

Information Systems

Vision

The Program of Information Systems strives to become a reputable and leading Information System program for developing world-class professionals with excellent skills in both business and Information System and Technology to innovatively solve business problems.

Mission

The Program of Information Systems exists to prepare globally competitive Information System graduates through innovative and growth-oriented curriculum by meeting the stake-holder expectations, providing academic and service excellence, promoting high quality research, building strong corporate connections, and gaining international recognitions and accreditation. They will be equipped with the necessary leadership, entrepreneurial, technological, problem-solving skills, and analytical knowledge through the high quality education and research in the area of Information Systems provided in the program.

Program Description

The Information Systems Program is a unique combination of **computing** domain and the **business** sector that is developed to equip the students with competencies of managing IS (Information System), computing technology, database, business process, project management and IS auditing. Its graduates will play an important role of delivering technology solution to the market place by systematically recognizing and translating the business needs into technical IT (Information Technology) requirements.

The ability of being the **link** between technology and the people / customer is of rare expertise in IT industry nowadays. Combined with focus on international quality higher education system, embedded **entrepreneurship** and **innovation** subjects, the program opens to its graduate endless opportunities from being a world class Information System professional into a well equipped business start-up entrepreneur.

The double degree program offered in partnership with Queensland University of Technology (QUT), Auckland University of Technology (AUT) and Cologne Business School would enhance students' ability to compete in an international marketplace. Single degree programs are also available, with options of IS General, Project Management and IS Audit and Assurance. In addition to the single and double degree program, the IS Program also provides master track program. The program aims to prepare students for either immediate entry into the global marketplace or for more advanced study in either business or technology.

The objectives of the Information System Program are :

1. To provide student with openness and awareness of diversity across cultures and and to prepare them for entering the international market in the Information System industry
2. To equip students with strong analytical, critical, and creative thinking skills in developing innovative solutions and show passion for continuous improvement of Information System domain.
3. To equip students with the knowledge of Information System & Technology, Business and Enterprise System, and their contribution to meet management needs for information and decision support.

4. To complement students with leadership, social and ethical professional skills in order to compete globally.
5. To equip student with necessary entrepreneurial skill related to the Information System market.
6. To prepare students with an effective English communication skills to express idea clearly and successfully.
7. To provide students with solid knowledge and skills on information system and technology to succeed in various industries

Award/Degree

- Sarjana Komputer (S.Kom) from BINUS University
- Dual Degree with Bachelor of Information Technology (B.I.T.) from Queensland University of Technology at Queensland, Australia
- Dual Degree with Bachelor of Computer and Information Sciences (BCIS) from Auckland University of Technology at Auckland, New Zealand
- Dual Degree with a Bachelor of Art (B.A.) from Cologne Business School at Cologne, Germany
- Dual Degree with a Bachelor of Commerce (B.Com) from Curtin University of Technology, Australia.
- Dual Degree with a Master of Commerce in Information System and Technology (M.Com) from Macquarie University, Australia.

Graduate Competencies

Upon successful completion of this 4-year program, students are expected to be able to:

1. Apply knowledge of computing, management, and mathematics appropriate to the discipline.
2. Identify and analyze user requirements and business process in the selection, creation and evaluation of information systems.
3. Apply the processes that support the delivery and management of information systems within a specific application environment.
4. Effectively integrate IT solutions aligned with organizational goals.
5. Explain and apply best practices and standards in order to produce good quality of information.
6. Communicate effectively with a range of audience.
7. Understand professional, ethical, legal, security and social issues and responsibilities.
8. Analyze the local and global impact of computing on individuals, organizations and society.
9. Analyze the needs and engagement for continuous improvement, including professional development.
10. Design and implement innovative problem solution to adapt to dynamic IT environment and growth.

Study Completion Requirements

Major in Information System

To complete a major in Business Information Systems program with either a single or double degree(s) at Binus University International, students must complete a minimum of 146 SCUs of academic credit. These 146 SCUs are comprised of:

- 111 SCU of IS Mandatory Courses, required for all students taking a major in IS, which meet either BINUS UNIVERSITY INTERNATIONAL requirements or mandated by the Indonesian Ministry of Education.
- Single degree programs also require the 8 unit of full semester Internship, and 6 unit Thesis in the final year, thus totaling 125 Mandatory units.

- Additional courses that are determined by the Program of Information Systems which vary based on the specific streaming selected.
- Elective courses chosen by the students .

