

BCS THE CHARTERED INSTITUTE FOR IT

BCS HIGHER EDUCATION QUALIFICATIONS
BCS Level 5 Diploma in IT

PROFESSIONAL ISSUES IN INFORMATION SYSTEMS PRACTICE

Thursday 20th April 2023 - Afternoon

Answer any FOUR questions out of SIX. All questions carry equal marks.

Time: TWO hours

Answer any Section A questions you attempt in Answer Book A
Answer any Section B questions you attempt in Answer Book B

The marks given in brackets are indicative of the weight given to each part of the question.

Calculators are NOT allowed in this examination.

Section A
Answer Section A questions in Answer Book A

A1.

a) The Royal Charter states that part of BCS's purpose is to promote education. Discuss **TWO** ways that BCS achieves this purpose.

(10 marks)

b) 'Duty to the Profession' is one of the sections of the BCS Code of Conduct. Using **THREE** relevant examples, explain what this means and the impact this code might have on an individual computing practitioner.

(15 marks)

A2.

a) A limited liability company has a corporate legal identity, and its ownership is divided into a number of shares. Discuss the significance of this in the following situations.

i) The company makes a profit.

ii) The company makes a loss.

(10 marks)

b) Three people are working together as business partners writing software used in the film industry. The people are working in a partnership, as defined by the Partnership Act.

i) There is a problem with the software. A customer makes a claim for financial damages because of that problem. How would the issue of joint liability apply and how is this different compared with a limited liability company?

(10 marks)

ii) Describe a problem that occurs if a person wants to leave the partnership.

(5 marks)

A3.

- a) Using relevant examples, discuss what Management by Objectives (MBO) are and how they are used in organisations.

(10 marks)

- b) A company's Human Resources department is reviewing the design of jobs.

The company develops a software package that manages student information for universities. The software includes functions for recording student personal details, processing exam marks, managing student fees and student scholarships.

The company has grown over several years and it currently has 100 employees. There are several departments, including software development and testing, IT, customer support, marketing, sales, finance and human resources.

Discuss how the following techniques might be applied in the process of job design for this organisation:

- Job rotation.
- Job enlargement.
- Job enrichment.

(15 marks)

[Turn Over]

Section B
Answer Section B questions in Answer Book B

B4.

a) Explain what is meant by the following terms with at least **ONE** example of each term from IT industry:

- i) Fixed assets;
- ii) Current assets;
- iii) Current liability;
- iv) Depreciation.

(12 marks)

b) A company bought a file server for £25,000. The useful life of the server was expected to be 5 years. Due to upgrading plans for all the computer equipment, the company sold the file server for £12,500 after 3 years.

Calculate the depreciation amounts and explain the effect of this transaction on the company's accounts using the following two methods:

- i) Straight line method.
- ii) Declining balance method.

(6 marks)

(7 marks)

B5.

a) A UK resident wishes to find out the following information from their local Fire and Rescue Service:

- Details of the fire prevention policy.
- Details of how many businesses fail fire prevention checks.

Under UK Freedom of Information legislation how could this information be obtained?
(13 marks)

b) A company sells electrical and electronic products through its website and stores in UK cities. It collects information from customers as part of the orders and for sending out marketing emails. Customers can choose to create an online account and store credit card details for quicker purchases.

Discuss **FOUR** requirements placed upon this company by UK Data Protection legislation.

(12 marks)

B6.

a) Discuss how UK Equality legislation would apply to the design of a website.
(15 marks)

b) A UK company has developed a new application that translates text into different languages. There are versions for the web and mobile devices.

Discuss whether the company could use any of copyright, trademarks and patents to protect the intellectual property of this software.

(10 marks)

END OF EXAMINATION