

## Suggested solution

### Section A

#### Question 1

To: The finance director of Banton

From: Performance management consultant

Date: 1 September 20X5

Subject: Non-financial performance measures, activity-based budgeting and reward schemes

#### Introduction

This report will recommend non-financial performance measures to address performance relating to customers and the environment. The report will then undertake the requested cost and margin calculations and assessment before evaluating the proposed new bonus scheme for sales staff and offering a justified recommendation regarding which reward scheme should be adopted.

#### (i)

Banton's current reliance on financial measures of performance, such as operating profit and ROCE, enables Banton to measure the results of its performance but not the important drivers of that performance.

The finance director (FD) has suggested introducing measures relating to; customers and the environment. It is important that Banton takes full recognition of the wants and needs of its customers as failure to satisfy those will ultimately lead to Banton failing in its marketplace. In addition, given the industry Banton operates in, environmental considerations will be important to the customers who are purchasing solar panels, and it is important that Banton can be clear on its environmental credentials.

#### Customer

For Banton being the first choice for consumers thinking about buying solar panels, Banton could measure brand perception of Banton within its target demographic group. This could be done by having a list of possible perceptions, such as 'reliable', and 'provides value for money' amongst others, and the respondent could choose which response they felt to be most appropriate. The measure could be a composite of the responses given: % of positive responses to the Banton brand.

The idea behind Banton being the first choice for consumers is that these consumers are not yet, and have not previously been, customers of Banton and Banton is therefore seeking to gain a perception of its reputation from those who have not used its product.

For this reason, it is probably inappropriate to simply ask – “would you choose Banton if you were purchasing solar panels?” as these potential customers would most likely not have undertaken much by way of research into buying solar panels. However, measuring the brand’s perception amongst this group may help Banton make a judgement as to whether it is likely to be the customers’ first choice or not. In straightforward terms, positive perceptions such as ‘reliable’ would mean that a customer is more likely to choose Banton as its supplier of solar panels.

The long-term functionality of solar panels could be measured by % of defective panels within an appropriate time period which, for example, could be ten years. This is an important area for Banton as customers would not expect to renew their purchase of solar panels. Banton would also have to try to ensure the defect rate is low as this would adversely affect its reputation and, as a result, its position in the marketplace. Additionally, identifying the reasons for defective products would be a very useful way for Banton to try to correct those defects in order to continuously improve its product offering.

## **Environmental**

Water usage can be measured by the volume of water which Banton uses across either a given period of time or in the production of a standard solar panel. The volume itself can be measured by a standard unit of measurement, such as number of litres used. It may be more helpful to measure usage per solar panel as this may enable Banton to manage water usage in the cooling of each panel, thus taking the management of the usage of water to the level of the individual panel.

However, using this metric would only measure the water usage for each panel which had been produced. There will inevitably be some water which is used which is not for the cooling process and it is also likely that some panels may be produced which are damaged and perhaps have to be scrapped. In both cases, the water usage here would not be measured.

It may also be challenging to measure the actual water used. Banton may have to install water metres to ensure there is an accurate reading of water usage at the point of usage. A cultural change may also be required when water usage is managed, as those involved in the cooling process may not have considered the area of waste in water usage at all. This would now become an important overall factor.

The amount of CO<sub>2</sub> emissions can be measured simply by the amount of CO<sub>2</sub> which Banton produces in the production of solar panels. This would register the amount of emissions and Banton may therefore be in a position to manage CO<sub>2</sub> emissions overall. As with water usage above, however, Banton may need to install specialist measuring instruments to measure this accurately.

Measuring CO<sub>2</sub> emissions used in the production process would not, however, address all the CO<sub>2</sub> which Banton emits. Its delivery vehicles, for example, would emit CO<sub>2</sub> and there may also be some of Banton’s activities in pre-production processes which emit CO<sub>2</sub>.