IS Double Degree Program

The Double Degree programs are offered in partnership with Queensland University of Technology (Brisbane, Australia), Curtin University (Perth, Australia), Auckland University of Technology (Auckland, New Zealand), and Cologne Business School (Cologne, Germany). In addition to the Sarjana Komputer (S.Kom) degree from BINUS University, students who complete this program will be awarded with a Bachelor of Information Technology (B.I.T) degree from QUT, Bachelor of Computer and Information Sciences (BCIS) from AUT, Bachelor of Commerce (B.Com) from Curtin, and Bachelor of Arts (B.A.) degree from Cologne Business School. The first three years of study follow a prescribed set of courses agreed between BINUS and AUT/QUT/Curtin/Cologne. The final year of study is undertaken at the partner overseas campus.

IS Single Degree Program

There are three streaming available in this program. The three streams are IS **General**, **Project Management**, and Information Systems **Audit and Assurance**.

IS General Stream (Single Degree)

The IS General option is aimed to provide graduates with a broad ground in both business and technology subjects. In addition to the core of business and technology related courses. Please refer to course descriptions to check any prerequisites for electives.

Project Management Stream (Single Degree)

The Project Management stream includes more advanced courses in project management related topics. In addition to the core of business and technology related courses, 15 units are determined by the Program. Please refer to course descriptions to check any prerequisites for electives.

IS Audit and Assurance Stream (Single Degree)

The IS Audit and Assurance stream provides students to focus more on information systems governance. In addition to the core of business and technology related courses, three mandatory subjects comprise of 9 units are chosen by the IS Program in addition to 4 SCU elective course(s). Please refer to course descriptions to check any prerequisites for electives.

Master Track Program

The Master Track program is designed to allow students to complete their Sarjana Komputer (S.Kom) degree at Binus University International in 7 (seven) semesters, and then continue with a graduate program for 2 (two) semesters at Macquarie University to obtain Master Degree.

Teaching, Learning, and Assessment Strategy

The teaching and learning processes are conducted through lectures, tutorials, practical demonstrations and activities, small projects, with students' independent study required. It is the responsibility of the lecturer of a particular course to facilitate all students' learning on the course, who can be assisted by a tutor, if necessary. By having qualified lecturers and guest lecturers from professional industries, the students will be able to gain knowledge from both sides, i.e. theoretical and practical frameworks, through in-depth analysis of case studies, laboratories, and individual/group work projects. In addition, an innovation habit will be developed through course assessment that put weight on content comprehension and innovation.

Learning will be an exciting experience for students as they are provided with excellent facilities such as Internet access, computer laboratories and library resources. Specialized laboratories or access to specialized simulation software is needed for advanced students where group and individual projects are developed. Contemporary and emerging software development tools will be available to create the most current enterprise solutions. A good quality library is provided for the students to access books, journals and magazines for information and research activity.

All coursework are assessed through a variety of assessment tasks such as reports, presentations, assignments, individual and group projects, and thesis/final project report as well as mid-semester and final semester examinations. The feedback of the given assessment tasks is given in the class/tutorial, embedded in the scoring rubric/assessment criteria sheet and/or separate feedback forms. Students will also be provided to work together on team-oriented projects. The group skills developed in this mode are critical to a successful information systems professional. The complexity of course content in design problem-solving methods is introduced at different levels of study. A final project work and the written report must be submitted in Year 4 (semester 8).

Employability and Career Support

A wide range of career opportunities in information systems industry is introduced to students during their study. The integrated curriculum is designed and developed to support students in building on their technical and non-technical skills as well as engaging with the industry. IS graduates may enter the marketplace through many career paths, including, but not limited to:

- Corporate Information Systems Designer
- Database Administrator (DBA)
- E-Business Entrepreneur
- Enterprise System Administrator
- Enterprise Resource Planning (ERP) Consultant
- Information Technology based Entrepreneur
- IS Project Manager
- IT/IS Consultant
- IS Auditor
- Programmer Analyst
- System Tester and Integrator

This program provides an internship program for single degree students wherein they may conduct real projects as a practical study within industrial contexts. The program develops the student's ability to be involved in professional practices, and ethical and organizational responsibilities. Furthermore, the industrial internship program provides students with real experience in the workplace and leverages their ability to cope with the international working environment. In addition, series of study/field trips to visiting professionals and industries will be conducted to give good grounds for having a broad overview of the industry. These experiences support individual career aspiration and may provide social and professional networks.

BINUS UNIVERSITY INTERNATIONAL also provides career support for students by disseminating information on the latest job vacancies, internships, and workshops. This support service can be accessed from www.binuscareer.com.

