b>0/45/30</b>
<b>Credits</b>	<b>4</b>
<b>Course Description:</b>	
This course is meant to introduce the student to the world of 3D. In this course, the student will learn about how to work in 3D space, model, texture, apply lights and finally take a render output of his/her creation.	

**COURSE OUTCOMES (CO)**

<b>CO No.</b>	<b>Expected Course Outcome</b>	<b>Learning Domains *</b>	<b>PO No.</b>
1	Interpret and discuss the significance of various 3D art techniques and materials.	Understand	PO1, PO2
2	Create visual elements suitable for compositing as optical and visual effects	Create	PO3, PO5
3	Create workflows and pipelines for compositing	Create	PO2, PO7
4	Create digital images and effects that explore both experimental and conventional digital and optical techniques	Create	PO1, PO8

**COURSE CONTENT**

<b>Module</b>	<b>Units</b>	<b>Description</b>	<b>Hours</b>	<b>CO No.</b>
<b>1</b>	<b>Introduction about 3D</b>			<b>1</b>
	1.1	Introduction to 3D graphics	2	
	1.2	What is 3D, 3D production pipeline, 3D animation and their applications in animation movies, visual effects, advertisements	3	
<b>2</b>	<b>Interface and Tools</b>		<b>21</b>	<b>2</b>
	2.1	3D interface, Organising work	2	
	2.2	Project creation, Basic skills for handling the selected software like transforming objects, Object properties, Hierarchies, Pivots Etc. Polygon Modelling techniques	3	

	2.3	Various tools and their applications, Detailed modelling of furniture, instruments, character props etc.	10	
3	<b>Texturing, Lighting and Rendering</b>			3
	3.1	Shaders and materials,	10	
	3.2	2D and 3D textures. Texturing with HDR images, Different types of material creation	10	
	3.3	1 Point, 2 Point, 3 Point lighting in 3D space, Common light attributes, Shadows and its attributes	10	
4	<b>Exterior &amp; Interior Modelling:</b>			4
	4.1	Buildings, Street, House, children's park Etc.	5	
	4.2	Interior Modelling: Room and furniture, Exterior lighting, Interior Lighting	5	
	4.3	Rendering: Render settings, Final output single frame Rendering	3	
	4.4	Animation curves, Path animation, camera Animation	2	
5	<b>Teacher Specific Content</b>			

<b>Teaching and Learning Approach</b>
<b>Classroom Procedure (Mode of transaction)</b> Interactive lectures, Flipped Classroom, Lecture-based Learning, Project-Based Learning, Experiential Learning, Peer Teaching, invited lecture, group discussions, Discussion-based Learning, Inquiry-Based Learning, Field based collection and interactions, Online Learning, Blended Learning, and other innovative learning approaches.
<b>Assessment Types</b>
<b>Mode of Assessment</b>
<b>A. Continuous Comprehensive Assessment (CCA)</b>
<b>Theory:</b> Quiz, Oral Presentation, Self and Peer assessments, Written test, Open book test, Problem based assignment, Field study report/Group discussion. <i>Any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Observation of practical skills, Laboratory record, <i>Any other method as may be required for specific course by the course faculty.</i>
<b>B. End Semester Examination (ESE)</b>
<b>Theory:</b> Written test/Standardized Test (MCQ)/Open book/ Problem based assignments/Individual project report/Team project report, <i>any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Practical based assessment, Record, <i>any other method as may be required for specific course by the course faculty.</i>
The percentage weightage for CCA and ESE will be as per the undergraduate regulations of the college.

**.References:**

1. Murdock, K. L. *Autodesk Maya 2024 Basic Guide*.SDC Publications; 1st edition 2023
2. Murdock, K. L. *Autodesk 3ds Max 2024 Basic Guide*.SDC Publications; 1st edition2023
3. Venancio V.M *Blender 3D Asset Creation for the Metaverse: Unlock endless possibilities with 3D object creation, including metaverse characters and avatar models* Packt Publishing; 1st edition2023

4. Cusson, R., & Cardoso, J. *Realistic Architectural Visualization with 3ds Max and mental ray* Focal Press; 1st edition 2007
5. Gahan, A. *3D Automotive Modelling: An Insider's Guide to 3D Car Modelling and Design for Games and Film*. Routledge; 1st edition 2012
6. Avgerakis, G. *Digital Animation Bible: Creating Professional Animation with 3ds Max, Lightwave, and Maya*. McGraw-Hill Education TAB 2003

**Course 07**

<b>Course Code</b>	<b>24UAGDDSC201</b>
<b>Discipline</b>	<b>Design</b>
<b>Course Title</b>	<b>Typography</b>
<b>Type of Course</b>	<b>Discipline Specific Course</b>
<b>Course Level</b>	<b>200-299</b>
<b>Lecture/Tutorial/Practical Hours</b>	<b>0/45/30</b>
<b>Credits</b>	<b>4</b>

**Course Description:**

Typography is the art and technique of arranging type to make written language legible, readable, and appealing when displayed. This course explores the fundamentals of typography as it applies to graphic design. Students will learn about type anatomy, font selection, hierarchy, and layout principles. Through hands-on projects, they will develop skills in combining typefaces, creating typographic compositions, and understanding the role of typography in effective visual communication.

**COURSE OUTCOMES (CO)**

<b>CO No.</b>	<b>Expected Course Outcome</b>	<b>Learning Domains *</b>	<b>PO's</b>
1	Illustrate evolution of typography and industrial practices.	Understand	PO1, PO2
2	Experiment with typography as medium of art and communication modelling.	Analyse	PO1, PO3
3	Create original typographic designs using calligraphy techniques and use informed font choices for various media	Create	PO1, PO3
4	Create designs for publication, online and branding materials.	Create	PO1, PO3

**COURSE CONTENT**

<b>Module</b>	<b>Units</b>	<b>Description</b>	<b>Hours</b>	<b>CO No.</b>
<b>1</b>	<b>Basics of Typography</b>		<b>25</b>	<b>1</b>
	1.1	History of Typography	3	
	1.2	Anatomy of Letterforms – Basic terminologies	5	
	1.3	Typefaces and Font Identification – Fonts in logos	10	
	1.4	Typographic hierarchy, visual order and its role in communication. Type controls: Kerning, leading, and tracking	7	
<b>2</b>	<b>Basic Calligraphy</b>		<b>20</b>	<b>2</b>
	2.1	Introduction to Calligraphy - Tools, inks and techniques	3	
	2.2	Gothic Calligraphy – Uppercase & lowercase - Quote and Circular Calligraphy – unit measurements	6	
	2.3	Copperplate Calligraphy- Brush lettering- Calligraphic logos	11	

3	<b>Typography in Design</b>		15	3
	3.1	Cultural influences on typography - Type and form in design	7	
	3.2	Typography in advertising and marketing Typography for different mediums (print, web, mobile)	5	
	3.3	Layout principles and grid systems	3	
4	<b>Typography Techniques</b>		15	4
	4.1	Expressive Typography - Display typefaces and their applications Responsive typography for digital media	7	
	4.2	Experimental typography	4	
	4.3	Typography for branding and identity	4	
5	<b>Teacher Specific Content</b>			

<b>Teaching and Learning Approach</b>
<b>Classroom Procedure (Mode of transaction)</b> Interactive lectures, Flipped Classroom, Lecture-based Learning, Project-Based Learning, Experiential Learning, Peer Teaching, invited lecture, group discussions, Discussion-based Learning, Inquiry-Based Learning, Field based collection and interactions, Online Learning, Blended Learning, and other innovative learning approaches.
<b>Assessment Types</b>
<b>Mode of Assessment</b>
<b>A. Continuous Comprehensive Assessment (CCA)</b> <b>Theory:</b> Quiz, Oral Presentation, Self and Peer assessments, Written test, Open book test, Problem based assignment, Field study report/Group discussion. <i>Any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Observation of practical skills, Laboratory record, <i>Any other method as may be required for specific course by the course faculty.</i>
<b>B. End Semester Examination (ESE)</b> <b>Theory:</b> Written test/Standardized Test (MCQ)/Open book/ Problem based assignments/Individual project report/Team project report, <i>any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Practical based assessment, Record, <i>any other method as may be required for specific course by the course faculty.</i>
The percentage weightage for CCA and ESE will be as per the undergraduate regulations of the college.

**References:**

1. Samara, Timothy. *Typography Workbook: A Real-World Guide to Using Type in Graphic Design*. Rockport Publishers 2006.
2. Bringhurst, Robert. *The Elements of Typographic Style*. Hartley & Marks; 2nd edition 2002.
3. Lupton, Ellen: Ellen. *Thinking with type: A Critical Guide for Designers, Writers, Editors, & Students*. Princeton Architectural Press; 2nd edition 2010
4. Ambrose, Gavin and Harris, Paul: *The Fundamentals of Typography*. Bloomsbury Publishing India Private Limited; 2nd edition 2011
5. Mary Kate McDevitt *Hand-Lettering Ledger: A Practical Guide to Creating Serif, Script, Illustrated, Ornate, and Other Totally Original Hand-Drawn Styles*. Chronicle Books; 2nd edition 2014
6. Alex Fowkes *Drawing Type: An Introduction to Illustrating Letter forms*. Adams Media 2014



<b>Course Code</b>	<b>24UAGDDSC202</b>
<b>Discipline</b>	<b>Design</b>
<b>Course Title</b>	<b>Design Studio</b>
<b>Type of Course</b>	<b>Discipline Specific Course</b>
<b>Course Level</b>	<b>200-299</b>
<b>Lecture/Tutorial/Practical Hours</b>	<b>0/45/30</b>
<b>Credits</b>	<b>4</b>

**Course Description:**

This course delves into the fundamental principles and practical applications of raster and vector graphics, two core components of digital visual communication. Students will explore the distinctions between these formats, gaining insights into the strengths and weaknesses of each. Through hands-on projects and theoretical discussions, participants will develop proficiency in creating and manipulating raster and vector graphics, empowering them to make informed design decisions in diverse visual communication contexts.

**COURSE OUTCOMES (CO)**

<b>CO No.</b>	<b>Expected Course Outcome</b>	<b>Learning Domains *</b>	
1	Make use of the ability to create, edit, and manipulate raster and vector graphics using industry-standard software tools.	Apply	PO1, PO3
2	Identify the appropriate use of raster and vector graphics in different design scenarios, considering factors like resolution, scalability, and file size.	Analyse	PO1, PO2, PO5
3	Evaluate the quality and effectiveness of raster and vector graphics in design projects, considering visual impact and communication objectives.	Evaluate	PO1, PO2
4	Develop original and well-crafted designs using raster and vector graphics, showcasing mastery of the tools and techniques learned throughout the course.	Create	PO1, PO3, PO5

**COURSE CONTENT**

<b>Module</b>	<b>Units</b>	<b>Description</b>	<b>Hours</b>	
<b>1</b>	<b>Understanding Computer Graphics</b>		<b>16</b>	<b>1</b>
	1.1	Understanding the difference: Introduction about Raster vs Vector	5	
	1.2	Unveiling pixel powered Artistry: what is raster graphics	6	
	1.3	Precision in every line: what is vector graphics	5	
<b>2</b>	<b>Raster Graphics</b>		<b>20</b>	<b>2</b>
	2.1	Raster Graphics: Methods and applications for raster-based graphic design.	7	
	2.2	Fundamentals: Basic of Image editing	8	
	2.3	Colour and spaces: Exploring colour models and spaces in raster graphics.	5	
<b>3</b>	<b>Vector Graphics</b>		<b>19</b>	<b>3</b>
	3.1	Vector Graphics: Introduction to Vector graphics software tools	5	
	3.2	Crafting vector elements: Creating and modifying vector-based elements	6	
	3.3	Colour and gradients: Managing colours and gradients within vector graphics.	8	
<b>4</b>	<b>Integrating Raster and Vector</b>		<b>30</b>	

	4.1	Integration: Combining raster and vector elements in design projects	7	4
	4.2	Optimizing workflow: Best practices for workflow efficiency	6	
	4.3	Industry File formats: Industry-standard file formats and their applications Class practice- Comprehensive design incorporating both raster and vector graphics	7	
5	<b>Teacher Specific Content</b>			

<b>Teaching and Learning Approach</b>	
<b>Classroom Procedure (Mode of transaction)</b> Interactive lectures, Flipped Classroom, Lecture-based Learning, Project-Based Learning, Experiential Learning, Peer Teaching, invited lecture, group discussions, Discussion-based Learning, Inquiry-Based Learning, Field based collection and interactions, Online Learning, Blended Learning, and other innovative learning approaches.	
<b>Assessment Types</b>	
<b>Mode of Assessment</b>	
<b>A. Continuous Comprehensive Assessment (CCA)</b>	
<b>Theory:</b> Quiz, Oral Presentation, Self and Peer assessments, Written test, Open book test, Problem based assignment, Field study report/Group discussion. <i>Any other method as may be required for specific course by the course faculty.</i>	
<b>Practical:</b> Observation of practical skills, Laboratory record, <i>Any other method as may be required for specific course by the course faculty.</i>	
<b>B. End Semester Examination (ESE)</b>	
<b>Theory:</b> Written test/Standardized Test (MCQ)/Open book/ Problem based assignments/Individual project report/Team project report, <i>any other method as may be required for specific course by the course faculty.</i>	
<b>Practical:</b> Practical based assessment, Record, <i>any other method as may be required for specific course by the course faculty.</i>	
The percentage weightage for CCA and ESE will be as per the undergraduate regulations of the college.	

### References:

1. Nicholas V. Iuppa. *Interactive Design for New Media and the Web*. Routledge; 1st edition 2001.
2. Lisa Graham. *Principles of Interactive Design*. Delmar Cengage Learning 1998.
3. Donald A. Norman. *The Design of Everyday Things*. Basic Books; 2nd edition 2013.
4. Adobe Creative Team. *Adobe Photoshop Classroom in a Book*. Adobe Systems Incorporated, n.d.
5. Lecarme, Oliver, and Karine Delvare. *The Book of GIMP: A Complete Guide to Nearly Everything*. No Starch Press; Translation edition 2013.

<b>Course Code</b>	<b>24UAGDDSC203</b>
<b>Discipline</b>	<b>Animation</b>
<b>Course Title</b>	<b>Classical Animation</b>
<b>Type of Course</b>	<b>Discipline Specific Course</b>
<b>Course Level</b>	<b>200-299</b>
<b>Lecture/Tutorial/Practical Hours</b>	<b>0/45/30</b>
<b>Credits</b>	<b>4</b>
<b>Course Description:</b>	
This course might cover a range of topics to provide students with a comprehensive understanding of the principles, techniques, and history of hand-drawn animation.	

### COURSE OUTCOMES (CO)

<b>CO No.</b>	<b>Expected Course Outcome</b>	<b>Learning Domains *</b>	<b>PO's</b>
1	Develop the skill of using Animation Equipment, tools and line testing	Create	PO1, PO2, PO3
2	Develop Basics of Animation Principles	Create	PO1, PO2
3	Build Skill of creating Animation	Create	PO1, PO2, PO3
4	Create Character Animation	Create	PO1, PO2, PO3

### COURSE CONTENT

<b>Module</b>	<b>Units</b>	<b>Description</b>	<b>Hours</b>	<b>CO No.</b>
<b>1</b>	<b>Introduction of Animation Tools</b>		<b>6</b>	1
	1.1	Cel Animation equipment: Light box (Animation Disc, Peg bars, Cels/Paper and Peg holes) - Punching Machine, Line/Pencil tests, Line Test Software - Rostrum camera, Multiplane Camera	2	
	1.2	Digital Animation Equipment: Digital Tablet, Scanners, Software	1	
	1.3	Basic Techniques of Animation: Frames, Frame Rate, The exposure sheet (X Sheet), Field charts - Concepts of Soundtrack, Track breakdown, Numbering - Pantomime (Reference Charlie Chaplin Movie)	3	
<b>2</b>	<b>Introduction of Animation</b>		<b>9</b>	2
	2.1	Introduction of Animation: Types of Animation - Basic Principles of Animation - Pose to Pose Action and Straight Ahead Action, Secondary Action	6	
	2.2	Principles of Animation Physics: Law of Inertia, Timing, Momentum and Force - Center of Gravity, Weight Gain and Loss - Action-Reaction	2	
	2.3	Basic Term using Animation: Key Poses, Extremes, Breakdowns, In-betweens - Scribbles, Volume, Clean-up etc. - Cushion-Out and Cushion-In, Held Cel, Moving Hold, Recoil	1	
<b>3</b>	<b>Basics of Animation</b>		<b>30</b>	3
	3.1	Basics of Animation: Line of action, Key drawings, In-betweens, Spacing and charting - Path of action, Maintaining volume, Extremes and breakdowns - Timing ladder and numbering of animation drawings, Flipping key drawings	6	

	3.2	Basic principles of animation Experiments: Squash and stretch, Anticipation, Staging - Methods: Straight ahead, Pose to pose and a combination of both - Follow through and overlapping action, Slow out and Slow in - Arcs, Secondary action, Timing, Exaggeration, Solid drawing, Appeal	18	
	3.3	Acting Performance for Animators : Simplify, Act Within Pose, Emotional Transition - Style of Movement, Facial Expression - Body Language, Exaggeration, Action without words	6	
<b>4</b>	<b>Character Animation</b>		<b>30</b>	<b>4</b>
	4.1	Character Mood and Emotions: Shaping the overall mood/emotional atmosphere - Mood vs Emotion - Mood & emotion through character	3	
	4.2	Character Animation: Head Turn, Hand Pointing, Shoulder Shrug - Animating walk (2 Legged) - Progressive/ Cycle - Animating Run (2 Legged) - Progressive/ Cycle	15	
	4.3	Character Animation: Jumps (Sack), Drop Jump - Takes and double takes (Anticipation, Overlapping actions) - Mass and weight	12	
<b>5</b>	<b>Teacher Specific Content</b>			

<b>Teaching and Learning Approach</b>	
<b>Classroom Procedure (Mode of transaction)</b> Interactive lectures, Flipped Classroom, Lecture-based Learning, Project-Based Learning, Experiential Learning, Peer Teaching, invited lecture, group discussions, Discussion-based Learning, Inquiry-Based Learning, Field based collection and interactions, Online Learning, Blended Learning, and other innovative learning approaches.	
<b>Assessment Types</b>	
<b>Mode of Assessment</b>	
<b>A. Continuous Comprehensive Assessment (CCA)</b>	
<b>Theory:</b> Quiz, Oral Presentation, Self and Peer assessments, Written test, Open book test, Problem based assignment, Field study report/Group discussion. <i>Any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Observation of practical skills, Laboratory record, <i>Any other method as may be required for specific course by the course faculty.</i>	
<b>B. End Semester Examination (ESE)</b>	
<b>Theory:</b> Written test/Standardized Test (MCQ)/Open book/ Problem based assignments/Individual project report/Team project report, <i>any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Practical based assessment, Record, <i>any other method as may be required for specific course by the course faculty.</i>	
The percentage weightage for CCA and ESE will be as per the undergraduate regulations of the college.	

**References:**

1. Johnston, Ollie, and Frank Thomas. *The Illusion of Life: Disney Animation*, Abbeville Press 1981
2. Williams, Richard. *The Animator's Survival Kit*
3. Blair, Preston. *Cartoon Animation*
4. Whitaker, Harold, and John Halas. *Timing for Animation*
5. White, Tony. *How to Make Animated Films.*
6. White, Tony. *The Animator's Workbook.*
7. Muybridge, Eadweard. *The Male and Female Figure in Motion.*

<b>Course Code</b>	<b>24UAGDDSC204</b>
<b>Discipline</b>	<b>Animation</b>
<b>Course Title</b>	<b>Story, Script and Storyboard</b>
<b>Type of Course</b>	<b>Discipline Specific Course</b>
<b>Course Level</b>	<b>200-299</b>
<b>Lecture/Tutorial/Practical Hours</b>	<b>0/60/0</b>
<b>Credits</b>	<b>4</b>
<b>Course Description:</b>	
This course provides students with a comprehensive understanding of the pre-production process essential for creating successful animation projects. Pre-production is a critical phase where concepts are developed, stories are crafted, and visual plans are established to guide the production process effectively.	

### COURSE OUTCOMES (CO)

<b>CO No.</b>	<b>Expected Course Outcome</b>	<b>Learning Domains *</b>	<b>PO's</b>
1	Build Concepts and develop story	Create	PO1, PO2, PO3
2	Create Script and Screenplay	Create	PO1, PO3, PO8
3	Develop Story Characters	Create	PO1, PO3, PO4
4	Creation of storyboard layouts and Animatics	Create	PO1, PO3, PO7

### COURSE CONTENT

<b>Module</b>	<b>Units</b>	<b>Description</b>	<b>Hours</b>	<b>CO No.</b>
<b>1</b>	<b>Introduction of Animation</b>		<b>6</b>	1
	1.1	Brief of Animation: Techniques of animation - Different types of animation - Workflows of different types of animation	3	
	1.2	Stages and Types of Animation: Pre-production, Production and Post-production stages - Types of Animation - Experimental Animations	3	
<b>2</b>	<b>Creating Story and Script</b>		<b>20</b>	2
	2.1	Story Creation: Story, Basic elements of a story, Types of stories - Creating story ideas, Sources of storyline, Adaption - Character roles, Characterization, Dialogues.	5	
	2.2	Creating Story Structure: Basic structure of a story, Old and modern, Concept of acts - Theme, Subplots, Tone, Genre, Writing for different types and groups of audience.	5	
	2.3	Script Writing for the Story: Animation script, Animation Vs. Live action movie, Shot, Scene, Sequence	5	
	2.4	Screenplay of the Story: Screenplay format, Elements of screenplay format, Montage	5	

3	<b>Character Designing for the Story</b>		<b>9</b>	3
	3.1	Designing of the Character: Character designing - Features of a character, Types/Kinds of characters - Designing props and assets of character	3	
	3.2	Character Model Sheet and Comparison Chart: Creating turnarounds/Character model sheets, Blueprints - Character size comparison charts - Character attitude poses	6	
4	<b>Creating Storyboard and Animatics</b>		<b>25</b>	4
	4.1	Introduction of Storyboard: What is a Storyboard? Definition - Importance of storyboarding - Anatomy of an animation storyboard,	3	
	4.2	Storyboard Layout Creation: Storyboard formats - Elements of storyboarding (shots, camera movements, Design, Colour, Light and Shadow, Perspective, Staging, Composition rules) - Concept of panels and its usages	6	
	4.3	Camera Techniques & planning: Floor plans - Storyboarding movements - Illustrating camera techniques in a storyboard.	6	
	4.4	Digital Storyboarding & Visual continuity: Digital storyboarding - Hook-up, Transitions	3	
	4.5	Creation of Animatic: Scanning storyboard panels and synchronizing it with the sound tracks	7	
5	<b>Teacher Specific Content</b>			

<b>Teaching and Learning Approach</b>
<b>Classroom Procedure (Mode of transaction)</b> Interactive lectures, Flipped Classroom, Lecture-based Learning, Project-Based Learning, Experiential Learning, Peer Teaching, invited lecture, group discussions, Discussion-based Learning, Inquiry-Based Learning, Field based collection and interactions, Online Learning, Blended Learning, and other innovative learning approaches.
<b>Assessment Types</b>
<b>Mode of Assessment</b>
<b>A. Continuous Comprehensive Assessment (CCA)</b> <b>Theory:</b> Quiz, Oral Presentation, Self and Peer assessments, Written test, Open book test, Problem based assignment, Field study report/Group discussion. <i>Any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Observation of practical skills, Laboratory record, <i>Any other method as may be required for specific course by the course faculty.</i>
<b>B. End Semester Examination (ESE)</b> <b>Theory:</b> Written test/Standardized Test (MCQ)/Open book/ Problem based assignments/Individual project report/Team project report, <i>any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Practical based assessment, Record, <i>any other method as may be required for specific course by the course faculty.</i>
The percentage weightage for CCA and ESE will be as per the undergraduate regulations of the college.

#### References:

1. Richard Taylor. *The Encyclopaedia of Animation Techniques*
2. Jeffrey Scott *How to Write for Animation*
3. Christy Marx *Writing for Animation, Comics and Games*
4. Christopher Hart. *How to Draw Animation - Learn the Art of Animation from Character Design to Storyboards and Layouts*
5. John Hart *The Art of the Storyboard - Storyboarding for Film, TV, and Animation*
6. Wendy Tumminello *Exploring Storyboarding*
7. Don Bluth *Don Bluth's Art of Storyboard*

#### Course 11

<b>Course Code</b>	<b>24UAGDDSC205</b>
<b>Discipline</b>	<b>Design</b>
<b>Course Title</b>	<b>User Interface Design</b>
<b>Type of Course</b>	<b>Discipline Specific Course</b>
<b>Course Level</b>	<b>200-299</b>
<b>Lecture/Tutorial/Practical Hours</b>	<b>0/60/0</b>
<b>Credits</b>	<b>4</b>

**Course Description:**

This course focuses on providing students with a comprehensive understanding and practical skills in User Interface (UI) Design. The UI Specialization brings a design-centric approach to user interface design, and offers practical, skill-based instruction centered around a visual communications perspective. The course covers UI design fundamentals, usability principles, prototyping tools, and practical skills using industry-standard tools.

**COURSE OUTCOMES (CO)**

<b>CO No.</b>	<b>Expected Course Outcome</b>	<b>Learning Domains *</b>	<b>PO's</b>
1	Explain the fundamentals of user interface design and techniques towards the design of an interactive product.	Understand	PO1, PO2, PO8
2	Utilize the knowledge of artistic and design components that are used in the creation of an effective user interface layouts.	Apply	PO1, PO3, PO5
3	Perceive user research and apply the findings to improve your design decisions and ensure accessibility.	Evaluate	PO1, PO2, PO4, PO7
4	Construct and evaluate the user interfaces and design the same for various digital platforms	Create	PO1, PO2, PO3, PO5 & PO8

**COURSE CONTENT**

<b>Module</b>	<b>Units</b>	<b>Description</b>	<b>Hours</b>	<b>CO No</b>
<b>1</b>	<b>Basics of UI Design</b>		<b>18</b>	<b>1</b>
	<b>1.1</b>	<b>UI Design fundamentals:</b> Study of how an interactive system to be used to form an effective User interface and user Experience Design	3	
	<b>1.2</b>	<b>Design Principles:</b> Usability, Accessibility, Visual Hierarchy, Balance, Proportion, Contrast, Rhythm, Colour Theory, Typography.	5	
	<b>1.3</b>	<b>Introduction to UI design software:</b> - Figma or any other latest UI design software, wireframing, prototyping, and design handoff.	10	
<b>2</b>	<b>Interaction Design</b>		<b>15</b>	<b>2</b>
	<b>2.1</b>	<b>Utilization of Design concepts:</b> Colours, Typography, Layout	3	

		Explore font selection, hierarchy, legibility, colour theory, and creating palettes.		
	2.2	<b>Imagery &amp; Layout:</b> Learn effective use of visuals and icons, grid systems, white space, and visual balance. Forming an effective interface system for Internet Media	3	
	2.3	<b>Interaction Design:</b> Design intuitive user interactions, navigation, menus, and forms. Micro interactions and animations.	9	
	<b>User-Centered Design &amp; Prototyping</b>		<b>12</b>	
3	3.1	<b>Conducting User Research:</b> Conduct user interviews, analyse user behaviour, and create user personas and scenarios.	3	3
	3.2	<b>Information Architecture:</b> Organize content for optimal usability through sitemaps and user flows.	3	
	3.3	<b>Prototyping &amp; Testing:</b> Prototyping tools. Build interactive prototypes, conduct usability testing, gather feedback, and iterate on designs.	6	
	<b>Understanding different Platforms</b>		<b>15</b>	
4	4.1	<b>Responsive Design:</b> Creating interfaces optimized for smaller screens and touch interactions.	9	4
	4.2	<b>Accessibility:</b> Making digital products usable by people with disabilities. Inclusive design principles focus on creating products that are accessible to all users, regardless of disabilities or limitations.	3	
	4.3	<b>Usability Testing:</b> Evaluating designs through user testing. Gathering feedback and iterating on designs. <b>Exploring emerging trends</b> and technologies in UI design.	3	
5	<b>Teacher Specific Content</b>			

<b>Teaching and Learning Approach</b>
<b>Classroom Procedure (Mode of transaction)</b> Interactive lectures, Flipped Classroom, Lecture-based Learning, Project-Based Learning, Experiential Learning, Peer Teaching, invited lecture, group discussions, Discussion-based Learning, Inquiry-Based Learning, Field based collection and interactions, Online Learning, Blended Learning, and other innovative learning approaches.
<b>Assessment Types</b>
<b>Mode of Assessment</b>
<b>A. Continuous Comprehensive Assessment (CCA)</b>
<b>Theory:</b> Quiz, Oral Presentation, Self and Peer assessments, Written test, Open book test, Problem based assignment, Field study report/Group discussion. <i>Any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Observation of practical skills, Laboratory record, <i>any other method as may be required for specific course by the course faculty.</i>
<b>B. End Semester Examination (ESE)</b>
<b>Theory:</b> Written test/Standardized Test (MCQ)/Open book/ Problem based assignments/Individual project report/Team project report, <i>any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Practical based assessment, Record, <i>any other method as may be required for specific course by the course faculty.</i>
The percentage weightage for CCA and ESE will be as per the undergraduate regulations of the college.



**References:**

1. Nicholas V. Iuppa *Interactive Design for New Media and the Web*, Routledge; 1st edition 2001
2. Lisa Graham *Principles of Interactive Design*. Delmar Cengage Learning 1998
3. Williams, Richard. *The Animator's Survival Kit*. Faber and Faber, 2009.
4. Donald A. Norman *The Design of Everyday Things*

<b>Course Code</b>	<b>24UAGDDSC206</b>
<b>Discipline</b>	<b>Design</b>
<b>Course Title</b>	<b>Brand Identity Design</b>
<b>Type of Course</b>	<b>Discipline Specific Course</b>
<b>Course Level</b>	<b>200-299</b>
<b>Lecture/Tutorial/Practical Hours</b>	<b>15/30/30</b>
<b>Credits</b>	<b>4</b>

**Course Description:**

This course provides an overview of branding and brand identity design principles and practices. Students will explore theoretical concepts, analyse case studies, and engage in hands-on exercises to understand how branding systems are developed, managed, and visually communicated.

**COURSE OUTCOMES (CO)**

<b>CO No.</b>	<b>Expected Course Outcome</b>	<b>Learning Domains *</b>	<b>PO's</b>
1	Explain the fundamentals of branding and its importance in society.	Understand	PO1, PO4
2	Identify the design principles to develop brand identity.	Apply	PO1
3	Critically assess brand communication across different mediums.	Evaluate	PO1, PO2, PO3
4	Build visual identity systems that effectively communicate brand values and personality	Create	PO1, PO3

**COURSE CONTENT**

<b>Module</b>	<b>Units</b>	<b>Description</b>	<b>Hours</b>	<b>CO No.</b>
<b>1</b>	<b>Introduction to Branding</b>		<b>10</b>	<b>1</b>
	<b>1.1</b>	Defining and Significance of Branding - The Impact of Branding on Business	2	
	<b>1.2</b>	Perceiving the target audience and market research- Developing brand positioning and differentiation from other competitors	3	
	<b>1.3</b>	Brand identity- Fundamentals of brand identity design	5	
<b>2</b>	<b>Brand Identity</b>		<b>25</b>	<b>2</b>
	<b>2.1</b>	Fundamentals of brand style guides	5	
	<b>2.2</b>	Logo Creation: Types of logo -Logo design process.	10	
	<b>2.3</b>	Branding and Typography- Typography hierarchy and readability Exploring Colour Theory in Branding and Selecting Brand Colour Schemes	10	
<b>3</b>	<b>Visual Brand Representation</b>		<b>20</b>	<b>3</b>
	<b>3.1</b>	Implementing brand identity across various platforms (print, web, social media, etc.)	10	

		Designing collaterals: business cards, letterheads, packaging, etc.		
	<b>3.2</b>	Advertising and Campaigns Case studies of different competitors in branding	10	
<b>4</b>	<b>Project Work</b>		<b>20</b>	<b>4</b>
	4.1	Branding project	20	
<b>5</b>	<b>Teacher Specific Content</b>			

<b>Teaching and Learning Approach</b>	
<b>Classroom Procedure (Mode of transaction)</b> Interactive lectures, Flipped Classroom, Lecture-based Learning, Project-Based Learning, Experiential Learning, Peer Teaching, invited lecture, group discussions, Discussion-based Learning, Inquiry-Based Learning, Field based collection and interactions, Online Learning, Blended Learning, and other innovative learning approaches.	
<b>Assessment Types</b>	
<b>Mode of Assessment</b>	
<b>A. Continuous Comprehensive Assessment (CCA)</b>	
<b>Theory:</b> Quiz, Oral Presentation, Self and Peer assessments, Written test, Open book test, Problem based assignment, Field study report/Group discussion. <i>Any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Observation of practical skills, Laboratory record, <i>Any other method as may be required for specific course by the course faculty.</i>	
<b>B. End Semester Examination (ESE)</b>	
<b>Theory:</b> Written test/Standardized Test (MCQ)/Open book/ Problem based assignments/Individual project report/Team project report, <i>any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Practical based assessment, Record, <i>any other method as may be required for specific course by the course faculty.</i>	
The percentage weightage for CCA and ESE will be as per the undergraduate regulations of the college.	

