



KINGDOM OF SAUDI ARABIA
IMAM MOHAMMAD IBN SAUD ISLAMIC UNIVERSITY
COLLEGE OF COMPUTER AND INFORMATION SCIENCES
INFORMATION SYSTEMS DEPARTMENT
BACHELOR IN INFORMATION SYSTEMS

المملكة العربية السعودية جامعة الإمام محمد بن سعود الإسلامية كلية علوم الحاسب والمعلومات قسم نظم المعلومات بكالوريوس نظم المعلومات

# **SYLLABUS**

# IS1250: Fintech: Foundation and Applications

CREDIT HOURS 3 credit hours

PREREQUISITE

Math 1014 (CalculusI)IS1200 – IS
Management
Competencies

**Instructor:** 

**Contact information and office hours** 

**Office No:** To be announced (TBA)

**Office Hours: TBA** 

E-mail: \_\_\_\_\_@imamu.edu.sa

## **COURSE DESCRIPTION**

The main goal is to introduce the essential building blocks of financial technologies and realworld applications through the use of case studies drawn from the relevant industry

| COURSE LEARNING OUTCOMES (CLOs) |  | Aligned<br>SOs |
|---------------------------------|--|----------------|
| 1                               | Knowledge and Understanding  |                |
| 1.1                             | Explain crypto-currency and blockchain in financial contexts                             | 1( <b>I</b> )  |
| 1.2                             | Identify the regulatory concerns presented by the most common financial technologies     | 1(P)           |
| 1.3                             | Understand both the infrastructure of decentralized finance and the leading applications | 1(P)           |
| 1.4                             |  |                |
| 1.5                             |  |                |
| 2                               | Skills:  |                |
| 2.1                             | Interpret the synthesis of FinTech components  | 1(P)           |





| 2.2 | Analyze which problems decentralized finance is designed to solve and | 2(A) |
|-----|---|------|
|     | how   |      |
| 2.3 | Apply the key components of decentralized finance's infrastructure    | 2(A) |
| 2.4 |   |      |
| 2.5 |   |      |
| 3   | Values:   |      |
| 3.1 |   |      |
| 3.2 |   |      |
| 3.3 |   |      |
| 3.4 |   |      |
| 3.5 |   |      |

# **TEACHING Strategies**

Lectures

Self-Learning

| N  | List of Topics   | Contact | Self-    |
|----|--|---------|----------|
| 0  |  | Hours   | Learning |
| 1  | The financial environment  | 3       |          |
| 2  | Money and the money systems  | 3       | 2        |
| 3  | FinTech: Foundations, Payments, and Regulations                      | 3       |          |
| 4  | Cryptocurrency and Blockchain: An Introduction to Digital Currencies | 3       |          |
| 5  | Lending, Crowdfunding, and Modern Investing                          | 3       |          |
| 6  | Decentralized Finance Infrastructure                                 | 6       |          |
| 7  | Decentralized Finance Primitives                                     | 3       | 2        |
| 8  | Decentralized Finance Deep Dive                                      | 9       |          |
| 9  | Decentralized Finance Opportunities and Risks                        | 3       | 2        |
| 10 |  |         |          |
| 11 |  |         |          |
| 12 |  |         |          |
|    | Total  | 36      | 6        |

## **TEXT BOOK**

FinTech Innovation: From Robo-Advisors to Goal Based Investing and Gamification by Paolo Sironi | Jul 19, 2016

DeFi and the Future of Finance 1st Edition

by Campbell R. Harvey (Author), Ashwin Ramachandran (Author), Joey Santoro (Author), Vitalik Buterin (Preface), Fred Ehrsam (Foreword)





FinTech For Dummies 1st Edition by Steven O'Hanlon (Author), Susanne Chishti (Author), Brendan Bradley (Author), James Jockle (Author), Dawn Patrick (Author)

## **REFERENCES**

Introduction to Finance: Markets, Investments, and Financial Management by Ronald W. Melicher and Edgar A. Norton | Oct 8, 2019

|    | Course Assessment Methods |          |                       |  |
|----|---------------------------|----------|-----------------------|--|
| No | Assessment Method         | Due Week | % of Total Assessment |  |
| 1  | Quiz                      | 4        | 10                    |  |
| 2  | Assignment                | 9        | 10                    |  |
| 3  | Midterm                   | 7        | 20                    |  |
| 4  | Project / Lab Exam        | 11       | 20                    |  |
| 5  | Final Exam                | 13       | 40                    |  |