## Course Outline

|  |  |
| --- | --- |
| Title | Professional Practices |
| **Code** | GE-261 |
| **Credit Hours** | 03  ***Theory/week:***  Weight 03 Cr. Hrs.  Contact Hours 03 Hrs.  Lectures : 02  Duration 1.5 Hrs./Lecture |
| **Prerequisite** | None |
| **Prerequisite Skills** | Ability to analyze and accept different viewpoints. |
| **Follow Up** | None |
| **Category** | Minor |
| **Course Description** | The course, professional practices, critically examines ethical issues that arise in professional life. This course will not only cover the philosophical grounds of ethics and morality but also provide the case-based knowledge to analyze the moral dilemmas specific to the profession of software engineering and the professions of others with whom the IT professionals must live and work, along with the study of software engineering code of conduct. |
| **Learning Outcomes** | After successful completion of this course, the students will be able to   * Describe and critically evaluate theoretical components of ethical practice in general * Understand and apply ethical framework for professional decisions and to resolve ethical dilemmas * Demonstrate understanding of Software Engineering Code of Ethics and Professional Practice * Develop foundational skills in critical analysis and reflective ethical practice in computing profession |
| **Syllabus** | Introduction: Why Professional Ethics? The Paradigm of Professions, Sorting Out Computing and its Status as a Profession, Ethics and Some Fundamental Ethical Viewpoints (Utilitarianism, Deontological theories, Rights, Virtue Ethics), Golden rule, Value conflicts, The Ethical Judgment of Moral Dilemmas (The Ethical Cycle), What is Computer Ethics? (Technology and Ethics, Computer ethics and morality, Ethical decision making in computing, The special status of computer ethics), Ethical and Social Impacts of Computers on Work, Ethical Evaluation of Technology (The “Digital Divide”, Ethical issues in design process), Ethics and the Internet, Hacking and Hackers’ Ethics, Identity Theft, Ethics and Privacy, Ethics and Intellectual Property, Engineers in Organizations (Responsible Organizational Disobedience Whistle-blowing), The Software Engineering Code of Ethics, Computer Applications in Various Sectors Along with Ethical Dilemmas. |
| **Text Books** | A – Book: Computer Ethics by Deborah G. Johnson, (4th Edition), Pearson  B – Book: A Gift of Fire: Social, Legal, and Ethical Issues for Computing and the Internet (5th Edition) by Sara Baase, Prentice Hall |
| **Reference Book(s) and Material** | C – Article: Poel, van de, I. R., & Royakkers, L. M. M. (2007). The ethical cycle. *Journal of Business Ethics*, *71*(1), 1-13.  D – Book: Computer Ethics, A Global Perspective by Giannis Stamatellos, Jones and Bratlett Publishers |
| **Instructional Aids/Resources** | * Microsoft PowerPoint * White Board and Marker * Multimedia * Photocopy Facility for Handouts, Quizzes, and Case Studies |
| **Assessment Criteria** | |  |  |  |  | | --- | --- | --- | --- | | **Sessional 25%** | **Mid 35%** | **Final 40%** | **Total 100%** | | Quizzes and Assignments | Mid Paper 35 | Final Paper 40 | 100 | |
| **Recommendations** | Active participation of students in class discussions will be the key to achieve course objectives, successfully. |

