**King Saud University**

**College of Computer and Information Sciences**

**Department of Information Systems**

**IS201–Fundamentals and Ethics of Information Systems (3-0-1)**

**Instructor: Lecturer/ Ashraf Youssef**

**Textbook(s) and/or Other Required Materials:**

#### Primary Book: Ralph Stair and G. Reynolds, *Information Systems Essentials*, Thomson Course Technology, latest edition

**Material on: lms.ksu.edu.sa**  <http://fac.ksu.edu.sa/ashraf>

**Prerequisites:** None

**Co-requisite:** None

**Course Type:** Required

**Contact Information:**

* **Office:** Room G050, **Phone:** 469-7476
* **email:** ashraf@ksu.edu.sa
* **Office hours:** Mon (8am-9am), Wed (8am-11am)

**Course Description (catalog):**

This course introduces students to the fundamentals of information systems and to ethical issues related to information systems as a discipline and profession. Topics covered include: definition of information systems, hardware and software, the binary system, telecommunications and networks, concepts of information, database approach to data management, systems development, specialized information systems, moral, legal and social issues in the cyberspace, professional conduct, personal, local and global impacts of computers, and IS professionals’ need for continuous professional development.

**Course Learning Outcomes:** After completing this course, the students will be able to:

1. Identify and describe types and components of an information system
2. Identify and describe the functions of computer hardware and software
3. Identify the binary number system and logic gates
4. Identify major advantages of the database approach
5. Understand telecommunications and computer networks
6. Identify ethical, legal, social, and security issues related to information systems
7. Understand different types of IS in organizations such as (MIS, DSS, TPS, KMS,..)
8. Analyze local and global impacts of information systems on organizations
9. Recognize the need for continuous professional development

**Student Outcomes Covered by the Course**

|  |  |  |
| --- | --- | --- |
| **Outcome** | **ABET Student Outcome Description** | **Coverage** |
| (a) | 1. An ability to apply knowledge of computing and mathematics appropriate to the discipline | **√** |
| (b) | 1. An ability to analyze a problem, and identify and define the computing requirements appropriate to its solution |  |
| (c) | 1. An ability to design, implement, and evaluate a computer-based system, process, component, or program to meet desired needs |  |
| (d) | 1. An ability to function effectively on teams to accomplish a common goal |  |
| (e) | 1. An understanding of professional, ethical, legal, security and social issues and responsibilities | **√** |
| (f) | 1. An ability to communicate effectively with a range of audiences |  |
| (g) | 1. An ability to analyze the local and global impact of computing on individuals, organizations, and society | **√** |
| (h) | 1. Recognition of the need for and an ability to engage in continuing professional development | **√** |
| (i) | 1. An ability to use current techniques, skills, and tools necessary for computing practice. |  |
| (j) | 1. An understanding of processes that support the delivery and management of information systems within a specific application environment. |  |

**Course Outcomes vs. Student Outcomes**

|  |  |  |  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
| # | Course Outcomes | ABET Student Outcomes | | | | | | | | | |
| A | B | C | D | E | F | G | H | I | J |
| 1 | Identify and describe types and components of an information system | X |  |  |  |  |  |  |  |  |  |
| 2 | Identify and describe the functions of computer hardware and software | X |  |  |  |  |  |  |  |  |  |
| 3 | Identify the binary number system and logic gates | X |  |  |  |  |  |  |  |  |  |
| 4 | Identify major advantages of the database approach | X |  |  |  |  |  |  |  |  |  |
| 5 | Understand telecommunications and computer networks | X |  |  |  |  |  |  |  |  |  |
| 6 | Identify ethical, legal, social and security issues related to information systems |  |  |  |  | X |  |  |  |  |  |
| 7 | Understand different types of IS in organizations such as (MIS, DSS, TPS, KMS,..) | x |  |  |  |  |  |  |  |  |  |
| 8 | Analyze local and global impacts of information systems on organizations |  |  |  |  |  |  | X |  |  |  |
| 9 | Recognize the need for continuous professional development |  |  |  |  |  |  |  | X |  |  |

**Major Topics covered and schedule in weeks:**

|  |  |
| --- | --- |
| * Introduction to information systems in organizations | 1 |
| * Hardware and software components of IS | 1 |
| * The binary system and logic gates | 1 |
| * Organizing data and information (Database) | 2 |
| * Telecommunications, the internet, intranets and extranets | 2 |
| * Ethics, Legal, and Security of information systems | 2 |
| * Different types of IS in organizations | 2 |
| * Local and global impact of IS on organizations | 2 |
| * Continuous professional development | 2 |

**Evaluation Criteria (TENTATIVE)**

* Quiz1 5%
* Quiz2 5%
* Lab/Tut 10%
* Mid1 20% ------- Wed, week 7
* Mid2 20% -------- Wed, week 13
* Final 40%

**Absence**

* Absences of 25% or more of classes (**lectures + tutorials**) will result in automatically being barred from attending the final exam, NO EXCEPTIONS will be made (even if the student is in his/her final Semester).
* NO medical excuses will be accepted as a way for deducting the number of absence days (25% of allowed absence in a Semester is actually there for the purpose of such health or other emergency circumstances).
* A medical excuse may only be used in the case that a student misses an exam (to allow for a make-up exam), however, the absence should still be counted.