

# **BTEC IN DIGITAL INFORMATION TECHNOLOGY**



# COMPONENT 1:

## Sample planning documents:

Gantt Chart

No	Task	Week 1	Week 2	Week 3	Week 4	Week 5	Week 6	Completed/Comments
1	Interview the stadium manager about what he wants							Was completed at the end of the week so assets went into week 2
2	Find assets <ul style="list-style-type: none"><li>images</li><li>icons</li></ul>							Did this on time without any problems
3	Design a mood board for the interface							This was completed
4	Design initial storyboards for my screens							This was completed
5	Discuss my design with the stadium manager			Review				Bit of a delay as he was away
6	Improve initial design							This was completed
7	Develop the interface							This took longer than I thought
8	Get users feedback				Review			This was completed
9	Make any other improvements							This was completed

Task dependencies

Task 1 is to Interview the stadium manager about what he wants, I must do this first before I can do any other task. I must then find the assets before designing the mood boards and then storyboards. I cant discuss my design with the stadium manager until task 2, 3 and 4 is done. Then I will improve my design and after that develop the interface.

Mood Board

My mood board shows blue and grey colours, as they are calming colours and good design colours that I think will suit all ages. I have also looked at different fonts



# COMPONENT 1:

## More sample planning documents:

### Task List

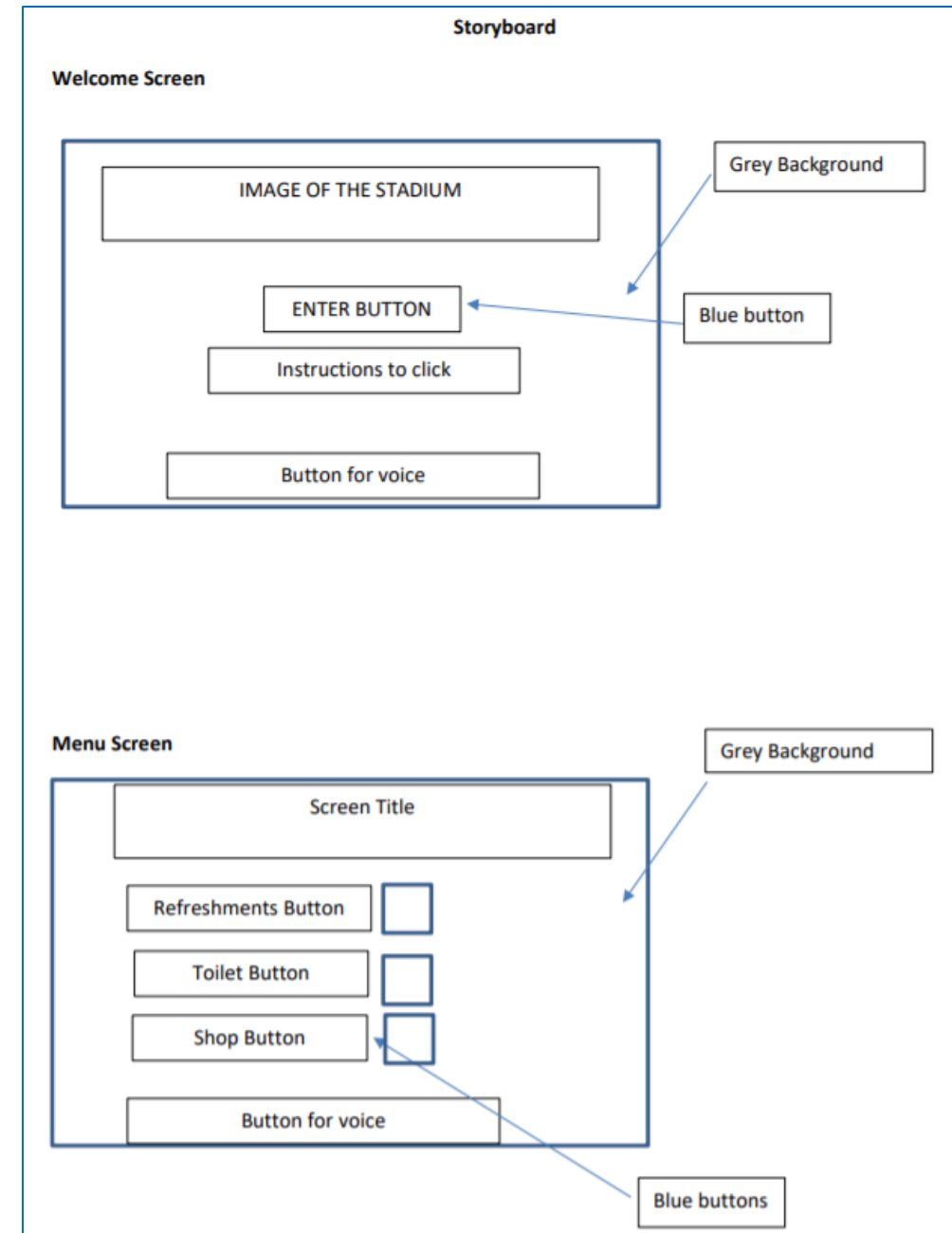
1. Interview the stadium manager
2. Find images and icons
3. Design initial storyboards
4. Discuss my design
5. Improve initial design
6. Develop the screens