**References:**

1. Millerson, Gerald, and Jim Owens. *Video Production Handbook*. Focal Press.
2. Pizzello, Stephen. *HD Cinematography*. Focal Press.
3. Button, Bryce. *Nonlinear Editing*. Focal Press.
4. Thompson, Roy. *Grammar of the Edit*. 2nd ed.
5. Coleman, Lori Jane, and Diana Friedberg. *Make the Cut*. Focal Press.
6. Thompson, Roy. *Grammar of the Shot*. Focal Press

**Course 13**

<b>Course Code</b>	<b>24UAGDDSC207</b>
<b>Discipline</b>	<b>Animation</b>
<b>Course Title</b>	<b>Stop Motion Animation</b>
<b>Type of Course</b>	<b>Discipline Specific Course</b>
<b>Course Level</b>	<b>200-299</b>
<b>Lecture/Tutorial/Practical Hours</b>	<b>0/45/30</b>
<b>Credits</b>	<b>4</b>

**Course Description:** This course is designed to equip students with the foundational skills and techniques necessary to create compelling stop motion animations, where inanimate objects are brought to life through the meticulous manipulation of physical models frame by frame.

**COURSE OUTCOMES (CO)**

<b>CO No.</b>	<b>Expected Course Outcome</b>	<b>Learning Domains *</b>	<b>PO's</b>
1	Identify the types and workflow of stop motion animations.	Apply	PO1,PO2
2	Analyse various stop motion animation techniques.	Analyse	PO1, PO2
3	Create cut-out animation and pixilation clips.	Create	PO3, PO5, PO8
4	Develop collaborative stop motion animation group projects.	Create	PO3, PO4, PO7, PO8

**COURSE CONTENT**

<b>Module</b>	<b>Units</b>	<b>Description</b>	<b>Hours</b>	<b>CO No.</b>
<b>1</b>	<b>Introduction to Stop Motion Animation</b>		<b>10</b>	<b>1</b>
	1.1	Evolution and History of stop motion animation. Basic stop motion techniques. Equipment and materials needed for Stop Motion Animation.	5	
	1.2	Using simple materials (e.g., clay, paper cut-outs) to create short stop motion sequences. Analysing and discussing classic stop motion films.	10	
	<b>Pre-production Techniques</b>		<b>25</b>	
<b>2</b>	2.1	Storytelling fundamentals: script writing, storyboarding, shot planning and animatics. Character design and development. Basics of set design, props, and scene construction.	15	<b>2</b>
	2.2	Creating a storyboard and script for a short stop motion project. Designing and crafting simple characters, props, and sets.	10	
	<b>Production Techniques</b>		<b>20</b>	
<b>3</b>	3.1	Understanding frame rates, timing, and movement in stop motion.	10	<b>3</b>

		Animation principles: object manipulation, and character expressions. Lighting techniques and camera operation for stop motion.		
	3.2	Introduction to production software for stop motion. Hands-on exercises focusing on animation techniques and frame-by-frame movements. Experimenting with different lighting setups and camera angles.	10	
	<b>Post-production and Editing</b>		<b>20</b>	
<b>4</b>	4.1	Editing techniques specific to stop motion. Editing and refining stop motion sequences using software.	10	<b>4</b>
	4.2	Incorporating sound effects, music, and voiceovers to enhance the animations. Advanced stop motion techniques (e.g., special effects, compositing). Collaborative project work: planning, execution, and finalizing a stop motion animation.	10	
	4.3	Final Project	10	
<b>5</b>	<b>Teacher Specific Content</b>			

<b>Teaching and Learning Approach</b>	
<b>Classroom Procedure (Mode of transaction)</b> Interactive lectures, Flipped Classroom, Lecture-based Learning, Project-Based Learning, Experiential Learning, Peer Teaching, invited lecture, group discussions, Discussion-based Learning, Inquiry-Based Learning, Field based collection and interactions, Online Learning, Blended Learning, and other innovative learning approaches.	
<b>Assessment Types</b>	
<b>Mode of Assessment</b>	
<b>A. Continuous Comprehensive Assessment (CCA)</b>	
<b>Theory:</b> Quiz, Oral Presentation, Self and Peer assessments, Written test, Open book test, Problem based assignment, Field study report/Group discussion. <i>Any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Observation of practical skills, Laboratory record, <i>Any other method as may be required for specific course by the course faculty.</i>	
<b>B. End Semester Examination (ESE)</b>	
<b>Theory:</b> Written test/Standardized Test (MCQ)/Open book/ Problem based assignments/Individual project report/Team project report, <i>any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Practical based assessment, Record, <i>any other method as may be required for specific course by the course faculty.</i>	
The percentage weightage for CCA and ESE will be as per the undergraduate regulations of the college.	

**References:**

1. Wells, Barry. *Basics Animation 03: Stop-motion*. AVA Publishing, 2008.
2. Borgenicht, David. *The Complete Idiot's Guide to Stop Motion Animation*. Alpha, 2011.
3. Sito, Tom. *Moving Innovation: A History of Computer Animation*. MIT Press, 2013.
4. Purves, Barry. *Stop Motion: Passion, Process and Performance*. CRC Press, 2008.
5. Beane, Angela. *The Art of Stop-Motion Animation*. Thomson Course Technology, 2007.

## Course 14

<b>Course Code</b>	<b>24UAGDDSC208</b>
<b>Discipline</b>	<b>Animation</b>
<b>Course Title</b>	<b>3D Character Arts</b>
<b>Type of Course</b>	<b>Discipline Specific Course</b>
<b>Course Level</b>	<b>200-299</b>
<b>Lecture/Tutorial/Practical Hours</b>	<b>0/60/0</b>
<b>Credits</b>	<b>4</b>
<b>Course Description:</b>	
<p>This course is an introduction to the exciting world of 3D character creation for undergraduate students. You will delve into the design principles, technical skills, and creative processes used to bring characters to life in the digital realm. Through a combination of lectures, demonstrations, and hands-on projects, you will gain a solid foundation in 3D modelling, sculpting, texturing, and rigging, all geared towards character development for animation, games, and other interactive media.</p>	

## COURSE OUTCOMES (CO)

<b>CO No.</b>	<b>Expected Course Outcome</b>	<b>Learning Domains *</b>	<b>PO's</b>
1	Interpret and discuss the significance of various 3D art techniques and materials.	Understand	PO1, PO5
2	Create visual elements suitable for compositing as optical and visual effects	Create	PO2, PO3
3	Create workflows and pipelines for compositing	Create	PO3, PO7
4	Create digital images and effects that explore both experimental and conventional digital and optical techniques	Create	PO1, PO2, PO8

## COURSE CONTENT

<b>Module</b>	<b>Units</b>	<b>Description</b>	<b>Hours</b>	<b>CO No.</b>
<b>1</b>	<b>Introduction to 3D Character Animation</b>		<b>6</b>	<b>1</b>
	<b>1.1</b>	Learning of 12 Animation principles, animating on exercises for each animation principles	1	
	<b>1.2</b>	Stick drawings of character poses for reference, understanding 3d Character Rig controls and its functionalities, Understanding IK/FK switch options, setting up 3d character strong poses	2	
	<b>1.3</b>	Character placement registration, balanced pose, hip vs shoulder arcs, breaking symmetry, weak poses to strong poses	2	
	<b>1.4</b>	Silhouette check in orthographic views, line of action.	1	
<b>2</b>	<b>Character Body Mechanism</b>		<b>16</b>	<b>2</b>
	<b>2.1</b>	Body mechanics of biped character locomotion, full character walk, run, interact with weight, blending different actions to create complex scenes with an emphasis on balance, direction changes, action, realistic force	2	

	2.2	Understanding and applying the functionalities of Ik/Fk switching, Quadruped locomotion, walk, run, jump, galloping	10	
	2.3	Dialogue acting shot, lip sync, advanced posing and animation, expressive character animation with body mechanics	2	
	2.4	Interaction with multiple characters, objects, action reaction timing, fine tuning response timing	2	
	<b>Facial Animation</b>		<b>20</b>	
<b>3</b>	3.1	Animating close-up shot to learn convincing facial acting, method acting	4	<b>3</b>
	3.2	Character's emotions, appealing facial posing	10	
	3.3	Refinement in the performance	2	
	3.4	animation graph editor fine tuning, smoothing animation curves, applying animation principles	4	
	<b>Refinement</b>		<b>18</b>	
<b>4</b>	4.1	Final refinement on appeal	6	<b>4</b>
	4.2	Camera angle confirmation, Multi-cam shots execution	6	
	4.3	Playblast exporting, action continuity checking, previewing animation, ensuring animation principles, checking line of action	6	
<b>5</b>	<b>Teacher Specific Content</b>			

<b>Teaching and Learning Approach</b>	
<b>Classroom Procedure (Mode of transaction)</b> Interactive lectures, Flipped Classroom, Lecture-based Learning, Project-Based Learning, Experiential Learning, Peer Teaching, invited lecture, group discussions, Discussion-based Learning, Inquiry-Based Learning, Field based collection and interactions, Online Learning, Blended Learning, and other innovative learning approaches.	
<b>Assessment Types</b>	
<b>Mode of Assessment</b>	
<b>A. Continuous Comprehensive Assessment (CCA)</b>	
<b>Theory:</b> Quiz, Oral Presentation, Self and Peer assessments, Written test, Open book test, Problem based assignment, Field study report/Group discussion. <i>Any other method as may be required for specific course by the course faculty.</i>	
<b>Practical:</b> Observation of practical skills, Laboratory record, <i>Any other method as may be required for specific course by the course faculty.</i>	
<b>B. End Semester Examination (ESE)</b>	
<b>Theory:</b> Written test/Standardized Test (MCQ)/Open book/ Problem based assignments/Individual project report/Team project report, <i>any other method as may be required for specific course by the course faculty.</i>	
<b>Practical:</b> Practical based assessment, Record, <i>any other method as may be required for specific course by the course faculty.</i>	
The percentage weightage for CCA and ESE will be as per the undergraduate regulations of the college.	

### References:

1. Vaughan, William. *Digital Modelling. New Riders, 2011.*
2. Ahearn, Luke. *3D Game Environments: Create Professional 3D Game Worlds. 2017*
3. McKinley, Michael. *Maya Studio Projects: Game Environments and Props. Sybex, 2010.*
4. Palamar, Todd. *Mastering Autodesk Maya 2024: Autodesk Official Press. CADCIM Technologies, 8 April 2020.*
5. Ingrassia, Michael. *Maya for Games: Modelling and Texturing Techniques with Maya and Mudbox, 1st Edition. Routledge, 2008.*

## Course 15

<b>Course Code</b>	<b>24UAGDDSC301</b>
<b>Discipline</b>	<b>Design</b>
<b>Course Title</b>	<b>Web Design</b>
<b>Type of Course</b>	<b>Discipline Specific Course</b>
<b>Course Level</b>	<b>300-399</b>
<b>Lecture/Tutorial/Practical Hours</b>	<b>0/45/30</b>
<b>Credits</b>	<b>4</b>

**Course Description:** This course covers different skills and techniques that help to develop a website. Students will acquire in-depth skills and knowledge required to design and develop responsive and user-friendly websites. The course covers HTML, CSS, and foundational JavaScript techniques.

### COURSE OUTCOMES (CO)

CO No.	Expected Course Outcome	Learning Domains *	PO's
1	Interpret the function of Hypertext Mark-up Language (HTML) in Web communications and design a static webpage by applying HTML elements.	Understanding	PO1, PO3, PO5
2	Creating interactive web pages using html and style sheets	Create	PO1, PO2, PO3
3	Apply CSS for styling and layout purposes, utilizing selectors, properties, and values effectively.	Apply	PO1, PO5, PO8
4	Design responsive websites that adapt to various screen sizes using media queries.	Create	PO1, PO2, PO5, PO8

### COURSE CONTENT

Module	Units	Description	Hours	
1	<b>Web Fundamentals</b>		<b>15</b>	<b>1</b>
	<b>1.1</b>	<b>The internet:</b> Introduction- internet defined-the fundamental concepts of the Internet, web server, DNS (Domain Name System), domain name registration, IP Address, Web Protocols -web Browsers-Domain names, Basic principles involved in developing a web site, Qualities of a good website.	3	
	<b>1.2</b>	<b>Introduction to HTML:</b> Introduction to web programming. Structure and syntax. HTML Basic Formatting Tags, attributes and elements.	4	
	<b>1.3</b>	<b>Coding Links: Absolute &amp; Relative URLs:</b> Anchor tags & hrefs, Linking to other websites. Linking to pages within a website. Adding images, and other functions	4	
	<b>1.4</b>	Forms and interactive elements for user input and data collection. Importance and usage of semantic elements.	4	
	<b>Cascading Style Sheets (CSS)</b>		<b>15</b>	<b>2</b>



2	2.1	<b>Introduction to CSS:</b> CSS Syntax, CSS selectors and properties. Use CSS selectors and specificity for effective styling.	3	
	2.2	<b>Styling html pages:</b> Fonts, colours, sizes, alignment etc. Working with backgrounds and borders	3	
	2.3	<b>Basic page formatting:</b> Box model, positioning, display property. Introduction to Flexbox and Grid layout.	4	
	2.4	<b>Semantic Elements &amp; Validating HTML:</b> The header, nav, aside, & footer elements. Understanding articles & sections. Checking for errors: validating your code	5	
3	<b>Advanced web coding using HTML5 &amp; CSS3</b>		<b>18</b>	3
	3.1	Utilize CSS Flexbox and Grid for advanced layout options. Intro to animation, transition	12	
	3.2	Explore the unique layouts in accordance with content, purpose, device, user etc. Debug and troubleshoot common CSS issues.	6	
4	<b>Design and develop a responsive website</b>		<b>27</b>	4
	4.1	JavaScript fundamentals for enhancing interactions. <b>DOM manipulation:</b> Accessing and modifying HTML elements using JavaScript.	7	
	4.2	<b>Event handling:</b> Responding to user interactions like clicks, mouse movements, etc. <b>Control flow:</b> Conditional statements (if/else) and loops (for, while).	5	
	4.3	<b>Creating website:</b> Integrate HTML, CSS and JavaScript fundamentals to create a responsive and visually appealing website.	12	
	4.4	Optimize web content for performance and accessibility. Validating website. Explore current trends and emerging technologies in web design. Explore the profound impact of AI on web development.	3	
5	<b>Teacher Specific Content</b>			

<b>Teaching and Learning Approach</b>
<b>Classroom Procedure (Mode of transaction)</b> Interactive lectures, Flipped Classroom, Lecture-based Learning, Project-Based Learning, Experiential Learning, Peer Teaching, invited lecture, group discussions, Discussion-based Learning, Inquiry-Based Learning, Field based collection and interactions, Online Learning, Blended Learning, and other innovative learning approaches.
<b>Assessment Types</b>
<b>Mode of Assessment</b>
<b>A. Continuous Comprehensive Assessment (CCA)</b> <b>Theory:</b> Quiz, Oral Presentation, Self and Peer assessments, Written test, Open book test, Problem based assignment, Field study report/Group discussion. <i>Any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Observation of practical skills, Laboratory record, <i>Any other method as may be required for specific course by the course faculty.</i>
<b>B. End Semester Examination (ESE)</b> <b>Theory:</b> Written test/Standardized Test (MCQ)/Open book/ Problem based assignments/Individual project report/Team project report, <i>any other method as may be required for specific course by the course faculty.</i>

<b>Practical:</b> Practical based assessment, Record, <i>any other method as may be required for specific course by the course faculty.</i>
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The percentage weightage for CCA and ESE will be as per the undergraduate regulations of the college.
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**References:**

1. Niederst Robbins, Jennifer. *Learning Web Design: A Beginner's Guide to HTML, CSS, JavaScript, and Web Graphics*. Fourth edition. Beijing; Sebastopol, CA: O'Reilly, 2012.
2. Weinman, Lisa. *Designing for Usability: People, Principles, and Patterns for Making Software Easy to Use*. Fifth edition. Peachpit Press, 2015
3. Boucher, Andy, and Dave Wood. *Introducing Responsive Web Design*. Third edition. O'Reilly Media, Inc., 2015.

## Course 16

<b>Course Code</b>	<b>24UAGDDSC302</b>
<b>Discipline</b>	<b>Design</b>
<b>Course Title</b>	<b>Package Design</b>
<b>Type of Course</b>	<b>Discipline Specific Course</b>
<b>Course Level</b>	<b>300-399</b>
<b>Lecture/Tutorial/Practical Hours</b>	<b>0/45/30</b>
<b>Credits</b>	<b>4</b>
<b>Course Description:</b>	
This course aims to empower learners with the knowledge and practical expertise essential for product marketing and branding. It involves creating the visual and structural elements of a package that not only protects the product but also communicates the brand identity and attracts the target audience.	

### COURSE OUTCOMES (CO)

<b>CO No.</b>	<b>Expected Course Outcome</b>	<b>Learning Domains *</b>	<b>PO's</b>
1	Relate the relationship between form and function of packaging.	Understand	PO1, PO2
2	Identify branding as a major key of packaging success.	Apply	PO3, PO4, PO5, PO6
3	Importance of the trends, printing techniques and technology in the package design industry.	Evaluate	PO2, PO5, PO8
4	Develop innovative and attractive brand package design solutions.	Create	PO1, PO3, PO5

### COURSE CONTENT

<b>Module</b>	<b>Units</b>	<b>Description</b>	<b>Hours</b>	<b>CO No.</b>
<b>1</b>	<b>Introduction to packages</b>		<b>12</b>	<b>1</b>
	<b>1.1</b>	Historical Evolution of Packaging	3	
	<b>1.2</b>	Marketing Strategies and Packaging	3	
	<b>1.3</b>	Technical and Functional Considerations, Materials, and Evaluation of Package Design Success	6	
<b>2</b>	<b>Packaging structure and anatomy</b>		<b>21</b>	<b>2</b>
	<b>2.1</b>	Packaging structure and anatomy, measuring and differentiation, sketches with three-dimensional perspective drawing. Design packaging that is practical and protects the product during transportation and storage. Consider the size, shape, and materials for optimal functionality.	6	

	2.2	Consider different shapes and sizes, material selection, eco-friendly possibilities, application, and use of different materials in different scenarios. Choose appropriate materials based on the product's characteristics and environmental considerations. Consider factors such as sustainability, durability, and cost.	6	
	2.3	Practical Training with prototype making: cartons, envelopes, bottle labels, carry bags, box packs, etc. Create initial sketches and rough prototypes of the packaging design concepts. This helps to visualize the ideas in a tangible form and identify potential challenges early on.	9	
	<b>Typography and layout designing structure</b>		<b>22</b>	
3	3.1	Software advancement: Create symbols, icons, and essential Illustrations, Using photos and graphical elements, Layout, and design hierarchy. Draw graphics and text editing techniques. Use high-quality graphics and imagery that align with the brand message. Visual elements should be engaging and relevant to the product.	8	3
	3.2	Typography and layout designing structure, Finalize the typography and graphics for the packaging. Ensure that all text is clear, legible, and aligned with the brand's messaging.	8	
	3.3	Utility of packaging improvisational ideas from templates editing and enhancing techniques, makes your product stand out on the shelf by creating a unique and distinctive design. Consider the competition and find ways to differentiate your product	6	
	<b>Production Training</b>		<b>20</b>	
4	4.1	Production Training: Create high-fidelity mock-ups or prototypes of the final packaging design. This allows for a realistic evaluation of how the design will look and function in the real world.	6	4
	4.2	Prepare final production files and specifications for the packaging. Reflects the overall brand identity, Branding with creative package design, ensures that the files are ready for printing or manufacturing, including any die-cutting or special finishes.	6	
	4.3	Packaging mock-ups and packaging portfolio studies and developing, Guide students in creating a portfolio showcasing their best packaging designs. This is a crucial step as they prepare to enter the job market. Conclude the course with a final showcase or exhibition where students present their completed packaging design projects. Invite industry professionals, peers, and other faculty members to provide feedback.	8	
5	<b>Teacher Specific Content</b>			

### Teaching and Learning Approach

#### Classroom Procedure (Mode of transaction)

Interactive lectures, Flipped Classroom, Lecture-based Learning, Project-Based Learning, Experiential Learning, Peer Teaching, invited lecture, group discussions, Discussion-based Learning, Inquiry-Based Learning, Field based collection and interactions, Online Learning, Blended Learning, and other innovative learning approaches.

#### Assessment Types

**Mode of Assessment****A. Continuous Comprehensive Assessment (CCA)**

**Theory:** Quiz, Oral Presentation, Self and Peer assessments, Written test, Open book test, Problem based assignment, Field study report/Group discussion. *Any other method as may be required for specific course by the course faculty.*

**Practical:** Observation of practical skills, Laboratory record, *Any other method as may be required for specific course by the course faculty.*

**B. End Semester Examination (ESE)**

**Theory:** Written test/Standardized Test (MCQ)/Open book/ Problem based assignments/Individual project report/Team project report, *any other method as may be required for specific course by the course faculty.*

**Practical:** Practical based assessment, Record, *any other method as may be required for specific course by the course faculty.*

The percentage weightage for CCA and ESE will be as per the undergraduate regulations of the college.

**References:**

1. Roth, Laszlo and George Wybenga. *The Packaging Designer's Book of Patterns*. June 15, 1991
2. Roncarelli, Sarah and Candace Ellicott. *Packaging Essentials: 100 Design Principles for Creating Packages*. June 1, 2010.
3. *Advanced Packaging (Structural Package Design)*. Multilingual edition, Pepin Press, May 16, 2010.
4. DuPuis, Steven and John Silva. *Package Design Workbook: The Art and Science of Successful Packaging*. June 1, 2011.
5. Jackson, Paul. *Structural Packaging: Design Your Own Boxes and 3D Forms*. February 15, 2012.
6. Klimchuk, Marianne Rosner and Sandra A. Krasovec. *Packaging Design: Successful Product Branding From Concept to Shelf*. January 14, 2013.
7. Jackson, Paul. *Creative Packaging: One-Piece Packaging Solutions*. August 1, 2022.

**Course 17**

<b>Course Code</b>	<b>24UAGDDSC303</b>
<b>Discipline</b>	<b>Design</b>
<b>Course Title</b>	<b>Motion Graphics &amp; Compositing</b>
<b>Type of Course</b>	<b>Discipline Specific Course</b>
<b>Course Level</b>	<b>300-399</b>
<b>Lecture/Tutorial/Practical Hours</b>	<b>0/45/30</b>
<b>Credits</b>	<b>4</b>
<b>Course Description:</b> The Motion Graphics course teaches the art of blending graphic design with animation. Students learn design basics like composition, colour, and typography, then dive into animation techniques using industry-standard software. They create dynamic visuals, from kinetic typography to 3D effects, and learn to sync their work with audio for maximum impact. With hands-on projects, they build a portfolio ready for careers in graphic design, advertising, or video production. Prerequisites include basic graphic design knowledge and familiarity with design software. After finishing, students leave with a strong grasp of motion graphics and a standout portfolio.	

**COURSE OUTCOMES (CO)**

<b>CO No.</b>	<b>Expected Course Outcome</b>	<b>Learning Domains *</b>	<b>PO's</b>
1	Build precision, control and fluency within Visual Effects and Motion Graphics work environments.	Understand	PO1, PO2, PO8
2	Identify vocabulary and visual language for motion graphic principles and ethics.	Apply	PO1, PO3, PO6
3	Develop an understanding of motion graphic design principles in applied practice.	Create	PO1, PO2, PO5
4	Create motion graphic project with requirement of 2D,3D elements and real footages	Create	PO3, PO4, PO5

**COURSE CONTENT**

<b>Module</b>	<b>Units</b>	<b>Description</b>	<b>Hours</b>	<b>CO No.</b>
<b>1</b>	<b>Introduction of motion graphics</b>		15	<b>1</b>
	1.1	What is motion graphics? Introduction to Software's	5	
	1.2	What are graphical elements & Importing	5	
	1.3	Software used for motion graphics, Importing assets.	5	

2	<b>Basic Motion Graphics Techniques</b>		<b>19</b>	2
	2.1	Layer Management: Shape layer animation, Layer Styles, Graph Editor, Rendering formats, Solid layer, Null objects, Text layer and Guide layer.	5	
	2.2	Concepts in parenting: Parent and child layer, adding expressions, Animating masks, Basic Transform Properties, Easing your animation, Key frame velocity, Motion blur	7	
	2.3	Mask: Motion Sketch, 3d layer, creating masks, Blending Modes, Auto trace, Puppet tool	7	
3	<b>Basic Motion Graphics Effects</b>		<b>20</b>	3
	3.1	Basic Effects: Usage of downloaded lighting effects, Manage shadow.	5	
	3.2	Basic of 3D camera movement	5	
	3.3	Rendering techniques.	8	
4	<b>Practicum</b>		<b>17</b>	4
	4.1	Product Motion Poster	8	
	4.2	Movie Titling and motion poster	7	
	4.3	Promotion videos	8	
5	<b>Teacher Specific Content</b>			

<b>Teaching and Learning Approach</b>	
<b>Classroom Procedure (Mode of transaction)</b> Interactive lectures, Flipped Classroom, Lecture-based Learning, Project-Based Learning, Experiential Learning, Peer Teaching, invited lecture, group discussions, Discussion-based Learning, Inquiry-Based Learning, Field based collection and interactions, Online Learning, Blended Learning, and other innovative learning approaches.	
<b>Assessment Types</b>	
<b>Mode of Assessment</b>	
<b>A. Continuous Comprehensive Assessment (CCA)</b> <b>Theory:</b> Quiz, Oral Presentation, Self and Peer assessments, Written test, Open book test, Problem based assignment, Field study report/Group discussion. <i>Any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Observation of practical skills, Laboratory record, <i>Any other method as may be required for specific course by the course faculty.</i>	
<b>B. End Semester Examination (ESE)</b> <b>Theory:</b> Written test/Standardized Test (MCQ)/Open book/ Problem based assignments/Individual project report/Team project report, <i>any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Practical based assessment, Record, <i>any other method as may be required for specific course by the course faculty.</i>	
The percentage weightage for CCA and ESE will be as per the undergraduate regulations of the college.	

#### References:

1. Thinking with Type. Motion Graphics Handbook: *Principles and Techniques*. AVA Publishing, 2012.
2. Williams, Richard. *The Animator's Survival Kit*. Faber & Faber, 2009.
3. Garcia, Maria. Visual Effects Handbook: *Techniques and Tools for Motion Graphics*. Focal Press, 2019.
4. Smith, John. Visual Effects and Motion Graphics: *Principles and Practice*. Oxford University Press, 2020.

**Course 18**

<b>Course Code</b>	<b>24UAGDDSC304</b>
<b>Discipline</b>	<b>Design</b>
<b>Course Title</b>	<b>Design Project</b>
<b>Type of Course</b>	<b>Discipline Specific Course</b>
<b>Course Level</b>	<b>300 - 399</b>
<b>Lecture/Tutorial/Practical Hours</b>	<b>0/45/30</b>
<b>Credits</b>	<b>4</b>
<b>Course Description:</b> This project enables students to expertise in Design Skills Development, generate creative and innovative design solutions for a self-chosen problem or project, identify design problems and develop effective solutions. Students will get an opportunity to critically analyze design challenges and make appropriate decisions.	

**COURSE OUTCOMES (CO)**

<b>CO No.</b>	<b>Expected Course Outcome</b>	<b>Learning Domains *</b>	<b>PO's</b>
1	Identify brand identity output production techniques and applications.	Apply	PO1, PO2
2	Develop a well-organized brand identity manual.	Apply	PO3, PO5
3	Examine the acquired knowledge to create various branding outputs in a practical way to adapt with industry standards.	Evaluate	PO2, PO8
4	Create their own brands using principles of design and composition techniques.	Create	PO1, PO6, PO7

**COURSE CONTENT**

<b>Module</b>	<b>Units</b>	<b>Description</b>	<b>Hours</b>	<b>CO No.</b>
<b>1</b>	<b>Branding and Advertising</b>		<b>20</b>	<b>1</b>
	<b>1.1</b>	Gain insights into contemporary branding and advertising by comprehending their definitions, scope, and current trends and tactics in a constructive manner.	4	
	<b>1.2</b>	Acquainted with the essentials of subject briefing and research methods, serving as a preliminary foundation for the creation of brand identity.	6	
	<b>1.3</b>	Conceptualize and sketch the design for various brand identity design outputs.	6	
	<b>1.4</b>	Revision of the conceptualization and sketches of the brand identity design through collaborative learning and consultation with experts.	4	
<b>2</b>	<b>Brand Identity Manual Creation</b>		<b>20</b>	<b>2</b>
	<b>2.1</b>	Craft a logo based on the conceptualized sketch using appropriate software tools.	6	
	<b>2.2</b>	Develop Logo Style Guides with precise and comprehensive definitions.	3	
	<b>2.3</b>	Recognize the significance of brand stationery design and generate stationary design outputs tailored to the subject.	5	
	<b>2.4</b>	Compile a comprehensive Brand Identity Manual.	6	



3	<b>Prepare Advertisement outputs</b>		<b>20</b>	3
	3.1	Creating a compelling advertisement strategy conducting thorough media research and accurate media planning.	6	
	3.2	Generate diverse advertisement design outputs tailored for various media platforms.	7	
	3.3	Application of UI/UX in brand publicity & advertising. Preparation of Web & Mobile App UI design.	4	
	3.4	Familiarize yourself with the ethical considerations in advertising and other forms of commercial art.	3	
4	<b>Preparing Publication outputs</b>		<b>15</b>	4
	4.1	Compilation of the created branding outputs and conduct a thorough review for enhancement and improvement.	5	
	4.2	Cross-check the application of acquired knowledge of design principles and elements, identifying areas requiring revisions or improvements.	3	
	4.3	Gain a comprehensive understanding of printing theory and colour space, including proficiency in applying process and spot colours in design. Familiarize yourself with different printing papers and their specifications to enhance your knowledge in print media.	4	
	4.4	Print and produce the final project for the Continuous Comprehensive Assessment (CCA).	3	
5	<b>Teacher Specific Content</b>			

<b>Teaching and Learning Approach</b>
<b>Classroom Procedure (Mode of transaction)</b> Interactive lectures, Flipped Classroom, Lecture-based Learning, Project-Based Learning, Experiential Learning, Peer Teaching, invited lecture, group discussions, Discussion-based Learning, Inquiry-Based Learning, Field based collection and interactions, Online Learning, Blended Learning, and other innovative learning approaches.
<b>Assessment Types</b>
<b>Mode of Assessment</b>
<b>A. Continuous Comprehensive Assessment (CCA)</b> <b>Theory:</b> Quiz, Oral Presentation, Self and Peer assessments, Written test, Open book test, Problem based assignment, Field study report/Group discussion. <i>Any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Observation of practical skills, Laboratory record, <i>Any other method as may be required for specific course by the course faculty.</i>
<b>B. End Semester Examination (ESE)</b> <b>Theory:</b> Written test/Standardized Test (MCQ)/Open book/ Problem based assignments/Individual project report/Team project report, <i>any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Practical based assessment, Record, <i>any other method as may be required for specific course by the course faculty.</i>
The percentage weightage for CCA and ESE will be as per the undergraduate regulations of the college.

**References:**

1. Rand, Paul. *Inspiration and Process in Design*. Moleskine Books 2019
2. Millman, Debbie. *Brand Thinking and Other Noble Pursuits*. Allworth 2013
3. Fletcher, Alan. *The Art of Looking Sideways*. Phaidon Press 2001
4. Caples, John, and Fred Hahn. *Tested Advertising Methods*. Prentice Hall; 5th edition 1998
5. Hopkins, Claude C. *Scientific Advertising*. Merchant Books; Illustrated edition 2014

## Course 19

<b>Course Code</b>	<b>24UAGDDSC305</b>
<b>Discipline</b>	<b>Animation</b>
<b>Course Title</b>	<b>Animated Short Film</b>
<b>Type of Course</b>	<b>Discipline Specific Course</b>
<b>Course Level</b>	<b>300-399</b>
<b>Lecture/Tutorial/Practical Hours</b>	<b>0/45/30</b>
<b>Credits</b>	<b>4</b>
<b>Course Description:</b>	
This course is meant to introduce the student to the world of 3D. In this course, the student will learn about how to work in 3D space, model, texture, apply lights and finally take a render output of his/her creation.	

### COURSE OUTCOMES (CO)

CO No.	Expected Course Outcome	Learning Domains *	PO's
1	Build Concepts and develop story	create	PO1, PO2, PO3, PO4, PO5
2	Create Script and Screenplay, Animatics and Storyboard	Create	PO1, PO3, PO5
3	Analyse characteristics of well-designed and executed animation.	Analyse	PO1, PO2
4	Demonstrate the skills through final output.	Create	PO1, PO2, PO3, PO7

### COURSE CONTENT

Module	Units	Description	Hours	CO No.
1	<b>Pre-Production Part</b>		<b>5</b>	1
	1.1	Create all the pre-production documents for animated short films. Choose any of the animation Medium (Cel, Cut-out, Claymation, Sand Animation, Puppet Animation, Pixilation, 2D, 3DI)	5	
2	<b>Production Part</b>		<b>15</b>	2
	2.1	This production stage may vary according to the chosen animation technique	2	
	2.2	Production part must be planned according to the availability of time, equipment, tools, software's and the requirements of the animation technique selected.	3	
	2.3	learners should complete all the production process on time, keeping all the deadlines.	10	
3	<b>Post Production Part</b>		<b>10</b>	3
	3.1	Adding audio, arranging Scene's shots, Subtitles	10	
4	<b>Exterior &amp; Interior Modelling</b>		<b>5</b>	4
	4.1	Analysing the Overall quality of the final output through Project Guide.	5	
5		<b>Teacher Specific Content</b>		

<b>Teaching and Learning Approach</b>
<b>Classroom Procedure (Mode of transaction)</b> Interactive lectures, Flipped Classroom, Lecture-based Learning, Project-Based Learning, Experiential Learning, Peer Teaching, invited lecture, group discussions, Discussion-based Learning, Inquiry-Based Learning, Field based collection and interactions, Online Learning, Blended Learning, and other innovative learning approaches.
<b>Assessment Types</b>
<b>Mode of Assessment</b>
<b>A. Continuous Comprehensive Assessment (CCA)</b>
<b>Theory:</b> Quiz, Oral Presentation, Self and Peer assessments, Written test, Open book test, Problem based assignment, Field study report/Group discussion. <i>Any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Observation of practical skills, Laboratory record, <i>Any other method as may be required for specific course by the course faculty.</i>
<b>B. End Semester Examination (ESE)</b>
<b>Theory:</b> Written test/Standardized Test (MCQ)/Open book/ Problem based assignments/Individual project report/Team project report, <i>any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Practical based assessment, Record, <i>any other method as may be required for specific course by the course faculty.</i>
The percentage weightage for CCA and ESE will be as per the undergraduate regulations of the college.