**(ii)**

Using absorption costing	Model X	Model Y
	\$	\$
Material	40.00	52.00
Labour	50.00	75.00
Overheads (W1)	21.29	31.93
<b>Total cost</b>	<b>111.29</b>	<b>158.93</b>
Selling price	210.00	285.00
<b>Profit per panel</b>	<b>98.71</b>	<b>126.07</b>
<b>Profit margin</b>	<b>47%</b>	<b>44%</b>
<b>W1: Absorption costing</b>		
	<b>Overhead cost per unit (\$)</b>	
	<b>Model X</b>	<b>Model Y</b>
Total overheads	314,000	
Total labour hours	29,500	
Cost per labour hour	10.64	21.29
		31.93

Using ABC	Model X	Model Y				
	\$	\$				
Material	40.00	52.00				
Labour	50.00	75.00				
Overheads (W2):						
Power and machine cost	8.85	35.38				
Production scheduling	0.43	2.13				
Packaging	2.08	2.08				
Finishing and despatching	3.31	4.12				
<b>Total cost</b>	<b>104.66</b>	<b>170.71</b>				
Selling price	210	285				
<b>Profit per panel</b>	<b>105.34</b>	<b>114.29</b>				
<b>Profit margin</b>	<b>50%</b>	<b>40%</b>				
<b>W2: ABC</b>						
<b>Overhead</b>	<b>Driver</b>	<b>Total cost</b>	<b>Total driver</b>	<b>Cost per driver</b>	<b>Overhead cost per unit (\$)</b>	
					<b>Model X</b>	<b>Model Y</b>
Power and machine cost	Machine hours	230,000	26000	8.85	8.85	35.38
Production scheduling	Batches	13,000	610	21.31	0.43	2.13
Packaging	Units	26,000	12,500	2.08	2.08	2.08
Finishing and despatching	Orders	45,000	68	661.76	3.31	4.12

The results of the activity-based costing calculations highlight that model Y consumes significantly more of the overhead cost per panel (\$43.71 compared to \$31.93 per panel) than model X. The principal reason for this is that model Y consumes four times as many

machine hours for the production of one panel as model X consumes, with power and machinery cost being the most expensive overhead cost.

As a result, model Y's cost, when calculated on an activity basis, is \$170.71. This is 7.4% higher than when calculated under a traditional absorption costing approach. This finding has significant implications for the price which Banton charges as its margin for model Y reduces to 40% under an activity-based budgeting approach.

This is concerning for two reasons: firstly, model Y is arguably a new and enhanced product which, due to its increased efficiency, should be worth a premium in the marketplace. This should be reflected in the margin which Banton achieves on this panel and perhaps that should be more than the 45% detailed in the budget.

Secondly, it is stated that sales of model Y have increased steadily and that it is a more significant part of Banton's revenue. This may be because Banton is gaining market share in this panel through undercharging for it. The margin of 40% is certainly significantly below Banton's budgeted figure of 45% and the selling price would need to increase to \$310.38 to ensure that Banton achieved its budgeted margin.

Although the margin on model X is larger than the budget figure of 45%, this may be a concern for the same reason as mentioned in the paragraph above. If the balance of Banton's business is shifting, and model Y is becoming more popular than model X, then sales of model X are likely to decline as the more efficient panel becomes the accepted norm in the industry.

Based on the information provided by the activity-based calculations, and assuming current levels of sales and production continue, Banton should therefore consider increasing the price of panel Y to \$310.38 and reducing the price of panel X to \$190.29.

### **(iii)**

#### **Existing bonus scheme:**

##### Clarity

The current scheme in operation at Banton seems clear to all sales staff as they will be aware of the company's budgeted sales figure and of overall performance. The staff will also know their own salary and would therefore be fully aware, at the start of the year, what their bonus might be at the end of the year as long as the company exceeds its operating profit budgeted figure by 8%.

##### Controllability

Banton's sales staff have some degree of controllability within the current bonus system in that they control, to some extent, the number of sales enquiries which they can turn into orders. This is not entirely within their control, of course, as customers may change

their mind due to financial reasons or for other reasons which are not directly related to choosing Banton as the preferred supplier.

