

**OXFORD CAMBRIDGE AND RSA EXAMINATIONS**  
**LEVEL 1/2**  
**R001/01**

**CAMBRIDGE NATIONAL IN ICT**  
**Understanding Computer Systems**

**TUESDAY 10 JANUARY 2017: Morning**

**DURATION: 1 hour**  
**plus your additional time allowance**

**MODIFIED ENLARGED**

<b>Candidate forename</b>		<b>Candidate surname</b>	
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<b>Centre number</b>						<b>Candidate number</b>				
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**Candidates answer on the Question Paper.**

**OCR SUPPLIED MATERIALS:**

**Clean Copy of the Pre-release Case Study (R001/01 – Inserted)**

**OTHER MATERIALS REQUIRED:**

**None**

**READ INSTRUCTIONS OVERLEAF**



## **INSTRUCTIONS TO CANDIDATES**

**Write your name, centre number and candidate number in the boxes on the first page. Please write clearly and in capital letters.**

**Use black ink. HB pencil may be used for graphs and diagrams only.**

**Answer ALL the questions.**

**Read each question carefully. Make sure you know what you have to do before starting your answer.**

**Write your answer to each question in the space provided. Additional paper may be used if necessary but you must clearly show your candidate number, centre number and question number(s).**

## **INFORMATION FOR CANDIDATES**

**The number of marks is given in brackets [ ] at the end of each question or part question.**

**The total number of marks for this paper is 60.**

**Any blank pages are indicated.**

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**Answer ALL questions.**

## **SECTION A**

**The questions in this section are based on Scenario 1 in the case study and your background research.**

**1 The restaurant has a new menu every week.**

**(a) Identify ONE output device that can be used to create a hard copy of this menu.**

\_\_\_\_\_ **[1]**

**The menu includes images of the meals.**

**(b) Identify ONE input device that could be used to capture these images.**

\_\_\_\_\_ **[1]**

**(c) Explain the benefits of having colour images rather than black and white images in the menu.**

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**[4]**

**2 The restaurant's ordering system has tablet computers connected to its network. Customers can use these tablets to place their orders for meals.**

**(a) Identify the MOST suitable method by which the tablet could connect to the restaurant's network.**

\_\_\_\_\_ [1]

**(b) Explain ONE advantage to the restaurant of using this ordering system to take orders.**

\_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_ [2]

**(c) Explain ONE disadvantage of using this ordering system to place orders.**

\_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_ [2]

**(d) Orders are sent to an output device in the kitchen.**

- (i) Identify ONE output device that would be suitable for use in the kitchen to display orders.**

\_\_\_\_\_ **[1]**

- (ii) Explain ONE feature of this device that makes it suitable for this purpose.**

\_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_ **[2]**

- 3 The restaurant has an online form that customers can use to book tables.**

**When booking a table, the customer must provide a contact telephone number.**

- (a) Identify TWO input devices that could be used to enter a telephone number into an online form.**

**1** \_\_\_\_\_

**2** \_\_\_\_\_

**[2]**

- (b) The online form includes questions about the customer's name, the number of people in the party and the time at which they want to arrive.**

**Explain why the form includes these questions.**

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**[4]**



- (c) Another question that the restaurant could include on the form is to ask for the date of birth of the person making the booking.**

**Explain why this question is NOT suitable to include on the form.**

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**[2]**

- (d) (i) Identify ONE further question that would be appropriate to use on the form.**

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**[1]**

- (ii) Give ONE reason why this question is appropriate.**

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**[1]**

- Explain how the needs of the restaurant and the need for data security may have affected the decision to provide customers with an app to pay their bill. [8]**

[illegible]

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**SECTION B**

The questions in this section are based on Scenario 2 in the case study and your background research.

**5 The restaurant holds a themed party every month. The manager of the restaurant wants to create a flyer to promote this month’s party.**

**(a) Identify the MOST appropriate type of applications software that would be used to create this flyer.**

\_\_\_\_\_ **[1]**

**(b) Other than the ability to add images, identify THREE features of this software that can be used to create an effective flyer.**

**1** \_\_\_\_\_  
\_\_\_\_\_

**2** \_\_\_\_\_  
\_\_\_\_\_

**3** \_\_\_\_\_  
\_\_\_\_\_

**[3]**

**The restaurant would like to include graphics on the flyer and has been searching for suitable graphics that have a creative commons licence.**

**(c) Describe what is meant by a ‘creative commons licence’.**

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**[2]**

**(d) Explain TWO reasons why the restaurant may want to use graphics that have a creative commons licence.**

**1** 

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**2** 

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**[4]**

- 6 Bookings for the evening are stored in a database. The database includes validation rules.**

**A selection from the database is shown in FIG. 1.**

- (a) (i) A format check is one type of validation.**

**Identify ONE item of data on the form that could be validated by a format check.**

\_\_\_\_\_ **[1]**

- (ii) Describe how the format check identifies invalid data on the form and informs the user of the presence of invalid data.**

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\_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_ **[4]**

**FIG. 1**

<b>Booking_ reference</b>	<b>Name</b>	<b>Street</b>	<b>Postcode</b>	<b>Email_ address</b>	<b>Date_of_ booking</b>	<b>Time_ of_ booking</b>	<b>Number_ of_ people</b>
<b>17</b>	<b>George</b>	<b>Argyle St</b>	<b>AN7 6TY</b>	<b>george@ home mail.com</b>	<b>1/2/17</b>	<b>19:30</b>	<b>4</b>
<b>218</b>	<b>Sue</b>	<b>Fleet St</b>	<b>AN4 6HY</b>	<b>SUE@ Grumbl email. com</b>	<b>1/2/17</b>	<b>19:30</b>	<b>6</b>
<b>319</b>	<b>Jane</b>	<b>Ashgrove</b>	<b>AN2 4GT</b>	<b>Jane. Hughes @Forts. co.uk</b>	<b>1/2/17</b>	<b>20:00</b>	<b>3</b>

**(b) Describe ONE further type of validation that could be used on the form.**

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**[2]**



**7 Due to an unexpected staff absence at the start of the evening, the manager has to contact staff to ask if they are available to work the extra hours. She must choose from staff that she already employs.**

**(a) Compare the use of email and face-to-face communication as methods that could be used to ask staff if they are available.**

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[4]

**(b) Describe ONE other suitable communication method that the manager could use to ask staff if they are available to work the extra hours.**

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**[2]**

**8 Individual tickets for the evening will each have a barcode.**

**(a) Describe how a barcode reader reads the information included in a barcode on the ticket.**

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**[4]**

**(b) Identify ONE other item that could be included on the ticket to increase the chance of forged tickets being identified by door staff.**

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**[1]**

**END OF QUESTION PAPER**

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