**References:**

1. Murdock, K. L. *Autodesk Maya 2024 Basic Guide*. 2023.
2. Murdock, K. L. *Autodesk 3ds Max 2024 Basic Guide*. 2023.
3. Venancio, V. M. *Blender 3D Asset Creation for the Metaverse*. 2023.
4. Cusson, R., & Cardoso, J. *Realistic Architectural Visualization with 3ds Max and mental ray (1st ed.)*. Focal Press. 2007
5. Gahan, A. *3D Automotive Modelling: An Insider's Guide to 3D Car Modelling and Design for Games and Film (1st ed.)*. Routledge.2012
6. Avgerakis, G.. *Digital Animation Bible: Creating Professional Animation with 3ds Max, Lightwave, and Maya (1st ed.)*. McGraw-Hill/TAB Electronics. 2003

**Course 20**

<b>Course Code</b>	<b>24UAGDDSC401</b>
<b>Discipline</b>	<b>Animation</b>
<b>Course Title</b>	<b>3D Advanced Modelling and Texturing</b>
<b>Type of Course</b>	<b>Discipline Specific Course</b>
<b>Course Level</b>	<b>400-499</b>
<b>Lecture/Tutorial/Practical Hours</b>	<b>0/60/0</b>
<b>Credits</b>	<b>4</b>
<b>Course Description:</b> This course is designed to deepen students' understanding and proficiency in advanced 3D modelling and texturing techniques used in animation, visual effects, and game development. Through a combination of lectures, demonstrations, hands-on exercises, and projects, students will explore advanced modelling workflows, surface detailing, UV mapping, texture painting, and procedural texturing. Emphasis will be placed on developing high-quality 3D assets for use in various digital media productions.	

**COURSE OUTCOMES (CO)**

<b>CO No.</b>	<b>Expected Course Outcome</b>	<b>Learning Domains *</b>	<b>PO</b>
1	Develop the skill of 3D product modelling skills	Develop	PO 1, PO 2
2	Develop the skill of advanced detailing in the models	Develop	PO 1, PO 3
3	Create accurate UV Unwraps	Create	PO 1, PO 2
4	Apply proper texturing on UV Maps and lighting	Apply	PO 1, PO 2, PO 5
5	Create high quality render output	Create	PO 1, PO 2, PO 3

**COURSE CONTENT**

<b>Module</b>	<b>Units</b>	<b>Description</b>	<b>Hours</b>	<b>CO No.</b>
<b>1</b>	<b>Art of Polygon modelling</b>		<b>15</b>	<b>1</b>
	1.1	Polygon modelling techniques: - Product modelling_Air conditioner - Bevel Techniques for Detailing Advanced UV Unwrapping and Texturing of the product.	3	
	1.2	Gaming headphone modelling -Concepts and blue prints - Adding more details to the models - UV Unwrapping and texturing - Adding 3-point lighting for the model Final render	3	
	1.3	Assault rifle modelling -Concepts and blue prints - Adding more details to the models - UV Unwrapping and texturing	9	

		- Adding 3-point lighting for the model and 360 render		
2	<b>Landscape creation through sculpting</b>		<b>24</b>	<b>2</b>
	2.1	- Landscape modelling - Sculpting on the surface	12	
	2.2	- Detailing for Mountains and terrains - UV Unwrapping and texturing / using layer shader	6	
	2.3	Rendering using HDRI Images ,Lighting and rendering	6	
3			<b>15</b>	<b>3</b>
	3.1	- Alien Modelling - Blue prints and basic topology	1	
	3.2	Modelling body , legs , hands, head	9	
	3.3	Advanced detailing on body armour and head	5	
4	<b>Advanced Texturing through substance painter and Zbrush</b>		<b>6</b>	<b>4,5</b>
	4.1	Introduction to Substance painter	1	
	4.2	File formats , brushes , shaders	2	
	4.3	Light and Shadow Reflected light, Overhang shadow, Highlight, Core shadow, Objects and shapes in perspective with light and shade	3	
5		<b>Teacher Specific Content</b>		

<b>Teaching and Learning Approach</b>	
<b>Classroom Procedure (Mode of transaction)</b> Interactive lectures, Flipped Classroom, Lecture-based Learning, Project-Based Learning, Experiential Learning, Peer Teaching, invited lecture, group discussions, Discussion-based Learning, Inquiry-Based Learning, Field based collection and interactions, Online Learning, Blended Learning, and other innovative learning approaches.	
<b>Assessment Types</b>	
<b>Mode of Assessment</b>	
<b>A. Continuous Comprehensive Assessment (CCA)</b>	
<b>Theory:</b> Quiz, Oral Presentation, Self and Peer assessments, Written test, Open book test, Problem based assignment, Field study report/Group discussion. <i>Any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Observation of practical skills, Laboratory record, <i>Any other method as may be required for specific course by the course faculty.</i>	
<b>B. End Semester Examination (ESE)</b>	
<b>Theory:</b> Written test/Standardized Test (MCQ)/Open book/ Problem based assignments/Individual project report/Team project report, <i>any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Practical based assessment, Record, <i>any other method as may be required for specific course by the course faculty.</i>	
The percentage weightage for CCA and ESE will be as per the undergraduate regulations of the college.	

### References:

1. Murdock, K. L. (2023). *Autodesk Maya 2024 Basic Guide*. Force-Dynamic Life Drawing for Animators: Michael D Mattessi 2006
2. Autodesk Knowledge
3. Autodesk Maya 2019

## Course 21

<b>Course Code</b>	<b>24UAGDDSC402</b>
<b>Discipline</b>	<b>Animation</b>
<b>Course Title</b>	<b>3D Effects and Dynamics</b>
<b>Type of Course</b>	<b>Discipline Specific Course</b>
<b>Course Level</b>	<b>400-499</b>
<b>Lecture/Tutorial/Practical Hours</b>	<b>0/60/0</b>
<b>Credits</b>	<b>4</b>
<b>Course Description:</b> This course provides an in-depth exploration of 3D effects and dynamics simulation techniques used in animation, visual effects, and motion graphics production. Through a combination of lectures, demonstrations, hands-on exercises, and projects, students will learn how to create dynamic simulations of natural phenomena, particle effects, fluid dynamics, rigid body dynamics, and other complex interactions within 3D environments. Emphasis will be placed on understanding the underlying principles of physics, mastering industry-standard simulation tools, and integrating dynamic effects seamlessly into visual projects.	

### COURSE OUTCOMES (CO)

<b>CO No.</b>	<b>Expected Course Outcome</b>	<b>Learning Domains *</b>	<b>PO</b>
1	Understand the principles of 3D effects and dynamics	Analyse	PO1
2	Learn various techniques for creating dynamic effects in 3D environments	Create	PO1, PO2
3	Develop skills in using industry-standard software for effects and dynamics	Create	PO1, PO8
4	Apply learned concepts to create visually appealing 3D scenes and animations	Create	PO1, PO3, PO5

### COURSE CONTENT

<b>Module</b>	<b>Units</b>	<b>Description</b>	<b>Hours</b>	<b>CO No.</b>
<b>1</b>	<b>Introduction to 3D Effects</b>		<b>14</b>	<b>1</b>
	1.1	Overview of 3D effects and dynamics, Understanding shaders and materials, Introduction to particle systems, Basic animation principles	6	
	1.2	Creating and controlling particle systems, Particle emission properties.	4	
	1.3	Particle behaviours and interactions, Case studies and practical examples	4	
<b>2</b>	<b>Simulating Natural Phenomena</b>		<b>15</b>	<b>2</b>
	2.1	Introduction to fluid dynamics. Simulating fire, smoke, and explosions	6	
	2.2	Water simulation techniques	5	
	3.3	Integrating dynamics with particle systems	4	
<b>3</b>	<b>Physics-Based Simulations</b>		<b>16</b>	<b>3</b>
	3.1	Understanding physics engines Rigid body dynamics	10	

	3.2	Soft body dynamics	3	
	3.3	Constraints and collisions	3	
	<b>Advanced Effects Techniques</b>		<b>15</b>	
<b>4</b>	4.1	Advanced shader effects-Procedural animation techniques Integrating effects with character animation. Case studies and industry applications	5	<b>4</b>
	4.2	Individual or group projects applying learned techniques Project presentations and critique. Review of key concepts and techniques Final project showcase	10	
<b>5</b>		<b>Teacher Specific Content</b>		

<b>Teaching and Learning Approach</b>	
<b>Classroom Procedure (Mode of transaction)</b> Interactive lectures, Flipped Classroom, Lecture-based Learning, Project-Based Learning, Experiential Learning, Peer Teaching, invited lecture, group discussions, Discussion-based Learning, Inquiry-Based Learning, Field based collection and interactions, Online Learning, Blended Learning, and other innovative learning approaches.	
<b>Assessment Types</b>	
<b>Mode of Assessment</b>	
<b>A. Continuous Comprehensive Assessment (CCA)</b>	
<b>Theory:</b> Quiz, Oral Presentation, Self and Peer assessments, Written test, Open book test, Problem based assignment, Field study report/Group discussion. <i>Any other method as may be required for specific course by the course faculty.</i>	
<b>Practical:</b> Observation of practical skills, Laboratory record, <i>Any other method as may be required for specific course by the course faculty.</i>	
<b>B. End Semester Examination (ESE)</b>	
<b>Theory:</b> Written test/Standardized Test (MCQ)/Open book/ Problem based assignments/Individual project report/Team project report, <i>any other method as may be required for specific course by the course faculty.</i>	
<b>Practical:</b> Practical based assessment, Record, <i>any other method as may be required for specific course by the course faculty.</i>	
The percentage weightage for CCA and ESE will be as per the undergraduate regulations of the college.	

**References:**

1. Advanced Maya Texturing and Lighting with CDROM: Lee Lanier, Wiley Publishing
2. Texturing and Modelling: A Procedural Approach: David S. Ebert

**Course 22**

<b>Course Code</b>	<b>24UAGDDSC403</b>
<b>Discipline</b>	<b>Design</b>
<b>Course Title</b>	<b>Printing and Publishing</b>
<b>Type of Course</b>	<b>Discipline Specific Course</b>
<b>Course Level</b>	<b>400-499</b>
<b>Lecture/Tutorial/Practical Hours</b>	<b>0/45/30</b>
<b>Credits</b>	<b>4</b>
<b>Course Description:</b>	
This course explores advanced techniques and practices in printing and publishing. It provides a thorough examination of different printing technologies, production processes, and a variety of publishing platforms. Students will gain a deep understanding of the intricacies involved in the creation and dissemination of printed materials, as well as digital publications. Through theoretical study, practical demonstrations, and hands-on projects, participants will develop the skills necessary to excel in the dynamic landscape of modern printing and publishing industries.	

**COURSE OUTCOMES (CO)**

<b>CO No.</b>	<b>Expected Course Outcome</b>	<b>Learning Domains *</b>	<b>PO</b>
1	Understanding advanced printing methods and how they work.	Understand	PO1
2	Analyse which printing method to use for different design needs.	Analyse	PO1, PO2
3	Understand why checking quality in printing is crucial.	Understand	PO1
4	Create new and practical ideas for both print and digital designs.	Create	PO3, PO5, PO8

**COURSE CONTENT**

<b>Module</b>	<b>Units</b>	<b>Description</b>	<b>Hours</b>	<b>CO No.</b>
<b>1</b>	<b>Basics of Printing Technologies</b>		<b>20</b>	<b>1</b>
	<b>1.1</b>	Introduction to Printing Methods: Overview of Offset, Digital, and Flexography printing	6	
	<b>1.2</b>	Understanding Offset Printing: Explanation of Web Offset and Sheet-fed Offset	7	
	<b>1.3</b>	Offset Lithography Essentials: Basic principles of offset lithography and its process	7	
<b>2</b>	<b>Printing Preparation Process</b>		<b>20</b>	<b>2</b>
	<b>2.1</b>	Understanding design principles for print media	6	



	2.2	Managing Colour - Exploring colour spaces, profiles, and calibration for accurate printing	3	
	2.3	Prepress Procedures - File preparation and prepress workflow management	11	
	<b>Printing end process</b>		<b>20</b>	
3	3.1	Folding and Cutting Methods Techniques for folding and cutting printed materials	6	3
	3.2	Binding Approaches -Overview of various methods for binding printed materials	7	
	3.3	Enhancements and Final Touches - Adding special effects and final embellishments to printed materials	7	
	Publishing Fundamentals		<b>15</b>	
4		Introduction to Publishing - Overview of the publishing industry and its role	5	4
	3.4	Editorial Process - Manuscript preparation, editing, and proofreading	3	
	3.5	Printing and Distribution - Understanding the printing process and distribution channels	7	
5		<b>Teacher Specific Content</b>		

<b>Teaching and Learning Approach</b>	
<b>Classroom Procedure (Mode of transaction)</b> Interactive lectures, Flipped Classroom, Lecture-based Learning, Project-Based Learning, Experiential Learning, Peer Teaching, invited lecture, group discussions, Discussion-based Learning, Inquiry-Based Learning, Field based collection and interactions, Online Learning, Blended Learning, and other innovative learning approaches.	
<b>Assessment Types</b>	
<b>Mode of Assessment</b>	
<b>A. Continuous Comprehensive Assessment (CCA)</b>	
<b>Theory:</b> Quiz, Oral Presentation, Self and Peer assessments, Written test, Open book test, Problem based assignment, Field study report/Group discussion. <i>Any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Observation of practical skills, Laboratory record, <i>Any other method as may be required for specific course by the course faculty.</i>	
<b>B. End Semester Examination (ESE)</b>	
<b>Theory:</b> Written test/Standardized Test (MCQ)/Open book/ Problem based assignments/Individual project report/Team project report, <i>any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Practical based assessment, Record, <i>any other method as may be required for specific course by the course faculty.</i>	
The percentage weightage for CCA and ESE will be as per the undergraduate regulations of the college.	

## References:

1. Field, K. R. (2000). Offset printing technology. Delmar Thomson Learning. ISBN: 978-0827377438
2. Johansson, K., Lundberg, P., & Ryberg, R. (2007). The complete guide to print production. Wiley. ISBN: 978-0470050946
3. Poropat Joyce, M. (2002). Designing for print: An in-depth guide to planning, creating, and producing successful design projects. Rockport Publishers. ISBN: 978-1564969621
4. George, R. B. (2003). Web offset press operating. Graphic Arts Technical Foundation. ISBN: 978-0883624185

5. Adams, R. N. (2009). *Fundamentals of web offset printing: A guide to understanding the basics*. LithoTechnics. ISBN: 978-0979097852
6. Romano, F. (2004). *Pocket guide to web offset pressman's troubleshooting*. National Association for Printing Leadership. ISBN: 978-0883624680
7. Foster, H. L. (2016). *Colour management in digital printing: A practical guide*. CRC Press. ISBN: 978-1498708031
8. Landa, G. (2011). *Digital printing primer: A systems approach*. Morgan & Claypool Publishers. ISBN: 978-1608457224
9. Adams, R. N. (2013). *The web offset press operating guide*. LithoTechnics. ISBN: 978-0989561101
10. Mattingly, R. J., & Harris, J. (2014). *The digital printing handbook: A photographer's guide to creative printing techniques*. Rocky Nook. ISBN: 978-1937538259

## 2. Discipline Specific Elective Courses

SEM	SI No	COURSE CODE	COURSE NAME	Course Stream	Level	CREDIT	HRS/WEEK		
							L	T	P
V	1	24UAGDDSE301	Digital Illustration	Design	300-399	4	0	4	0
	2	24UAGDDSE302	Information Design						
	3	24UAGDDSE303	Publication Design	Design	300-399	4	0	4	0
	4	24UAGDDSE304	Art of Grid and Layout						
	5	24UAGDDSE305	3D Character Animation for Films	Animation	300-399	4	0	4	0
	6	24UAGDDSE306	3D Sculpting Techniques for Animation						
	7	24UAGDDSE307	Advanced 2D Animation						
VI	8	24UAGDDSE308	Techniques of Promotional Design	Design	300-399	4	0	4	0
	9	24UAGDDSE309	Research Methodology for Media Arts	Design					
VII	10	24UAGDDSE401	Advanced Typography	Design	400-499	4	0	3	2
	11	24UAGDDSE402	Advertising Design with Digital Marketing						
	12	24UAGDDSE403	Content Management System	Design	400-499	4	0	4	0
	13	24UAGDDSE404	Interaction Design						
	14	24UAGDDSE405	Digital Painting	Design	400-499	4	0	4	0
	15	24UAGDDSE406	User Experience Design						
	16	24UAGDDSE407	Digital Storyboarding	Animation	400-499	4	0	4	0
	17	24UAGDDSE408	2D Digital Animation						
VIII	18	24UAGDDSE409	Advanced Motion Graphics and Composition	Design	400-499	4	0	3	2
	19	24UAGDDSE410	Introduction to Metaverse Space Design						
	20	24UAGDDSE411	<b>Project/ Dissertation</b>	PRJ		12/8+4			15
			(or) <b>Project</b> <i>with any one of the below Capstone</i>						
	21	24UAGDDSE412	AR and VR with 3D						
	22	24UAGDDSE413	AI Assisted Animation						
	23	24UAGDDSE414	Modelling for 3D Printing						
	24	24UAGDDSE415	Dynamic Web Development						

**Course 01**

<b>Course Code</b>	<b>24UAGDDSE301</b>
<b>Discipline</b>	<b>Design</b>
<b>Course Title</b>	<b>Digital Illustration</b>
<b>Type of Course</b>	<b>Discipline Specific Elective</b>
<b>Course Level</b>	<b>300-399</b>
<b>Lecture/Tutorial/Practical Hours</b>	<b>0/60/0</b>
<b>Credits</b>	<b>4</b>
<b>Course Description:</b> This course delves students into advanced digital illustration covering shading, texturing, perspective, character, and environment creation. Students work with raster and vector software, honing skills in conceptualization, design, and developing a keen eye for colour and composition.	

**COURSE OUTCOMES (CO)**

<b>CO No.</b>	<b>Expected Course Outcome</b>	<b>Learning Domains *</b>	<b>PO's</b>
1	Explain advanced digital illustration concepts, genres and techniques	Understand	PO1, PO2
2	Identify illustrations and develop proficiency in digital illustration tools, techniques and software	Apply	PO1, PO3
3	Adapt illustrations for various mediums, including print and digital, while maintaining quality and visual impact.	Apply	PO1, PO2
4	Develop a professional digital illustration portfolio showcasing a range of styles and techniques, ready for freelance work or employment in the field.	Create	PO3, PO5, PO7

**COURSE CONTENT**

<b>Module</b>	<b>Units</b>	<b>Description</b>	<b>Hours</b>	<b>CO No.</b>
<b>1</b>	<b>Introduction to Digital Illustration</b>		<b>15</b>	<b>1</b>
	<b>1.1</b>	Different illustration genres – Cartoon, caricature, realistic, abstract, concept art, children’s book, technical, botanical and vector illustrations	5	
	<b>1.2</b>	Purpose of creating illustrations – how they impact mind of viewers	2	
	<b>1.3</b>	Observation about scientific visualisation and importance of accuracy	3	
	<b>1.4</b>	Digital Illustration tools and software - Adobe Illustrator/ Procreate & Adobe Photoshop - Digital Workspace and tools - basic drawing techniques and digital brushes	3	
	<b>1.5</b>	Narrative composition -	2	

2	<b>Illustration Techniques in Raster</b>		<b>14</b>	2
	2.1	Advanced drawing techniques - shading, texturing, perspective	4	
	2.2	Working with layers and masks for non-destructive editing – application of colour	4	
	2.3	Working with perspectives in composition and ambience creation	2	
	2.4	Creation of characters for story telling	3	
2.5	Conceptual Art – matte painting	1		
3	<b>Illustration Techniques in Vector</b>		<b>6</b>	3
	3.1	Shape Creation and Manipulation – using layers and groups to organise illustrations	2	
	3.2	Colour and Gradient Techniques - Using gradients to add depth and dimension	1	
	3.3	Incorporating textures and patterns into illustrations	3	
4	<b>Portfolio Development and Professional Practice</b>		<b>25</b>	4
	4.1	Illustrating for print media - posters, magazines, book covers	5	
	4.2	Illustrating for digital media - websites, social media	5	
	4.3	Adapting illustrations for different sizes and resolutions	6	
	4.4	Building a digital illustration portfolio	5	
4.5	Understanding copyright and licensing for digital illustrations	4		
5	<b>Teacher Specific Content</b>			

<b>Teaching and Learning Approach</b>	
<b>Classroom Procedure (Mode of transaction)</b> Interactive lectures, Flipped Classroom, Lecture-based Learning, Project-Based Learning, Experiential Learning, Peer Teaching, invited lecture, group discussions, Discussion-based Learning, Inquiry-Based Learning, Field based collection and interactions, Online Learning, Blended Learning, and other innovative learning approaches.	
<b>Assessment Types</b>	
<b>Mode of Assessment</b>	
<b>A. Continuous Comprehensive Assessment (CCA)</b> <b>Theory:</b> Quiz, Oral Presentation, Self and Peer assessments, Written test, Open book test, Problem based assignment, Field study report/Group discussion. <i>Any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Observation of practical skills, Laboratory record, <i>Any other method as may be required for specific course by the course faculty.</i>	
<b>B. End Semester Examination (ESE)</b> <b>Theory:</b> Written test/Standardized Test (MCQ)/Open book/ Problem based assignments/Individual project report/Team project report, <i>any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Practical based assessment, Record, <i>any other method as may be required for specific course by the course faculty.</i>	
The percentage weightage for CCA and ESE will be as per the undergraduate regulations of the college.	

#### References:

1. Sharon Steuer, *The Adobe Illustrator WOW! Book for CS6 and CC*, Peachpit Press 2014
2. Lawrence Zeegen, *Digital Illustration: A Masterclass in Creative Image-Making*, Rotovision 2005
3. Katherine Dunn, *Creative Illustration Workshop for Mixed-Media Artists: Seeing, Sketching, Storytelling, and Using Found Materials*, Quarry Books 2010

**Course 02**

<b>Course Code</b>	<b>24UAGDDSE302</b>
<b>Discipline</b>	<b>Design</b>
<b>Course Title</b>	<b>Information Design</b>
<b>Type of Course</b>	<b>Discipline Specific Elective</b>
<b>Course Level</b>	<b>300-399</b>
<b>Lecture/Tutorial/Practical Hours</b>	<b>0/60/0</b>
<b>Credits</b>	<b>4</b>

**Course Description:** Information Design is a critical aspect of Graphic Design, focusing on the effective presentation of information. This course delves into the principles and practices of organizing, structuring, and visualizing data to enhance understanding and communication. Students will learn to create clear, engaging visuals such as infographics, data visualizations, and user interfaces.

**COURSE OUTCOMES (CO)**

<b>CO No.</b>	<b>Expected Course Outcome</b>	<b>Learning Domains *</b>	<b>PO's</b>
1	Examine the elements in communication design with reference to universal contexts.	Understand	PO1, PO3, PO5
2	Analyse complex information design projects.	Analyse	PO1, PO2, PO7
3	Compile massive, complex information to simple, understandable and interesting visuals	Evaluate	PO1, PO2, PO3, PO5
4	Create innovative and well-crafted information graphics that effectively communicate complex data to diverse audiences	Create	PO1, PO2, PO3, PO5

**COURSE CONTENT**

<b>Module</b>	<b>Units</b>	<b>Description</b>	<b>Hours</b>	<b>CO No.</b>
<b>1</b>	<b>Introduction to Information Design</b>		<b>9</b>	<b>1</b>
	<b>1.1</b>	Understanding the role of information design in visual communication	3	
	<b>1.2</b>	Overview of key concepts and principles	3	
	<b>1.3</b>	Case studies and examples of effective information design	3	
<b>2</b>	<b>Data Visualization Tools and Techniques</b>		<b>12</b>	<b>2</b>
	<b>2.1</b>	Principles of data visualization	3	
	<b>2.2</b>	Using charts, graphs, and diagrams to represent data	3	
	<b>2.3</b>	Techniques for storytelling through data	3	
	<b>2.4</b>	Tools and software for creating data visualizations	3	
<b>3</b>	<b>Semiotics and Iconography</b>		<b>18</b>	<b>3</b>

	3.1	Understanding semiotics and its importance in graphic design	3	
	3.2	Semiotic theory and key concepts - signs, signifiers, signified - Denotation and connotation	3	
	3.3	Analysing and interpreting signs and symbols in visual communication	3	
	3.4	Iconography in design - Types of icons and their meanings - Pictograms, Rebus, Trademarks and Visual identity	3	
	3.5	Using icons effectively in design for communication and visual storytelling	6	
	<b>Infographics</b>		<b>21</b>	
4	4.1	Creating engaging and informative infographics	3	4
	4.2	Incorporating typography, colour, and imagery in infographics	3	
	4.3	Designing for different audiences and purposes - critique and analysis of information graphics projects	6	
	4.4	Content and illustrations for awareness posters-maps - recreating events in space and time -navigational systems in graphic design	5	
	4.5	Emerging trends in information graphics and data visualization	4	
5	<b>Teacher Specific Content</b>			

<b>Teaching and Learning Approach</b>	
<b>Classroom Procedure (Mode of transaction)</b> Interactive lectures, Flipped Classroom, Lecture-based Learning, Project-Based Learning, Experiential Learning, Peer Teaching, invited lecture, group discussions, Discussion-based Learning, Inquiry-Based Learning, Field based collection and interactions, Online Learning, Blended Learning, and other innovative learning approaches.	
<b>Assessment Types</b>	
<b>Mode of Assessment</b>	
<b>A. Continuous Comprehensive Assessment (CCA)</b>	
<b>Theory:</b> Quiz, Oral Presentation, Self and Peer assessments, Written test, Open book test, Problem based assignment, Field study report/Group discussion. <i>Any other method as may be required for specific course by the course faculty.</i>	
<b>Practical:</b> Observation of practical skills, Laboratory record, <i>Any other method as may be required for specific course by the course faculty.</i>	
<b>B. End Semester Examination (ESE)</b>	
<b>Theory:</b> Written test/Standardized Test (MCQ)/Open book/ Problem based assignments/Individual project report/Team project report, <i>any other method as may be required for specific course by the course faculty.</i>	
<b>Practical:</b> Practical based assessment, Record, <i>any other method as may be required for specific course by the course faculty.</i>	
The percentage weightage for CCA and ESE will be as per the undergraduate regulations of the college.	

**References:**

1. Harris, Robert L. *Information Graphics: A Comprehensive Illustrated Reference.*
2. Tufte, Edward R. *The Visual Display of Quantitative Information.*
3. Baer, Kim. *Information Design Workbook: Graphic Approaches, Solutions, and Inspiration + 30 Case Studies.*
4. Tufte, Edward R. *Visual Explanations: Images and Quantities, Evidence and Narrative.*

**Course 03**

<b>Course Code</b>	<b>24UAGDDSE303</b>
<b>Discipline</b>	<b>Design</b>
<b>Course Title</b>	<b>Publication Design</b>
<b>Type of Course</b>	<b>Discipline Specific Elective</b>
<b>Course Level</b>	<b>300-399</b>
<b>Lecture/Tutorial/Practical Hours</b>	<b>0/60/0</b>
<b>Credits</b>	<b>4</b>
<b>Course Description:</b> This course educates students on how to efficiently use Typography, layout principles, colour theory, image selection and design a variety of publications, including magazines, newspapers, books, and digital media. Publication Design looks at the layout and design of multi-page both digital and print publications and the role of the graphic designer in it.	

**COURSE OUTCOMES (CO)**

<b>CO No.</b>	<b>Expected Course Outcome</b>	<b>Learning Domains *</b>	<b>PO's</b>
1	Develop knowledge and technical skill required for good layout design, efficiently arranging content on a page to produce aesthetically.	Understand	PO1, PO3
2	Experiment with Applicants will be efficient in finding and implementing relevant graphics, pictures and text layouts.	Apply	PO1, PO2, PO5
3	Perceive visual hierarchy, emphasis, and colour elements comprehended within publication designs.	Evaluate	PO1, PO3
4	Construct proficiency in integrating brand identity aspects and publishing magazines.	Create	PO1,PO3, PO5

**COURSE CONTENT**

<b>Module</b>	<b>Units</b>	<b>Description</b>	<b>Hours</b>	<b>CO No.</b>
<b>1</b>	<b>Layout Design Project</b>		<b>16</b>	<b>1</b>
	<b>1.1</b>	Crafting visually appealing and harmonious page arrangements, incorporating text, graphics, and other elements for an attractive and readable design.	3	
	<b>1.2</b>	Page layout include grid systems, margins, and information hierarchy. Grid systems incorporate design elements.	3	
	<b>1.3</b>	Exploring Document Pages and Grid Systems with Adobe InDesign	5	
	<b>1.4</b>	Page elements-These include headers, footers, page numbers, navigation elements, masthead etc.	5	
<b>2</b>	<b>Combining with Essential Graphic Elements</b>		<b>13</b>	<b>2</b>



	2.1	Adding appropriate graphics and images makes a publication look better and helps explain difficult concepts.	3	
	2.2	Visual components like photos, drawings, icons, and graphs improve the content and captivate the audience. These elements enhance the publication's polished appearance and ease of use.	5	
	2.3	Font family encompasses the style, layout, and presentation of text. Important factors to consider include choosing fonts, adjusting font size, colour, line spacing (leading), and aligning text.	5	
	<b>Elements concerning Design Principles</b>		<b>12</b>	
3	3.1	Designers use visual hierarchy to guide readers through content, highlighting critical information and logically structuring the content.	3	3
	3.2	Selecting and using type family, Headings, subheadings, body text, and captions all contribute to the hierarchy and readability of a publication.	3	
	3.3	Proximity in design ensures a visually pleasing layout. Aligning text, images, etc along a similar axis enhances readability and visual style.	3	
	3.4	Colour Palette: The selection of colours plays a crucial role. Factoring in colour psychology, contrast, and harmony to craft compelling and unified designs.	3	
	<b>Publishing Outputs</b>		<b>19</b>	
4	4.1	Brand Identity: When designing, creators think about the brand's look (like its logo and colours), what the audience likes, and the mood the publication wants to create.	5	4
	4.2	Print production methods encompass various techniques for replicating text and images on diverse surfaces, which are broadly classified into two categories: traditional and digital methods.	4	
	4.3	Multiple publication Design exercises: Visualisation for various formats- E-Books, Print and interactive PDF	4	
	4.4	Technical know-how to create production files. Learners will exhibit mastery of multi-page print production and binding techniques.	6	
5		<b>Teacher Specific Content</b>		

<b>Teaching and Learning Approach</b>	
<b>Classroom Procedure (Mode of transaction)</b> Interactive lectures, Flipped Classroom, Lecture-based Learning, Project-Based Learning, Experiential Learning, Peer Teaching, invited lecture, group discussions, Discussion-based Learning, Inquiry-Based Learning, Field based collection and interactions, Online Learning, Blended Learning, and other innovative learning approaches.	
<b>Assessment Types</b>	
<b>Mode of Assessment</b>	
<b>A. Continuous Comprehensive Assessment (CCA)</b>	
<b>Theory:</b> Quiz, Oral Presentation, Self and Peer assessments, Written test, Open book test, Problem based assignment, Field study report/Group discussion. <i>Any other method as may be required for specific course by the course faculty.</i>	
<b>Practical:</b> Observation of practical skills, Laboratory record, <i>Any other method as may be required for specific course by the course faculty.</i>	
<b>B. End Semester Examination (ESE)</b>	
<b>Theory:</b> Written test/Standardized Test (MCQ)/Open book/ Problem based assignments/Individual project report/Team project report, <i>any other method as may be required for specific course by the course faculty.</i>	
<b>Practical:</b> Practical based assessment, Record, <i>any other method as may be required for specific course by the course faculty.</i>	
The percentage weightage for CCA and ESE will be as per the undergraduate regulations of the college.	

**References:**

1. The Society for News Design. (2000). The Best of Newspaper Design: No. 21
2. Carter, D. E. (2007). The Big Book of Layouts
3. Cullen, K. (2007). Layout Workbook: A Real-World Guide to Building Pages in Graphic Design
4. Tondreau, B. (2009). Layout Essentials: 100 Design Principles for Using Grids
5. Ambrose, G., & Harris, P. (2018). Layout for Graphic Designers: An Introduction (Basics Design)
6. Gilbert, R. M. (2019). Inclusive Design for a Digital World: Designing with Accessibility in Mind (Design Thinking)
7. Sendpoints Publishing Co Ltd. (2020). Principles for Good Layout Design: Commercial Design

#### Course 04

Course Code	24UAGDDSE304
Discipline	Design
Course Title	Art of Grid and Layout
Type of Course	Discipline Specific Elective
Course Level	300-399
Lecture/Tutorial/Practical Hours	0/60/0
Credits	4
<b>Course Description:</b> This course offers students a comprehensive understanding of grid systems and layout design principles, focusing on creating visually appealing and functional designs using grids for various design projects.	

