

# قسم تقنية المعلومات الخطة الدراسية



## First Year

|      | Level 1 (Prep. Year)       |                                 |                 |    |    |  |
|------|----------------------------|---------------------------------|-----------------|----|----|--|
| Code | No.                        | Course Title                    | Credits / Hours | PR | CR |  |
| ENG  | 001                        | Preparatory English 1           | 8 (20,0,0)      |    |    |  |
| MATH | 001                        | Introduction to Mathematics 1   | 2 (2,0,1)       |    |    |  |
| CS   | 001                        | Computer Skills                 | 2 (1,2,0)       |    |    |  |
| SKL  | 001                        | Learning & Communication Skills | 2 (1,2,0)       |    |    |  |
|      | Total Semester Credits :14 |                                 |                 |    |    |  |

|      | Level 2 (Prep. Year)       |                                     |                |          |    |  |  |
|------|----------------------------|-------------------------------------|----------------|----------|----|--|--|
| Code | No.                        | Course Title                        | Credits /Hours | PR       | CR |  |  |
| ENG  | 002                        | Preparatory English 2               | 6 (14,0,0)     | ENG 001  |    |  |  |
| ENG  | 003                        | English for science and Engineering | 2 (4,0,0)      |          |    |  |  |
| MATH | 002                        | Introduction to Mathematics 2       | 4 (4,0,1)      | MATH 001 |    |  |  |
| PHY  | 001                        | General Physics                     | 3 (2,2,1)      |          |    |  |  |
|      | Total Semester Credits :15 |                                     |                |          |    |  |  |



### **Second Year**

|      | Level 3                    |                              |                 |    |    |  |  |
|------|----------------------------|------------------------------|-----------------|----|----|--|--|
| Code | No.                        | Course Title                 | Credits / Hours | PR | CR |  |  |
| ISL  |                            | Elective Islamic Culture (1) | 2 (2,0,0)       |    |    |  |  |
| CS   | 110                        | Programming 1                | 4 (3,2,0)       |    |    |  |  |
| MATH | 112                        | Calculus1                    | 3 (3,0,1)       |    |    |  |  |
| MATH | 111                        | Discrete Mathematics         | 3 (3,0,1)       |    |    |  |  |
| PHY  | 104                        | Physics 1                    | 3 (2,2,1)       |    |    |  |  |
| ENG  | 114                        | Technical English 1          | 2 (2,0,0)       |    |    |  |  |
|      | Total Semester Credits :17 |                              |                 |    |    |  |  |

|      | Level 4                    |                                     |                 |          |    |  |  |
|------|----------------------------|-------------------------------------|-----------------|----------|----|--|--|
| Code | No.                        | Course Title                        | Credits / Hours | PR       | CR |  |  |
| ARB  |                            | Elective Arab Course                | 2 (2,0,0)       |          |    |  |  |
| CS   | 120                        | Programming 2                       | 4 (3,2,0)       | CS 110   |    |  |  |
| IT   | 200                        | Information Technology Fundamentals | 3 (3,0,1)       |          |    |  |  |
| MATH | 122                        | Calculus 2                          | 3 (3,0,1)       | MATH 112 |    |  |  |
| ENG  | 124                        | Technical English 2                 | 2 (2,0,0)       | ENG 114  |    |  |  |
| STAT | 102                        | Probability and Statistics          | 3 (3,0,1)       |          |    |  |  |
|      | Total Semester Credits :17 |                                     |                 |          |    |  |  |



## Third Year

|                            | Level 5 |                                |                 |         |    |  |  |
|----------------------------|---------|--------------------------------|-----------------|---------|----|--|--|
| Code                       | No.     | Course Title                   | Credits / Hours | PR      | CR |  |  |
| ISL                        |         | Elective Islamic Culture (2)   | 2 (2,0,0)       |         |    |  |  |
| CS                         | 210     | Data Structure                 | 3 (3,0,1)       | CS 120  |    |  |  |
| IT                         | 481     | Professional Practice & Ethics | 2 (2,0,0)       |         |    |  |  |
| MATH                       | 107     | Linear Algebra                 | 3 (3,0,1)       | MATH122 |    |  |  |
| IT                         | 210     | Visual Programming             | 3 (3,0,1)       | CS 120  |    |  |  |
|                            |         | Elective Professional Course 1 | 2               | CS 120  |    |  |  |
| Total Semester Credits :15 |         |                                |                 |         |    |  |  |