The bonus is based on profitability, however, and the sales staff are not in control of any of the costs or purchasing decisions within Banton. They cannot control areas such as staff, overhead, raw material or production costs. Nor can individual members of the sales staff control the sales made by other members of the sales staff and it is possible that those sales staff who are responsible for a higher number of customer orders see themselves as subsidising other members of the sales staff.

### Motivation

The current scheme is likely to be slightly demotivating in that it would appear to reward length of service rather than ability, as the longer serving members have a higher salary which would attract a higher bonus. This has the potential to make newer members of staff feel as though their efforts are being less rewarded than those who have been there for a longer period. Newer members of staff may consider that longer serving members could be gaining a higher bonus whilst possibly relying, at least in part, on the work of others to sustain their bonus payment.

### **Proposed bonus scheme:**

#### Clarity

The first part of the proposed scheme seems to be very clear as it is exactly the same scheme which is currently in operation, only now the bonus amount is limited to 5% of salary. The second part of the scheme, however, lacks clarity mainly because staff are not aware of how many orders their individual customers have to place before the bonus becomes payable. It is very important to know this number as it will have a significant effect on motivation if the sales staff consider this number to be too high.

In a similar manner, the actual amount of the bonus is not clear as staff will receive 5% of the value of orders placed, but value of the orders and therefore the value of this part of the bonus would not be clear until after the end of the trading year. This may not be an unusual occurrence for most companies, but it would give much less clarity of the total value of the bonus to Banton's sales staff than the current system.

#### Controllability

The same concerns over lack of controllability would exist within the 50% of the new system which is based on Banton's overall operating profit for the year. However, the sales staff would have more controllability over the second part of the new bonus as this part of the bonus would relate to their individual number of sales. This is likely to be seen by sales staff as being more reflective of their individual abilities to do their job.

## Motivation

The new scheme has the same motivation concerns for the 50% of the old bonus scheme which would remain. The new part to the scheme, however, has the potential to be motivating as it relies much more upon the efforts of the individual than on the sales staff collectively.

A potential downside to increasing the motivation of the individual is that it encourages a sense of competition amongst sales staff which is not healthy for Banton overall. For example, one member of staff may be dealing with a customer enquiry and may, through illness or another reason, not be able to meet with customers or undertake certain agreed tasks, such as offering a quotation, within the agreed time frame. This individual may be reluctant to share the customer details with another member of the sales staff in case this other member of staff was given the ultimate credit for the sale. In the meantime, if there was a delay, the customer may have made an enquiry with a rival company and Banton could have lost the potential business. Through enhancing individual motivation, therefore, the scheme has the potential to directly encourage sub-optimal behaviour in the sales staff.

Additionally, it is clear that Deeland has varying economic conditions in different regions which may make it much easier for some members of the sales staff to sell successfully than others. This would seem to be unfair and is likely to demotivate those sales staff who are trying to sell the panels in less affluent areas.

There should also be some concern that many customers will need to take out a loan to fund their purchase of solar panels. If the sales staff's motivation is increased, it is possible that the staff might be encouraged to sell to people who could have difficulty in affording the solar panels. Whereas any decision to purchase the panels would clearly rest solely with the customer, the second part of the new scheme could motivate the sales staff to ignore the potential financial consequences for the customer. Such behaviour could be seen as irresponsible and being against Banton's objective of having the customer at the centre of all the company's policies.

## Recommendation

Banton's bonus scheme for the sales staff should have more of a focus on the contribution the individual member of the sales staff makes to overall company profitability as the current scheme seems to reward length of service rather than ability.

The proposed scheme is an improvement as it still has a focus on overall company profitability but now includes an individual element. However, this individual element should be clarified in terms of how many sales need to be achieved before the bonus is enacted and it should also clarify what might happen if two or more of the sales staff are involved in a sale. The current proposal would appear to set sales staff in competition

with each other, and this should be avoided. There should also be some account taken of the differing economic conditions in parts of Deeland and varied levels of when the bonus is enacted could be set for sales staff in different regions.

## Section B

### Question 2

#### Performance Dashboard

Mochrum's overall aim is to provide health education advice in a manner which is fun and refreshing and to provide the two owners of the company with a sustainable and comfortable income.