### My plan

This is what I will need to do and by when

### Gantt Chart

Task	Week 1	Week 2	Week 3	Week 4	Week 5	Week 6
Interview the manager						
Assets						
Make the initial storyboards						
Discuss my design						
Make initial design better						
Develop the screens						



# COMPONENT 1:

## Sample user interface designs:

### Design Principles – Graphical User Interface

This is Apple mobile which is a handheld device and has a GUI interface as you can see this is the how the GUI looks like.



It is used for communication and playing games and watching videos.

All the icons are the same size and the name of the app underneath, they are all spaced out nicely, with white space between them, so they are not crammed together.

This is good for the user to see everything clearly.

The background colour is easy on the eyes, which makes the icons stand out for the user. The icons are all different colours and grouped together to make them stand out.

All of the text is clear and easy to read.

There is a battery life indicator and signal bars is a easy-to-use help feature and is always at the top, so you can see if the phone needs charging or whether there is a signal.

When the battery is green then it is ok but when it goes red then they don't have much time left to use the phone.

This is good for the user to know information about the phone and whether it needs charging or has a signal.

### Design Principles – Menus/Forms

I have been given a database user interface for my assignment. This is a Menus/Forms interface and its usually found on a computer.



The main use of this menu is to make driving lesson bookings

It must be easy to use for all users and use language that all skill levels can use. The menus are also clear to see.

There are also buttons to take you to other menus with more choices. It is easy to see what each button does, and the language is simple.

All the buttons are the same colour and it says on them what each one does.

There is a big red button to exit the system, this is good as it sets it apart from the rest of the buttons, so the user knows it does something different and catches their eye.



# COMPONENT 2:

## Sample data analysis:

Supermarket data used	Transport Company used
Customer Number Date Time Amount Spent Gender	Customer email Date of Survey Gender Travel Date Booking Process Rating Transport Type Transport Rating Recommend to Friend Price Paid

### Using the data for decision making

Supermarket	Transport Company
<ol style="list-style-type: none"><li>they can decide things for the company.</li><li>They can use the information to give the customers' offers.</li><li>They can make sure there is enough staff working at those times.</li></ol>	<ol style="list-style-type: none"><li>they can decide if they need to make their systems better.</li><li>If they need all of the transport options</li><li>If they need to make some of the transport options better</li></ol>

### Sectors that Use Data Modelling

Lots of different types of organisations use data modelling. Some of these are

- transport
- education
- retail
- banking

They collect it to make important decisions for the company, like, for transport, if bus routes are busy in the morning, they can put on more buses.

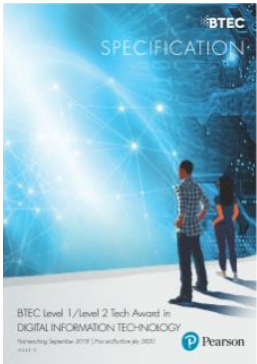
### Data collection methods

There are two types:

- Primary, collected by them
- Secondary, collected by people outside the company