|      | Level 6 |                           |                 |          |        |  |
|------|---------|---------------------------|-----------------|----------|--------|--|
| Code | No.     | Course Title              | Credits / Hours | PR       | CR     |  |
| IT   | 301     | Information Management    | 3 (3,0,0)       |          |        |  |
| CS   | 240     | Operating Systems         | 3 (3,0,1)       | CS 210   |        |  |
| CS   | 312     | Computer organization     | 3 (3,0,1)       | MATH 111 |        |  |
| IS   | 231     | Fundamental of Database   | 3 (3,0,1)       | CS 120   | CS 210 |  |
| CS   | 360     | Software Engineering      | 3 (3,0,1)       | CS 210   |        |  |
|      |         | Elective General Course 1 | 2 (2,0,0)       |          |        |  |
|      |         | Total Semester Cre        | edits:17        |          |        |  |



#### **Fourth Year**

|      |                            | Level 7                               |               |                 |    |  |
|------|----------------------------|---------------------------------------|---------------|-----------------|----|--|
| Code | No.                        | Course Title                          | Credits/Hours | PR              | CR |  |
|      |                            | Elective General Course 2             | 2 (2,0,0)     |                 |    |  |
| IT   | 321                        | Multimedia & Web Design               | 3 (2,2,0)     | IS 231          |    |  |
| IT   | 331                        | Human Computer Interactions           | 3 (3,0,1)     | CS210<br>IT 210 |    |  |
| IT   | 332                        | Systems Integration                   | 3 (3,0,1)     | CS 360          |    |  |
| IT   | 341                        | Data Transmission & Computer Networks | 3 (3,0,1)     | CS 240          |    |  |
| IT   | 311                        | Database Lab                          | 2 (0,4,0)     | IS 231          |    |  |
|      | Total Semester Credits :16 |                                       |               |                 |    |  |

|      | Level 8                    |  |                 |           |    |  |  |
|------|----------------------------|--|-----------------|-----------|----|--|--|
| Code | No.                        | Course Title                           | Credits / Hours | PR        | CR |  |  |
| IS   | 410                        | Systems Analysis & Design              | 3 (3,0,1)       | CS 210    |    |  |  |
| IS   | 334                        | Project Management                     | 3 (3,0,1)       |           |    |  |  |
| IT   | 432                        | Systems Administration and Maintenance | 3 (3,0,1)       | CS 360    |    |  |  |
| IT   | 342                        | Computer Networks Lab                  | 2 (0,4,0)       | IT 341    |    |  |  |
| IS   | 445                        | Information Security                   | 3 (3,0,1)       | IT 341    |    |  |  |
| IT   | 399                        | Seminar                                | 1 (1,0,0)       | 100 Units |    |  |  |
|      | Total Semester Credits :15 |  |                 |           |    |  |  |



#### Fifth Year

|      | Level 9                    |                                |                 |           |    |  |
|------|----------------------------|--------------------------------|-----------------|-----------|----|--|
| Code | No.                        | Course Title                   | Credits / Hours | PR        | CR |  |
| IT   |                            | Track Course                   | 3               |           |    |  |
| IT   | 498                        | Graduation Project 1           | 2 (2,0,0)       | 120 Units |    |  |
| IT   | 400                        | Summer Training                | 1 (1,0,0)       | 120 Units |    |  |
| IT   | 333                        | Intelligent Systems            | 3(3,0,1)        | CS 210    |    |  |
| IT   |                            | Track Course                   | 3               |           |    |  |
|      |                            | Elective Professional Course 2 | 2               | 100 Units |    |  |
|      | Total Semester Credits :14 |                                |                 |           |    |  |

|      | Level 10                   |                                |                 |           |    |  |
|------|----------------------------|--------------------------------|-----------------|-----------|----|--|
| Code | No.                        | Course Title                   | Credits / Hours | PR        | CR |  |
| ISL  |                            | Elective Islamic Culture (3)   | 2 (2,0,0)       |           |    |  |
| IT   |                            | Track Course                   | 3               |           |    |  |
| IT   |                            | Track Course                   | 3               |           |    |  |
| IT   | 499                        | Graduation Project 2           | 3(3,0,0)        | IT 498    |    |  |
|      |                            | Elective Professional Course 3 | 2               | 100 Units |    |  |
|      | Total Semester Credits :13 |                                |                 |           |    |  |



