

### Values

- Fairness: Dealing fairly with all and respecting individual's value, dignity and legitimate freedom.
- Transparency: Dealing clearly in all University procedures with students, academic and administrative staff.
- Integrity: Full compliance with professional morals and ethics.
- Belongingness: Having a sense of responsibility toward the University, local community and nation.
- Co-operation: Group work among all University staff and students in all University procedures.
- Innovation: Accommodating innovative ideas and solutions in teaching and learning as well as academic research fields in Software Engineering.
- Professionalism: The ability to demonstrate knowledge, skills and capability in the field of Software Engineering.

### Why Software Engineering?

Graduates of this program will work in the engineering of software with special attention devoted to large and critical systems. Recent surveys and data from the Bureau of Labor Statistics indicate that the need for trained software engineers will increase significantly during the next decade.

### About us:

The Department of Software Engineering at Philadelphia University was established in the year 2000 as the first department to award a bachelor's degree in software engineering in Jordan. The establishment of the department is based on scientific studies that indicated the urgent need for specialists in this field to meet the needs of the growing labor market.

Our department keeps itself abreast with recent IT trends and developments through its continuous Academic-Industry Interactions. Also, its curriculum is updated in accordance to the needs of the changing labor market.

### What is Software Engineering

Software Engineering is the application of engineering principles to the development, operation, and maintenance of high-quality software systems.



### Vision of Software Engineering Department

To be one of the most highly recognized department well-known educational conglomerates in Jordan in the spheres of teaching and learning, research, and community services according to international standards.

### Mission of Software Engineering Department

The Software Engineering department strives to:

- Prepare graduates in the field of Software Engineering who are well-equipped with knowledge, skills and values and who are highly motivated to lifelong learning and capable of fulfilling contemporary requirements.
- Foster academic research and graduate studies and support innovation plans in the field of Software Engineering.
- Establish a productive partnership with local community.

## Philadelphia University Faculty of Information Technology Software Engineering Department Undergraduate Program



### **Research Project Module**

The ultimate goal of undertaking a research project is to demonstrate that the student is capable of independent work and/or team work. It also provides mechanism to consolidate relevant material taught in the undergraduate program and allows its application to the solution or analysis of a particular problem.

The Software Engineering Department strives for directing the research projects to serve our local community by automating the work and activities of various community institutions such as hospitals, schools, and others.

### **Assessment**

Assessment is done through different ways and is declared at the beginning of the semester through the distribution of a well-formulated syllabus that has common format for all modules. Arrangements for the assessment of each module are set out in detail in the rules for progression between years. Assessment may take several forms: traditional written examinations, coursework, tests and oral presentations, as appropriate.

In most modules, students are asked to submit a practical coursework. The skills associated with working in teams are learned and assessed in group projects.



### **How to Apply?**

Prospective students are advised to consult the edition of the undergraduate handbook. They can also contact the head of the department who will advise and give further details about the program. Students are also advised to consult our department website and send e-mails or any inquiries to the head of the department.

### **Scientific Research**

The department considers scientific research as the main pillar of academic activities as it has a great role in improving the academic level of staff members and serving the local community.

### **Undergraduate Degree Program**

The student who wants to enroll in the software engineering program is subject to the laws and regulations approved by the higher education and private universities. The student who receives a minimum of 60% is accepted from all high school branches except literary stream.

### **Teaching**

The Department turns out highly qualified graduates with sound understanding of Software Engineering. The state-of-the-art teaching framework we have including the internationally distinguished staff, the most modern curriculum, labs and the ever evolving and dynamic environment all contributes to an outstanding teaching outcome for our software engineering program.

Various topics, including practical assignments throughout the semester are being taught, which contribute significantly to supporting innovation and improving performance by studying and developing business work.



### **Program Outcomes**

The program enables students to:

1. Apply formal methods and techniques of software engineering in the development of software components and systems.
2. Efficiently utilise software tools such as tools for requirements analysis, modelling, testing and project management.
3. Identify the needs of the society for IT in business and industry and to explore the opportunities and resources necessary for implementation.
4. Prepare effective software systems for enterprises and businesses in order to use the most efficient economic resources available.
5. Working in projects in different disciplines and acquire communication skills in a professional manner.

### **Staff and Students**

There are eight full-time members of academic staff in the department in addition to the administrative and technical support staff.

Teaching is the first concern of faculty members. Also our staff members have the solid foundations of supporting students during study and in the job market after graduation. All faculty members have degrees from prestigious regional and international universities.

### **Practical Training**

The software engineering department gives special attention to practical training. In addition to studying theoretical modules using text books, we provide our students with the experience of typical technical issues in a software projects. Precisely, after obtaining the basic skills and concepts required for software engineering and its related fields our students are directed to the specialised labor market for the purpose of training to benefit from the practical experience available in this market.

The Department has established extensive partnerships and relations with the labour market, where our students are advised to make the most of their practical training period through part-time work in such institutions. The training course also qualifies the student to choose the research project in the last year in accordance with the requirements of the labour market.