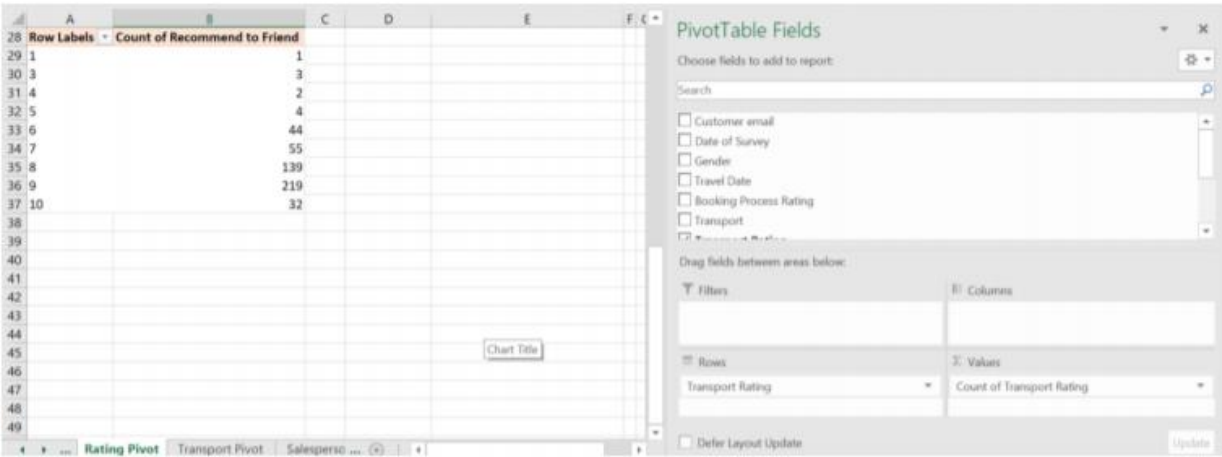
### Data Collection Features for the supermarket

- The data had customer number, the date, the time, how much the customer spent.
- It is a good way to collect a lot of good quality data because the data is collected from the customers
- The supermarket used primary data
- Data is collected from the customers
- By the checkout computer when they used a loyalty card
- 90% of its customers have a card

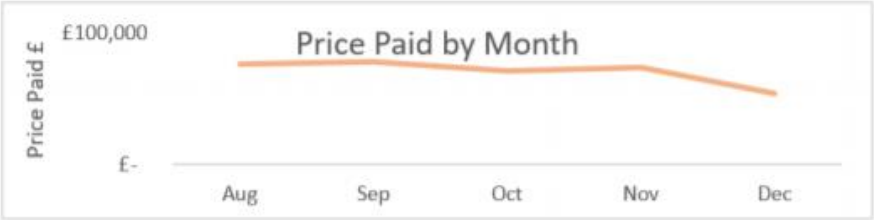


# COMPONENT 2:

## More sample data analysis:



I then created three bar charts in different colours to show the outcome. Using bar charts in the same format will help the user to compare as the three different information is presented in the same bar chart format. The use of different colours identified each rating clearly.