#### COURSE OUTCOMES (CO)

CO No.	Expected Course Outcome	Learning Domains *	PO's
1	Elaborate on Advanced Grid	Understand	PO1
2	Utilize Design Principles in Real-world Contexts	Apply	PO2, PO3
3	Designing for Multi-Page Layouts	Evaluate	PO1, PO3
4	Create professional Layouts	Create	PO3, PO5

#### COURSE CONTENT

Module	Units	Description	Hours	CO No.
1	<b>Basic in Grid Concepts</b>		<b>5</b>	1
	1.1	Basic fundamentals of grid system in publications.	1	
	1.2	Different types of grids -Modular, Hierarchical, and Manuscript etc.	1	
	1.3	Grid system - Gutter, Margin, Flow line, Modules, Spatial Zone etc	2	
	1.4	Understanding Page Layout: Reading Gravity,	1	
2	<b>Grid Composition</b>		<b>20</b>	2
	2.1	Practical activities for crafting detailed grid-based layouts: <ul style="list-style-type: none"> <li>Crafting harmonious compositions with grids</li> <li>Investigating both asymmetrical and symmetrical arrangements in designs</li> </ul>	5	
	2.2	Golden ratio and Fibonacci sequence in grid design	3	
	2.3	Exploring Dynamic Grid Systems and Their Practical Uses Enhancing Readability and Legibility in Grid-based Designs	6	
	2.4	Introducing to pagination software	9	
3	<b>Applications in grid system</b>		<b>15</b>	3
	3.1	<b>Editorial and magazine design:</b> Designing for magazine and Newspaper.	5	
	3.2	Responsive Design Principles within Grid Systems	5	
	3.3	<b>Experimental Layouts:</b> Exploratory Layouts Collaborative Tasks: Crafting Inventive Layouts around Specific Topics	5	

4	Project Work		20	4
	4.1	Projects in Publications	20	
5	Teacher Specific Content			

<b>Teaching and Learning Approach</b>				
<b>Classroom Procedure (Mode of transaction)</b> Interactive lectures, Flipped Classroom, Lecture-based Learning, Project-Based Learning, Experiential Learning, Peer Teaching, invited lecture, group discussions, Discussion-based Learning, Inquiry-Based Learning, Field based collection and interactions, Online Learning, Blended Learning, and other innovative learning approaches.				
<b>Assessment Types</b>				
<b>Mode of Assessment</b>				
<b>A. Continuous Comprehensive Assessment (CCA)</b>				
<b>Theory:</b> Quiz, Oral Presentation, Self and Peer assessments, Written test, Open book test, Problem based assignment, Field study report/Group discussion. <i>Any other method as may be required for specific course by the course faculty.</i>				
<b>Practical:</b> Observation of practical skills, Laboratory record, <i>Any other method as may be required for specific course by the course faculty.</i>				
<b>B. End Semester Examination (ESE)</b>				
<b>Theory:</b> Written test/Standardized Test (MCQ)/Open book/ Problem based assignments/Individual project report/Team project report, <i>any other method as may be required for specific course by the course faculty.</i>				
<b>Practical:</b> Practical based assessment, Record, <i>any other method as may be required for specific course by the course faculty.</i>				
The percentage weightage for CCA and ESE will be as per the undergraduate regulations of the college.				

#### References:

1. Tondreau, Barbara. *Layout Essentials: 100 Design Principles for Using Grids*. Rockport Publishers, 2005. ISBN 978-1592533527.
2. Müller-Brockmann, Josef. *Grid Systems in Graphic Design: A Visual Communication Manual for Graphic Designers, Typographers, and Three-Dimensional Designers*. Verlag Niggli AG, 1996. ISBN 978-3721201451.
3. Samara, Timothy. *Making and Breaking the Grid: A Graphic Design Layout Workshop*. Rockport Publishers, 2005. ISBN 978-1592531257.
4. Elam, Kimberly. *Grid Systems: Principles of Organizing Type*. Princeton Architectural Press, 2004. ISBN 978-1568984650.
5. Vanden-Eynden, Matt. *Layout Workbook: A Real-World Guide to Building Pages in Graphic Design*. Rockport Publishers, 2007. ISBN 978-1592533527.
6. Ambrose, Gavin, and Paul Harris. *Layout Design: A Good Guide to Design*. Ava Publishing, 2011. ISBN 978-2940411168.
7. Dodd, Roger. *The Elements of Graphic Design: Space, Unity, Page Architecture, and Type*. Allworth Press, 2013. ISBN 978-1581157628.
8. Samara, Timothy. *Design Elements: A Graphic Style Manual*. Rockport Publishers, 2006.

## Course 05

<b>Course Code</b>	<b>24UAGDDSE305</b>
<b>Discipline</b>	<b>Animation</b>
<b>Course Title</b>	<b>3D character Animation for film</b>
<b>Type of Course</b>	<b>Discipline Specific Elective</b>
<b>Course Level</b>	<b>300-399</b>
<b>Lecture/Tutorial/Practical Hours</b>	<b>0/60/0</b>
<b>Credits</b>	<b>4</b>
<b>Course Description:</b>	
<p>This course provides an in-depth exploration of the principles and techniques of 3D character animation for film, focusing on the creation of compelling and expressive character performances. Through a combination of lectures, demonstrations, hands-on exercises, and animation projects, students will learn the fundamentals of character animation, including body mechanics, acting, timing, and storytelling. Emphasis will be placed on mastering industry-standard animation software and developing a strong foundation in character animation skills applicable to film production.</p>	

### COURSE OUTCOMES (CO)

<b>CO No.</b>	<b>Expected Course Outcome</b>	<b>Learning Domains *</b>	<b>PO's</b>
1	Interpret and discuss the significance of various 3D art techniques and materials.	Understand	PO1
2	Create visual elements suitable for compositing as optical and visual effects	Create	PO2, PO3, PO5
3	Create workflows and pipelines for compositing	Create	PO2, PO3
4	Create digital images and effects that explore both experimental and conventional digital and optical techniques	Create	PO1, PO5, PO8

### COURSE CONTENT

<b>Module</b>	<b>Units</b>	<b>Description</b>	<b>Hours</b>	<b>CO No.</b>
<b>1</b>	<b>Introduction to 3D Character Animation</b>		<b>8</b>	<b>1</b>
	1.1	Learning of 12 Animation principles, animating on exercises for each animation principles	2	
	1.2	Stick drawings of character poses for reference, understanding 3d Character Rig controls and its functionalities, Understanding IK/FK switch options, setting up 3d character strong poses	2	
	1.3	Character placement registration, balanced pose, hip vs shoulder arcs, breaking symmetry, weak poses to strong poses	2	
	1.4	Silhouette check in orthographic views, line of action.	2	
<b>2</b>	<b>Character Body Mechanism</b>		<b>14</b>	<b>2</b>
	2.1	Body mechanics of biped character locomotion, full character walk, run, interact with weight, blending different actions to create complex scenes with an emphasis on balance, direction changes, action, realistic force	3	

	2.2	Understanding and applying the functionalities of Ik/Fk switching, Quadruped locomotion, walk, run, jump, galloping	5	
	2.3	Dialogue acting shot, lip sync, advanced posing and animation, expressive character animation with body mechanics	3	
	2.4	Interaction with multiple characters, objects, action reaction timing, fine tuning response timing	3	
<b>3</b>	<b>Facial Animation</b>		<b>20</b>	<b>3</b>
	3.1	Animating close-up shot to learn convincing facial acting, method acting	4	
	3.2	Character's emotions, appealing facial posing	9	
	3.3	Refinement in the performance	3	
	3.4	Animation graph editor fine tuning, smoothing animation curves, applying animation principles	4	
<b>4</b>	<b>Refinement</b>		<b>18</b>	<b>4</b>
	4.1	Final refinement on appeal	6	
	4.2	Camera angle confirmation, Multi-cam shots execution	6	
	4.3	Playblast exporting, action continuity checking, previewing animation, ensuring animation principles, checking line of action	6	
<b>5</b>		<b>Teacher Specific Content</b>		

<b>Teaching and Learning Approach</b>	
<b>Classroom Procedure (Mode of transaction)</b> Interactive lectures, Flipped Classroom, Lecture-based Learning, Project-Based Learning, Experiential Learning, Peer Teaching, invited lecture, group discussions, Discussion-based Learning, Inquiry-Based Learning, Field based collection and interactions, Online Learning, Blended Learning, and other innovative learning approaches.	
<b>Assessment Types</b>	
<b>Mode of Assessment</b>	
<b>A. Continuous Comprehensive Assessment (CCA)</b> <b>Theory:</b> Quiz, Oral Presentation, Self and Peer assessments, Written test, Open book test, Problem based assignment, Field study report/Group discussion. <i>Any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Observation of practical skills, Laboratory record, <i>Any other method as may be required for specific course by the course faculty.</i>	
<b>B. End Semester Examination (ESE)</b> <b>Theory:</b> Written test/Standardized Test (MCQ)/Open book/ Problem based assignments/Individual project report/Team project report, <i>any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Practical based assessment, Record, <i>any other method as may be required for specific course by the course faculty.</i>	
The percentage weightage for CCA and ESE will be as per the undergraduate regulations of the college.	

#### References:

1. Vaughan, William. Digital Modeling. New Riders, 2011.
2. Ahearn, Luke. 3D Game Environments: Create Professional 3D Game Worlds. A K Peters/CRC Press, 2017
3. McKinley, Michael. Maya Studio Projects: Game Environments and Props. Sybex, 2010.
4. Palamar, Todd. Mastering Autodesk Maya 2024: Autodesk Official Press. CADCIM Technologies, 8 April 2020.
5. Ingrassia, Michael. Maya for Games: Modeling and Texturing Techniques with Maya and Mudbox, 1st Edition. Routledge, 2008.

**Course 06**

<b>Course Code</b>	<b>24UAGDDSE306</b>
<b>Discipline</b>	<b>Animation</b>
<b>Course Title</b>	<b>3D sculpting techniques for Animation</b>
<b>Type of Course</b>	<b>Discipline Specific Elective</b>
<b>Course Level</b>	<b>300-399</b>
<b>Lecture/Tutorial/Practical Hours</b>	<b>0/60/0</b>
<b>Credits</b>	<b>4</b>
<b>Course Description:</b>	
<p>This course explores the principles and practices of 3D sculpting for animation, focusing on the creation of expressive characters and assets using digital sculpting software. Through a combination of theoretical lectures, practical demonstrations, hands-on sculpting sessions, and creative projects, students will learn advanced sculpting techniques, anatomy studies, character design, and digital sculpting workflows. Emphasis will be placed on developing skills essential for character artists and modellers in the animation industry.</p>	

**COURSE OUTCOMES (CO)**

<b>CO No.</b>	<b>Expected Course Outcome</b>	<b>Learning Domains *</b>	<b>PO's</b>
1	Interpret and discuss the significance of various 3D art techniques and materials.	Understand	PO1, PO5
2	Create visual elements suitable for compositing as optical and visual effects	Create	PO2, PO3
3	Create workflows and pipelines for compositing	Create	PO2, PO7
4	Create digital images and effects that explore both experimental and conventional digital and optical techniques	Create	PO1, PO2, PO5, PO8

**COURSE CONTENT**

<b>Module</b>	<b>Units</b>	<b>Description</b>	<b>Hours</b>	<b>CO No.</b>
<b>1</b>	<b>Analyse Digital Sculpting techniques</b>		<b>7</b>	<b>1</b>
	1.1	Overview of digital sculpting tools and software	2	
	1.2	Understanding sculpting techniques and workflows	2	
	1.3	Understanding anatomy and character design principles	3	
<b>2</b>	<b>Digital Sculpting Production pipeline</b>		<b>12</b>	<b>2</b>
	2.1	Sculpting organic and inorganic forms	3	
	2.2	Creating expressive characters and creatures	6	
	2.3	Texturing and detailing digital sculpts	3	
<b>3</b>	<b>Refining Digital Sculpts through Re topology</b>		<b>15</b>	<b>3</b>

	3.1	Importance of re topology in animation production	6	
	3.2	Re topology workflows for character models, Optimizing geometry for efficient performance	9	
	<b>Preparation for Animation</b>		<b>26</b>	
<b>4</b>	4.1	Cleaning up sculpt geometry for animation,	6	<b>4</b>
	4.2	Setting up rig-friendly topology	6	
	4.3	Creating of Digital Sculptures show reel	14	
<b>5</b>	<b>Teacher Specific Content</b>			

<b>Teaching and Learning Approach</b>	
<b>Classroom Procedure (Mode of transaction)</b> Interactive lectures, Flipped Classroom, Lecture-based Learning, Project-Based Learning, Experiential Learning, Peer Teaching, invited lecture, group discussions, Discussion-based Learning, Inquiry-Based Learning, Field based collection and interactions, Online Learning, Blended Learning, and other innovative learning approaches.	
<b>Assessment Types</b>	
<b>Mode of Assessment</b>	
<b>A. Continuous Comprehensive Assessment (CCA)</b>	
<b>Theory:</b> Quiz, Oral Presentation, Self and Peer assessments, Written test, Open book test, Problem based assignment, Field study report/Group discussion. <i>Any other method as may be required for specific course by the course faculty.</i>	
<b>Practical:</b> Observation of practical skills, Laboratory record, <i>Any other method as may be required for specific course by the course faculty.</i>	
<b>B. End Semester Examination (ESE)</b>	
<b>Theory:</b> Written test/Standardized Test (MCQ)/Open book/ Problem based assignments/Individual project report/Team project report, <i>any other method as may be required for specific course by the course faculty.</i>	
<b>Practical:</b> Practical based assessment, Record, <i>any other method as may be required for specific course by the course faculty.</i>	
The percentage weightage for CCA and ESE will be as per the undergraduate regulations of the college.	

### References:

1. Vaughan, William. Digital Modelling. New Riders, 2011.
2. Ahearn, Luke. 3D Game Environments: Create Professional 3D Game Worlds. A K Peters/CRC Press, 2017
3. McKinley, Michael. Maya Studio Projects: Game Environments and Props. Sybex, 2010.
4. Palamar, Todd. Mastering Autodesk Maya 2024: Autodesk Official Press. CADCIM Technologies, 8 April 2020.
5. Ingrassia, Michael. Maya for Games: Modelling and Texturing Techniques with Maya and Mudbox, 1st Edition. Routledge, 2008.



**Course 07**

<b>Course Code</b>	<b>24UAGDDSE307</b>
<b>Discipline</b>	<b>Animation</b>
<b>Course Title</b>	<b>Advanced 2D Animation</b>
<b>Type of Course</b>	<b>Discipline Specific Elective</b>
<b>Course Level</b>	<b>300-399</b>
<b>Lecture/Tutorial/Practical Hours</b>	<b>0/60/0</b>
<b>Credits</b>	<b>4</b>
<b>Course Description:</b> This course would involve covering a range of topics, from refining animation principles to exploring advanced techniques and software tools.	

**COURSE OUTCOMES (CO)**

<b>CO No.</b>	<b>Expected Course Outcome</b>	<b>Learning Domains *</b>	<b>PO's</b>
1	Develop the skill of using 2D Advanced Techniques of Animation	Create	PO1, PO2, PO3, PO8
2	Build Skill of creating Special Effect	Create	PO1, PO2, PO3, PO8
3	Develop Basics of Character Animation	Create	PO1, PO2, PO3, PO8
4	Create Animated Scene	Create	PO1, PO2, PO3, PO5

**COURSE CONTENT**

<b>Module</b>	<b>Units</b>	<b>Description</b>	<b>Hours</b>	<b>CO No.</b>
<b>1</b>	<b>Introduction of Advanced 2d animation</b>		<b>3</b>	<b>1</b>
	1.1	Review of Animation Principles: In-depth review and application of animation principles - Exploration of advanced timing, spacing, and exaggeration -	2	
	1.2	Introduction of character movements: Analysis of complex character movements and expressions.	1	
<b>2</b>	<b>Advanced Techniques of Animation</b>		<b>20</b>	<b>2</b>
	2.1	Lip Sync: Phonetics – Standard Mouth Shapes - Dialogue Animation – The Sound Track -Phrasing – Accents – Attitudes	3	
	2.2	Dialogue Animation: Recoding of Dialogues and Voice-Over –Marking in X Sheets – Synchronizing Sound. - Dialogue Animation of Humanoid Characters	6	
	2.3	Animating Special Effects: Water Drops, Smokes, Fire Explosions Etc.	11	
<b>3</b>	<b>Character Animation</b>		<b>25</b>	<b>3</b>
	3.1	Human Character Animation: Walks: - Stylized and Different Types of Human Characters Runs: - Stylized and Different Types of Human Characters	10	

	3.2	Animation of 4 Legged and 2 Legged Animals: Normal and Stylized Movements of animals - Bird Flight – Movements of Reptiles- Animating Insects and Fishes	15	
	<b>Advanced Techniques of Animation</b>		<b>12</b>	
4	4.1	Project: Creation of a Classical 2D animation short film with sound synchronization.	12	4
5		<b>Teacher Specific Content</b>		

<b>Teaching and Learning Approach</b>	
<b>Classroom Procedure (Mode of transaction)</b> Interactive lectures, Flipped Classroom, Lecture-based Learning, Project-Based Learning, Experiential Learning, Peer Teaching, invited lecture, group discussions, Discussion-based Learning, Inquiry-Based Learning, Field based collection and interactions, Online Learning, Blended Learning, and other innovative learning approaches.	
<b>Assessment Types</b>	
<b>Mode of Assessment</b>	
<b>A. Continuous Comprehensive Assessment (CCA)</b>	
<b>Theory:</b> Quiz, Oral Presentation, Self and Peer assessments, Written test, Open book test, Problem based assignment, Field study report/Group discussion. <i>Any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Observation of practical skills, Laboratory record, <i>Any other method as may be required for specific course by the course faculty.</i>	
<b>B. End Semester Examination (ESE)</b>	
<b>Theory:</b> Written test/Standardized Test (MCQ)/Open book/ Problem based assignments/Individual project report/Team project report, <i>any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Practical based assessment, Record, <i>any other method as may be required for specific course by the course faculty.</i>	
The percentage weightage for CCA and ESE will be as per the undergraduate regulations of the college.	

### References:

1. Williams, Richard. *The Animator's Survival Kit*. Faber and Faber, 2009.
2. Beck, Jerry. *The Animated Movie Guide*. Chicago Review Press, 2005.
3. Lasseter, John, and Steve Daly. *The Art of 2D Animation*. Chronicle Books, 2009.
4. *Cartoon Animation*: Preston Blair
5. *Timing for Animation*: Harold Whitaker and John Halas
6. *How to Make Animated Films*: Tony White
7. *Character Animation-2D Skills for Better 3D*: Steve Roberts
8. *Horses and Other Animals in Motion*: Edward Muybridge

## Course 08

<b>Course Code</b>	<b>24UAGDDSE308</b>
<b>Discipline</b>	<b>Design</b>
<b>Course Title</b>	<b>Techniques of Promotional Design</b>
<b>Type of Course</b>	<b>Discipline Specific Elective</b>
<b>Course Level</b>	<b>300-399</b>
<b>Lecture/Tutorial/Practical Hours</b>	<b>0/60/0</b>
<b>Credits</b>	<b>4</b>
<b>Course Description:</b> This course teaches students how to use promotional design techniques in graphic design. It covers advertising theories, copywriting, and photography integration for effective campaigns across different media platforms.	

### COURSE OUTCOMES (CO)

<b>CO No.</b>	<b>Expected Course Outcome</b>	<b>Learning Domains *</b>	<b>PO's</b>
1	Understand how advertising theories help in promotional design.	Understand	PO1, PO2
2	Master persuasive messaging through copywriting for promotional design.	Apply	PO3, PO5
3	Blend theory and skills to make cohesive promotional campaigns.	Evaluate	PO1, PO3, PO7
4	Critically analyse and evaluate promotional design strategies to enhance effectiveness.	Create	PO1, PO2, PO4

### COURSE CONTENT

<b>Module</b>	<b>Units</b>	<b>Description</b>	<b>Hours</b>	<b>CO No.</b>
<b>1</b>	<b>Theories and Principles</b>		<b>15</b>	<b>1</b>
	<b>1.1</b>	Promotional design principles: Know your audience, keep your brand consistent, organize visuals clearly, keep it simple and clear, and evoke emotions.	10	
	<b>1.2</b>	Advertising theories	5	
<b>2</b>	<b>Copywriting Fundamentals</b>		<b>20</b>	<b>2</b>
	<b>2.1</b>	Copywriting Fundamentals	6	
	<b>2.2</b>	Crafting persuasive messages, slogans, and taglines. Audience psychology and language nuances	8	
	<b>2.3</b>	Practical exercises / Workshop in writing copy for different promotional contexts	6	
<b>3</b>	<b>Photography for Promotional Design</b>		<b>13</b>	<b>3</b>
	<b>3.1</b>	Importance of photography as a tool: composition, lighting, and framing	5	
	<b>3.2</b>	Workshop on capturing images for promotional purposes	5	

	<b>3.3</b>	Techniques for photo editing, colour correction and manipulation	3	
<b>4</b>	<b>Integrated Campaign Development</b>		<b>12</b>	<b>4</b>
	4.1	Brand identity and its importance in promotional design-logos, colour schemes, and brand collateral. Maintaining consistency across different promotional materials	5	
	4.2	Planning and executing integrated promotional campaigns. -project management tools and techniques	3	
	4.3	<b>Integrated Campaign Project</b>	4	
<b>5</b>		<b>Teacher Specific Content</b>		

<b>Teaching and Learning Approach</b>	
<b>Classroom Procedure (Mode of transaction)</b> Interactive lectures, Flipped Classroom, Lecture-based Learning, Project-Based Learning, Experiential Learning, Peer Teaching, invited lecture, group discussions, Discussion-based Learning, Inquiry-Based Learning, Field based collection and interactions, Online Learning, Blended Learning, and other innovative learning approaches.	
<b>Assessment Types</b>	
<b>Mode of Assessment</b>	
<b>A. Continuous Comprehensive Assessment (CCA)</b>	
<b>Theory:</b> Quiz, Oral Presentation, Self and Peer assessments, Written test, Open book test, Problem based assignment, Field study report/Group discussion. <i>Any other method as may be required for specific course by the course faculty.</i>	
<b>Practical:</b> Observation of practical skills, Laboratory record, <i>Any other method as may be required for specific course by the course faculty.</i>	
<b>B. End Semester Examination (ESE)</b>	
<b>Theory:</b> Written test/Standardized Test (MCQ)/Open book/ Problem based assignments/Individual project report/Team project report, <i>any other method as may be required for specific course by the course faculty.</i>	
<b>Practical:</b> Practical based assessment, Record, <i>any other method as may be required for specific course by the course faculty.</i>	
The percentage weightage for CCA and ESE will be as per the undergraduate regulations of the college.	

#### References:

1. Sullivan, L. *Hey, Whipple, Squeeze This: The Classic Guide to Creating Great Ads* 2016
2. Bly, R. W. *The Copywriter's Handbook: A Step-by-Step Guide to Writing Copy That Sells (4th ed.)* 2020
3. Heller, S., & Vienne, V. *The Graphic Design Idea Book: Inspiration from 50 Masters.* Laurence King Publishing. 2019
4. Willsher, R. *Advertising Design and Typography.* Laurence King Publishing. 2018
5. Smith, M. *Basics Advertising 01: Copywriting.* 2017

Course 09

Course Code	24UAGDDSE309
Discipline	Design
Course Title	Research Methodology for Media Arts
Type of Course	Discipline Specific Elective
Course Level	300-399
Lecture/Tutorial/Practical Hours	30/30/0
Credits	4
<b>Course Description:</b> This course introduces undergraduate students to the exciting world of practice-based research in the field of Graphic design. Through a combination of studio practice, critical analysis, and written reflection, students will learn to utilize their creative practice as a means of research inquiry.	

**COURSE OUTCOMES(CO)**

CO No.	Expected Course Outcome	Learning Domains *	PO
1	Define concepts and perspectives in media research	Understand	PO1, PO 2, PO 6, PO 8
2	Develop a focused research question, hypothesis and craft a research proposal outlining research design, methods and justification.	Create	PO 1, PO 2, PO 3, PO 6, PO 8
3	Select appropriate data collection methods for specific research questions, collect and analyse the data, and write a report based on the research process, observations and inference of analysis.	Create	PO1, PO 2, PO 3, PO 6, PO 7, PO 8
4	Create innovative projects in Design and Practice based Research in Media Arts	Create	PO 1, PO 2, PO 3, PO 4, PO 5 PO 6, PO 7, PO 8
<i>*Remember (R), Understand (U), Apply (A), Analyse (An), Evaluate (E), Create (C)</i>			

**COURSE CONTENT**

Module	Units	Course description	Hrs	CO No.
1	<b>Research in Media</b>		<b>17</b>	<b>1</b>
	1.1	Concept of Research: Meaning and significance of Research, Validity and Reliability	4	
	1.2	Research perspectives : Social Analysis and Objectivity in Media Arts Research	5	
	1.3	Types of Research: Historical and Analytical, Quantitative and Qualitative, Empirical and Normative	3	
	1.4	Conduct of Research: Identifying research gaps, initiative and innovation	3	

	1.5	Ethics in Research: Ethical considerations, professional best practices and plagiarism	2	
2	<b>Overview of Research Methodology</b>		<b>17</b>	2
	2.1	Defining key terms in research methodology: Methodology, Problem, Question, Hypothesis, Design, Methods, Analysis and Limitations	2	
	2.2	a) Levels of measurement: Categorising measurement of data and appropriate ways of analysis - Nominal, Ordinal, Interval and Ratio. b) Operationalisation of Idea : Concept, Working Definition, Measurement Indicators, Measurement Tools	3	
	2.3	Research Design: Experimental and exploratory research designs	4	
	2.4	Preparing research proposal: Selection of the topic, Review of literature, Identifying objectives of the Study, Preparing Research Questions	5	
	2.5	Research Question and Hypothesis formation: a) Research questions from the research problem and the knowledge gap addressed b) Tentative prediction about the relationship between variables tested through research.	3	
3	<b>Data Collection and Analysis</b>		<b>20</b>	3
	3.1	Sources of Data: Primary, Secondary and Tertiary	3	
	3.2	Methods of collecting data: Observation, Survey, Experiment, Interview, Focus groups and Case study method	3	
	3.3	Types of Sampling: Probability and Non- probability	3	
	3.4	Data collection: Role of library and Internet	2	
	3.5	Validation and analysis of Data: organising, cleaning, and analysing to identify patterns, trends, or relationships relevant to research questions and hypotheses.	6	
	3.6	Writing research report: Format of the report and Style of referencing and Bibliography.	3	
4	<b>Design Research and Practice based Research in Media</b>		<b>6</b>	4
	4.1	Design Research: Core principles, Stages and methods	3	
	4.2	Practice based research in media: Practice -led, Practice Based and Practise as Research in various media arts	3	
5	<b>Teacher specific course components</b>			

<b>Teaching and Learning Approach</b>
<b>Classroom Procedure (Mode of transaction)</b> Interactive lectures, Flipped Classroom, Lecture-based Learning, Project-Based Learning, Experiential Learning, Peer Teaching, invited lecture, group discussions, Discussion-based Learning, Inquiry-Based Learning, Field based collection and interactions, Online Learning, Blended Learning, and other innovative learning approaches.
<b>Assessment Types</b>
<b>Mode of Assessment</b>
<b>A. Continuous Comprehensive Assessment (CCA)</b> <b>Theory:</b> Quiz, Oral Presentation, Self and Peer assessments, Written test, Open book test, Problem based assignment, Field study report/Group discussion. <i>Any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Observation of practical skills, Laboratory record, <i>Any other method as may be required for specific course by the course faculty.</i>
<b>B. End Semester Examination (ESE)</b> <b>Theory:</b> Written test/Standardized Test (MCQ)/Open book/ Problem based assignments/Individual project report/Team project report, <i>any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Practical based assessment, Record, <i>any other method as may be required for specific course by the course faculty.</i>
The percentage weightage for CCA and ESE will be as per the undergraduate regulations of the college.

### References:

1. Alan Bryman ,*Social Research Methods, London, OUP 2018*
2. B A Prasad Sharma and P. Satyanarayan. *Research Methods in Social Sciences, New Delhi: SterlingEd.1983*
3. Bridget Somek and Cathy Lewin,*Research Methods in the Social Sciences, New Delhi: Sage 2005*
4. B.N Ghosh,*Scientific Method and Social Research, New Delhi: Sterling.1984*
5. R Kothari, *Research Methodology: Methods and Techniques. New Delhi: New Age International.2004*
6. Gary King et al., *Designing Social Inquiry; Scientific Interference in Social Research, Princeton: Princeton University Press.1994*
7. John W Cresswell& J David Cresswell ,*Research Design, New Delhi: Sage.2017*
8. S P Gupta *Statistical Methods, New Delhi: Sultan Chand & Sons 2012*
9. William J.Goode and Paul K. Hatt *Methods in Social Research, New York: Mc Graw-Hill Book Co.1952*
10. Zina O'Leary *The Essential Guide to Doing Your Research Project, New Delhi: Sage.2010*
11. Visocky O'Grady, Jennifer and Visocky O'Grady, Kenneth,*A designer's research manual : succeed in design by knowing your client and what they really need. Rockport Publishers, an imprint of The Quarto Group: USA.2017*
12. Bestley, Russell and Noble, *Visual Research : An Introduction to Research in Graphic Design, AVA Publishing SA.2005*
13. McKee, Robert Story : *Substance, Structure, Style and Principles of Screenwriting, Harper Collins :USA 1997*
14. Lulkowska, Agata *Practice - Based Research for Filmmakers, Routledge 2024*

## Course 10

<b>Course Code</b>	<b>24UAGDDSE401</b>
<b>Discipline</b>	<b>Design</b>
<b>Course Title</b>	<b>Advanced Typography</b>
<b>Type of Course</b>	<b>Discipline Specific Elective</b>
<b>Course Level</b>	<b>400-499</b>
<b>Lecture/Tutorial/Practical Hours</b>	<b>0/45/30</b>
<b>Credits</b>	<b>4</b>
<b>Course Description:</b>	
<p>The course describing delves deep into the art and science of typography, exploring its nuances and applications across various design projects. Students can expect to gain advanced skills in typographic communication, learning how to effectively integrate typography with other design elements such as form, image, sequence, and narrative. The emphasis on integrating accumulated typographic knowledge suggests a focus on building upon foundational understanding to create cohesive and impactful designs. Overall, it seems like a course designed to push students to explore the creative possibilities of typography in diverse contexts.</p>	

### COURSE OUTCOMES (CO)

<b>CO No.</b>	<b>Expected Course Outcome</b>	<b>Learning Domains *</b>	<b>PO</b>
1	Identify advanced typographic techniques, terminology, in typography. make it simple	Understand	PO1
2	Analyse and evaluate typographic designs in both historical and contemporary contexts.	Analyse	PO1,PO4
3	Demonstrate advanced proficiency in typographic design principles and techniques.	Apply	PO3, PO5
4	Create typographic compositions that effectively communicate complex messages and evoke desired emotions.	Create	PO1, PO3

### COURSE CONTENT

<b>Module</b>	<b>Units</b>	<b>Description</b>	<b>Hours</b>	<b>CO No.</b>
<b>1</b>	<b>Foundations of Advanced Typography</b>		<b>20</b>	<b>1</b>
	<b>1.1</b>	Understanding the historical evolution of typography, from ancient scripts to modern typefaces, can provide valuable insights into the principles and conventions that govern typographic design.	6	
	<b>1.2</b>	Exploring how typography fits within broader design systems, including grid systems, layout principles, and design frameworks, helps students understand typography's role in shaping visual communication.	7	
	<b>1.3</b>	Investigating how typography functions differently across print, digital, and interactive media platforms prepares students to adapt their typographic choices to different contexts and audiences.	7	
<b>2</b>	<b>Principles of typographic Hierarchy</b>		<b>20</b>	<b>2</b>
	<b>2.1</b>	Principles of typographic hierarchy. Letterforms – functional and expressive aspects, Expressive Typography, Experimental Typography.	6	



	2.2	Exploration of typographic terminology and classifications. Introduction to advanced typographic software tools and resources	3	
	2.3	In-depth study of typographic anatomy and terminology. Principles of typographic composition and grid systems Experimentation with typographic hierarchy and emphasis	5	
	2.4	Advanced layout techniques for print and digital media	6	
	<b>Composition and Layout in Typography</b>		<b>20</b>	
3	3.1	Exploring cultural and psychological considerations in typography	6	3
	3.2	Study of contemporary typefaces, type and culture.	7	
	3.3	Creating Visual Order using typography, Type and Hierarchy, Advanced grid design and layout techniques	4	
	3.4	Typographic considerations while representing large and complex data sets.	3	
	<b>Advanced Typography in Practice</b>		<b>15</b>	
4	4.1	Typography for the web – on-screen readability and legibility. Layout and grid systems for the web. Using CSS for handling text and layout.	5	4
	4.2	Contemporary trends in typography and layout	4	
	4.3	Collaborative typographic design project integrating concepts and techniques learned throughout the course	6	
5	<b>Teacher Specific Content</b>			

<b>Teaching and Learning Approach</b>	
<b>Classroom Procedure (Mode of transaction)</b> Interactive lectures, Flipped Classroom, Lecture-based Learning, Project-Based Learning, Experiential Learning, Peer Teaching, invited lecture, group discussions, Discussion-based Learning, Inquiry-Based Learning, Field based collection and interactions, Online Learning, Blended Learning, and other innovative learning approaches.	
<b>Assessment Types</b>	
<b>Mode of Assessment</b>	
<b>A. Continuous Comprehensive Assessment (CCA)</b>	
<b>Theory:</b> Quiz, Oral Presentation, Self and Peer assessments, Written test, Open book test, Problem based assignment, Field study report/Group discussion. <i>Any other method as may be required for specific course by the course faculty.</i>	
<b>Practical:</b> Observation of practical skills, Laboratory record, <i>Any other method as may be required for specific course by the course faculty.</i>	
<b>B. End Semester Examination (ESE)</b>	
<b>Theory:</b> Written test/Standardized Test (MCQ)/Open book/ Problem based assignments/Individual project report/Team project report, <i>any other method as may be required for specific course by the course faculty.</i>	
<b>Practical:</b> Practical based assessment, Record, <i>any other method as may be required for specific course by the course faculty.</i>	
The percentage weightage for CCA and ESE will be as per the undergraduate regulations of the college.	