It aspires to achieve this through:

- Being the most popular health podcast in Neeland.
- Attracting renowned experts as guests on the podcasts.
- Developing alternative revenue streams to podcast subscription.
- Expanding internationally.
- Being an inspiration to people to live more healthy lives.

**To provide health education advice in a manner which is fun and refreshing and to provide the two owners of the company with a sustainable and comfortable income.**

Mochrum's main aim, that of providing health education advice in a fun and refreshing manner, is not measured. Subjective areas such as 'fun' and 'refreshing' are much harder to measure than a measure of income or dividend payment but Mochrum could have made an attempt to measure the overall image they portray to their listeners to see if it reflected elements of 'fun' and 'refreshing'. This could have been done by undertaking a survey amongst their listeners to gauge their perception of Mochrum.

The other part of Mochrum's main aim is not measured either as there is no measure which relates to the income of the two owners. They are joint owners, and their income could be measured by their salaries or by the dividends they have taken out of the company. Showing this in a sustainable manner would involve showing the growth in income over time. There is nothing is shown in the dashboard which goes further back than a three-month period.

**Being the most popular health podcast in Neeland.**

Mochrum measures the number of downloads per month and the number of podcast subscribers, but these measures do not address if Mochrum's is the most popular health podcast in Neeland. To do this, Mochrum would need to measure external comparators such as the number of downloads which their rivals achieve or the average number of downloads per month of a health podcast. This would at least give Mochrum some indication as to how popular their podcast is in relative terms. Mochrum does measure the number of other health podcasts in Neeland but this number, by itself, is practically useless. It tells us only that this number does not appear to be growing and is around 20

but we have no idea how these podcasts perform in terms of number of downloads or revenue generated compared to Mochrum.

### **Attracting renowned experts as guests on the podcasts.**

One of Mochrum's objectives is attracting renowned experts as guests and Mochrum does appear to measure the number of expert guests. Again, however, it is difficult to ascertain if the number of expert guests is any more or less than a competing podcast may attract or if it is any higher or lower than Mochrum may have attracted last year. That said, the figure does give a clear indication as to how many experts Mochrum has attracted and experts, by definition, are probably quite rare. This, therefore, seems to be an appropriate measure.

### **Developing alternative revenue streams to podcast subscription.**

Mochrum is not quite measuring the development of new revenue streams nor the amount of revenue which comes from alternative revenue streams. This could be calculated by subtracting the download revenue from total revenue for each month, with the balance being the amount of revenue from alternative streams. The revenue from alternative streams is just less than 50% of total revenue and it is clear from the performance report that advertising revenue is a significant part of this. However, it is not known what the other sources of revenue are. Book sales would appear to be some of this, but book sales are falling and the revenue from other sources is not falling. Therefore, there are other sources of revenue which are neither explicitly named nor measured.

If Mochrum is serious about measuring the development of new revenue streams, then it should highlight in the charts which are presented in the performance report what those alternative streams are. Those streams could be depicted in different colours, or in a pie chart, to show their individual contributions to Mochrum's total revenue. In this way, it would be easier to visualise the alternative revenue streams and to determine which may be growing more quickly than others, thus aiding Mochrum's decision-making.

### **Expanding internationally.**

There is no measure in the performance report which tries to address Mochrum's international expansion. This is stated as part of Mochrum's overall objectives and there should be some attempt to measure how this is progressing, be it through downloads and/or revenue generated from subscribers outside Neeland.

### **Being an inspiration to people to live more healthy lives.**

Mochrum is not explicitly measuring its last objective, which is to be an inspiration to people to live more healthy lives. This is very difficult to measure and perhaps the

measure of customer satisfaction is an attempt to measure this, on the basis that a satisfied customer is one who is likely to be influenced by what they have heard on the podcast to live a healthier life. Perhaps Mochrum could take a straightforward approach of asking a more direct question of its listeners and simply ask them if the podcast has inspired them to live healthier lives. It may be difficult for listeners to answer this in the affirmative more than once, however, as it is unlikely that every listener to every podcast would lead to further inspiration. Customer satisfaction, though imperfect, may therefore be one of the best ways of trying to measure this last objective.