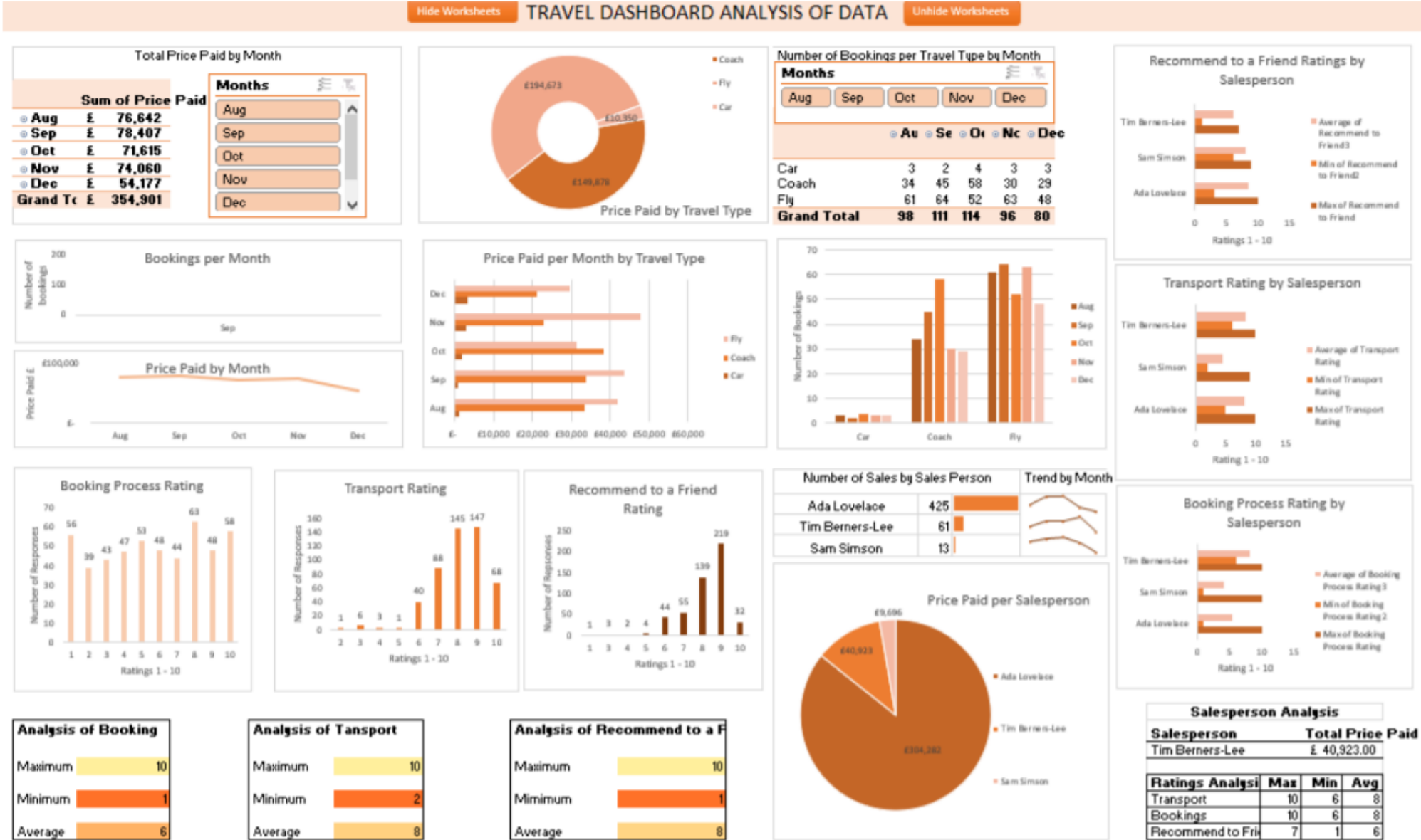
The pivot was also copied to the dashboard and a Slicer added for the months, giving the user buttons for each month to be able to filter the data





# COMPONENT 2:

## Sample Excel dashboard



# COMPONENT 3

## Sample exam questions:

Answer ALL questions. Write your answers in the spaces provided.

1 Clare is a designer for a games development company.

She works from home and in public places such as cafés, train stations and airports.

Clare uses her laptop to prepare designs.

(a) Give **two** ways Clare could connect her laptop to the internet when she is working away from home.

(2)

1 .....

2 .....

(b) Clare uses cloud storage for her designs.

One benefit to Clare of using cloud storage is that she can access her designs anywhere that has internet access.

State **two** other benefits to Clare of using cloud storage.

(2)

1 .....

2 .....

(c) Clare is concerned about malware. She knows a virus is a type of malware.

Give **two** other types of malware.

(2)

1 .....

2 .....





# COMPONENT 3

## More sample exam questions:

3 Piccalilli Shoes sells shoes through its nationwide shops and telephone orders.

(a) The company records transactional data from all sales.

Explain **one** way that Piccalilli Shoes could use this data

(2)

(b) Staff from different shops work together to produce reports about the company's sales.

Explain **two** collaboration tools that can be used to help staff work together on these reports.

(4)

1 .....

2 .....

Piccalilli Shoes has created a website to allow customers to buy online.

(c) One reason for the company to have a website is to increase sales.

Explain **two other** reasons why Piccalilli Shoes has a website.

(4)

1 .....

2 .....

BTEC  
ATION



# COMPONENT 3

## More sample exam questions:

(c) The travel agency has produced a form to allow customers to search for holidays.

Annotate the form to show **four** improvements that could be made to make it more user friendly and effective. An example has been provided.

(4)

Holiday Search Form

Region	<input type="text"/>
Departure Date	<input type="text"/>
Length of Stay	<input type="text"/>
Number of Guests	<input type="text"/>
Number of Rooms	<input type="text"/>

make each text box an appropriate size for the input data.

(d) **Figure 1** shows part of the process of purchasing shoes through the company's website:

- The customer order is submitted.
- The customer card payment details are checked with the credit card company.
- The payment is either approved or rejected.
- A confirmation of the order is sent to the customer with a delivery date or a notification that the card payment has not been accepted.

**Figure 1**

Draw a top level (Level 0) Data Flow Diagram showing the process Piccalilli Shoes uses for online orders.

(6)