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **Week** | **Lecture** | Topic | Source (Book-Chapter No.) | **Recommendations for Learning Activities** |
| 1 | 1 | **Introduction**   * The definition of Student, Learning, DE learning, relearning, Zero-line theory * Data, information, knowledge, skills, experience * Foundation of Professional Practices | Lecture Notes |  |
| 2 |
| 2 | 3 | **An overview of ethics:**  What is Ethics? The importance of integrity. The difference between morals, ethics, and law. Ethics in the business world. Why Fostering Good Business Ethics Is Important. | A – 2 |  |
| 4 |
| 3 | 5 | **The tool kit for ethics, manners, and etiquettes:**  Management and leadership | Lecture Notes |  |
| 6 |
| 4 | 7 | **The tool kit for ethics, manners, and etiquettes:**  Time Management | Lecture Notes |  |
| 8 |
| 5 | 9 | **The tool kit for ethics, manners, and etiquettes:**  Anger and stress Management | Lecture Notes |  |
| 10 |
| 6 | 11 | **Professional Ethics:**  Introduction: Why Professional Ethics?, The Paradigm of Professions, Characteristics of a fully developed Profession, Sorting Out Computing and its Status as a Profession, Common morality, Personal ethics, Professional ethics | A – 7,  Reading 2 |  |
| 12 |
| 7 | 13 | **Professional Ethics:** Communication (Writing, speaking, Listening) | Lecture Notes |  |
| 14 |
| 8 | 15 | **Professional Ethics:** How to criticize, How to ask question, How to interrupt |  |  |
| 16 |
| **Mid Term Examinations** | | | | | |
| 9 | 17 | **What is Computer Ethics?**  Technology and Ethics, Computer ethics and morality, Ethical decision making in computing, The special status of computer ethics (uniquely stored, uniquely malleable, uniquely complex, uniquely fast, uniquely cheap, uniquely cloned, uniquely discrete, uniquely coded) with scenarios | D – 1,  Reading 3 |  |
| 18 |
| 10 | 19 | **Ethical and Social Impacts of Computers on Work:**  Changes, fears and questions, Impacts on employment (Job destruction and creation, changing skills and skill levels, telecommuting, a global workforce), Employee communication and monitoring (Learning about job applicants, risks and rules for work and personal communications) | B – 6 |  |
| 20 |
| 11 | 21 | **Ethical Evaluation of Technology**:  Evaluating information (the need for responsible judgment), The “Digital Divide” (Trends in computer access, the global divide and next billion users), Neo-Luddite views of computers, technology and quality of life (Criticism of computing technologies), Making decision about technology (Intelligent machines and super-intelligent humans – or the end of human race?) Ethical issues in design process | B – 7 |  |
| 22 |

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| 12 | 23 | **Ethics and the Internet:**  Three morally significant characteristics (global, anonymity, reproducibility), ethical significance  **Hacking and Hackers’ Ethics:**  What is hacking? Hacktivisim and political hacking, Hackers as security researchers, Hacking as foreign policy, Security, The law: catching and punishing hackers | A – 6, B – 5 |  |
| 24 |
| 13 | 25 | **Identity Theft:**  Identity theft and credit card fraud, stealing identities, Responses to identity theft, biometrics, whose laws rule the web? When digital actions cross border, culture, law and ethics, potential solutions  Case study | B – 5 |  |
| 26 |
| 14 | 27 | **Ethics and Privacy**:  What is privacy?, New technology, new risks, understanding the “Computers and Privacy” issues (uses of information, personal privacy, information mediates relationships, individual-organization relationships), Exception of privacy and surveillance technologies, The business and social sectors, Government systems, Protecting Privacy: Technology, Markets, Rights, and Laws | A – 4, B – 2 |  |
| 28 |
| 15 | 29 | **Ethics and Intellectual Property**:  What is intellectual property? Challenges of new technology, Current legal protection, The philosophical basis of property, Consequentialist arguments, Conclusions from the philosophical analysis of property, Is it wrong to copy proprietary software? Scenarios | A – 5, B – 4 |  |
| 30 |
| 16 | 31 | **The Software Engineering Code of Ethics:**  Professional Relationships (Employer-employee, Client-professional, Other stakeholders-professionals, Professional-professional, Conflicting responsibilities)  ACM Code of Ethics and Professional Conduct, IEEE Code of Ethics, DPMA Code of Ethics, ICCP Code of Ethics | A – 7,  Hand outs |  |
| 32 |
| **Final Term Examinations** | | | | |