### **Other areas**

There are areas which Mochrum is measuring which do not relate to its aim or its objectives. The hours spent in studio and studio rental costs seem to be cost-focused measures which a company would understandably wish to measure, and these costs may make more sense if the owners' income or if Mochrum's overall profitability was being measured. As this is clearly a business for the two owners, some overall measure of profitability would be expected and there is no evidence of this in the performance dashboard. This is something that Mochrum should rectify.

The report is also adopting a short-sighted approach in only considering performance from the last three months. It would be helpful to see performance on an annual basis to allow a wider trend of performance to be determined and it would also be helpful to see a budgeted figure for the year. This would help with control and would help inform Mochrum's decision-making.

### **Data visualisation, narrative commentary and information overload**

The dashboard has too much content in a relatively small space and there is no clear focal point for the reader. This is because it is made up of four specific quadrants with none of the quadrants attracting greater attention than any other.

The graphs are limited in the information which they convey and may have been better presented as data in a table in the same manner as that at the top left hand-side of the report. The number of downloads is a very straightforward figure and, to be more meaningful, the graph could have had a comparative figure for competitor downloads or could have had an additional line for overall company profitability. The graph on revenue gives only an indication that Mochrum enjoys revenue from additional streams but as mentioned above, gives no indication as to what these streams are.

There is a significant amount of information squeezed into the top left-hand side of the report and this data would benefit from being expressed over a larger space. This would enable the reader to read the data more easily. It is a further example of the need for space between the different areas of the report to allow for a more relaxing read.

The narrative is not indicative of what good practice would be in the narrative part of a performance dashboard. Generally, the narrative commentary should explain the information provided in the dashboard. It should direct attention to important matters and explain their significance or causes. In this case, therefore, the commentary should offer some indication as to why the number of subscribers and the revenue had increased. Specifically, the commentary should address the significant point which emerges with regard to subscription charges, as it appears that other companies may be trying to end this revenue stream. It remains a very important part of Mochrum's overall revenue and there must be a possibility that, over time, this stream may diminish.

The narrative should also highlight, in a more definitive manner, the reason for the fall in book sales and address whether writing further books is a part of Mochrum's strategic direction. The reason for more time being spent in the studio is well explained though it would be helpful to know if that trend is likely to continue.

Overall, it is clear that there is data overload in the performance dashboard. The narrative parts feel as if they have been squashed together and the graphs, though they do not carry much by way of useful information, still require to be analysed and understood. If graphs or charts are to be used, they should carry more information in a succinct manner but, for the purposes they have in this report, they would be best deleted and their content added to the top left-hand side of the performance dashboard. The narrative parts could then at least be extended a little to give them more space on the dashboard and the data overload problem could be avoided. This could also be the case if an alternative approach was taken and more of the information was presented on the graphs and the narrative was reduced to one or two bullet points with very succinct explanations.

### Question 3

#### (a) Data silos

A data silo is a collection of data held by one group in an organisation which is not easily accessible by other groups in the same organisation. Pockets or ‘silos’ of data are scattered across applications, databases, departments, and geographic locations.

It would appear as though the diverse and individual data systems currently operating in Usge would confirm that the company is experiencing, or will experience, difficulties in data-driven decision-making due to the existence of data silos.

One of the main criticisms of data silos is that they provide a limited view of data at the overall company level. This is certainly the case in Usge. Head office only receives information on a sale of a service to a new client after the sale has been made and therefore all the other information which is available, such as new client enquiries and market developments, are not known to the regional directors. The existence of the different departmental data means that the directors could be making strategic decisions which do not reflect current developments in the marketplace, and this could ultimately threaten Usge’s position in the market. In a fiercely competitive marketplace, making decisions which do not contain the most up-to-date information could be potentially very damaging to Usge’s long-term sustainability.

