

THIS PAPER IS NOT TO BE REMOVED FROM THE EXAMINATION HALLS
--

UNIVERSITY OF LONDON

CO3323 ZB

BSc Examination

**COMPUTING AND INFORMATION SYSTEMS, CREATIVE COMPUTING
and COMBINED DEGREE SCHEME**

Electronic Commerce

Date and Time: Tuesday 3 May 2016: 14:30 - 16.45

Duration: 2 hours 15 minutes

There are FIVE questions on this paper. Candidates should answer **THREE** questions. All questions carry equal marks, and full marks can be obtained for complete answers to a total of **THREE** questions. The marks for each part of a question are indicated at the end of the part in [.] brackets.

Only your first **THREE** answers, in the order that they appear in your answer book, will be marked.

There are 75 marks available on this paper.

No calculators should be used.

© University of London 2016

Question 1 Evolution of electronic commerce

- (a) Three key stages of the evolution of electronic commerce are innovation, consolidation and reinvention. Compare and contrast each stage, and provide ONE example to support your comparisons. Following this, describe Ubiquity, Global reach, Personalisation and Social technology as features of e-commerce technology. [15]
- (b) When creating an e-commerce site, it is important to take a methodological approach. Define the systems development life cycle, and describe the key steps involved in creating a site using this approach. Then compare and contrast the main differences between a single-tier and a multi-tier site architecture. [10]

Question 2 Scenario: Pop Art Culture

Pop Art Culture is a company that organises events across Europe and the US buying and selling Pop Art culture. This includes anything from original art pieces from leading artists in the 'Pop Art' genre, which originated in the 1960s in the US and the UK, to magazines and toys which have come to exemplify pop art sensibilities. Collectors of pop art memorabilia travel to these events to buy and sell their collections. These collectors also use eBay and other auction sites to buy and sell memorabilia, and have many friends online with whom they discuss their purchases.

As a company, Pop Art Culture has decided to set up an online memorabilia company. The idea is to provide a specialist website for pop art memorabilia collectors to buy and sell memorabilia and read informed reviews about memorabilia availability, value, etc.

Pop Art Culture also wish to create a range of their own products to sell at their events and online. This range will consist of: t-shirts, key-rings and jewellery, only available to attendees at events and online. This, it is hoped, will bring a degree of exclusivity to this range, something collectors of memorabilia often like.

For this question, you must use the information provided in the scenario above.

- (a) A key reason for creating a business online is the potential to have very low transaction costs when supplying products or services to customers. Describe FIVE advantages and transaction cost savings Pop Art Culture could make by creating an online shop, instead of a traditional shop on a High Street. [10]
- (b) Describe how, through creating a virtual community on the new website, Pop Art Culture could build long-term relationships with customers. Include in your answer a description of FIVE different ways in which they could use a virtual community to obtain valuable information about future products to sell. [15]

Question 3 Mobile application development

Describe FIVE unique features that must be taken into account when designing a mobile web presence. Following this, compare and contrast the key differences between building a mobile web application and a native mobile app.

[25]

Question 4 Scenario: Travellers' World

Created in 1977, Travellers' World is an internationally renowned quarterly magazine which provides detailed information to travellers and those working in the tourism industry around the world. During the magazine's long history, it has become the standard reference for many who work in the travel and tourism industry. It has sections on countries around the world, both how traditionally-travelled to countries are changing and how new markets are opening up. It contains essays by leading academics and its comments pages are seen as a major area for debate by those in the tourism industry. It is also known for its use of photography.

Travellers' World has recently seen a drop in sales which, after examination, it has attributed to its lack of an internet presence. Furthermore, it has a competitor in the same arena, Living Landscapes, which not only has an online version of its publication, but also a mobile application which allows people to record new trends in tourism on their mobile devices and share them with a virtual community.

If Travellers' World is to make the transition online, it feels that this must be achieved by not cannibalising its print business. It is important that the online version not only offers its readers something different in terms of content, but also has its own unique revenue streams.

You have been hired as an internet consultant to write a report including the following for Travellers' World:

- (a) Compare and contrast the benefits and drawbacks of Travellers' World employing a digital content subscription revenue model, an advertising-supported revenue model, or a fee-for-transaction revenue model when it builds its new online presence. [15]
- (b) On the new website Travellers' World wants to use banner advertising as a source of revenue. The relative cost effectiveness of banner advertising is constantly being evaluated by companies. Write a detailed description of the different forms of banner advertising currently being deployed. Include in your answer an explanation of the process of constructing banners including authoring tools, formats and levels of intrusiveness. [10]

Question 5 Scenario: PC-Globe: What went wrong?

PC-Globe (PCG) is a well-established supplier of technology to businesses and home users in the UK. Starting out from selling by mail order from his house, Jeff Jennings created a company with over 100 outlets across the UK by 2008. Then in 2009 PCG management decided to go digital. It decided to close the majority of its 100 outlets and to put all the company's focus and resources into creating an ecommerce platform that would allow it to sell its technology online to the world.

As part of this new initiative, PCG hired BrandsRUs, a branding agency, to create a new brand for the online business, and IBStem was hired to develop the new platform. IBStem also provided business consultants to PCG to help plan and execute a business strategy based upon the new platform. PCG enlisted the digital processing agency DigitNow to digitise all their product catalogues, and to take digital photos of their range of technology products.

In 2010 the new site was launched to the general public. Advertising and promotional campaigns were executed and PCG thought all was going well. During the first year, sales via the website were poorer than expected and this worried PCG's management. However, they were assured by IBStem that although there had been some technical problems, 2013 to 2014 would see record numbers of visitors to the site, conversions to sales and return customers.

The reality was very different to what was expected. Sales were still flat and worryingly, overall income was dropping. Furthermore, users visiting the site were not browsing for long on the site or buying technology from PCG in large enough numbers to cover costs.

PCG's management has hired you as an online user experience expert to explain what is going wrong. As a company they do not understand why users are not behaving the way they hoped or buying their technology products.

For this question, you must use the information provided in the scenario above.

- (a) Write a report for PCG explaining the THREE main approaches used to understand user experiences when interacting with websites. These are: behavioural segmentation, usage-based market segmentation, and the 5-stage model of customer loyalty. Compare and contrast each of these three approaches, highlighting the differences and providing an example of each.

[15]

- (b) Compare and contrast **search engine positioning** and **viral marketing** as online marketing strategies PCG could use to improve their sales and marketing effort online.

[10]

END of PAPER