



**RAJARATA UNIVERSITY OF SRI LANKA
FACULTY OF APPLIED SCIENCES**

B.Sc. (Four-year) Degree in Information and Communication Technology

B.Sc. (Four-year) Degree in Applied Sciences

Fourth Year - Semester I Examination – September/October 2019

ICT 4306 – E-Commerce

Time: THREE (03) hours

-
- **Answer ALL questions.**
 - **This is a closed book examination.**
 - **This paper includes THREE (03) pages.**
-

1.

- a) What are the differences between **E-Commerce** and **E-Business**? [5 marks]
- b) E-Payment solutions can be classified by the time of payment. What are the categories of the classification? Give examples for each category from Sri Lankan context. [6 marks]
- c) **With the adaptation of e-commerce features, banks could increase their customer base and transactions in order to increase the revenue of the bank.** Explain three (03) features of e-commerce which are currently being implemented in Sri Lankan banks. Give examples. [9 marks]

2.

- a) What are the similarities and differences between traditional commerce and e-commerce? Elaborate your answer with suitable examples. [6 marks]
- b) Explain how Virtual Reality and Augmented Reality concepts could be used with e-commerce applications in order to attract more customers. Give suitable example from any industry. [5 marks]
- c) Write short notes on following topics. [9 marks]
 - i. M-Commerce
 - ii. B2C business model
 - iii. E-Government

3.

- a) Explain the EDI based execution and settlement process of the trade cycle. (4 marks)
- b) To manage security risks, we can treat them in four ways. What are they? Briefly explain them. (4 marks)
- c) Explain the given business models and give examples from Sri Lankan context for each model. (9 marks)
 - i. Brick-and-mortar
 - ii. Brick-and-click
 - iii. Click-only

4.

A dairy product company in Sri Lanka is hiring you as an IT expert to propose an e-commerce solution to help in its supply chain starting from fresh milk sold by the farmers to dairy products and then to retail shops and customers.

- a) Explain how you can adapt “e” concepts in the supply chain process and mention the points in the process where they could be implemented. (4 marks)
- b) What practical challenges will the company experience when implementing this e-commerce solution? Discuss. (4 marks)
- c) Prepare a brief e-commerce project plan for the company. You should indicate all important planning steps in your answer. (10 marks)

5.

In China, users who have provided bank account information may use the WeChat app to pay bills, order goods and services, transfer money to other users, and pay in stores if the stores have WeChat payment option. Vetted third parties, known as "official accounts", offer these services by developing lightweight "apps within the app". Users can link their Chinese bank accounts, as well as Visa, MasterCard and JCB. The government has actively supported the development of the e-commerce market in China—for example in the 12th five-year plan (2011–2015).

WeChat Pay is a digital wallet service incorporated into WeChat, which allows users to perform mobile payments and send money between contacts. Although users receive immediate notification of the transaction, the WeChat Pay system is not an instant payment instrument, because the funds transfer between counterparts is not immediate. The settlement time depends on the payment method chosen by the customer.

Every WeChat user has their own WeChat Payment account. Users can acquire a balance by linking their WeChat account to their debit card, or by receiving money from other users. For non-Chinese users of WeChat Pay, an additional identity verification process of providing a

photo of a valid ID as well as oneself is required before certain functions of WeChat Pay become available. Users who link their credit card can only make payments to vendors, and cannot use this to top up WeChat balance. WeChat Pay can be used for digital payments, as well as payments from participating vendors. The feature ("virtual red envelopes") allows users to send money to contacts and groups as gifts. The red envelope feature significantly increased the adoption of WeChat Pay.

In 2016, WeChat started a service charge if users transferred cash from their WeChat wallet to their debit cards. On March 1, WeChat payment stopped collecting fees for the transfer function. Starting from the same day, fees will be charged for withdrawals. Each user had a 1,000 Yuan (about US\$150) free withdrawal limit. Further withdrawals of more than 1,000 Yuan were charged a 0.1 per cent fee with a minimum of 0.1 Yuan per withdrawal. Other payment functions including red envelopes and transfers were still free.

WeChat Pay's main competitor in China and the market leader in online payments is Alibaba Group's Alipay. The success prompted Alibaba to launch its own version of virtual red envelopes in its competing Laiwang service. Other competitors, Baidu Wallet and Sina Weibo, also launched similar features.

In 2017 Tencent reported that WeChat had overtaken Alibaba with 600 million active WeChat mobile payment users versus 450 million for Alibaba's Alipay. However Alibaba had a 54 per cent share of the Chinese mobile online payments market in 2017 compared to WeChat's 37 per cent share. In the 2018 Berkshire Hathaway annual shareholders meeting, it was identified WeChat as one of the few potential competitors to Visa, MasterCard and American Express.

- a) Refer the given passage about the WeChat Platform, and make a report by including following information.

The payment model(s), functionalities of the payment platform, security measures, ways the business get revenue, its competitors, SWOT.

(15 marks)

- b) How Sri Lanka could adopt such kind of payment solution? Give suggestions to be included in the solution.

(5 marks)

- c) What challenges will be experienced when implementing such solution? How you can overcome the challenges?

(5 marks)

- END -