| TRACK (  | TRACK COURSES FOR "NETWORKS AND SYSTEMS ADMINISTRATION": STUDENTS CHOOSE 4 COURSES |              |                 |  |  |  |
|----------|--|--------------|-----------------|--|--|--|
| Code/ No | Course Tile  | Credit Hours | PR              |  |  |  |
| IT 421   | Information Administration and Storage Technology                                  | 3 (3,0,1)    | IS 231          |  |  |  |
| IT 422   | Infrastructure Environment and Network Servers                                     | 3 (3,0,1)    | IT 341          |  |  |  |
| IT 423   | Database Management Systems  | 3 (3,0,1)    | IS 231          |  |  |  |
| IT 424   | Global Information Management  | 3 (3,0,1)    | IS 334          |  |  |  |
| IT 425   | Enterprise Architecture and Systems Design   | 3 (3,0,1)    | CS 360          |  |  |  |
| IT 426   | Mobile & Wireless Networks   | 3 (3,0,1)    | IT 341          |  |  |  |
| IT 427   | Concepts of Multimedia Processing & Transmission                                   | 3 (3,0,1)    | IT 321 & IT 341 |  |  |  |
| IT 428   | Selected Topics in Networks  | 3 (3,0,1)    | >100            |  |  |  |
| IT 429   | Selected Topics in System Administration   | 3 (3,0,1)    | >100            |  |  |  |

| TRAC     | TRACK COURSES FOR "WEB AND MULTIMEDIA DEVELOPMENT": STUDENTS CHOOSE 4 COURSES |              |                 |  |  |  |
|----------|---|--------------|-----------------|--|--|--|
| Code/ No | Course Tile   | Credit Hours | PR              |  |  |  |
| IT 423   | Database Management Systems   | 3 (3,0,1)    | IS 231          |  |  |  |
| IT 451   | Web Site Management   | 3 (3,0,1)    | IS 334 & IT 341 |  |  |  |
| IT 452   | Web Development Using Content Management Systems                              | 3 (3,0,1)    | IT 321          |  |  |  |
| IT 453   | Digital Technology Applications   | 3 (3,0,1)    | IT 321 & IT 341 |  |  |  |
| IT 454   | Information Visualization   | 3 (3,0,1)    | IT 201 & IT 331 |  |  |  |
| IT 455   | Advanced Web Applications Development   | 3 (3,0,1)    | IT 321          |  |  |  |
| IT 456   | Mobile Applications   | 3 (3,0,1)    | IT 321          |  |  |  |
| IT 457   | Cloud Computing   | 3 (3,0,1)    | IT 341 & IS 231 |  |  |  |
| IT 446   | Selected Topics in Web Technologies   | 3 (3,0,1)    | >100            |  |  |  |
| IT 447   | Selected Topics in Multimedia   | 3 (3,0,1)    | >100            |  |  |  |

| TRACK COURSES FOR " INFORMATION SECURITY ": STUDENTS CHOOSE 4 COURSES |  |              |                          |
|---|--|--------------|--------------------------|
| Code/ No  | Course Tile  | Credit Hours | PR                       |
| IT 461  | Fundamentals of Cryptography                         | 3 (3,0,1)    | MATH 122                 |
| IT 462  | IT Security: Attack & Defense                        | 3 (3,0,1)    | IT 341                   |
| IT 463  | Legal Issues in Information Security Management      | 3 (3,0,1)    | IT 444 ENG 114           |
| IT 464  | Information Security Management                      | 3 (3,0,1)    | IT 301 & IS 445 & IS 334 |
| IT 465  | Risk Analyst Capstone                                | 3 (3,0,1)    | IS 241 & IS 334 & IS 445 |
| IT 466  | Information Security Forensics and Incident Response | 3 (3,0,1)    | IS 334 & IT 461 & IT 462 |
| IT 467  | Secure System Accreditation and Certification        | 3 (3,0,1)    | IS 444                   |
| IT 468  | Selected Topics in Secure Systems Administrator      | 3 (3,0,1)    | CS 210 & IS 334          |
| IT 469  | Selected Topics in Network Security                  | 3 (3,0,1)    | IT 341                   |