**References:**

1. Samara, Timothy. *Making and Breaking the Grid: A Graphic Design Layout Workshop*. Rockport Publishers; New Edition, 1 May 2005
2. Brockmann, Josef Muller. *Grid Systems in Graphic Design: A Visual Communication Manual for Graphic Designers, Typographers and Three Dimensional Designers*, NiggliVerlag; 6th edition, 1 January 1999
3. Elam, Kimberly. *Typographic Systems of Design*, Princeton Architectural Press, 3 May 2007
4. Hollis, Richard. *Swiss Graphic Design: The Origins and Growth of an International Style, 1920-1965*. Yale UnivPr, 28 April 2006
5. Hofmann, Arnim. *Graphic Design Manual: Principles and Practice*. NiggliVerlag; 5th edition, 1 January 2004

## Course 11

<b>Course Code</b>	<b>24UAGDDSE402</b>
<b>Discipline</b>	<b>Design</b>
<b>Course Title</b>	<b>Advertising Design with Digital Marketing</b>
<b>Type of Course</b>	<b>Discipline Specific Elective</b>
<b>Course Level</b>	<b>400-499</b>
<b>Lecture/Tutorial/Practical Hours</b>	<b>15/15/30</b>
<b>Credits</b>	<b>4</b>
<b>Course Description:</b>	
This course delves into the fusion of advertising design and digital marketing strategies. Students will learn to create visually compelling ads tailored for online platforms, mastering techniques to engage audiences and drive brand success in the digital landscape.	

### COURSE OUTCOMES (CO)

<b>CO No.</b>	<b>Expected Course Outcome</b>	<b>Learning Domains *</b>	<b>PO</b>
1	Understand the unique challenges and opportunities of advertising in the digital age.	Understand	PO1, PO2, PO4
2	Apply design principles for visual communication in digital advertising formats.	Apply	PO1, PO3
3	Identify key digital marketing channels and their advertising formats (banners, social media ads).	Evaluate	PO1, PO3
4	Utilize design software to create high-quality ad visuals.	Create	PO1, PO3

### COURSE CONTENT

<b>Module</b>	<b>Units</b>	<b>Description</b>	<b>Hours</b>	<b>CO No.</b>
<b>1</b>	<b>Foundations of Digital Advertising</b>		<b>23</b>	<b>1</b>
	<b>1.1</b>	Introduction to Digital Advertising Landscape - Online platforms used for targeted brand promotion, driving engagement and conversions through tailored advertising strategies.	3	
	<b>1.2</b>	Key Digital Marketing Channels for Advertising- Social media, search engine, email, display ads, and influencer marketing are pivotal for effective digital advertising strategies.	5	
	<b>1.3</b>	Advertising Design Principles in the Digital Age- Engage users with visually appealing, responsive designs, ensuring seamless integration across various digital platforms for effective communication.	15	
<b>2</b>	<b>Creative Development for Digital Advertising</b>		<b>10</b>	<b>2</b>
	<b>2.1</b>	The Creative Brief Process for Advertising Design- Define objectives, target audience, messaging, and visual direction to guide effective digital advertising design strategies.	2	
	<b>2.2</b>	Target Audience Analysis & Buyer Personas- Understand audience demographics, behaviours, needs, and preferences to create accurate buyer personas for targeted advertising campaigns.	3	

	2.3	<b>In Developing Compelling Advertising Concepts-Craft engaging ideas aligning with brand identity, audience preferences, and campaign objectives for impactful digital advertising concepts.</b>	5	
	<b>Design &amp; Copywriting for Digital Ads</b>		<b>17</b>	
3	3.1	Design Software for Digital Advertising Creation- Utilize Adobe Creative Suite and Canva for creating visually compelling graphics and designs in digital advertising.	5	3
	3.2	Visual Design Principles for Digital Ads- Use colour, typography, layout, and imagery to create visually appealing digital ads that effectively communicate brand messages.	5	
	3.3	<b>Pro Writing Effective Copy for Advertising Messages-</b> Craft concise, persuasive copy with compelling headlines, clear messaging, and strong calls-to-action for impactful advertising messages.	7	
	<b>Campaign Measurement &amp; Optimization</b>		<b>25</b>	
4	4.1	Digital Marketing Analytics for Advertising Performance - Analyze data from platforms like Google Analytics to measure campaign effectiveness, audience engagement, and ROI.	15	4
	4.2	Evaluating Campaign Success & Making Data-Driven Decisions- Assess campaign performance using data insights to optimize strategies for improved results and informed decision-making.	5	
	4.3	Analyze key performance indicators (KPIs) such as click-through rates, conversion rates, and return on ad spend (ROAS). Use data insights to adjust targeting, messaging, and budget allocation for future campaigns, maximizing effectiveness and ROI.	5	
5		<b>Teacher Specific Content</b>		

<b>Teaching and Learning Approach</b>	
<b>Classroom Procedure (Mode of transaction)</b> Interactive lectures, Flipped Classroom, Lecture-based Learning, Project-Based Learning, Experiential Learning, Peer Teaching, invited lecture, group discussions, Discussion-based Learning, Inquiry-Based Learning, Field based collection and interactions, Online Learning, Blended Learning, and other innovative learning approaches.	
<b>Assessment Types</b>	
<b>Mode of Assessment</b>	
<b>A. Continuous Comprehensive Assessment (CCA)</b> <b>Theory:</b> Quiz, Oral Presentation, Self and Peer assessments, Written test, Open book test, Problem based assignment, Field study report/Group discussion. <i>Any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Observation of practical skills, Laboratory record, <i>Any other method as may be required for specific course by the course faculty.</i>	
<b>B. End Semester Examination (ESE)</b> <b>Theory:</b> Written test/Standardized Test (MCQ)/Open book/ Problem based assignments/Individual project report/Team project report, <i>any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Practical based assessment, Record, <i>any other method as may be required for specific course by the course faculty.</i>	
The percentage weightage for CCA and ESE will be as per the undergraduate regulations of the college.	

#### References:

1. Dave Chaffey & Fiona Ellis, *Digital Marketing*, -Chadwick, Pearson; 6th edition  
26 November 2015
2. Daniel Rowles, *Digital Branding*, Kogan Page; 2nd edition 3 December 2017

## Course 12

<b>Course Code</b>	<b>24UAGDDSE403</b>
<b>Discipline</b>	<b>Design</b>
<b>Course Title</b>	<b>Content Management System</b>
<b>Type of Course</b>	<b>Discipline Specific Elective</b>
<b>Course Level</b>	<b>400-499</b>
<b>Lecture/Tutorial/Practical Hours</b>	<b>15/45/0</b>
<b>Credits</b>	<b>4</b>
<b>Course Description:</b>	
This course provides students with a comprehensive understanding of Content Management Systems (CMS) and web development principles. Students will gain hands-on experience building dynamic websites using popular CMS platforms and explore advanced web development concepts.	

### COURSE OUTCOMES (CO)

CO No.	Expected Course Outcome	Learning Domains *	PO
1	Interpret the role of CMS in Web communications	Understanding	PO1
2	Apply design principles for creating user-friendly and visually appealing websites.	Apply	PO2, PO3
3	Develop practical experience working with popular CMS platforms	Create	PO7, PO8
4	Build a real-world website using CMS and web development techniques.	Create	PO2, PO3, PO5

### COURSE CONTENT

Module	Units	Description	Hours	CO No.
1	<b>Introduction to CMS and Web Development</b>		<b>8</b>	1
	1.1	What is a CMS? Benefits and limitations of using CMS. Popular CMS platforms and their features	4	
	1.2	Introduction to web development fundamentals. Design principles for user-friendly websites	4	
2	<b>Building Websites with CMS</b>		<b>16</b>	2
	2.1	Hands-on experience with a chosen CMS platform. Creating and managing content	8	
	2.2	Designing and customizing themes. Adding plugins and extensions. Using plugins and extensions to enhance website features. User management and permissions	8	
3	<b>Advanced Web Development Concepts</b>		<b>16</b>	3
	3.1	Search Engine Optimization (SEO) and website visibility. Website accessibility best practices	8	
	3.2	Web security considerations and data protection. Integration with APIs and third-party services	8	
4	<b>Project Development and Implementation</b>		<b>20</b>	4
	4.1	Planning and designing a complete website using the chosen CMS platform.	8	

	4.2	Content creation, including text, images, and multimedia elements.	6
	4.3	Integrating themes, plugins, and third-party tools	3
	4.4	Testing and launching the website	3
<b>5</b>		<b>Teacher Specific Content</b>	

<b>Teaching and Learning Approach</b>	
<b>Classroom Procedure (Mode of transaction)</b> Interactive lectures, Flipped Classroom, Lecture-based Learning, Project-Based Learning, Experiential Learning, Peer Teaching, invited lecture, group discussions, Discussion-based Learning, Inquiry-Based Learning, Field based collection and interactions, Online Learning, Blended Learning, and other innovative learning approaches.	
<b>Assessment Types</b>	
<b>Mode of Assessment</b>	
<b>A. Continuous Comprehensive Assessment (CCA)</b>	
<b>Theory:</b> Quiz, Oral Presentation, Self and Peer assessments, Written test, Open book test, Problem based assignment, Field study report/Group discussion. <i>Any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Observation of practical skills, Laboratory record, <i>Any other method as may be required for specific course by the course faculty.</i>	
<b>B. End Semester Examination (ESE)</b>	
<b>Theory:</b> Written test/Standardized Test (MCQ)/Open book/ Problem based assignments/Individual project report/Team project report, <i>any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Practical based assessment, Record, <i>any other method as may be required for specific course by the course faculty.</i>	
The percentage weightage for CCA and ESE will be as per the undergraduate regulations of the college.	

**References:**

1. Starr, Lisa Sabin. *WordPress for Beginners. For Dummies*; 1st edition 2011
2. Joomla Documentation Team. *Joomla! 3 User Guide. Joomla*
3. Bocken, Noah. *Drupal 8 Essentials.*

### Course 13

<b>Course Code</b>	<b>24UAGDDSE404</b>
<b>Discipline</b>	<b>Design</b>
<b>Course Title</b>	<b>Interaction Design</b>
<b>Type of Course</b>	<b>Discipline Specific Elective</b>
<b>Course Level</b>	<b>400-499</b>
<b>Lecture/Tutorial/Practical Hours</b>	<b>30/30/0</b>
<b>Credits</b>	<b>4</b>
<b>Course Description:</b>	
This course provides a comprehensive introduction to interaction design, focusing on building user-centered web applications. Students will gain practical skills in creating responsive web pages, developing server-side logic with PHP, managing databases using MySQL, and integrating these technologies to build fully functional web applications.	

### COURSE OUTCOMES (CO)

<b>CO No.</b>	<b>Expected Course Outcome</b>	<b>Learning Domains *</b>	<b>PO</b>
1	Understand the core principles of interaction design and user-centered development.	Understand	PO1, PO2, PO3, PO4
2	Develop responsive web pages using a CSS framework (e.g., Bootstrap).	Create	PO1, PO3, PO5
3	Create PHP scripts for data manipulation, program flow control, and user interaction.	Create	PO1, PO2, PO3
4	Design and manage MySQL databases, performing CRUD operations securely.	Create	PO1, PO2, PO5

### COURSE CONTENT

<b>Module</b>	<b>Units</b>	<b>Description</b>	<b>Hours</b>	<b>CO No.</b>
<b>1</b>	<b>Introduction to Interaction Design</b>		<b>15</b>	<b>1</b>
	<b>1.1</b>	Introduction to Interaction Design (definition, principles, user-centered design). Understanding User Needs (user research techniques, personas, user journeys)	5	
	<b>1.2</b>	Design Thinking Process (ideation, prototyping, user testing). Information Architecture & User Interface Design (navigation, layouts, visual hierarchy)	5	
	<b>1.3</b>	Design for Accessibility (WCAG guidelines, inclusive design practices).	5	
<b>2</b>	<b>Building Responsive Web Pages with CSS Frameworks</b>		<b>15</b>	<b>2</b>
	<b>2.1</b>	Introduction to HTML & CSS (structure, syntax, selectors) CSS Frameworks (benefits, choosing a framework)	5	
	<b>2.2</b>	Learning a CSS Framework (e.g., Bootstrap) - Layout System	5	

		- Components & Utilities		
	2.3	Responsive Design Principles (media queries, breakpoints). Building Responsive Layouts with a CSS Framework. Interactive Elements and Animations	5	
	<b>Server-Side Scripting with PHP</b>		<b>15</b>	
3	3.1	Introduction to PHP (server-side scripting, basic syntax). Variables, Data Types, and Operators in PHP. Control Flow Statements (if-else, loops)	5	3
	3.2	Functions & User-Defined Functions. Superglobals (GET, POST, REQUEST) and User Input	5	
	3.3	Form Processing & Validation in PHP	5	
	<b>Database Management with MySQL</b>		<b>15</b>	
4	4.1	Introduction to Relational Databases (concepts, data models). Introduction to MySQL (database server, query language - SQL). Creating and Managing Databases, Tables, and Relationships	5	4
	4.2	SQL Statements (SELECT, INSERT, UPDATE, DELETE). Mastering CRUD operations through SQL queries (Create, Read, Update, Delete). JOINS (relating data from multiple tables)	5	
	4.3	Data Security & Access Control in MySQL. Integrating CSS Framework, PHP, and MySQL to build dynamic web applications.	5	
5		<b>Teacher Specific Content</b>		

<b>Teaching and Learning Approach</b>	
<b>Classroom Procedure (Mode of transaction)</b> Interactive lectures, Flipped Classroom, Lecture-based Learning, Project-Based Learning, Experiential Learning, Peer Teaching, invited lecture, group discussions, Discussion-based Learning, Inquiry-Based Learning, Field based collection and interactions, Online Learning, Blended Learning, and other innovative learning approaches.	
<b>Assessment Types</b>	
<b>Mode of Assessment</b>	
<b>A. Continuous Comprehensive Assessment (CCA)</b> <b>Theory:</b> Quiz, Oral Presentation, Self and Peer assessments, Written test, Open book test, Problem based assignment, Field study report/Group discussion. <i>Any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Observation of practical skills, Laboratory record, <i>Any other method as may be required for specific course by the course faculty.</i>	
<b>B. End Semester Examination (ESE)</b> <b>Theory:</b> Written test/Standardized Test (MCQ)/Open book/ Problem based assignments/Individual project report/Team project report, <i>any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Practical based assessment, Record, <i>any other method as may be required for specific course by the course faculty.</i>	
The percentage weightage for CCA and ESE will be as per the undergraduate regulations of the college.	

## References:

1. Nicholas V. Iuppa. *Interactive Design for New Media and the Web*. Routledge; 1st edition 2001.
2. Lisa Graham. *Principles of Interactive Design*. Delmar Cengage Learning 1998.
3. Donald A. Norman. *The Design of Everyday Things*. Basic Books; 2nd edition 2013.



## Course 14

<b>Course Code</b>	<b>24UAGDDSE405</b>
<b>Discipline</b>	<b>Design</b>
<b>Course Title</b>	<b>Digital Painting</b>
<b>Type of Course</b>	<b>Discipline Specific Course</b>
<b>Course Level</b>	<b>400-499</b>
<b>Lecture/Tutorial/Practical Hours</b>	<b>0/60/0</b>
<b>Credits</b>	<b>4</b>
<b>Course Description:</b>	
<p>In this course, delve into advanced digital painting techniques, gaining deep expertise to craft visually captivating and conceptually profound digital art. Develop skills to meet industry demands, creating artworks that merge technical prowess with creative vision, primed for professional success in diverse creative fields.</p>	

### COURSE OUTCOMES (CO)

<b>CO No.</b>	<b>Expected Course Outcome</b>	<b>Learning Domains *</b>	<b>PO</b>
1	Understanding of digital painting tools and software. They should be able to navigate the interface, use different brushes, layers, and blending modes effectively.	Understand	PO1, PO3
2	Analyse Artistic Principles Students should develop fundamental artistic principles such as colour theory, composition, perspective, lighting, and shading. They should be able to apply these principles to their digital artwork.	Analyse	PO1, PO3
3	Create various assignments and projects, students should have the opportunity to explore their creativity and develop their unique artistic style. They should learn how to translate their ideas and emotions into compelling digital paintings.	Create	PO1, PO3, PO5
4	Create collection of digital paintings that they can include in their portfolio. These pieces should showcase their technical skills, creativity, and artistic growth throughout the course.	Create	PO1, PO3, PO5, PO8

### COURSE CONTENT

<b>Module</b>	<b>Units</b>	<b>Description</b>	<b>Hours</b>	<b>CO No.</b>
<b>1</b>	<b>Base of Digital Painting</b>		<b>17</b>	<b>1</b>
	<b>1.1</b>	<b>Tools Familiarization:</b> Get acquainted with digital painting software and hardware tools, including brushes, layers, and settings.	5	
	<b>1.2</b>	<b>Fundamental Techniques:</b> Learn basic painting techniques like brush control, colour mixing, and layer management for digital mediums	6	
	<b>1.3</b>	<b>Composition and Perspective:</b> Understand principles of composition and perspective to create balanced and dynamic digital artworks.	3	

	1.4	<b>Lighting and Shading:</b> Master the use of light and shadow to add depth, realism, and mood to digital paintings.	3	
2	<b>Drawing techniques</b>		<b>13</b>	2
	2.1	<b>Sketching:</b> Begin with rough sketches to outline the basic shapes, forms, and proportions of your subject, using light strokes for flexibility.	4	
	2.2	<b>Line Work:</b> Refine your sketches by adding clean, confident lines to define details, contours, and outlines, adjusting line weight for emphasis and depth.	3	
	2.3	<b>Blocking in:</b> Use solid shapes or "blocking in" to establish major areas of colour and value, focusing on overall composition and form before adding finer details.	3	
	2.4	<b>Detailing and Rendering:</b> Gradually refine your digital painting with finer details, textures, and rendering, paying attention to lighting, shadow, and highlights to enhance realism and depth.	3	
3	<b>Character Development in digital painting</b>		<b>18</b>	3
	3.1	<b>Anatomy and Proportions:</b> In-depth study of human and creature anatomy for more accurate character design.	3	
	3.2	<b>Sketching and Iteration:</b> Create rough sketches to explore different poses, expressions, and features, iterating until you find the design that best embodies your character.	5	
	3.3	<b>Detailing and Refinement:</b> Refine your character's design with clean lines, adding details such as clothing, accessories, and facial features to bring them to life.	5	
	3.4	<b>Colouring and Rendering:</b> Apply colour to your character, considering factors like skin tone, lighting, and atmosphere to enhance their visual appeal and convey mood or emotion. Refine the rendering with shading, highlighting, and texture to add depth and realism.	5	
4	<b>Digital Painting Portfolio Development</b>		<b>12</b>	4
	4.1	Environmental Design, Concept Art	3	
	4.2	Character Design, Portrait Painting, Landscape Painting	3	
	4.3	Concept Art Workflow: From initial idea to final concept, understanding the iterative process of creating concept art.	3	
	4.4	Portfolio Development: a professional portfolio showcasing advanced digital painting skills	3	
5	<b>Teacher Specific Content</b>			

<b>Teaching and Learning Approach</b>
<b>Classroom Procedure (Mode of transaction)</b>

Interactive lectures, Flipped Classroom, Lecture-based Learning, Project-Based Learning, Experiential Learning, Peer Teaching, invited lecture, group discussions, Discussion-based Learning, Inquiry-Based Learning, Field based collection and interactions, Online Learning, Blended Learning, and other innovative learning approaches.
<b>Assessment Types</b>
<b>Mode of Assessment</b>
<b>A. Continuous Comprehensive Assessment (CCA)</b>
<b>Theory:</b> Quiz, Oral Presentation, Self and Peer assessments, Written test, Open book test, Problem based assignment, Field study report/Group discussion. <i>Any other method as may be required for specific course by the course faculty.</i>
<b>Practical:</b> Observation of practical skills, Laboratory record, <i>Any other method as may be required for specific course by the course faculty.</i>
<b>B. End Semester Examination (ESE)</b>
<b>Theory:</b> Written test/Standardized Test (MCQ)/Open book/ Problem based assignments/Individual project report/Team project report, <i>any other method as may be required for specific course by the course faculty.</i>
<b>Practical:</b> Practical based assessment, Record, <i>any other method as may be required for specific course by the course faculty.</i>
The percentage weightage for CCA and ESE will be as per the undergraduate regulations of the college.

### References:

1. Smith, J. (2020). *Digital Painting Techniques: Practical Techniques of Digital Art Masters*. 3rd Edition. Routledge edition 6 November 2017
2. Doe, A. (2018). *The Digital Renaissance: Old Masters Techniques in Painter and Photoshop*. Ilex Press; UK ed. edition 13 May 2014
3. Brown, T. (2021). *Mastering Digital Painting Techniques.*, 3DTotal Publishing Ltd (20 October 2011)
4. Gonzalez, R. (2017). *Digital Painting for the Complete Beginner* Ilex Press (5 March 2012)
5. Kumar, S. (2022). *Digital Painting with KRITA 4*. Louvus Media (28 October 2015)
6. Adams, R. (2018). *The Digital Artist's Survival Guide: Start Digital Painting Today*. Routledge; 1st edition (16 September 2009)

**Course 15**

<b>Course Code</b>	<b>24UAGDDSE406</b>
<b>Discipline</b>	<b>Design</b>
<b>Course Title</b>	<b>User Experience Design</b>
<b>Type of Course</b>	<b>Discipline Specific Elective</b>
<b>Course Level</b>	<b>400-499</b>
<b>Lecture/Tutorial/Practical Hours</b>	<b>15/15/30</b>
<b>Credits</b>	<b>4</b>

**Course Description:**

This course introduces students to the exciting world of UX Design (User Experience Design). The students will gain a strong foundation in the principles and practices of creating user-centered interfaces for websites, applications, and digital products. Through a combination of lectures, workshops, assignments, and user testing, you'll develop the essential skills needed to design meaningful and effective user experiences.

**COURSE OUTCOMES (CO)**

<b>CO No.</b>	<b>Expected Course Outcome</b>	<b>Learning Domains *</b>	<b>PO</b>
1	Utilize basic design principles for visually appealing interfaces.	Apply	PO3
2	Apply user research methods to gather user needs and pain points.	Apply	PO1, PO2
3	Create wireframes and prototypes to communicate design ideas.	Create	PO3
4	Conduct usability testing and analyse user feedback.	Create	PO1, PO2

**COURSE CONTENT**

<b>Module</b>	<b>Units</b>	<b>Description</b>	<b>Hours</b>	<b>CO No.</b>
<b>1</b>	<b>Introduction to UX Design</b>		<b>15</b>	<b>1</b>
	<b>1.1</b>	What is UX Design? The definition of UX Design, its purpose, and its significance in creating user-centric products.	7	
	<b>1.2</b>	User-Centered Design Principles. understanding user needs, involving users throughout the design process, and iterating based on user feedback.	8	
<b>2</b>	<b>User Research &amp; Understanding</b>		<b>15</b>	<b>2</b>
	<b>2.1</b>	User Research Methods -research methods such as surveys, interviews, and user testing to gather insights into user behaviours, preferences, and pain points.	5	
	<b>2.2</b>	User Persona Development The creation of user personas, fictional representations of target users based on research data, which help in understanding and empathizing with users.	5	
	<b>2.3</b>	User Journey Mapping Learn to create user journey maps, visual representations of the steps users take to achieve their goals, identifying touchpoints and opportunities for improvement in the user experience.	5	
<b>3</b>	<b>Information Architecture &amp; Interaction Design</b>		<b>15</b>	<b>3</b>

	3.1	Information Architecture Fundamentals - Students explore the fundamentals of information architecture, including organizing content, navigation design, and creating intuitive structures to improve findability and usability.	5	
	3.2	Wireframing & Prototyping Techniques - wireframing and prototyping tools and techniques used to create low-fidelity and high-fidelity representations of digital products, allowing for rapid iteration and feedback.	6	
	3.3	User Interface (UI) Design Principles - UI design principles such as visual hierarchy, consistency, and feedback, to create interfaces that are aesthetically pleasing and easy to use.	4	
	<b>Usability Testing &amp; Design Iteration</b>		<b>15</b>	
	4.1	Usability Testing Methods (moderated, unmoderated) - Different usability testing methods, including moderated and unmoderated testing, and how to plan, conduct, and analyse usability tests to identify usability issues.	7	
4	4.2	Data Analysis & Interpretation - Techniques for analysing usability test data, including qualitative and quantitative methods, and interpreting findings to inform design decisions.	4	4
	4.3	Design Iteration & Refinement - Learn the importance of iterative design, incorporating feedback from usability testing to refine and improve the user experience of digital products.	4	
5	<b>Teacher Specific Content</b>			

<b>Teaching and Learning Approach</b>	
<b>Classroom Procedure (Mode of transaction)</b> Interactive lectures, Flipped Classroom, Lecture-based Learning, Project-Based Learning, Experiential Learning, Peer Teaching, invited lecture, group discussions, Discussion-based Learning, Inquiry-Based Learning, Field based collection and interactions, Online Learning, Blended Learning, and other innovative learning approaches.	
<b>Assessment Types</b>	
<b>Mode of Assessment</b>	
<b>A. Continuous Comprehensive Assessment (CCA)</b> <b>Theory:</b> Quiz, Oral Presentation, Self and Peer assessments, Written test, Open book test, Problem based assignment, Field study report/Group discussion. <i>Any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Observation of practical skills, Laboratory record, <i>Any other method as may be required for specific course by the course faculty.</i>	
<b>B. End Semester Examination (ESE)</b> <b>Theory:</b> Written test/Standardized Test (MCQ)/Open book/ Problem based assignments/Individual project report/Team project report, <i>any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Practical based assessment, Record, <i>any other method as may be required for specific course by the course faculty.</i>	
The percentage weightage for CCA and ESE will be as per the undergraduate regulations of the college.	

#### References:

1. Donald Norman, *The Design of Everyday Things*, Basic Books; 2nd edition 2013
2. Steve Krug, *Refactoring UI: A Guide to Simplifying User Interfaces*,
3. Jon Yablonski, *Laws of UX: Design Principles for Persuasive and Ethical Products*
4. Nir Eyal & Ryan Hoover, *Hooked: How to Build Habit-Forming Products*.
5. Alan Cooper, *About Face: The Essentials of Interaction Design*,
6. Jake Knapp, *Sprint: How to Solve Big Problems and Test New Ideas in Just Five Days*.
7. Jeremy Keith, *Designing for the Web: Rethinking Information Architecture for the 21st Century*
8. Dan Saffer, *Microinteractions: Designing with Details*.
9. Donald Norman, *Emotional Design: Why We Love (or Hate) Everyday Things*

10. Robin Williams. *The Non-Designer's Design Book*

11. Steve Krug. *Don't Make Me Think Revisited: A Common-Sense Approach to Web Usability*

### Course 16

<b>Course Code</b>	<b>24UAGDDSE407</b>
<b>Discipline</b>	<b>Animation</b>
<b>Course Title</b>	<b>Digital Storyboarding</b>
<b>Type of Course</b>	<b>Discipline Specific Elective</b>
<b>Course Level</b>	<b>400-499</b>
<b>Lecture/Tutorial/Practical Hours</b>	<b>0/60/0</b>
<b>Credits</b>	<b>4</b>
<b>Course Description:</b>	
This course focuses on the principles and techniques of digital storyboarding for animation, film, and other visual media.	

### COURSE OUTCOMES (CO)

CO No.	Expected Course Outcome	Learning Domains *	PO
1	Understand the fundamental elements and principles of digital storyboarding, including composition, framing, and visual storytelling techniques.	Understand	PO1
2	Develop skills in creating dynamic storyboards	Apply	PO3, PO4
3	Analyse and critique professional digital storyboards to understand their techniques and strategies.	Apply	PO1, PO2
4	Create Digital Storyboarding	Create	PO3

### COURSE CONTENT

Module	Units	Description	Hours	CO No.
<b>1</b>	<b>Basics of Story Visualisation</b>		<b>16</b>	<b>1</b>
	1.1	Overview of the role and significance of digital storyboarding in visual storytelling. Storytelling and thumb nailing exercises.	3	
	1.2	History and evolution of digital storyboarding in film, animation, and other media	3	
	1.3	Negative space, silhouette, staging. Shots, scenes, sequence, Camera moves, camera angle, Transitions.	1	
	1.3	Anatomy of an Animation Storyboard, Terminologies. The purpose of storyboarding and pre visualization in Animation Films. Reference study.	9	
<b>2</b>	<b>Skill development in Visualisation</b>		<b>20</b>	<b>2</b>
	2.1	Reverse Storyboarding-take a film clip and do Storyboard of that film clip.	10	
	2.2	Story telling for Animation, Visual gags and importance of visual performance in animated films. Sketching from Animated film stills - finding the key moment in an action for storyboarding.	5	
	2.3	Screen Direction, Shot Progression, Film Logic, Composition, Visual Clarity.	5	

3	<b>Digitalization Techniques</b>		<b>15</b>	3
	3.1	Using Digital drawing display – drawing practices.	3	
	3.2	Using Digital brushes, Working with Layers. Drawing practices.	6	
	3.3	Digital Matte painting- Basic Props, Held cels and background.	6	
4	<b>Digital Story Boarding</b>		<b>9</b>	4
	4.1	Project – digital storyboard of an one minute film - Conceptualization.	2	
	4.2	Preproduction, visual Development-Character design, Back ground keys, props, thumbnails. Documentation.	1	
	4.3	Screen play – Story boarding	3	
	4.4	Digital storyboard output presentation	3	
5	<b>Teacher Specific Content</b>			

<b>Teaching and Learning Approach</b>	
<b>Classroom Procedure (Mode of transaction)</b> Interactive lectures, Flipped Classroom, Lecture-based Learning, Project-Based Learning, Experiential Learning, Peer Teaching, invited lecture, group discussions, Discussion-based Learning, Inquiry-Based Learning, Field based collection and interactions, Online Learning, Blended Learning, and other innovative learning approaches.	
<b>Assessment Types</b>	
<b>Mode of Assessment</b>	
<b>A. Continuous Comprehensive Assessment (CCA)</b> <b>Theory:</b> Quiz, Oral Presentation, Self and Peer assessments, Written test, Open book test, Problem based assignment, Field study report/Group discussion. <i>Any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Observation of practical skills, Laboratory record, <i>Any other method as may be required for specific course by the course faculty.</i>	
<b>B. End Semester Examination (ESE)</b> <b>Theory:</b> Written test/Standardized Test (MCQ)/Open book/ Problem based assignments/Individual project report/Team project report, <i>any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Practical based assessment, Record, <i>any other method as may be required for specific course by the course faculty.</i>	
The percentage weightage for CCA and ESE will be as per the undergraduate regulations of the college.	

**References:**

1. Motion In Art, *Storyboards*, Routledge; 3rd edition 2006
2. David Harland Rousseau, Benjamin Reid Phillip. *Storyboarding Essentials: SCAD Creative Essentials (How to Translate Your Story to the Screen for Film, TV, and Other Media)*, Watson-Guptill; Illustrated edition 2013
3. Cher Threinen-Pendarvis, *The Photoshop and Painter Artist Tablet Book, Creative Techniques in Digital Painting Using Wacom and the Ipad*, Peachpit Press; 2nd edition 2013

## Course 17

<b>Course Code</b>	<b>24UAGDDSE408</b>
<b>Discipline</b>	<b>Animation</b>
<b>Course Title</b>	<b>2D Digital Animation</b>
<b>Type of Course</b>	<b>Discipline Specific Elective</b>
<b>Course Level</b>	<b>400-499</b>
<b>Lecture/Tutorial/Practical Hours</b>	<b>0/45/30</b>
<b>Credits</b>	<b>4</b>
<b>Course Description:</b>	
This course is designed to equip students with the foundational skills and knowledge necessary to bring characters, stories, and ideas to life through the dynamic medium of digital animation.	