Another of the challenges resulting from data silos is that data held at the company level may not be up-to-date, and its accuracy and completeness might not be able to be promptly verified. It is clear that some of the information in the data silos in both the marketing and innovation and development departments is up-to-date as it contains information on the latest product developments and customer enquiries. It is concerning that this information would only find its way into the data warehouse after a sale had been made. It is not clear if the time taken between enquiry and sale is lengthy or short but, in either case, the data warehouse does not offer the regional directors any information in any format which is approaching real-time, which may be necessary for data-driven decision-making in this industry.

A further challenge from data silos is that they represent wasted resources. There might, for example, be duplication of resources and analysis in the various data silos. It would appear, for instance that the marketing, sales and the innovation and development department may have very similar, if not identical, information on clients and on the developments in the marketplace. It would also appear that the sales department is maintaining its own information on sales which is also present in the central data warehouse. This data has to be maintained and updated, and it is a clear waste of resources to be doing this on potentially three different data platforms.

A more rigorous investigation of the exact information being maintained by each department is likely to reveal more data in common and it is also very likely that several departments maintaining the same data may reduce data integrity, as there might be confusion about which data set (among many versions) is reliable and up-to-date.

There can also be the problem that data held in silos might not be directly comparable with data held by other departments, and there might be a need to translate, reformat or repackage data before it can be transferred and used by other departments. Specifically, as each department has its own system, this may mean that the data cannot simply be transferred from department to department or to the central data warehouse at head office as it may not exist in a format which is compatible with any other system. This can often be the case with data silos where there is no common platform to enable sharing. This can ultimately make the data impossible to share and much time could be spent transferring the data to a more widely accessible format.

### **(b) Big data**

Big data comprises extremely large data sets which may be analysed computationally to reveal patterns, trends and associations, especially relating to human behaviour and interactions. Big data has five characteristics - variety, velocity, veracity, volume, value, and each of those will be considered from the perspective of what Usge is seeking to produce as a selling aid for its software platform.

If Usge is seeking to condense all the customer reviews into a short video to promote the experience of using its platforms to leave a review, it will have a significant quantity of data to consider before it can present this experience in the best possible light. For example, there will be data on every customer who has left a review, which would be an immense amount of data for a global company which has achieved a significant market share. Usge would need to consider how it might analyse this data to present the best aspects of the customer review experience and it is clear that this analysis would be time consuming and possibly expensive as Usge may need to purchase special software to undertake this task.

The velocity of the data that Usge has to process could also be a concern as there will be a great deal of activity taking place at any given time, with people leaving reviews at all times of day and night. This constant influx of additional data may add to Usge's understanding of the demographics of the client base which uses its software platforms, and this understanding may ultimately help Usge in its quest to sell its platforms to more organisations. However, Usge will already have a vast amount of still current data on which to develop its promotional material, therefore the speed at which data is being produced may not be a significant problem for Usge.

There will be a significant variety of forms of data for Usge to analyse. Specifically, data will be presented in the form of photos, written posts, voice notes and videos. Usge would be very keen to highlight the versatility of its platform and would want to illustrate how flexible the platform is to accommodate different forms of communication media. To present this in the best possible way, Usge would need to analyse the communication in all its different forms to show the range of human experience which is captured by its platform. This may be problematic and may require specialist software to undertake the analysis involved.

Given Usge's overall purpose for the data, the accuracy of the data may be less of a concern. Whereas it is true that some communication may be negative and unsubstantiated in its criticism of the event which the customer had experienced, such criticism is not criticism of the service that Usge is providing. Indeed, Usge is arguably allowing these consumers a platform to express their feelings and seen from this perspective, any and all communication would show that Usge's software platform is fit for purpose.

Overall, Usge may have a concern with the value of the data which is produced but only because it may find that additional data begins to tell them very little which they do not already know. Customers may occasionally express a desire to post certain things on the feedback platform which they are not currently able to, and such comments would probably hold more value for Usge than most of the comments which are made about customers' experiences. This is because most experiences have already been expressed in most forms of communication.

There are ethical issues which Usge should consider in its use of this data. Firstly, Usge needs the permission of all those who have used its platform, in either booking or in reviewing, to use their personal data. To do this, the individuals must have explicitly agreed to this somewhere in the overall process. Additionally, Usge has collected this data initially for the specific purpose of customers booking a service and for them leaving a review. It is now using this data for the very different purpose of selling its software platform to other organisations which is not the same specific purpose for which the data was collected in the first place.