Program Structure

IS Mandatory Courses (include elective)

Course Code	Course Name	SCU
COMP6178	Introduction to Programming	4
ENGL6171	Academic English I	3
CHAR6013	Character Building: Pancasila	2
CHAR6012	Freshmen Enrichment Program	0
ISYS6259	Introduction to IT 100	2
BUSS6030	Introduction to Business (Management & Leadership)	2
ISYS6263	Systems Thinking	2
ENTR6038	Project Hatchery	2
MATH6089	Linear Algebra for Economy and Business	3
COMP6125	Programming Principles	4
ENGL6172	Academic English II	3
CHAR6014	Character Building: Kewarganegaraan	2
ISYS6093	Information Systems Concepts	4
ISYS6123	Introduction to Database Systems	4
ACCT6133	Introduction to Financial Accounting	4
STAT6081	Statistics	2
ISYS6245	Business Computing Infrastructure and Communication	4
COMP6207	Data Structures and Algorithm Analysis	4
CHAR6015	Character Building: Agama	2
ISYS6198	Data and Information Management	4
ISYS6188	Information Systems Analysis and Design (2/2)	4
ENTR6036	Entrepreneurship 1	4
ECON6034	Economic Theory	4
ISYS6209	User Experience	4
ISYS6197	Business Application Development (2/2)	4
ISYS6163	Advanced Information System Analysis and Design (4/2)	6
MKTG8005	Marketing Management	4
LAWS6075	Legal Aspect in Economics	2

ISYS6191	Advanced in Business Application Development (2/4)	6
ISYS6250	E-Business Concepts and Issues	4
ISYS6127	Testing and System Implementation	4
ISYS6101	Information Systems Project Management	4
COMM8006	Business Communication	2
ISYS6247	Corporate IS Management	4
ISYS6186	Business Process Fundamental	4
ISYS6126	Enterprise System	4
STAT6021	Research Methodology	2
ENTR6037	Entrepreneurship 2	6
ISYS6257	INTERNSHIP	8
	Elective (3 Scu)	3
ISYS6268	Thesis	6
		146

IS Elective courses list

CODE	SUBJECT	SCU
ISYS6250	E-Business Concepts and Issues	4
ISYS6247	Corporate IS Management	4
ISYS6251	Enterprise Resource Planning	3
ISYS6260	IT Governance	3
ISYS6271	IT Service Delivery	3
ISYS6272	IS Audit Workshop	2
ISYS6249	Data Mining & Business Intelligence	3

In addition to the above list, students are allowed to choose courses from other majors and declare these courses as their electives. Please refer to each course description to check any pre-requisites for these courses.

Additional Courses for Double Degree (Computer and Information Sciences – AUT) ***

CODE	SUBJECT	SCU
CPEN6098	Computer Network	4
COMP6213	Object Oriented Programming	4
MATH6025	Discrete Mathematics	4
COMM8006	Business Communication	2
	Courses at Auckland University of Technology, New Zealand	24

*** exempt from GS207 mandatory course

Additional Courses for Double Degree (Information Systems & International Business – Cologne)

CODE	SUBJECT	SCU
ACCT6065	Cost Accounting	4
FINC7047	Corporate Financial Management	4
FINC6001	Financial Management	4
MGMT6012	Human Resources Management	4
	Courses at Cologne Business University, Germany	24

Additional Courses for Double Degree (Information Technology – QUT)

CODE	SUBJECT	SCU
LAWS6075	Legal Aspect in Economy	2
ISYS6250	E-Business Concepts and Issues	4
ISYS6247	Corporate IS Management	4
ISYS6273	Client Relationship Management	3
(QUT)	Courses at Queensland University of Technology, Australia	24

Additional Courses for IS General Streaming

Course Code	Course Name	SCU
ISYS6250	E-Business Concepts and Issues	4
ISYS6247	Corporate IS Management	4
	Elective courses	3

Additional Mandatory Courses for Project Management Streaming

CODE	SUBJECT	SCU
ISYS6273	Client Relationship Management	3
ISYS6253	Human Factors in Information Systems	3
ISYS6251	Enterprise Resource Planning	3
ISYS6274	IT Security & Risk Management	3
ISYS6249	Data Mining & Business Intelligence	3

Additional Courses for IS Audit and Assurance Streaming

Course Code	Course Name	SCU
ISYS6260	IT Governance	3
ISYS6275	IS Audit and Information Assets Protection	4
ISYS6276	Business Continuity Management	2
	Protection of Information Assets	4