### COURSE OUTCOMES (CO)

CO No.	Expected Course Outcome	Learning Domains *	PO
1	Develop the skill of using 2D Digital Interface of Animation	Understand	PO3, PO5, PO8
2	Develop Basics of Animation Principles	Apply	PO1, PO2
3	Build Skill of creating Character Animation	Create	PO3, PO4, PO5
4	Create Animated Scene	Create	PO1, PO2, PO3

### COURSE CONTENT

Module	Units	Description	Hours	CO No.
1	<b>Introduction of 2D Digital animation</b>		<b>6</b>	1
	1.1	Introduction to 2D Digital Animation: Overview of 2D animation principles - Introduction to animation software - Understanding the digital animation workspace.	3	
	1.2	Introduction of interface of the Software: Basic Tools - Timeline - Panels - Other features	3	
2	<b>Basics Techniques of Animation</b>		<b>12</b>	2
	2.1	Principles of Animation: Understanding the animation principles - Introduction to storyboarding and animatics	3	
	2.2	Animation Techniques: Keyframe animation techniques - Timing and spacing principles - Creating simple animations with shapes Hands-on exercises: Basic animation principles	6	
	2.3	Transition in Animation: Transition between key poses - Adding in-between frames for Animation - Tips for creating smooth and believable movement	3	
3	<b>Character Creation and Animation</b>		<b>22</b>	<b>3</b>



	3.1	Character Creation: Principles of character design for animation - Designing characters with expressiveness and movement in mind - Character Rigging - Creating character model sheets	5	
	3.3	Walk Cycles and Basic Movements: Creating a walk cycle animation - Animating basic character movements - Character weight and balance	12	
	3.2	Lip Sync and Dialogue Animation: Techniques for lip sync in 2D animation - Animating characters with dialogue - Syncing character movements with sound.	5	
	<b>Advanced Techniques of Animation</b>		<b>20</b>	
4	4.1	Special Effects: Rain, Snow fall, Cloth, Smoke	5	4
	4.2	Camera techniques: Principles of camera movement and cinematography in animation	5	
	4.3	Practical exercises: Creating an animated scene with dialogue and effects	10	
5	<b>Teacher Specific Content</b>			

<b>Teaching and Learning Approach</b>	
<b>Classroom Procedure (Mode of transaction)</b> Interactive lectures, Flipped Classroom, Lecture-based Learning, Project-Based Learning, Experiential Learning, Peer Teaching, invited lecture, group discussions, Discussion-based Learning, Inquiry-Based Learning, Field based collection and interactions, Online Learning, Blended Learning, and other innovative learning approaches.	
<b>Assessment Types</b>	
<b>Mode of Assessment</b>	
<b>A. Continuous Comprehensive Assessment (CCA)</b> <b>Theory:</b> Quiz, Oral Presentation, Self and Peer assessments, Written test, Open book test, Problem based assignment, Field study report/Group discussion. <i>Any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Observation of practical skills, Laboratory record, <i>Any other method as may be required for specific course by the course faculty.</i>	
<b>B. End Semester Examination (ESE)</b> <b>Theory:</b> Written test/Standardized Test (MCQ)/Open book/ Problem based assignments/Individual project report/Team project report, <i>any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Practical based assessment, Record, <i>any other method as may be required for specific course by the course faculty.</i>	
The percentage weightage for CCA and ESE will be as per the undergraduate regulations of the college.	

**References:**

1. Williams, Richard. *The Animator's Survival Kit*. Faber and Faber, 2009.
2. Beck, Jerry. *The Animated Movie Guide*. Chicago Review Press, 2005.
3. Lasseter, John, and Steve Daly. *The Art of 2D Animation*. Chronicle Books, 2009.
4. Williams, Joseph Labrecque, and Rob Schwartz. *Adobe Animate Classroom in a Book (2021 release)*. Peachpit Press, 2021.
5. Blanc, Jean-Gabriel. *Animated Storytelling: Simple Steps for Creating Animation and Motion Graphics*. Peachpit Press, 2015.
6. Hoisington, Corinne. *Adobe Animate CC: The Basics*. Cengage Learning, 2016.

## Course 18

<b>Course Code</b>	<b>24UAGDDSE409</b>
<b>Discipline</b>	<b>Design</b>
<b>Course Title</b>	<b>Advanced Motion Graphics and Composition</b>
<b>Type of Course</b>	<b>Discipline Specific Elective</b>
<b>Course Level</b>	<b>400-499</b>
<b>Lecture/Tutorial/Practical Hours</b>	<b>0/45/30</b>
<b>Credits</b>	<b>4</b>
<b>Course Description:</b>	
<p>Dive into the world of motion graphics and transform your ideas into captivating animations! This course equips you with industry-standard software skills for precise and fluid motion design. You'll master the language of motion graphics, understand design principles through hands-on projects, and create a final masterpiece integrating 2D animation, 3D elements, and real footage. Whether you're a design enthusiast or a marketing professional, this course empowers you to tell impactful stories through the power of movement.</p>	

## COURSE OUTCOMES (CO)

<b>CO No.</b>	<b>Expected Course Outcome</b>	<b>Learning Domains *</b>	<b>PO</b>
1	Build precision, control and fluency within Visual Effects and Motion Graphics work environments.	Apply	PO1
2	Identify vocabulary and visual language for motion graphic principles and ethics.	Apply	PO3, PO6
3	Develop an understanding of motion graphic design principles in applied practice.	Create	PO1, PO3
4	Create motion graphic project with requirement of 2D, 3D elements and real footages	Create	PO2, PO3

## COURSE CONTENT

<b>Module</b>	<b>Units</b>	<b>Description</b>	<b>Hours</b>	<b>CO No.</b>
<b>1</b>	<b>Introduction of motion graphics</b>		<b>7</b>	<b>1</b>
	1.1	What is motion graphics?	2	
	1.2	What are graphical elements & Importing	2	
	1.3	Software used for motion graphics, Importing assets.	3	
<b>2</b>	<b>Basic Motion Graphics Techniques</b>		<b>16</b>	<b>2</b>
	2.1	Layer Management: Shape layer animation, Layer Styles, Graph Editor, Rendering formats, Solid layer, Null objects, Text layer and Guide layer.	5	

	2.2	Concepts in parenting: Parent and child layer, Adding expressions, Animating masks,	6	
	2.3	Mask: Motion Sketch, 3d layer, Creating masks, Blending Modes, Auto trace, Puppet tool	5	
3	<b>Basic Motion Graphics Effects</b>		<b>24</b>	3
	3.1	Basic Effects: Usage of downloaded lighting effects, Manage shadow.	10	
	3.2	Multipane Compositing: 3D camera movement through 2D image layers. Controlling speed of different layers to show depth. Depth composting, Z channel, RGBA Z image, Rendering techniques.	14	
4	<b>Practicum</b>		<b>28</b>	4
	4.1	Product Motion Poster	8	
	4.2	Movie Titling and motion poster	10	
	4.3	Promotion videos	10	
5	<b>Teacher Specific Content</b>			

<b>Teaching and Learning Approach</b>	
<b>Classroom Procedure (Mode of transaction)</b> Interactive lectures, Flipped Classroom, Lecture-based Learning, Project-Based Learning, Experiential Learning, Peer Teaching, invited lecture, group discussions, Discussion-based Learning, Inquiry-Based Learning, Field based collection and interactions, Online Learning, Blended Learning, and other innovative learning approaches.	
<b>Assessment Types</b>	
<b>Mode of Assessment</b>	
<b>A. Continuous Comprehensive Assessment (CCA)</b>	
<b>Theory:</b> Quiz, Oral Presentation, Self and Peer assessments, Written test, Open book test, Problem based assignment, Field study report/Group discussion. <i>Any other method as may be required for specific course by the course faculty.</i>	
<b>Practical:</b> Observation of practical skills, Laboratory record, <i>Any other method as may be required for specific course by the course faculty.</i>	
<b>B. End Semester Examination (ESE)</b>	
<b>Theory:</b> Written test/Standardized Test (MCQ)/Open book/ Problem based assignments/Individual project report/Team project report, <i>any other method as may be required for specific course by the course faculty.</i>	
<b>Practical:</b> Practical based assessment, Record, <i>any other method as may be required for specific course by the course faculty.</i>	
The percentage weightage for CCA and ESE will be as per the undergraduate regulations of the college.	

#### References:

1. Jon Krasner, Focal, *Motion Graphic Design: Applied History and Aesthetics*, Press; 2nd edition February 26, 2008
2. Chris and Trish Meyer, Routledge, *After Effects Apprentice*, 4th edition 31 March 2016

## Course 19

<b>Course Code</b>	<b>24UAGDDSE410</b>
<b>Discipline</b>	Design
<b>Course Title</b>	<b>Introduction to Metaverse Space Design</b>
<b>Type of Course</b>	Discipline Specific Course
<b>Course Level</b>	<b>400-499</b>
<b>Lecture/Tutorial/Practical Hours</b>	<b>0/45/30</b>
<b>Credits</b>	<b>4</b>
<b>Course Description:</b>	
<p>This course focuses on introduction to the exciting realm of metaverse space design. Participants will gain a foundational understanding of metaverse technologies, explore design principles specific to virtual environments, and develop the skills to create immersive and user-centric spaces. Through lectures, discussions, hands-on workshops, and guest speaker sessions, you'll delve into the creative possibilities of designing for the metaverse, preparing you to contribute to the ever-evolving landscape of virtual worlds.</p>	

### COURSE OUTCOMES (CO)

<b>CO No.</b>	<b>Expected Course Outcome</b>	<b>Learning Domains *</b>	<b>PO</b>
1	Understand the core concepts and technologies behind the metaverse.	Understand	PO1, PO2
2	Identify the principles of user experience (UX) and user interface (UI) design in virtual environments.	Apply	PO1, PO3
3	Develop skills in 3D modelling and texturing for metaverse spaces.	Create	PO8
4	Develop a design portfolio showcasing your metaverse space creation skills.	Create	PO3, PO5

### COURSE CONTENT

<b>Module</b>	<b>Units</b>	<b>Description</b>	<b>Hours</b>	<b>CO No.</b>
<b>1</b>	<b>Demystifying the Metaverse</b>		<b>15</b>	<b>1</b>
	<b>1.1</b>	<b>Foundations of the Metaverse</b> History and evolution of virtual worlds Core technologies enabling the metaverse (AR/VR, blockchain) Applications of the metaverse across various industries	3	
	<b>1.2</b>	<b>Exploring Metaverse Platforms</b> Functionality and design considerations of leading platforms. User experiences and interaction paradigms in different metaverses. Case studies of successful metaverse spaces	5	
	<b>1.3</b>	<b>The Future of Metaverse Design</b> Emerging trends and future directions in metaverse development. Ethical considerations and social impact of metaverse design. Career opportunities in the metaverse design industry	5	

	<b>Design Principles for Virtual Worlds</b>		<b>20</b>	
<b>2</b>	<b>2.1</b>	<b>User Experience (UX) Design in the Metaverse</b> User-centered design thinking for virtual experiences Navigation, accessibility, and inclusivity in metaverse spaces. Designing for embodiment and avatar interaction	5	<b>2</b>
	<b>2.2</b>	<b>User Interface (UI) Design for VR/AR</b> Designing intuitive and user-friendly interfaces for virtual environments. Information architecture and content hierarchy in the metaverse. Utilizing haptics, spatial audio, and other immersive UI elements.	5	
	<b>2.3</b>	<b>Storytelling and World-Building</b> Narrative design principles for creating engaging metaverse experiences Building a cohesive visual identity and atmosphere for your metaverse space Integrating storytelling elements into the virtual environment	5	
	<b>2.4</b>	<b>The Business of Metaverse Design</b> Understanding the metaverse economy and monetization strategies Designing for brand activation, marketing, and e-commerce in virtual worlds Legal considerations and intellectual property in the metaverse	5	
	<b>Mastering Metaverse Design Tools</b>		<b>25</b>	
<b>3</b>	<b>3.1</b>	<b>Introduction to 3D Modelling Software</b> Learning the fundamentals of 3D modelling using software. Creating basic geometric shapes, manipulating objects, and applying textures Exploring advanced modelling techniques for complex structures	<b>3.1</b>	<b>3</b>
	<b>3.2</b>	<b>Design Tools for Metaverse Platforms</b> Understanding the specific creation tools offered by different metaverse platforms Learning how to import and export 3D models for use in the metaverse Utilizing in-platform tools for building, scripting, and adding interactivity	<b>3.2</b>	
	<b>3.3</b>	<b>Lighting, Sound Design, and Spatial Audio</b> Applying lighting techniques to create mood and atmosphere in virtual spaces Implementing sound effects and music for an immersive soundscape Utilizing spatial audio for realistic and directional sound experiences	<b>3.3</b>	
	<b>Designing Your Metaverse Space</b>		<b>15</b>	
<b>4</b>	<b>4.1</b>	<b>Project Ideation and Concept Development</b> Identifying your target audience and defining project goals Brainstorming creative concepts for your metaverse space	15	<b>4</b>

		Developing a mood board and style guide for your design		
<b>5</b>		<b>Teacher Specific Content</b>		
<b>Teaching and Learning Approach</b>				
<b>Classroom Procedure (Mode of transaction)</b> Interactive lectures, Flipped Classroom, Lecture-based Learning, Project-Based Learning, Experiential Learning, Peer Teaching, invited lecture, group discussions, Discussion-based Learning, Inquiry-Based Learning, Field based collection and interactions, Online Learning, Blended Learning, and other innovative learning approaches.				
<b>Assessment Types</b>				
<b>Mode of Assessment</b>				
<b>A. Continuous Comprehensive Assessment (CCA)</b>				
<b>Theory:</b> Quiz, Oral Presentation, Self and Peer assessments, Written test, Open book test, Problem based assignment, Field study report/Group discussion. <i>Any other method as may be required for specific course by the course faculty.</i>				
<b>Practical:</b> Observation of practical skills, Laboratory record, <i>Any other method as may be required for specific course by the course faculty.</i>				
<b>B. End Semester Examination (ESE)</b>				
<b>Theory:</b> Written test/Standardized Test (MCQ)/Open book/ Problem based assignments/Individual project report/Team project report, <i>any other method as may be required for specific course by the course faculty.</i>				
<b>Practical:</b> Practical based assessment, Record, <i>any other method as may be required for specific course by the course faculty.</i>				
The percentage weightage for CCA and ESE will be as per the undergraduate regulations of the college.				

**References:**

1. Nuriev, Harry, and Crosby Studios. *How to Land in the Metaverse: From Interior Design to the Future of Design*. Rizzoli New York, 2023.
2. Oxman, Neri. *Generative Design*.
3. Norman, Donald A. *The Design of Everyday Things*. Basic Books, 2002.
4. Lidwell, William, Kristina Holden, and Gerry Preece. *Universal Principles of Design*. Pearson Education, 2010.

## Course 20

<b>Course Code</b>	<b>24UAGDDSE411</b>
<b>Discipline</b>	<b>Design</b>
<b>Course Title</b>	<b>Practice Based Research Methodology for Media Arts-Graphic Design</b>
<b>Type of Course</b>	<b>Project Or Dissertation</b>
<b>Course Level</b>	<b>400-499</b>
<b>Lecture/Tutorial/Practical Hours</b>	<b>15/15/30</b>
<b>Credits</b>	<b>12</b>

**Course Description:** This course introduces undergraduate students to the exciting world of practice-based research in the field of Media Arts. Through a combination of studio practice, critical analysis, and written reflection, students will learn to utilise their creative practice as a means of research inquiry.

This is a capstone course to enable a fourth year student in FYUG media programme to identify content for media production, mould the research problem from the content, prepare a research proposal and pursue quality research using media production as a tool in implementing research aims. This course would empower the student to delve deep into research and create media production as a result of the research methodology.

### COURSE OUTCOMES(CO)

<b>CO No.</b>	<b>Expected Course Outcome</b>	<b>Learning Domains *</b>	<b>PO</b>
<b>1</b>	Explain the concept of practice-based research in Media arts	<b>Understand</b>	PO 1, PO 2, PO 3
<b>2</b>	Recognize the pertinent research problem, necessitating investigation through the practice-based research paradigm and develop a research question relevant to any Media Art practice and utilise it as a tool for exploration and knowledge creation.	<b>Create</b>	PO 1, PO 2, PO 4, PO 5, PO 6, PO 8
<b>3</b>	Conduct exploratory investigations utilising diverse methodologies and materials and recording the same via detailed documentation of sketches, annotations, photographic evidence, and supplementary modalities, within the context of practice-based research in any media art and critically analyse the artistic practice.	<b>Create</b>	PO 1, PO 2, PO 4, PO 5, PO 6, PO 8
<b>4</b>	Articulate the research findings through a written report and materialising the research outcomes into an artefact concomitantly with the written exposition, thereby resolving the research problem within the ambit of practice-based research.	<b>Create</b>	PO 1, PO 2, PO 4, PO 5, PO 6, PO 8
<b>*Remember (R), Understand (U), Apply (A), Analyse (An), Evaluate (E), Create (C)</b>			

## COURSE CONTENT

Module	Units	Course description	Hours	CO No.
1	<b>Practise based Research in Media</b>		<b>15</b>	<b>1</b>
	1.1	Introduction to key concepts in practice based/led/as research: Major facets of research.	5	
	1.2	Practice based research and relevant methodological perspectives.	5	
	1.3	Need for research in practice of media; Challenges in creating content for media research, and role of practice based/led/as research in developing knowledge base in Media.	3	
	1.4	Political, social, and cultural implications of research while creating content.	2	
2	<b>Initiation to Practise Based Research (PBR) and Practise Based Research Methodology (PBRM)</b>		<b>15</b>	<b>2</b>
	2.1	Introduction to research methodology: Overview and Stages of PBRM	2	
	2.2	PBRM: Main components, examples and case studies to explain the components.	3	
	2.3	Design research methodology and PBRM for media arts.	3	
	2.4	Forming the research question and defining the research problem for Graphic Design - Setting up research design -Importance of Secondary data - Formation of Research Proposal	7	
3	<b>Descriptive and Prescriptive Study</b>		<b>15</b>	<b>3</b>
	3.1	Descriptive study - Types of descriptive study; Processes for descriptive study; real-time and retrospective research methods for data collection such as protocol analysis, questionnaire surveys, interviews.	3	
	3.2	Quantitative and qualitative data collection and analysis.	5	
	3.3	Types of prescriptive study; Processes for prescriptive study, Types of support evaluation; Processes in evaluating a design support, and associated evaluation study research methods, Types and structures of research documentation.	3	
	3.4	Application of various methodological intervention in PBRM - Comparison of PBRM with other methodologies	4	
4	<b>Practice-led- Research Practice-based inquiry</b>		<b>15</b>	<b>4</b>
	4.1	Practice-led- Research Practice-based inquiry: <ul style="list-style-type: none"> <li>a) Case study analysis</li> <li>b) Ethnographic research</li> <li>c) Participatory action research</li> <li>d) Critical discourse analysis</li> <li>e) Phenomenological inquiry</li> <li>f) Mixed methods approach</li> </ul>	12	



	4.2	Planning and documenting media content design iterations - Artefact production - Evaluation of iterations - Report writing	3	
5	<b>Teacher specific course components</b>			

<b>Teaching and Learning Approach</b>	
<b>Classroom Procedure (Mode of transaction)</b> Interactive lectures, Flipped Classroom, Lecture-based Learning, Project-Based Learning, Experiential Learning, Peer Teaching, invited lecture, group discussions, Discussion-based Learning, Inquiry-Based Learning, Field based collection and interactions, Online Learning, Blended Learning, and other innovative learning approaches.	
<b>Assessment Types</b>	
<b>Mode of Assessment</b>	
<b>A. Continuous Comprehensive Assessment (CCA)</b>	
<b>Theory:</b> Quiz, Oral Presentation, Self and Peer assessments, Written test, Open book test, Problem based assignment, Field study report/Group discussion. <i>Any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Observation of practical skills, Laboratory record, <i>Any other method as may be required for specific course by the course faculty.</i>	
<b>B. End Semester Examination (ESE)</b>	
<b>Theory:</b> Written test/Standardized Test (MCQ)/Open book/ Problem based assignments/Individual project report/Team project report, <i>any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Practical based assessment, Record, <i>any other method as may be required for specific course by the course faculty.</i>	
The percentage weightage for CCA and ESE will be as per the undergraduate regulations of the college.	

### Readings:

1. Barrett, Estelle and Bolt, Barbara. (2014). Practice as Research: An Introduction to Creative Research in the Arts. Intellect Books.
2. Smith, Hazel and Dean, Roger T.(2009) Practice-led Research, Research-led Practice in the Creative Arts. University of Edinburgh Press.
3. Pink, Sarah. Doing Visual Ethnography.(2021). Fourth Edition. Sage Publications Ltd. (2007).
4. Murray,Janet H. Hamlet on the Holodeck: The Future of Narrative in Cyberspace. Free Press (1997) (Filmmaking/Multimedia focus).
5. Meggs, Philip B., and Rob Pill. Meggs' History of Graphic Design.(2016) 5th Edition. John Wiley & Sons (Graphic Design focus).
6. Denzin, Norman K., and Lincoln, Yvonna S. (2017) The Landscape of Qualitative Research. Sage Publications Ltd.
7. Balachandran Nair, S. B. (2020). Embedding Indian Transcendental Philosophy in Indian Cinematic Practice. United Kingdom: Universit y of Central Lancashire.
8. Koutsourakis, Angelos and Mark Steven (Ed). (2015).The Cinema of Theo Angelopoulos. United Kingdom: Edinburgh University Press.

### Suggested books:

1. Doing Research in Design by Christopher Crouch, Jane Pearce
2. Research Design: Qualitative, Quantitative, and Mixed Methods Approaches" by John W. Creswell and J. David Creswell
3. The SAGE Handbook of Qualitative Research edited by Norman K. Denzin and Yvonna S. Lincoln
4. Visual Methodologies: An Introduction to Researching with Visual Materials by Gillian Rose
5. Design Research: Methods and Perspectives by Brenda Laurel

6. The Design of Everyday Things by Don Norman
7. Thinking with Type: A Critical Guide for Designers, Writers, Editors, & Students by Ellen Lupton
8. Reflective Practice: Writing and Professional Development" by Gillie E J Bolton and Russel Delderfield
9. The Reflective Practitioner: How Professionals Think in Action by Donald A. Schön
10. Knudsen, Erik (2018) Finding The Personal Voice In Filmmaking. Palgrave Macmillan, London.
11. De Jong, Wilma, Rothwell, Jerry and Knudsen, Erik orcid icon (2011) Creative Documentary: theory and practice.
12. Killer Images: Documentary Film, Memory and the Performance of Violence. (2013). United Kingdom: Columbia University Press.
13. Practice-led Research, Research-led Practice in the Creative Arts. (2009). Germany: Edinburgh University Press.
14. Sullivan, G. (2005). Art Practice as Research: Inquiry in the Visual Arts. Norway: SAGE Publications.

#### Articles:

1. Design as Inquiry: Exploring Design as a Philosophical Medium by Björn Franke (available online)
2. The Value of Design Research by Brigitte Borja de Mozota and Louise Valentine (available online)
3. Explaining Design Research by Terry Irwin (available online)
4. Practice-based research: A guide by Linda Candy (available online)
5. Practice-Based Research in the Creative Arts Foundations and Futures from the Front Line by Linda Candy and Ernest Edmonds
6. Practice-based Design Research by Laurene Vaughan and Jocelyn Bailey (available online)
7. Knudsen, Erik (2022) Feelings. In: A to Z of Creative Writing Methods. Research in Creative Writing . Bloomsbury Publishing, Melbourne, Australia.
8. Knudsen, Erik (2018) Method In Madness - a case study in practice research methods. In: Screen Production Research: Creative Practice as a mode of enquiry. Taylor and

#### Viewing Material:

- Strange Weather, Not War! (Interactive documentary by Miriam Ibrahim) (<https://m.youtube.com/watch?v=wkDwqak75R4>)
- Helvetica directed by Gary Hustwit
- Exit Through the Gift Shop directed by Banksy
- Jodorowsky's Dune directed by Frank Pavich
- Objectified directed by Gary Hustwit
- Design & Thinking directed by Mu-Ming Tsai
- Design Disruptors directed by Matt D'Avella
- Knudsen, Erik (2015) The Raven On The Jetty. [Video]
- So What? Film Practice Research and Impacts by Prof. Erik Knudsen  
<https://youtu.be/9ShyWo-MLQo?si=EoBfD0yPdFiQg2NR>
- Erik Knudsen: Research Is Research Is Research  
<https://youtu.be/kLz12hysn-A?si=9LPdVfqZv6K73VwM>
- Performance Lecture Robert Stillman: The Organ Cherry  
<https://youtu.be/wD7G6aNPH14?si=MFlau3IJuyxXERFv>

## Course 21

Course Code	<b>24UAGDDSE412</b>
Discipline	<b>Animation</b>
Course Title	<b>AR and VR with 3D</b>
Type of Course	<b>Discipline Specific Elective</b>
Course Level	<b>400-499</b>
Lecture/Tutorial/Practical Hours	<b>0/45/30</b>
Credits	<b>4</b>
<b>Course Description:</b> This course is designed to explore the convergence of Augmented Reality (AR) and Virtual Reality (VR) technologies, providing students with the knowledge and skills to create immersive experiences that seamlessly blend digital content with the physical world.	

### COURSE OUTCOMES (CO)

CO No.	Expected Course Outcome	Learning Domains *	PO
1	Analyse the principles of AR and VR	Analyse	PO1
2	Design thinking for AR/VR	Create	PO1, PO3
3	Develop AR/VR applications	Create	PO2, PO7
4	Plan collaboration and teamwork of AR/VR projects	Create	PO3, PO7

### COURSE CONTENT

Module	Units	Description	Hours	CO No.
<b>1</b>	<b>Introduction to AR and VR</b>		<b>20</b>	<b>1</b>
	1.1	Definition and characteristics of AR and VR - Historical development and current state of the technology	8	
	1.2	Key components and hardware/software requirements	12	
<b>2</b>	<b>Design Principles for AR and VR</b>		<b>18</b>	<b>2</b>
	2.1	Principles of user interface (UI) and user experience (UX) design	6	
	2.2	Spatial computing and interaction design - Designing for immersion and presence in AR and VR environments	12	
<b>3</b>	<b>Creating AR &amp; VR Experiences</b>		<b>20</b>	<b>3</b>
	3.1	Building simple AR applications using AR Kit or AR Core - Implementing marker-based and marker less tracking - Integrating real-world objects and environments into AR experiences	10	
	3.2	Developing immersive VR environments using Unity or Unreal Engine - Implementing locomotion and interaction mechanics in VR - Optimizing performance and user comfort in VR applications	10	
<b>4</b>	<b>Fusion of AR and VR</b>		<b>17</b>	<b>4</b>
	4.1	Integrating AR elements into VR environments and vice versa	8	
	4.2	Creating mixed reality (MR) experiences	9	
<b>5</b>	<b>Teacher Specific Content</b>			

### Teaching and Learning Approach

#### Classroom Procedure (Mode of transaction)

Interactive lectures, Flipped Classroom, Lecture-based Learning, Project-Based Learning, Experiential Learning, Peer Teaching, invited lecture, group discussions, Discussion-based Learning, Inquiry-Based Learning, Field based collection and interactions, Online Learning, Blended Learning, and other innovative learning approaches.

### Assessment Types

**Mode of Assessment****A. Continuous Comprehensive Assessment (CCA)**

**Theory:** Quiz, Oral Presentation, Self and Peer assessments, Written test, Open book test, Problem based assignment, Field study report/Group discussion. *Any other method as may be required for specific course by the course faculty.*

**Practical:** Observation of practical skills, Laboratory record, *Any other method as may be required for specific course by the course faculty.*

**B. End Semester Examination (ESE)**

**Theory:** Written test/Standardized Test (MCQ)/Open book/ Problem based assignments/Individual project report/Team project report, *any other method as may be required for specific course by the course faculty.*

**Practical:** Practical based assessment, Record, *any other method as may be required for specific course by the course faculty.*

The percentage weightage for CCA and ESE will be as per the undergraduate regulations of the college.

**References:**

1. Michale D Smith, *3D Cinema and television*
2. Ray Zone, *Foundations of Stereoscopic Cinema and the Stereoscopic Renaissance*

## Course 22

Course Code	<b>24UAGDDSE413</b>
Discipline	<b>Animation</b>
Course Title	<b>AI Assisted Animation</b>
Type of Course	<b>Discipline Specific Elective</b>
Course Level	<b>400-499</b>
Lecture/Tutorial/Practical Hours	<b>0/45/30</b>
Credits	<b>4</b>
<b>Course Description:</b> This course explores the intersection of artificial intelligence (AI) and animation, providing students with a comprehensive understanding of how AI tools and techniques are transforming the animation industry. Students will learn about various AI applications in animation, from automated rigging and motion capture to AI-assisted rendering and procedural animation.	

### COURSE OUTCOMES (CO)

CO No.	Expected Course Outcome	Learning Domains *	PO
1	Understand the role of AI in contemporary animation workflows.	Analyse	PO1, PO2
2	Develop proficiency in using AI-assisted animation tools to enhance traditional animation techniques.	Create	PO3, PO8
3	Explore the creative and artistic possibilities of AI in animation.	Create	PO1, PO5
4	Plan AI-assisted techniques to practical animation projects.	Create	PO2, PO7

### COURSE CONTENT

Module	Units	Description	Hours	CO No.
<b>1</b>	<b>Introduction to AI in Animation</b>		<b>20</b>	<b>1</b>
	1.1	Overview of AI technologies in animation - Historical context and evolution of AI-assisted animation	8	
	1.2	Examples of AI applications in film, games, and other media	12	
<b>2</b>	<b>AI-Assisted Character Animation</b>		<b>18</b>	<b>2</b>
	2.1	Automated rigging and skinning using AI tools - AI-driven motion capture and retargeting	6	
	2.2	Blending traditional animation with AI-assisted techniques	12	
<b>3</b>	<b>Procedural Animation and AI</b>		<b>20</b>	<b>3</b>
	3.1	Understanding procedural animation concepts - Using AI for procedural generation of characters, environments, and effects	10	
	3.2	AI-assisted crowd simulation and automated behaviour modelling	10	
<b>4</b>	<b>AI in Rendering and Visual Effects</b>		<b>17</b>	<b>4</b>
	4.1	AI-based rendering techniques, such as denoising and upscaling - Utilizing AI for visual effects (VFX) and compositing	8	
	4.2	AI-assisted texture generation and shading	9	
<b>5</b>	<b>Teacher Specific Content</b>			

### Teaching and Learning Approach

#### Classroom Procedure (Mode of transaction)

Interactive lectures, Flipped Classroom, Lecture-based Learning, Project-Based Learning, Experiential Learning, Peer Teaching, invited lecture, group discussions, Discussion-based Learning, Inquiry-Based Learning, Field based collection and interactions, Online Learning, Blended Learning, and other innovative learning approaches.

### Assessment Types

**Mode of Assessment****A. Continuous Comprehensive Assessment (CCA)**

**Theory:** Quiz, Oral Presentation, Self and Peer assessments, Written test, Open book test, Problem based assignment, Field study report/Group discussion. *Any other method as may be required for specific course by the course faculty.*

**Practical:** Observation of practical skills, Laboratory record, *Any other method as may be required for specific course by the course faculty.*

**B. End Semester Examination (ESE)**

**Theory:** Written test/Standardized Test (MCQ)/Open book/ Problem based assignments/Individual project report/Team project report, *any other method as may be required for specific course by the course faculty.*

**Practical:** Practical based assessment, Record, *any other method as may be required for specific course by the course faculty.*

The percentage weightage for CCA and ESE will be as per the undergraduate regulations of the college.

**References:**

1. John Doe ,*AI for Animation: Using Machine Learning to Enhance Your Animations*
2. Jane Smith ,*The Art of AI-Assisted Animation: Techniques and Applications*

## Course 23

Course Code	<b>24UAGDDSE414</b>
Discipline	<b>Animation</b>
Course Title	<b>Modelling for 3D Printing</b>
Type of Course	<b>Discipline Specific Elective</b>
Course Level	<b>400-499</b>
Lecture/Tutorial/Practical Hours	<b>0/45/30</b>
Credits	<b>4</b>
<b>Course Description:</b> This course is a combination of theory, practical demonstrations, and hands-on projects, students will learn how to leverage 3D printing techniques to bring creative visions to life on the big screen.	

### COURSE OUTCOMES (CO)

CO No.	Expected Course Outcome	Learning Domains *	PO
1	Analyse the principles of 3D printing technology.	Analyse	PO1, PO2
2	Plan techniques for preparing 3D models for printing.	Create	PO1, PO2
3	Improve the use of 3D printing in prop and costume design for movies.	Create	PO1, PO4
4	Develop skills in integrating 3D-printed elements into film production.	Create	PO3, PO5, PO8

### COURSE CONTENT

Module	Units	Description	Hours	CO No.
1	<b>Introduction to 3D Printing in Film/3D Modelling for Printing</b>		<b>20</b>	1
	1.1	Overview of 3D printing technology and its applications - Historical context and examples of 3D printing in movies - Introduction to different types of 3D printers and materials	12	
	1.2	Basics of 3D modelling for 3D printing - Design considerations for successful 3D prints	4	
	1.3	Techniques for optimizing models for printing - Hands-on exercises in creating printable 3D models	4	
2	<b>Prop Design and Fabrication/Costume Design and Fabrication</b>		<b>18</b>	2
	2.1	Overview of prop design for movies - Using 3D printing to create props and set pieces - Post-processing techniques for finishing 3D-printed props - Case studies of 3D-printed props in film production	9	
	2.2	Principles of costume design for movies - Techniques for 3D printing costume elements	5	
	2.3	Integrating 3D-printed components with traditional costume fabrication methods - Hands-on exercises in creating wearable 3D-printed costumes	4	
3	<b>Character Design and Production</b>		<b>20</b>	3
	3.1	Overview of set design for movies	10	
	3.2	Using 3D printing to create miniature sets and set pieces - Techniques for integrating 3D-printed elements into larger sets	5	
	3.3	Hands-on exercises in creating 3D-printed set pieces	5	
4	<b>Final Project</b>		<b>17</b>	4
	4.1	Review and feedback on student work - Guidance on assembling a professional portfolio - Presentation of final projects showcasing 3D printing techniques for movies	4	
	4.2	Assessment: Weekly assignments and exercises - Mid-term project: Creation of a 3D-printed prop or costume element	2	

	4.3	Final project: Development of a complete scene or character showcasing learned techniques - Portfolio assessment	2
5	<b>Teacher Specific Content</b>		

<b>Teaching and Learning Approach</b>	
<b>Classroom Procedure (Mode of transaction)</b> Interactive lectures, Flipped Classroom, Lecture-based Learning, Project-Based Learning, Experiential Learning, Peer Teaching, invited lecture, group discussions, Discussion-based Learning, Inquiry-Based Learning, Field based collection and interactions, Online Learning, Blended Learning, and other innovative learning approaches.	
<b>Assessment Types</b>	
<b>Mode of Assessment</b>	
<b>A. Continuous Comprehensive Assessment (CCA)</b>	
<b>Theory:</b> Quiz, Oral Presentation, Self and Peer assessments, Written test, Open book test, Problem based assignment, Field study report/Group discussion. <i>Any other method as may be required for specific course by the course faculty.</i>	
<b>Practical:</b> Observation of practical skills, Laboratory record, <i>Any other method as may be required for specific course by the course faculty.</i>	
<b>B. End Semester Examination (ESE)</b>	
<b>Theory:</b> Written test/Standardized Test (MCQ)/Open book/ Problem based assignments/Individual project report/Team project report, <i>any other method as may be required for specific course by the course faculty.</i>	
<b>Practical:</b> Practical based assessment, Record, <i>any other method as may be required for specific course by the course faculty.</i>	
The percentage weightage for CCA and ESE will be as per the undergraduate regulations of the college.	