## Mark scheme

### Question 1

(i)

Customer – up to 3 marks per performance measure

Environmental – up to 3 marks per performance measure

Challenges of measurement – up to 4 marks

#### Maximum 14 marks

(ii)

Calculations:

Absorption costing approach:

Total cost per panel – 1 mark for each model

Margin per panel – 1 mark for each model

Activity-based costing approach:

Power and machine cost per driver – 1 mark

Production scheduling cost per driver – 1 mark

Packaging cost per driver – 1 mark

Finishing and despatching cost per driver -1 mark

Total cost per panel – 1 mark for each model

Margin per panel – 1 mark for each model

Assessment of impact on pricing policy – 1 mark per relevant point, up to a maximum of 5 marks, including:

- Comparison of costs for each model under each approach
- Comparison of profit margins for each model under each approach and against target
- Implications for pricing of both models

#### Maximum 12 marks

**(iii)**

Assessment of existing reward scheme:

1 mark per relevant point covering clarity, controllability and motivation – up to 7 marks

Assessment of proposed reward scheme:

1 mark per relevant point covering clarity, controllability and motivation – up to 7 marks

Justified recommendation – up to 2 marks

**Maximum 14 marks****Professional skills marks:****Communication:**

General report format and structure (use of headings, sub-headings and an introduction)

Style, language and clarity (tone of report response, presentation of calculations, appropriate use of the tools, easy to follow and substantive amount of content)

**Analysis and evaluation**

Logical use of the data provided to perform and clearly present calculations and to draw a useful comparison of the impact of the overhead costs under the two methods

**Scepticism**

Both reward schemes are critically explored using the three criteria to arrive at a considered recommendation

**Commercial acumen**

Recommendations for performance measures are relevant and practical for Banton and reflect the priority matters raised by the directors, including the difficulties of measurement

**Maximum 10 marks****Total 50 marks**

## Question 2

Performance dashboard:

Breaking down hierarchy of aims and objectives – 1 mark

Evaluation of performance dashboard – 1 mark per relevant point, covering:

- Elements of main aim
- Being the most popular health podcast in Neeland
- Attracting renowned experts as guests on the podcasts
- Developing alternative revenue streams to podcast subscription
- Expanding internationally
- Being an inspiration to people to live more healthy lives
- Other comments with justifications for aspects such as lack of budget and limited coverage of the dashboard

### Maximum 15 marks

Data visualisation, narrative commentary and information overload:

Assessment of data visualisation on the dashboard – 1 mark per relevant point, up to 4 marks

Narrative commentary – 1 mark per relevant point, up to 3 marks

### Maximum 5 marks

#### Professional skills marks:

#### Analysis and Evaluation

Clear and systematic approach, taking each part of the main aim and objectives in turn, with a logical sequence of points on the evaluation of the performance dashboard

#### Scepticism

Critical assessment of the performance report is provided with useful potential solutions offered where the report is lacking

#### Commercial Acumen

Assessment of the presentation and commentary of the dashboard considers the needs of the users and raises valid commercial issues with its use for performance reporting

### Maximum 5 marks

### Total 25 marks

**Question 3****(a)**

Assessment of data silo problems - 1 mark per relevant point, including:

- Limited view at overall company level
- Data may not be current, accurate or complete
- Wasted resources
- Different formats and data transfer problems

**Maximum 8 marks**

**(b)**

Big data management challenges – 1 mark per relevant point, up to 11 marks, including:

- Quantity of data
- Speed of data collection
- Types of data collected
- Accuracy of data
- Value of data

Ethical concerns – up to 3 marks, 1 mark per relevant point

**Maximum 12 marks**

**Professional skills marks:**

**Scepticism**

Critical assessment of the problems of data silos at Usge clearly shows the range of issues and the wider implications for the company's management

**Commercial Acumen**

Evaluation of problems relating to big data management address valid commercial issues relevant to Usge

**Maximum 5 marks**

**Total 25 marks**