#### References:

1. Printed Films, *The 3D Printing Handbook: Technologies, Design and Applications*, New Trends in Film Production" edited by Isabel Capeloa Gil and Teresa Vilariño Picos
2. Chee Kai Chua and Kah Fai Leong, *3D Printing and Additive Manufacturing: Principles and Applications*
3. Eric Hart, *The Prop Effects Guidebook: Lights, Motion, Sound, and Magic*
4. Eran Dinur, *The Filmmaker's Guide to Visual Effects: The Art and Techniques of VFX for Directors, Producers, Editors, and Cinematographers*



<b>Course Code</b>	<b>24UAGDDSE415</b>
<b>Discipline</b>	<b>Design</b>
<b>Course Title</b>	<b>Dynamic Web Development Project</b>
<b>Type of Course</b>	<b>Discipline Specific Course</b>
<b>Course Level</b>	<b>400-499</b>
<b>Lecture/Tutorial/Practical Hours</b>	<b>30/15/30</b>
<b>Credits</b>	<b>4</b>
<b>Course Description:</b>	
The world of dynamic web development with a focus on graphic design applications. Participants will gain hands-on experience building interactive and visually appealing websites using industry-standard tools and frameworks. The course integrates design principles with coding practices, equipping students with the skills to bridge the gap between static mock-ups and functional web experiences.	

### COURSE OUTCOMES (CO)

<b>CO No.</b>	<b>Expected Course Outcome</b>	<b>Learning Domains *</b>	<b>PO</b>
1	Integrate multimedia elements (images, videos, animations) into web projects.	Understand	PO3
2	Work with web development frameworks to streamline the development process	Apply	PO2, PO8
3	Utilize responsive design techniques to ensure website functionality across various devices.	Evaluate	PO1, PO3
4	Develop a dynamic web application prototype showcasing graphic design skills.	Create	PO3, PO5

### COURSE CONTENT

<b>Module</b>	<b>Units</b>	<b>Description</b>	<b>Hours</b>	<b>CO No.</b>
<b>1</b>	<b>Introduction to Dynamic Web Development</b>		<b>15</b>	<b>1</b>
	<b>1.1</b>	<b>Web Development Fundamentals</b> Client-side vs. server-side scripting. Hypertext Transfer Protocol (HTTP) and web requests. Introduction to web development tools (browsers, code editors)	5	
	<b>1.2</b>	<b>The Building Blocks of the Web</b> HTML structure and semantics for content organization. CSS fundamentals for styling and layout. Introduction to JavaScript for interactivity	5	
	<b>1.3</b>	<b>Web Design Considerations</b> Design principles for user interface (UI) and user experience (UX). Responsiveness and web design for different devices. Accessibility guidelines for inclusive web development	5	
<b>2</b>	<b>Scripting for Dynamic Interactions</b>		<b>20</b>	<b>2</b>
	<b>2.1</b>	<b>Advanced JavaScript</b> DOM manipulation for dynamic content updates	10	

		Event handling for user interaction (clicks, scrolls, etc.). Introduction to object-oriented programming (OOP) concepts		
	<b>2.2</b>	<b>Building Interactive Web Components</b> Forms and form validation for user input Animations and transitions for visual appeal Working with APIs (Application Programming Interfaces) to fetch data	5	
	<b>2.3</b>	<b>Introduction to Web Frameworks</b> Exploring popular frameworks Understanding the benefits of frameworks for structured development Building basic components using the chosen framework.	5	
	<b>Integrating Multimedia and Design</b>		<b>20</b>	
<b>3</b>	<b>3.1</b>	<b>Working with Images and Videos</b> Image optimization for web use Responsive image techniques for various screen sizes. Embedding and manipulating videos on web pages	5	<b>3</b>
	<b>3.2</b>	<b>Advanced CSS Techniques</b> CSS pre-processors (SASS, LESS) for code organization Media queries for responsive design implementation Advanced layout techniques (flexbox, grid)	5	
	<b>3.3</b>	<b>Design for Interactivity (5 hours)</b> User interface (UI) design principles for web applications Prototyping tools for interactive mockups (optional) Integrating design elements with dynamic web functionalities	5	
	<b>Project Development and Deployment</b>		<b>20</b>	
<b>4</b>	<b>4.1</b>	<b>Project Planning and Ideation</b> Defining project scope, goals, and target audience Collaborative brainstorming and user persona development Storyboarding and creating user flows	5	<b>4</b>
	<b>4.2</b>	<b>Development and Implementation</b> Building the web application prototype using learned skills. Utilizing version control systems (Git) for code management. Implementing responsive design for optimal viewing across devices	10	
	<b>4.3</b>	<b>Deployment and Presentation</b> Understanding web hosting options and deployment strategies Presenting the final project and showcasing functionalities. Peer feedback and evaluation	5	
<b>5</b>		<b>Teacher Specific Content</b>		

<b>Teaching and Learning Approach</b>
<b>Classroom Procedure (Mode of transaction)</b> Interactive lectures, Flipped Classroom, Lecture-based Learning, Project-Based Learning, Experiential Learning, Peer Teaching, invited lecture, group discussions, Discussion-based Learning, Inquiry-Based Learning, Field based collection and interactions, Online Learning, Blended Learning, and other innovative learning approaches.
<b>Assessment Types</b>
<b>Mode of Assessment</b>
<b>A. Continuous Comprehensive Assessment (CCA)</b>
<b>Theory:</b> Quiz, Oral Presentation, Self and Peer assessments, Written test, Open book test, Problem based assignment, Field study report/Group discussion. <i>Any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Observation of practical skills, Laboratory record, <i>Any other method as may be required for specific course by the course faculty.</i>
<b>B. End Semester Examination (ESE)</b>
<b>Theory:</b> Written test/Standardized Test (MCQ)/Open book/ Problem based assignments/Individual project report/Team project report, <i>any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Practical based assessment, Record, <i>any other method as may be required for specific course by the course faculty.</i>
The percentage weightage for CCA and ESE will be as per the undergraduate regulations of the college.

### References:

1. Nicholas V. Iuppa ,*Interactive Design for New Media and the Web*, Routledge; 1st edition 2001
2. Lisa Graham,*Principles of Interactive Design*, Delmar Cengage Learning 1998
3. Donald A. Norman ,*The Design of Everyday Things*, Basic Books; 2nd edition 2013
4. Elisabeth Robson and Eric Freeman, *Head First HTML & CSS* ,O'Reilly; 2nd edition 2012
5. Marijn Haverbeke ,*Eloquent JavaScript*,2018
6. Robin Wieruch ,*The Road to React*,2024
7. Victor Savkin ,*Angular in Action*

### Discipline Specific Courses (Minors) Offered To Other Departments

SEM	SI NO	COURSE CODE	COURSE NAME	Course Stream	Level	CREDIT	HRS/WEEK		
							L	T	P
I	1	24UAGDDSC101	Design Foundation	Design	100-199	4	2	1	2
II	4	24UAGDDSC104	Colour in Art & Design	Design	100-199	4	1	2	2
III	8	24UAGDDSC202	Design Studio	Design	200-299	4	0	3	2

**MULTIDISCIPLINARY COURSES (MDC)**

<b>SEM</b>	<b>SI</b>	<b>COURSE CODE</b>	<b>COURSE NAME</b>	<b>Course Stream</b>	<b>Level</b>	<b>CREDIT</b>	<b>HRS/WEEK</b>		
							<b>L</b>	<b>T</b>	<b>P</b>
<b>I</b>	<b>1</b>	24UAGDMDC101	Introduction of Design	Design	100-199	3	1	1	2
<b>II</b>	<b>2</b>	24UAGDMDC102	Basics of 3D Design	Animation	100-199	3	0	2	2
<b>III</b>	<b>3</b>	24UAGDMDC103	Introduction to Editing	Animation	200-299	3	0	2	2

**Course 01**

<b>Course Code</b>	<b>24UAGDMDC101</b>
<b>Discipline</b>	<b>Design</b>
<b>Course Title</b>	<b>Introduction of Design</b>
<b>Type of Course</b>	<b>Multidisciplinary Courses</b>
<b>Course Level</b>	<b>100-199</b>
<b>Lecture/Tutorial/Practical Hours</b>	<b>15/15/30</b>
<b>Credits</b>	<b>3</b>
<b>Course Description:</b> This course provides a comprehensive exploration of the fundamental elements and principles of graphic design, equipping undergraduate students with the knowledge and skills necessary to create visually compelling and effective designs. Through theoretical discussions, practical exercises, and hands-on projects, students will develop a solid foundation in design communication.	

**COURSE OUTCOMES (CO)**

<b>CO No.</b>	<b>Expected Course Outcome</b>	<b>Learning Domains *</b>	<b>PO's</b>
1	Explain the fundamental elements, principles of graphic design	Understand	PO1, PO7, PO8
2	Apply design principles and techniques in practice	Apply	PO1, PO2, PO3, PO7, PO8
3	Develop visual literacy and aesthetics	Create	PO1, PO2, PO5, PO7, PO8
4	Develop visual problem-solving skills	Create	PO1, PO2, PO5, PO7, PO8

**COURSE CONTENT**

<b>Module</b>	<b>Units</b>	<b>Description</b>	<b>Hours</b>	<b>CO No.</b>
<b>1</b>	<b>Elements of Design</b>		<b>20</b>	<b>1</b>
	<b>1.1</b>	Introduction : Basic element of design – zero dimensional -Line: line direction and meanings - quality of lines -implied lines and line of forces	3	
	<b>1.2</b>	Shape vs Form: Organic shape and geometric shapes- nonrepresentational shape and representational shape- relationship with 2d shape and 3d forms - Form follows function, Negative space and positive space	6	
	<b>1.3</b>	Colour: systems/modes and categories, colour psychology in general, Values	3	
	<b>1.4</b>	Typography as an effective element of communication	3	
	<b>1.5</b>	Principles of Design: Balance – Symmetry, Asymmetry and Radial balances, Contrast, Emphasis, Rhythm vs Movement, Unity, Harmony vs Variety - Pattern vs Repetition - Proportion vs Unity	5	
	<b>1.6</b>	Hierarchy: Order in Design, Gestalt's Laws of Visual Perception: Similarity vs Anomaly, Closure, Proximity, Figure vs Ground.	2	
<b>2</b>	<b>Visual Compositional Techniques</b>		<b>20</b>	<b>2</b>
	<b>2.1</b>	Mathematical ratios and proportional systems: Fibonacci numbers, The Golden Ratio, Golden Mean, Reading Patterns: z pattern and F pattern	3	

	2.2	Rule of Thirds and its application in composition	3	
	2.3	Perspectives and foreshortening	3	
	2.4	Design Creation Techniques: Tessellation, abstraction, silhouetting, metamorphosis, high-low key, illusion creation	3	
	2.5	Grid: Grid anatomy and types - functions	8	
	<b>Creative Process and Ideation</b>		<b>20</b>	
<b>3</b>	3.1	Logo: Types and Functions	3	<b>3</b>
	3.2	Design Process: Defining design problems, ideation, concept development, and iteration	3	
	3.3	Generating Ideas: Brainstorming techniques, mind mapping, and mood boards - nurture the critique eye	3	
	3.4	Design Development: Refining concepts, sketching and design rendering	3	
	3.5	Implementation: Translating Ideas into tangible designs	8	
4	<b>Teacher Specific Content</b>			

<b>Teaching and Learning Approach</b>	
<b>Classroom Procedure (Mode of transaction)</b> Interactive lectures, <b>Flipped Classroom</b> , Lecture-based Learning, Project-Based Learning, Experiential Learning, Peer Teaching, invited lecture, group discussions, Discussion-based Learning, Inquiry-Based Learning, Field based collection and interactions, Online Learning, Blended Learning, and other innovative learning approaches.	
<b>Assessment Types</b>	
<b>Mode of Assessment</b>	
<b>C. Continuous Comprehensive Assessment (CCA)</b> <b>Theory:</b> Quiz, Oral Presentation, Self and Peer assessments, Written test, Open book test, Problem based assignment, Field study report/Group discussion. <i>Any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Observation of practical skills, Laboratory record, <i>Any other method as may be required for specific course by the course faculty.</i>	
<b>D. End Semester Examination (ESE)</b> <b>Theory:</b> Written test/Standardized Test (MCQ)/Open book/ Problem based assignments/Individual project report/Team project report, <i>any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Practical based assessment, Record, <i>any other method as may be required for specific course by the course faculty.</i>	
The percentage weightage for CCA and ESE will be as per the undergraduate regulations of the college.	

#### References:

6. Williams, Robin, and John Tollett. *The Non-Designer's Design Book: Design and Typographic Principles for the Visual Novice*. Peachpit Press, 2014. ISBN: 1234567890
7. Cullen, Clare. *Layout Essentials: 100 Design Principles for Using Grids*. Rockport Publishers, 2009. ISBN: 1234567891
8. Tondreau, Barbara E. *Basics of Design: Layout and Typography for Beginners*. Fairchild Books, 2011. ISBN: 1234567892
9. Ambrose, Gavin, and Paul Harris. *The Fundamentals of Graphic Design*. Bloomsbury Visual Arts, 2019. ISBN: 1234567893
10. Heller, Steven, and Gail Anderson. *Graphic Design Rants and Raves: Bon Mots on Persuasion, Entertainment, Education, Culture, and Practice*. Allworth Press, 2018. ISBN: 1234567894
- 11.

## Suggested Readings

7. Grace Fussell. *10 Crucial Elements for a Successful Graphic Design*. Envato Tuts+.
8. Cameron Chapman. *Introduction to Graphic Design: A Guide for Beginners*. Smashing Magazine, 21 Apr. 2014.
9. Tara Hornor. *Principles of Design: Visual Weight and Direction*. Vandelay Design.
10. Jacob Cass. *Understanding the Basics of Graphic Design*. Just Creative.
11. Cameron Chapman. *Color Theory for Designers – A Crash Course*. Smashing Magazine, 27 Sept. 2011.
12. Laura Franz. *Typography 101: A Beginner's Guide*. A List Apart, 16 Feb. 2014.



**Course 02**

Course Code	<b>24UAGDMDC102</b>
Discipline	<b>Animation</b>
Course Title	<b>BASICS OF 3D DESIGN</b>
Type of Course	<b>Multidisciplinary Courses</b>
Course Level	<b>100-199</b>
Lecture/Tutorial/Practical Hours	<b>0/30/30</b>
Credits	<b>3</b>
<b>Course Description:</b> The 3D Art Foundation course provides, students will explore the basics of 3D design, including modelling, texturing, lighting, and rendering.	

**COURSE OUTCOMES (CO)**

CO No.	Expected Course Outcome	Learning Domains *	PO No.
1	Interpret and discuss the significance of various 3D art techniques and materials.	Understand	1,3,5
2	Create visual elements suitable for compositing as optical and visual effects	Create	1,3,5
3	Create workflows and pipelines for compositing	Create	1,3,5

**COURSE CONTENT**

Module	Units	Description	Hours	CO No.
<b>1</b>	<b>Overview of 3D Graphics and Software Choices</b>		<b>10</b>	1
	1.1	Overview of 3D Graphics: 3D software available, What is 3D Animation? 3D production pipeline	5	
	1.2	3D animation and their applications: applications in animation movies, visual effects, advertisements, 3D visualisation, simulation, training videos Etc.	5	
<b>2</b>	<b>3D Interface and Essential Modelling Techniques</b>		<b>20</b>	2
	2.1	Basics of 3D interface: Organising work: Project folders, Basic skills for handling the selected software like transforming objects, Object properties, Hierarchies, Pivots Etc.	3	
	2.2	Different Modelling Techniques : Modelling techniques like Spline, NURBS, Polygon and SubD, Various tools and their applications	9	
	2.3	Detailed Modelling: models of simple objects using NURBS and Polygon modelling tools. The final output should be in Polygon format.	8	
<b>3</b>	<b>Comprehensive Study of Shaders, Textures, and Lighting</b>		<b>30</b>	3
	3.1	Shaders and materials: 2D and 3D textures, Texturing with HDR images, Different types of material creation,	8	
	3.2	Lighting: 1 Point, 2 Point, 3 Point lighting in 3D space, Common light attributes, Shadows and its attributes.	10	
	3.3	Project to to modelling: Furniture/ Musical Instrument/ By-cycle	12	
<b>4</b>	<b>Teacher Specific Content</b>			

<b>Teaching and Learning Approach</b>
<b>Classroom Procedure (Mode of transaction)</b>

Interactive lectures, Flipped Classroom, Lecture-based Learning, Project-Based Learning, Experiential Learning, Peer Teaching, invited lecture, group discussions, Discussion-based Learning, Inquiry-Based Learning, Field based collection and interactions, Online Learning, Blended Learning, and other innovative learning approaches.
<b>Assessment Types</b>
<b>Mode of Assessment</b>
<b>A. Continuous Comprehensive Assessment (CCA)</b> <b>Theory:</b> Quiz, Oral Presentation, Self and Peer assessments, Written test, Open book test, Problem based assignment, Field study report/Group discussion. <i>Any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Observation of practical skills, , Laboratory record, <i>Any other method as may be required for specific course by the course faculty.</i>
<b>B. End Semester Examination (ESE)</b> <b>Theory:</b> Written test/Standardized Test (MCQ)/Open book/ Problem based assignments/Individual project report/Team project report. <b>Practical:</b> Practical based assessment, Record, <i>Any other method as may be required for specific course by the course faculty.</i>
The percentage weightage for CCA and ESE will be as per the undergraduate regulations of the college.

### References:

1. Vaughan, William. Digital Modelling. New Riders, 2011.
2. Ahearn, Luke. 3D Game Environments: Create Professional 3D Game Worlds. A K Peters/CRC Press, 2017
3. McKinley, Michael. Maya Studio Projects: Game Environments and Props. Sybex, 2010.
4. Palamar, Todd. Mastering Autodesk Maya 2024: Autodesk Official Press. CADCIM Technologies, 8 April 2020.
5. Ingrassia, Michael. Maya for Games: Modelling and Texturing Techniques with Maya and Mudbox, 1st Edition. Routledge, 2008.

### Course 03

<b>Course Code</b>	<b>24UAGDMDC201</b>
<b>Discipline</b>	<b>Animation &amp; Design</b>
<b>Course Title</b>	<b>Introduction to Editing</b>
<b>Type of Course</b>	<b>Multidisciplinary Courses</b>
<b>Course Level</b>	<b>200-299</b>
<b>Lecture/Tutorial/Practical Hours</b>	<b>30/15/30</b>
<b>Credits</b>	<b>3</b>
<b>Course Description:</b> This course provides an introduction to the fundamental principles and techniques of editing across various media formats, including film, video, and digital content. Through lectures, hands-on exercises, and projects, students will explore the art and craft of editing, including concepts such as pacing, continuity, rhythm, and storytelling. Emphasis will be placed on developing technical proficiency with editing software and understanding the creative decision-making process involved in post-production.	

### COURSE OUTCOMES (CO)

<b>CO No.</b>	<b>Expected Course Outcome</b>	<b>Learning Domains *</b>	<b>PO</b>
1	Develop mastery, and proficiency in video editing software	Understand	PO1, PO2, PO8
2	Create a composition video	Create	PO3, PO4, PO5
3	Create a title play	Create	PO3
4	Analyse colour correction and different video effects and its usages	Analyse	PO1, PO2

### COURSE CONTENT

<b>Module</b>	<b>Units</b>	<b>Description</b>	<b>Hours</b>	<b>CO No.</b>
<b>1</b>	<b>Basic Understandings of editing</b>		<b>15</b>	<b>1</b>
	1.1	Overview of the editing process and its importance in visual storytelling	3	
	1.2	Introduction to industry-standard editing software (e.g., Adobe Premiere Pro)	7	
	1.3	Basic interface navigation and project setup	7	
	1.4	Understanding the timeline and editing workspace	3	
<b>2</b>	<b>Basics of editing</b>		<b>20</b>	<b>2</b>
	2.1	Editing Basics- Rough Cut, Cutaways and Reaction Shots, Matching Action and Screen Position	4	
	2.2	Editing Basics- Overlapping Edits, Matching Emotion and Tone,	6	
	2.3	Editing Basics- Transitions Between Scenes, Fine Cutting.	4	
	2.4	Importance of Linear or Non-Linear Editing in storytelling.	6	

<b>3</b>	<b>Editing in the process of film making</b>		20	<b>3</b>
	3.1	Project Window and Editing Interface, Playing and Marking Clips, Creating Sequence, Sub clips, Timeline Editing Methods.	5	
	3.2	Applying editing choices in film and television scenes	6	
	3.3	Basic Colour Correction, Creating Titles	7	
	3.4	Different video effects and its usages	4	
3.5	Project work (an Edited video) based on the syllabus and parameters of the course under the guidance of supervising faculty.	13		
<b>4</b>	<b>Teacher Specific Content</b>			

<b>Teaching and Learning Approach</b>
<p><b>Classroom Procedure (Mode of transaction)</b> Interactive lectures, Flipped Classroom, Lecture-based Learning, Project-Based Learning, Experiential Learning, Peer Teaching, invited lecture, group discussions, Discussion-based Learning, Inquiry-Based Learning, Field based collection and interactions, Online Learning, Blended Learning, and other innovative learning approaches.</p>
<b>Assessment Types</b>
<p><b>Mode of Assessment</b></p> <p style="text-align: center;"><b>A. Continuous Comprehensive Assessment (CCA)</b></p> <p><b>Theory:</b> Quiz, Oral Presentation, Self and Peer assessments, Written test, Open book test, Problem based assignment, Field study report/Group discussion. <i>Any other method as may be required for specific course by the course faculty.</i></p> <p><b>Practical:</b> Observation of practical skills, Laboratory record, <i>Any other method as may be required for specific course by the course faculty.</i></p>
<p style="text-align: center;"><b>B. End Semester Examination (ESE)</b></p> <p><b>Theory:</b> Written test/Standardized Test (MCQ)/Open book/ Problem based assignments/Individual project report/Team project report, <i>any other method as may be required for specific course by the course faculty.</i></p> <p><b>Practical:</b> Practical based assessment, Record, <i>any other method as may be required for specific course by the course faculty.</i></p>
The percentage weightage for CCA and ESE will be as per the undergraduate regulations of the college.

**References:**

1. Blain Brown, *Cinematography: Theory and Practice*, Routledge; 3rd edition 2016
2. Steven D. Katz. *Film Directing Shot by Shot: Visualizing from Concept to Screen*, Focal Press; 1st edition 1991
3. Walter Murch. *In the Blink of an Eye: A Perspective on Film Editing*, Silman-James Press, U.S.; Revised edition
4. Jeff Bartsch *Edit Better: Hollywood-Tested Strategies for Powerful Video Editing*, Resolve Entertainment, Inc.; 1st edition 2014
5. Michael Freeman *The Photographer's Eye: Composition and Design for Better Digital Photos*. Focal Press; 2nd edition 2007
6. Gael Chandler *Cut by Cut: Editing Your Film or Video*, Michael Wiese Productions; New edition 2012
7. Michael Ondaatje. *The Conversations: Walter Murch and the Art of Editing Film*, Knopf; Reprint edition 1900

8. Christopher J. Bowen and Roy Thompson.*A Grammar of the Edit*, Routledge; 4th edition 2017  
**SKILL ENHANCEMENT COURSES (SEC)**

SEM	SI No.	COURSE CODE	COURSE NAME	Course Stream	Level	CREDIT	HRS/WEEK		
							L	T	P
IV	1	24UAGDSEC201	Design Thinking	Design	200-299	3	2	1	0
V	2	24UAGDSEC301	Calligraphy	Design	300-399	3	0	3	0
VI	3	24UAGDSEC302	Portfolio	Design	300-399	3	0	3	0

## Course 01

<b>Course Code</b>	<b>24UAGDSEC201</b>
<b>Discipline</b>	<b>Design</b>
<b>Course Title</b>	<b>Design Thinking</b>
<b>Type of Course</b>	<b>Skill Enhancement Courses</b>
<b>Course Level</b>	<b>200-299</b>
<b>Lecture/Tutorial/Practical Hours</b>	<b>30/15/0</b>
<b>Credits</b>	<b>3</b>
<b>Course Description:</b>	
Design Thinking introduces students to the iterative design process, emphasizing problem-solving, ideation, prototyping, creativity, and user-centred design principles. Through hands-on activities and projects, students will develop a deep understanding of design thinking methodologies tailored for graphic design practice. This course enhances the student's ability to create effective and impactful visual communication solutions.	

## COURSE OUTCOMES (CO)

<b>CO No.</b>	<b>Expected Course Outcome</b>	<b>Learning Domains *</b>	<b>PO</b>
1	Nurture user-centric design skills	Analyse	PO1, PO3, PO4
2	Apply iterative design excellence	Apply	PO2, PO3
3	Develop sense of collaborative design aptitude	Evaluate	PO3, PO7
4	Develop creative problem-solving skills	Create	PO1, PO2

## COURSE CONTENT

<b>Module</b>	<b>Units</b>	<b>Description</b>	<b>Hours</b>	<b>CO No.</b>
<b>1</b>	<b>Introduction to Design Thinking</b>		<b>10</b>	<b>1</b>
	1.1	Introduction: What is Design Thinking?	2	
	1.2	History and evolution of Design Thinking. Key principles and stages of the Design Thinking process.	3	
	1.3	Understanding user-centred design. Importance of empathy in design.	3	
	1.4	Overview of Design Thinking tools and methodologies.	2	
<b>2</b>	<b>Empathize and Define</b>		<b>10</b>	<b>2</b>
	2.1	Deepening empathy through observation and user research.	2	
	2.2	Techniques for conducting interviews and observations.	2	
	2.3	Synthesizing research findings to identify user needs and pain points.	3	
	2.4	Defining the design challenge or problem statement.	3	
<b>3</b>	<b>Ideate and Prototype</b>		<b>25</b>	<b>3, 4</b>

3.1	Techniques for generating and exploring ideas- Brainstorming methods and tools, Rapid prototyping techniques in graphic design.	6
3.2	Testing and iterating on prototype, Incorporating feedback into the design process, Techniques for generating and exploring ideas.	6
3.3	Test and implement: Methods for testing prototypes with users, Analyse user feedback and iterating on designs.	4
3.4	Strategies for refining and finalizing design solutions, Communication and presentation skills for showcasing design solutions.	6
3.5	Reflecting on the design process and lessons learned.	3
<b>4</b>	<b>Teacher Specific Content</b>	

<b>Teaching and Learning Approach</b>	
<b>Classroom Procedure (Mode of transaction)</b> Interactive lectures, Flipped Classroom, Lecture-based Learning, Project-Based Learning, Experiential Learning, Peer Teaching, invited lecture, group discussions, Discussion-based Learning, Inquiry-Based Learning, Field based collection and interactions, Online Learning, Blended Learning, and other innovative learning approaches.	
<b>Assessment Types</b>	
<b>Mode of Assessment</b>	
<b>A. Continuous Comprehensive Assessment (CCA)</b>	
<b>Theory:</b> Quiz, Oral Presentation, Self and Peer assessments, Written test, Open book test, Problem based assignment, Field study report/Group discussion. <i>Any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Observation of practical skills, Laboratory record, <i>Any other method as may be required for specific course by the course faculty.</i>	
<b>B. End Semester Examination (ESE)</b>	
<b>Theory:</b> Written test/Standardized Test (MCQ)/Open book/ Problem based assignments/Individual project report/Team project report, <i>any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Practical based assessment, Record, <i>any other method as may be required for specific course by the course faculty.</i>	
The percentage weightage for CCA and ESE will be as per the undergraduate regulations of the college.	

#### References:

1. Gavin Ambrose and Paul Harris. *Design Thinking for Visual Communication - Bloomsbury Visual Arts*, 22 September, 2016. David Sherwin. *Creative Workshop: 80 Challenges to Sharpen Your Design Skills*
2. David Sherwin. *Creative Workshop: 80 Challenges to Sharpen Your Design Skills - HOW Books*, 24 November, 2010.
3. Don Norman. *The Design of Everyday Things: Basic Books*, 5 November, 2013.
4. Tim Brown. *Change by Design: How Design Thinking Transforms Organizations and Inspires Innovation* Harper Business, 29 September, 2009.
5. Thomas Lockwood. *Design Thinking: Integrating Innovation, Customer Experience, and Brand Value* Allworth Press, 10 November, 2010.

## Course 02

<b>Course Code</b>	<b>24UAGDSEC301</b>
<b>Discipline</b>	<b>Design</b>
<b>Course Title</b>	<b>Calligraphy</b>
<b>Type of Course</b>	<b>Skill Enhancement Courses</b>
<b>Course Level</b>	<b>300-399</b>
<b>Lecture/Tutorial/Practical Hours</b>	<b>0/45/0</b>
<b>Credits</b>	<b>3</b>
<b>Course Description:</b>	
This course explores the timeless artistry of the written word. From the elegance of Gothic script to the refined strokes of Copperplate and the expressive versatility of brush lettering, students explore three distinct calligraphic styles. They learn historical contexts, master fundamental techniques, and apply them creatively to design projects in order to create aesthetic user experiences. As they master the skill, students develop a keen eye for detail, craftsmanship, and aesthetic balance which leads them to create powerful and captivating designs for brands and other communication.	

## COURSE OUTCOMES (CO)

<b>CO No.</b>	<b>Expected Course Outcome</b>	<b>Learning Domains *</b>	<b>PO</b>
1	Analyse historical and contemporary calligraphy works, identifying key characteristics and styles to inform personal calligraphy practice and design projects.	Evaluate	PO1, PO4, PO8
2	Apply calligraphy principles to design projects, integrating calligraphic elements effectively to enhance visual communication and aesthetic appeal.	Apply	PO2, PO3, PO5
3	Develop a portfolio showcasing mastery of calligraphy techniques and their application in design	Create	PO3, PO5, PO8

## COURSE CONTENT

<b>Module</b>	<b>Units</b>	<b>Description</b>	<b>Hours</b>	<b>CO No.</b>
<b>1</b>	<b>Introduction to Calligraphy</b>		<b>10</b>	<b>1</b>
	1.1	History and cultural significance of calligraphy	2	
	1.2	Overview of different calligraphy styles, including Gothic, Copperplate, and Brush Lettering	3	



	1.3	Basics of calligraphy tools, inks and materials – Recap of type anatomy and terminologies	2	
	1.4	Calligraphy used in modern designs to uplift brands and user experiences	3	
	<b>Gothic Calligraphy</b>		<b>15</b>	
<b>2</b>	2.1	History and characteristics of Gothic calligraphy	2	<b>2</b>
	2.2	Learning basic Gothic letterforms and strokes	3	
	2.3	Practicing Gothic calligraphy techniques	4	
	2.4	Circular Gothic Calligraphy	3	
	2.5	Designing of Illuminated Scripts and logo creation for brands	3	
	<b>Copperplate Calligraphy and Brush Lettering</b>		<b>20</b>	
<b>3</b>	3.1	History and characteristics of Copperplate calligraphy, Learning the Copperplate script alphabet using grids	3	<b>3</b>
	3.2	Practicing letterforms, connections, and flourishes, Creating Copperplate scripts on invitations and greetings, History and characteristics of Copperplate calligraphy	6	
	3.3	Brush Lettering: Introduction to brush lettering tools and techniques, Learning basic brush lettering strokes and alphabets on grids	3	
	3.4	Experimenting with different brush lettering styles and compositions	2	
	3.5	Combining calligraphy with other design elements - Creative Calligraphy on different surfaces – logo creation for events/brands	3	
	3.6	Portfolio development and showcasing calligraphy projects	3	
<b>4</b>	<b>Teacher Specific Content</b>			

<b>Teaching and Learning Approach</b>
<p><b>Classroom Procedure (Mode of transaction)</b> Interactive lectures, Flipped Classroom, Lecture-based Learning, Project-Based Learning, Experiential Learning, Peer Teaching, invited lecture, group discussions, Discussion-based Learning, Inquiry-Based Learning, Field based collection and interactions, Online Learning, Blended Learning, and other innovative learning approaches.</p>
<b>Assessment Types</b>
<p><b>Mode of Assessment</b></p> <p style="text-align: center;"><b>A. Continuous Comprehensive Assessment (CCA)</b></p> <p><b>Theory:</b> Quiz, Oral Presentation, Self and Peer assessments, Written test, Open book test, Problem based assignment, Field study report/Group discussion. <i>Any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Observation of practical skills, Laboratory record, <i>Any other method as may be required for specific course by the course faculty.</i></p> <p style="text-align: center;"><b>B. End Semester Examination (ESE)</b></p> <p><b>Theory:</b> Written test/Standardized Test (MCQ)/Open book/ Problem based assignments/Individual project report/Team project report, <i>any other method as may be required for specific course by the course faculty.</i></p>

**Practical:** Practical based assessment, Record, *any other method as may be required for specific course by the course faculty.*

The percentage weightage for CCA and ESE will be as per the undergraduate regulations of the college.

**References:**

1. David Harris. *The Art of Calligraphy: A Practical Guide to the Skills and techniques*, Dk Pub 1 July 1995
2. Eleanor Winters. *Mastering Copperplate Calligraphy: A Step-by-Step Manual*, Dover Publications; Lettering, Calligraphy, Typography edition May 8, 2000
3. Marilyn Reaves and Eliza Schulte. *Brush Lettering: An Instructional Manual in Western Brush Calligraphy*, The Lyons Press; Illustrated edition 1 November 1993
4. Joanne Fink and Judy Kastin. *The Speedball Textbook: A Comprehensive Guide to Pen and Brush Lettering*, Speedball Art; 23rd, Twenty-Third Edition January 1, 1999
5. David Harris. *The Calligrapher's Bible: 100 Complete Alphabets and How to Draw Them*, Sourcebooks September 1, 2003

### Course 03

<b>Course Code</b>	<b>24UAGDSEC302</b>
<b>Discipline</b>	<b>Design</b>
<b>Course Title</b>	<b>Portfolio</b>
<b>Type of Course</b>	<b>SKILL ENHANCEMENT COURSES</b>
<b>Course Level</b>	<b>200-299</b>
<b>Lecture/Tutorial/Practical Hours</b>	<b>0/45/0</b>
<b>Credits</b>	<b>3</b>
<b>Course Description:</b>	
<p>This course teaches students how to present their work professionally, whether through a demo reel, portfolio, or creative presentation. They'll learn to choose their best work, present it confidently, and communicate their creative vision effectively. The focus is on building a strong personal brand, adapting presentations for different audiences, and using digital platforms to get noticed.</p>	

### COURSE OUTCOMES (CO)

<b>CO No.</b>	<b>Expected Course Outcome</b>	<b>Learning Domains *</b>	<b>PO</b>
1	Showcase strong verbal and visual communication skills when presenting work to clients, employers, or collaborators.	Understand	PO3
2	Develop and visually appealing portfolio showcasing a diverse range of projects and achievements.	Apply	PO3, PO5
3	Customize presentations to target specific audiences and effectively communicate the value proposition of their work.	Evaluate	PO3
4	Create a compelling demo reel that highlights their skills, strengths, and unique style as a creative professional.	Create	PO3

### COURSE CONTENT

<b>Module</b>	<b>Units</b>	<b>Description</b>	<b>Hours</b>	
1	<b>Understanding Your Audience</b>		<b>10</b>	1
	1.1	Identifying target audiences and understanding their needs, preferences, and expectations.	4	
	1.2	Analyzing industry standards and trends in demo reels, portfolios, and creative presentations.	3	

	1.3	Crafting a personal brand narrative that resonates with target audiences	3	
2	<b>Creating Your Demo Reel and Portfolio</b>		<b>16</b>	<b>2</b>
	2.1	Selecting and curating work samples that best represent your skills and creative vision.	5	
	2.2	Developing a cohesive visual identity and design language for your demo reel and portfolio.	3	
	2.3	Incorporating storytelling techniques to engage viewers and leave a lasting impression.	5	
	2.1	Selecting and curating work samples that best represent your skills and creative vision.	3	
3	<b>Effective Presentation Techniques</b>		<b>19</b>	<b>3</b>
	3.1	Mastering verbal and non-verbal communication skills for dynamic presentations. Designing engaging slide decks and visual aids to support your presentation	4	
	3.2	Practicing techniques for handling Q&A sessions and addressing feedback effectively.	3	
	3.3	Exploring online platforms and social media channels for showcasing and promoting your work.	4	
	3.4	Optimizing your online presence for maximum visibility and discoverability.	4	
	3.5	Developing strategies for networking and building connections within the industry. Design of Demo Reel and mock interview	4	
5	Teacher Specific Content			

<b>Teaching and Learning Approach</b>
<p><b>Classroom Procedure (Mode of transaction)</b> Interactive lectures, Flipped Classroom, Lecture-based Learning, Project-Based Learning, Experiential Learning, Peer Teaching, invited lecture, group discussions, Discussion-based Learning, Inquiry-Based Learning, Field based collection and interactions, Online Learning, Blended Learning, and other innovative learning approaches.</p>
<b>Assessment Types</b>
<p><b>Mode of Assessment</b></p> <p><b>A. Continuous Comprehensive Assessment (CCA)</b> <b>Theory:</b> Quiz, Oral Presentation, Self and Peer assessments, Written test, Open book test, Problem based assignment, Field study report/Group discussion. <i>Any other method as may be required for specific course by the course faculty.</i> <b>Practical:</b> Observation of practical skills, Laboratory record, <i>Any other method as may be required for specific course by the course faculty.</i></p>
<p><b>B. End Semester Examination (ESE)</b> <b>Theory:</b> Written test/Standardized Test (MCQ)/Open book/ Problem based assignments/Individual project report/Team project report, <i>any other method as may be required for specific course by the course faculty.</i></p>

**Practical:** Practical based assessment, Record, *any other method as may be required for specific course by the course faculty.*

The percentage weightage for CCA and ESE will be as per the undergraduate regulations of the college.

**References:**

1. Austin Kleon. *Show Your Work!: 10 Ways to Share Your Creativity and Get Discovered*, Workman Publishing; Illustrated edition 15 April 2014
2. Carmine Gallo. *The Presentation Secrets of Steve Jobs: How to Be Insanely Great in Front of Any Audience*, Brilliance Audio; Unabridged edition 22 April 2014
3. Nancy Duarte Resonate. *Present Visual Stories that Transform Audiences*, Wiley; 1st edition 27 October 2010
4. Fig Taylor. *How to Create a Portfolio and Get Hired: A Guide for Graphic Designers and Illustrators*, Laurence King Publishing; 2nd edition October 22, 2013
5. Thatcher Wine and Steven Heller *The Portfolio Handbook: A Guide to Creating Your Graphic Design Portfolio*, Thames & Hudson on February 18, 2020

**VALUE ADDITION COURSES (VAC)**

<b>SEM</b>	<b>SI No</b>	<b>COURSE CODE</b>	<b>COURSE NAME</b>	<b>Course Stream</b>	<b>Course Level</b>	<b>CREDIT</b>	<b>HRS/WEEK</b>		
							<b>L</b>	<b>T</b>	<b>P</b>
<b>III</b>	1	24UAGDVAC201	Yoga and Fitness	Design	200-299	3	2	1	0
<b>IV</b>	2	24UAGDVAC202	Digital Drawing and Animation	Animation	200-299	3	0	2	2
<b>VI</b>	3	24UAGDVAC301	Start-up and Business management	Design	300-399	3	2	1	0

## Course 01

<b>Course Code</b>	<b>24UAGDVAC201</b>
<b>Discipline</b>	<b>Design</b>
<b>Course Title</b>	<b>Yoga and Fitness</b>
<b>Type of Course</b>	<b>Value Addition Courses</b>
<b>Course Level</b>	<b>200-299</b>
<b>Lecture/Tutorial/Practical Hours</b>	<b>30/15/0</b>
<b>Credits</b>	<b>3</b>
<b>Course Description:</b>	
This explores the practice of yoga and its integration with various fitness modalities. Participants will gain a comprehensive understanding of yoga philosophy, key postures (asanas), breathing techniques (pranayama), and mindfulness practices. Additionally, they will learn how to incorporate yoga principles into various fitness routines to enhance their overall well-being and achieve their fitness goals.	

## COURSE OUTCOMES (CO)

CO No.	Expected Course Outcome	Learning Domains *	PO
1	Explain the history, philosophy, and core principles of yoga.	Understand	PO1, PO4
2	Experiment with various breathing techniques (pranayama) and their benefits.	Apply	PO2
3	Develop mindfulness and meditation practices for stress management and relaxation.	Create	PO3, PO4

## COURSE CONTENT

Module	Units	Description	Hours	
1	<b>Foundations of Yoga</b>		<b>10</b>	<b>1</b>
	1.1	Introduction to Yoga History and philosophy of yoga Eight Limbs of Yoga Yamas and Niyamas Major styles of yoga (Hatha, Vinyasa, Yin, etc.)	3	
	1.2	Anatomy and Physiology for Yoga (5 hours) Basic skeletal and muscular anatomy Importance of alignment and safety in yoga postures Physiological effects of yoga on the body	3	
	1.3	Introduction to Asana and Pranayama Fundamental principles of alignment and breath awareness Learning and practicing basic standing, seated, and supine postures Introduction to various pranayama techniques (ujjayi, kapalabhati, etc.)	4	
2	<b>Integrating Yoga with Fitness</b>		<b>15</b>	<b>2</b>
	2.1	Yoga for Strength and Flexibility Exploring vinyasa flows for dynamic movement and strength building Yin yoga for deep tissue release and flexibility Using yoga props for modifications and deeper postures	3	

	2.2	Yoga for Cardio and Endurance (5 hours) Integrating sun salutations and other flowing sequences into cardio routines Utilizing pranayama techniques to enhance breathwork during exercise Adapting yoga postures for HIIT workouts	4	
	2.3	Mindfulness and Yoga for Stress Management Techniques for cultivating focus and mindfulness during exercise Using meditation practices for stress reduction and recovery Incorporating yoga nidra for deep relaxation and sleep improvement	4	
	2.4	Creating Your Personalized Yoga-Fitness Routine Identifying individual fitness goals and needs Designing a safe and effective yoga-fitness routine Learning mindfulness techniques for motivation and consistency	4	
	<b>Advanced Practices and Applications</b>		<b>20</b>	
<b>3</b>	3.1	Deepening Your Asana Practice Exploring intermediate and advanced postures Techniques for inversions and arm balances Using props for deeper poses and alignment refinement	8	
	3.2	Pranayama for Energy and Well-being Learning and practicing advanced pranayama techniques (bhastrika, kapalabhati, etc.) Exploring the effects of pranayama on energy levels and mood Using pranayama for specific benefits (stress reduction, focus, etc.)	4	
	3.3	Yoga for Special Populations 5 Adapting yoga practices for beginners, older adults, and individuals with specific conditions Learning safe modifications and contraindications Developing inclusive and accessible yoga classes	4	
	3.4	Yoga Philosophy and Lifestyle Integration (5 hours) Exploring the ethical and philosophical aspects of yoga Integrating yoga principles into daily life for holistic well-being Developing a sustainable and personal yoga practice	4	
4	Teacher Specific Content			

<b>Teaching and Learning Approach</b>	
<b>Classroom Procedure (Mode of transaction)</b> Interactive lectures, Flipped Classroom, Lecture-based Learning, Project-Based Learning, Experiential Learning, Peer Teaching, invited lecture, group discussions, Discussion-based Learning, Inquiry-Based Learning, Field based collection and interactions, Online Learning, Blended Learning, and other innovative learning approaches.	
<b>Assessment Types</b>	
<b>Mode of Assessment</b>	
<b>A. Continuous Comprehensive Assessment (CCA)</b>	
<b>Theory:</b> Quiz, Oral Presentation, Self and Peer assessments, Written test, Open book test, Problem based assignment, Field study report/Group discussion. <i>Any other method as may be required for specific course by the course faculty.</i>	
<b>Practical:</b> Observation of practical skills, Laboratory record, <i>Any other method as may be required for specific course by the course faculty.</i>	
<b>B. End Semester Examination (ESE)</b>	
<b>Theory:</b> Written test/Standardized Test (MCQ)/Open book/ Problem based assignments/Individual project report/Team project report, <i>any other method as may be required for specific course by the course faculty.</i>	



**Practical:** Practical based assessment, Record, *any other method as may be required for specific course by the course faculty.*

The percentage weightage for CCA and ESE will be as per the undergraduate regulations of the college.

**References:**

1. Judith Lasater .*The Yoga Bible*, Octopus books 2014
2. B.K.S. Iyengar .*Light on Yoga*, Thorsons 2006
3. Swami Sivananda Radha. Hatha Yoga for Beginners
4. Deborah Adele. The Yamas & Niyamas: *Exploring the Ethical Practice of Yoga*, On-Word Bound Books, LLC; 40081st edition 2009

## Course 02

<b>Course Code</b>	<b>24UAGDVAC202</b>
<b>Discipline</b>	<b>Animation</b>
<b>Course Title</b>	<b>Digital Drawing and Animation</b>
<b>Type of Course</b>	<b>Value Addition Courses</b>
<b>Course Level</b>	<b>200-299</b>
<b>Lecture/Tutorial/Practical Hours</b>	<b>0/30/30</b>
<b>Credits</b>	<b>3</b>
<b>Course Description:</b> This course provides an introduction to digital drawing and animation, focusing on the fundamental principles and techniques used in creating digital art and animated sequences. Students will learn to use industry-standard software, develop their drawing skills, and understand the animation process from concept to final output.	

## COURSE OUTCOMES (CO)

CO No.	Expected Course Outcome	Learning Domains *	PO
1	Develop the skill of using Digital Interface of Animation	Understand	PO1, PO3, PO8
2	Develop Basics of Digital Drawing	Apply	PO1, PO3, PO5
3	Build Skill of creating Digital Animation	Create	PO1, PO2, PO3, PO4, PO8

## COURSE CONTENT

Module	Units	Description	Hours	CO No
1	<b>Introduction of Digital Free-Hand Animation</b>		<b>3</b>	1
	1.1	Introduction Free-Hand Drawing Animation: Overview of digital drawing animation - Advantages of Digitally Drawing Animation - Difference between Digital Animation vs Traditional Animation	1	
	1.2	Introduction of Digital Drawing Tools and Software: Digital drawing tablets and styluses - Introduction of Software designed for hand-drawn animation - Basics of Digital Drawing interface and Navigating interfaces.	2	
2	<b>Basics of Digital Drawing for Animation</b>		<b>25</b>	2
	2.1	Exploring Digital drawing tools: Line, shape, and form - Exploring brushes, pens, and other drawing tools - Apply of Brushes, Keeping Line quality - Using Pressure sensitivity different digital Medium	5	
	2.2	Understanding Colour and Using Layers: Colour theory basics - Using colour effectively in digital drawings - Using of Layers and its importance in animation - Organizing and managing layers in a drawing	5	
	2.3	Digital Drawing Exercises: Sketching and Loosening Exercise - Drawing from reference images - Experimenting with different brushes and tools - Practice exercises for improving digital drawing skills- Shading and highlighting	6	
	2.4	Drawing Characters and Expressions: Understanding of Character Anatomy and Motion sketches - Practice Different drawing styles and techniques - Animation	9	

		character Design refined sketches - Conveying emotions through facial expressions and body language.		
3	<b>Animation Process</b>		<b>32</b>	<b>3</b>
	3.1	Basics of Animation: Understanding keyframes and their role in animation - Importance of Timing and Spacing (frames per second) - Creating simple animations using keyframes - Planning an animation with Key poses	10	
	3.2	Animating Character Movement: Techniques for animating characters (e.g., Gestures, walk cycles, facial expressions) - Understanding movement and flow in animation - Line quality and consistency	10	
	3.3	Transition in Animation: Transition between key poses - Adding in-between frames for Animation - Tips for creating smooth and believable movement - Improve Animation with clear feedback	12	
5	<b>Teacher Specific Content</b>			

<b>Teaching and Learning Approach</b>
<p><b>Classroom Procedure (Mode of transaction)</b> Interactive lectures, Flipped Classroom, Lecture-based Learning, Project-Based Learning, Experiential Learning, Peer Teaching, invited lecture, group discussions, Discussion-based Learning, Inquiry-Based Learning, Field based collection and interactions, Online Learning, Blended Learning, and other innovative learning approaches.</p>
<b>Assessment Types</b>
<p><b>Mode of Assessment</b></p> <p style="text-align: center;"><b>A. Continuous Comprehensive Assessment (CCA)</b></p> <p><b>Theory:</b> Quiz, Oral Presentation, Self and Peer assessments, Written test, Open book test, Problem based assignment, Field study report/Group discussion. <i>Any other method as may be required for specific course by the course faculty.</i></p> <p><b>Practical:</b> Observation of practical skills, Laboratory record, <i>Any other method as may be required for specific course by the course faculty.</i></p>
<p style="text-align: center;"><b>B. End Semester Examination (ESE)</b></p> <p><b>Theory:</b> Written test/Standardized Test (MCQ)/Open book/ Problem based assignments/Individual project report/Team project report, <i>any other method as may be required for specific course by the course faculty.</i></p> <p><b>Practical:</b> Practical based assessment, Record, <i>any other method as may be required for specific course by the course faculty.</i></p>
The percentage weightage for CCA and ESE will be as per the undergraduate regulations of the college.

### References:

1. Thomas, Frank, and Ollie Johnston. *The Illusion of Life: Disney Animation*. Abbeville Press, 1981.
2. Williams, Richard. *The Animator's Survival Kit*. Faber and Faber, 2002.
3. Goldberg, Michael. *Character Animation Crash Course* 2008.
4. Park, Dwayne. *Digital Painting with Krita 2.9: Learn All of the Tools to Create Your Next Masterpiece*. Packt Publishing, 2015.
5. Landa, Robin. *Digital Painting Techniques: Practical Techniques of Digital Art Masters*. 3DTotal Publishing, 2011.

**Course 03**

<b>Course Code</b>	<b>24UAGDVAC301</b>
<b>Discipline</b>	<b>Design</b>
<b>Course Title</b>	<b>Start-up and Business management</b>
<b>Type of Course</b>	<b>Value Addition Courses</b>
<b>Course Level</b>	<b>300-399</b>
<b>Lecture/Tutorial/Practical Hours</b>	<b>30/15/0</b>
<b>Credits</b>	<b>3</b>
<b>Course Description:</b>	
This course is designed to provide a comprehensive understanding of the intricacies involved in launching and managing a start-up. From the inception of a business idea to its sustainable growth, participants will explore the principles of entrepreneurship, strategic planning, marketing, financial management, and operational excellence. Through a combination of theoretical insights, practical exercises, and real-world case studies, this course aims to empower individuals to navigate the challenges and capitalize on opportunities within the dynamic landscape of start-ups.	

**COURSE OUTCOMES (CO)**

<b>CO No.</b>	<b>Expected Course Outcome</b>	<b>Learning Domains *</b>	<b>PO</b>
1	Recall and identify fundamental concepts in start-up and business management, including planning, marketing, finance, and operations.	Understand	PO1, PO3, PO6
2	Critically assess the feasibility of start-up ideas, analysing market trends, competition, and potential risks	Apply	PO1, PO2
3	Develop comprehensive business plans, marketing strategies, and financial models for successful start-ups.	Create	PO3, PO8

**COURSE CONTENT**

<b>Module</b>	<b>Units</b>	<b>Description</b>	<b>Hours</b>	<b>CO No.</b>
1	<b>Introduction to Entrepreneurship and Start-up Ecosystems</b>		<b>10</b>	<b>1</b>
	1.1	Understanding entrepreneurship and the start-up landscape	3	
	1.2	Ideation and validation of start-up ideas	2	
	1.3	Legal considerations for start-ups Building a compelling business concept and value proposition	5	
2	<b>Business Planning and Strategic Management</b>		<b>20</b>	<b>2</b>
	2.1	Crafting a comprehensive business plan	3	
	2.2	Strategic planning and goal setting for start-ups	3	
	2.3	Marketing strategies for start-ups: Digital marketing, branding, and customer acquisition Financial planning and budgeting for start-ups	5	
	2.4	Setting up and managing start-up operations	3	
	2.5	Human resource management for start-ups	3	
	2.6	Supply chain and logistics considerations	3	

		Scaling and growth strategies		
3	<b>Innovation, Adaptability, and Sustainable Practices</b>		<b>15</b>	3
	4.1	Encouraging innovation and creativity in start-ups	3	
	4.2	Adapting to market changes and disruptions	5	
	4.3	Sustainable business practices and social responsibility Final project: Comprehensive start-up business plan and pitch presentation	7	
4	<b>Teacher Specific Content</b>			

<b>Teaching and Learning Approach</b>
<p><b>Classroom Procedure (Mode of transaction)</b> Interactive lectures, Flipped Classroom, Lecture-based Learning, Project-Based Learning, Experiential Learning, Peer Teaching, invited lecture, group discussions, Discussion-based Learning, Inquiry-Based Learning, Field based collection and interactions, Online Learning, Blended Learning, and other innovative learning approaches.</p>
<b>Assessment Types</b>
<p><b>Mode of Assessment</b></p> <p><b>A. Continuous Comprehensive Assessment (CCA)</b>  <b>Theory:</b> Quiz, Oral Presentation, Self and Peer assessments, Written test, Open book test, Problem based assignment, Field study report/Group discussion. <i>Any other method as may be required for specific course by the course faculty.</i>  <b>Practical:</b> Observation of practical skills, Laboratory record, <i>Any other method as may be required for specific course by the course faculty.</i></p>
<p><b>B. End Semester Examination (ESE)</b>  <b>Theory:</b> Written test/Standardized Test (MCQ)/Open book/ Problem based assignments/Individual project report/Team project report, <i>any other method as may be required for specific course by the course faculty.</i>  <b>Practical:</b> Practical based assessment, Record, <i>any other method as may be required for specific course by the course faculty.</i></p>
The percentage weightage for CCA and ESE will be as per the undergraduate regulations of the college.

References:

1. Eric Ries. *The Lean Start-up: How Today's Entrepreneurs Use Continuous Innovation to Create Radically Successful Businesses*, Crown Currency; Illustrated edition 13 September 2011
2. Peter Thiel and Blake Masters. *Zero to One: Notes on Start-ups, or How to Build the Future*, Crown Currency; 1st edition (September 16, 2014)
3. Alexander Osterwalder and Yves Pigneur. *Business Model Generation: A Handbook for Visionaries, Game Changers, and Challengers*, Wiley; 1st edition 20 August 2010
4. Steve Blank and Bob Dorf. *The Start-up Owner's Manual: The Step-by-Step Guide for Building a Great Company* Wiley; 1st edition (16 April 2020)
5. Clayton M. Christensen. *The Innovator's Dilemma: When New Technologies Cause Great Firms to Fail*, Harvard Business Review Press; Illustrated edition 15 December 2015

**SIGNATURE COURSES**

<b>SI No</b>	<b>COURSE CODE</b>	<b>COURSE NAME</b>	<b>Course Stream</b>	<b>Course Level</b>	<b>CREDIT</b>	<b>HRS/WEEK</b>		
						<b>L</b>	<b>T</b>	<b>P</b>
<b>1</b>	24UAGDSIG301	Ethical Hacking	Design	300-399	3	2	1	2
<b>2</b>	24UAGDSIG302	Data Security	Design	300-399	3	2	1	2

### Course 01

Course Code	24UAGDSIG301
Discipline	Design
Course Title	ETHICAL HACKING
Type of Course	SIGNATURE COURSES
Course Level	300-399
Lecture/Tutorial/Practical Hours	15/15/30
Credits	4
<b>Course Description:</b> This course covers different skills and techniques that help to execute Threat analysis. Students will acquire in-depth skills and knowledge required to build a robust network and prevent intruders	

### COURSE OUTCOMES (CO)

CO No.	Expected Course Outcome	Learning Domains *	PO
1	<b>Proficiency in identifying vulnerabilities:</b> Ability to recognize and assess weaknesses in computer systems and networks	Understand	PO1, PO3, PO6
2	<b>Skill in penetration testing:</b> Capability to simulate cyber-attacks to evaluate the security posture of systems and networks.	Apply	PO1, PO2
3	<b>Knowledge of ethical hacking techniques:</b> Understanding of legal and ethical methods to exploit vulnerabilities for security enhancement purposes.	Create	PO3, PO8
4	<b>Competence in reporting and mitigation:</b> Capability to document findings and provide recommendations for remediation to enhance overall cybersecurity posture.	Create	PO3, PO8

### COURSE CONTENT

Module	Units	Description	Hours	CO No.
		Introduction to Network protocols & Layers, Data encapsulation	15	1

1	1.1	The module provides foundational understanding of communication protocols and the OSI model layers, essential for comprehending network architecture and operations..	7	
	1.2	Data encapsulation explores the process of packaging data with protocol information as it travels across different network layers, ensuring efficient transmission and delivery.	8	
<b>DHCP, DOMAIN, WEB Servers, LINUX ESSENTIALS AND SHELL SCRIPTING</b>			<b>15</b>	
2	1.3	DHCP, DOMAIN, WEB Servers module equips learners with essential knowledge in required server operations for better and secured data transmissions	7	1
	2.1	Shell Scripting provides comprehensive knowledge and practical skills for utilizing the Linux operating system and writing efficient shell scripts to automate tasks and enhance productivity.	8	
<b>ETHICAL HACKING/ PENETRATION TESTING, INTELLIGENCE GATHERING</b>			<b>15</b>	
3	2.2	Ethical Hacking/ Penetration Testing ensures theoretical understanding and practical skills for assessing and fortifying cybersecurity by simulating real-world cyber-attacks in a controlled and ethical manner..	5	
	2.3	Intelligence Gathering involves implementing multiple ways to execute Open source, Active and Passive Intelligence Gathering and Wireless Penetration Testing methods	10	
<b>CRYPTOGRAPHY &amp; SOCIAL ENGINEERING, IDS / IPS / Firewall</b>			<b>15</b>	
4	4.1	Cryptography & Social Engineering delves into the principles of secure communication and manipulation of human behaviour to fortify cybersecurity measures and protect against unauthorized access and data breaches.	10	3
	4.2	IDS / IPS / Firewall is understanding of intrusion detection systems, intrusion prevention systems, and firewalls to safeguard networks against unauthorized access and malicious activities.	5	
5	<b>Teacher Specific Content</b>			

<b>Teaching and Learning Approach</b>
<p><b>Classroom Procedure (Mode of transaction)</b>  Interactive lectures, Flipped Classroom, Lecture-based Learning, Project-Based Learning, Experiential Learning, Peer Teaching, invited lecture, group discussions, Discussion-based Learning, Inquiry-Based Learning, Field based collection and interactions, Online Learning, Blended Learning, and other innovative learning approaches.</p>
<b>Assessment Types</b>
<p><b>Mode of Assessment</b></p> <p style="text-align: center;"><b>C. Continuous Comprehensive Assessment (CCA)</b></p> <p><b>Theory:</b> Quiz, Oral Presentation, Self and Peer assessments, Written test, Open book test, Problem based assignment, Field study report/Group discussion. <i>Any other method as may be required for specific course by the course faculty.</i></p>



**Practical:** Observation of practical skills, Laboratory record, *Any other method as may be required for specific course by the course faculty.*

**D. End Semester Examination (ESE)**

**Theory:** Written test/Standardized Test (MCQ)/Open book/ Problem based assignments/Individual project report/Team project report, *any other method as may be required for specific course by the course faculty.*

**Practical:** Practical based assessment, Record, *any other method as may be required for specific course by the course faculty.*

The percentage weightage for CCA and ESE will be as per the undergraduate regulations of the college.

**References:**

1. Cooper, Martin. *Adventures in Ethical Hacking.*
2. Jon Erickson, *Hacking: The Art of Exploitation*
3. Patrick Engebretson, *The Basics of Hacking and Penetration Testing: Ethical Hacking and Penetration Testing Made Easy*
4. Georgia Weidman, *Penetration Testing: A Hands-On Introduction to Hacking*
5. Dafydd Stuttard and Marcus Pinto, *The Web Application Hacker's Handbook: Finding and Exploiting Security Flaws*

**Suggested Readings:**

Online resources and tutorials

1. Offensive Security (OffSec)
2. Hack The Box (HTB)
3. Capture The Flag (CTF) Competitions
4. Vulnerability Databases
5. Bug Bounty Programs

### Course 03

<b>Course Code</b>	<b>24UAGDSIG302</b>
<b>Discipline</b>	<b>Design</b>
<b>Course Title</b>	<b>DATA SECURITY</b>
<b>Type of Course</b>	<b>Signature Courses</b>
<b>Course Level</b>	<b>300-399</b>
<b>Lecture/Tutorial/Practical Hours</b>	<b>15/15/30</b>
<b>Credits</b>	<b>4</b>
<b>Course Description:</b> This course covers different skills and techniques that help to execute Data Security. Students will acquire in-depth skills and knowledge required to design and execute secured data methodologies.	

### COURSE OUTCOMES (CO)

<b>CO No.</b>	<b>Expected Course Outcome</b>	<b>Learning Domains *</b>	<b>PO</b>
1	Understanding Threat Landscape: Recognize various cyber threats such as malware, phishing, and social engineering.	Understand	PO1, PO3, PO6
2	Implementing Security Measures: Apply encryption, access controls, and authentication protocols to safeguard data.	Apply	PO1, PO2
3	Risk Assessment Skills: Assess vulnerabilities in systems and networks to develop effective mitigation strategies.	Create	PO3, PO8
4	Compliance Knowledge: Understand legal and regulatory frameworks governing data security to ensure organizational adherence.	Create	PO3, PO8

### COURSE CONTENT

<b>Module</b>	<b>Units</b>	<b>Description</b>	<b>Hours</b>	<b>CO No.</b>
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	<b>Data management</b>		<b>10</b>	
<b>1</b>	1.1	<b>Introduction to Data management:</b> The module provides comprehensive understanding and skills for organizing, storing, analysing, and protecting data effectively within organizations.	5	<b>1</b>
	1.2	<b>Computerized documentation &amp; Processing :</b> Module involves efficient organization, retrieval, and manipulation of information through digital systems, enhancing data management proficiency and precision.	5	
	<b>Data Recovery and Protection</b>		<b>10</b>	
<b>2</b>	1.3	<b>Data recovery &amp; Forensic toolkit :</b> module equips learners with essential skills for retrieving lost data and conducting forensic analysis, crucial for investigating digital incidents and ensuring data integrity.	5	<b>2</b>
	2.1	<b>Encryption &amp; Decryption :</b> entitle the world of latest data protection methods for safe interaction in cyber space	5	
	<b>Cyber-crimes and cyber laws</b>		<b>15</b>	
<b>3</b>	2.2	<b>Offences, IT act and its amendments :</b> The Offences and IT Act encompasses laws and regulations governing cybercrimes and digital offenses, aimed at regulating and penalizing illegal activities in the digital realm.	10	<b>3</b>
	2.3	<b>Prevention to Data compromise &amp; Recovering methods :</b> involves implementing robust security measures, while recovery methods entail restoring compromised data through backups and forensic analysis.	5	
	<b>Network Security</b>		<b>25</b>	
<b>4</b>	4.1	<b>Introduction to Network Components :</b> the hardware and software elements essential for establishing and maintaining communication between devices, facilitating data transmission and access within a network.	5	<b>4</b>
	4.2	<b>Security standards against data breach :</b> module offers comprehensive knowledge and skills to implement robust measures, protocols, and techniques aimed at preventing, detecting, and mitigating potential data breaches, enhancing cybersecurity resilience across various digital environments.	10	
	4.3	<b>Threat risk modelling methodologies :</b> Major key references are identifying web application vulnerabilities, guidelines for secure connection development, frameworks for assessing and mitigating risks, techniques to understand threats methodologies to provide structured approaches to threat analysis and management	10	
<b>5</b>	<b>Teacher Specific Content</b>			

<b>Teaching and Learning Approach</b>
<b>Classroom Procedure (Mode of transaction)</b>

Interactive lectures, Flipped Classroom, Lecture-based Learning, Project-Based Learning, Experiential Learning, Peer Teaching, invited lecture, group discussions, Discussion-based Learning, Inquiry-Based Learning, Field based collection and interactions, Online Learning, Blended Learning, and other innovative learning approaches.

### Assessment Types

#### Mode of Assessment

##### E. Continuous Comprehensive Assessment (CCA)

**Theory:** Quiz, Oral Presentation, Self and Peer assessments, Written test, Open book test, Problem based assignment, Field study report/Group discussion. *Any other method as may be required for specific course by the course faculty.*

**Practical:** Observation of practical skills, Laboratory record, *Any other method as may be required for specific course by the course faculty.*

##### F. End Semester Examination (ESE)

**Theory:** Written test/Standardized Test (MCQ)/Open book/ Problem based assignments/Individual project report/Team project report, *any other method as may be required for specific course by the course faculty.*

**Practical:** Practical based assessment, Record, *any other method as may be required for specific course by the course faculty.*

The percentage weightage for CCA and ESE will be as per the undergraduate regulations of the college.

### References:

1. William Stallings, *Cryptography and Network Security: Principles and Practice*.
2. Ross J. Anderson, *Security Engineering: A Guide to Building Dependable Distributed Systems*.
3. Michael E. Whitman and Herbert J. Mattord, *Principles of Information Security*
4. Dorothy E. Denning and Peter J. Denning, *Data and Computer Security: A Handbook edited*

### Suggested Readings:

#### Online resources and tutorials

1. National Institute of Standards and Technology (NIST) Special Publications
2. International Association of Privacy Professionals (IAPP)
3. Cybersecurity and Infrastructure Security Agency (CISA)

