

MARK PLAN AND EXAMINER'S COMMENTARY

The marking plan set out below was that used to mark this question. Markers were encouraged to use discretion and to award partial marks where a point was either not explained fully or made by implication. More marks were available than could be awarded for each requirement. This allowed credit to be given for a variety of valid points which were made by candidates.

Question 1**Total marks: 45****General comments**

This question is the mini case. It is based on a company, Ordio, which is the market leader in music streaming. Ordio offers:

- a free service, where users can stream limited content with regular advertisements which generate revenue for Ordio, or
- a paid-for premium service, with better sound quality and unlimited content, uninterrupted by advertisements.

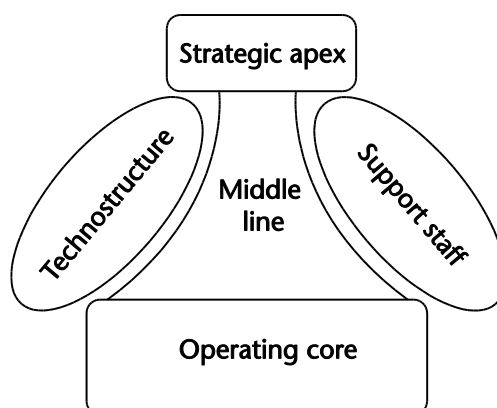
Ordio's founders retain a significant interest in the operations of the business and manage key relationships with media companies and artists. Ordio operates with an informal structure to minimise bureaucracy, and music editors are given significant autonomy. Most IT is provided in-house but many support functions are outsourced.

Until 2019, Ordio was loss-making as it has pursued revenue growth rather than profitability. At the start of 2020, the founders set out a new vision for Ordio to be the world's leading audio platform, streaming spoken content ('podcasts') as well as music, It acquired two companies that produce podcasts and is also considering two strategic developments: a streaming service with stories and songs targeted at children aged 9-13 (Ordio Youth) and a strategic partnership with an e-sports company, Kovar, to be the live-streaming audio provider for its global sporting events. Ordio budgeted to achieve breakeven in the year ended 31 December 2020.

Candidates were provided with actual and budgeted financial information for Ordio, together with some quarterly operating data.

1. Analyse structure and the extent to which it supports competitive advantage and innovation

One way of analysing Ordio's structure is with reference to Mintzberg's organisational configurations. The key component (or building block) appears to be the operating core, consisting of IT experts and editors working directly on selecting artists and providing playlists appropriate for the customer base. This might be seen as Mintzberg's adhocracy or innovative configuration and would be appropriate for the digital environment in which Ordio operates, which is complex and dynamic. The opportunity for Ordio was created by technology as a disrupting force in the music industry and its business continues to be driven by technological developments.



Key features of Ordio's structure are as follows:

- Innovation is a key objective. Staff (operating core) are likely to be intelligent and self-motivated, with the music expertise and/or technical knowledge to make appropriate decisions and carry out their work independently.
- There is little formalisation (an absence of technostructure) and no layer of middle management (middle line).
- Such a structure avoids the trappings of bureaucracy and remains flexible to encourage innovation.
- As IT is a core competence it is delivered in-house but the number of other support staff is likely to be limited as other functions (payroll, HR, accounting) are largely outsourced.

An alternative model might be Handy's shamrock organisation or flexible firm – with Ordio being seen as a lean organisation comprising a core of essential workers (editors and IT experts) supported by a contractual fringe of artists/media companies, which provide the underlying content.

Network architecture refers to the network of relational contracts within or around an organisation. In Ordio's case its relationships and contracts with media companies, artists and podcast producers are critical to its success. Recognising its reliance on certain media companies, Ordio appears to have taken steps to protect its competitive advantage by starting to source content itself and directly contract with artists. Another key relationship that contributes to competitive advantage is the fact that GTC is both a shareholder and strategic partner, providing Ordio with access to its customer base.

Whilst the simple, flexible structure promotes innovation and allows Ordio to focus on the activities important for competitive advantage, there may be some disadvantages which could present problems as Ordio continues to grow.

- Lack of control - the structure is lacking in coordination mechanisms
- If editors are too independent and work in isolation rather than sharing knowledge there may be a lack of goal congruence, with personal interests being put before shared company ones

Answers to this requirement were polarised. Better candidates analysed Ordio's structure in terms of Mintzberg's building blocks or Handy's shamrock, identifying the features of the informal, flexible structure that would provide agility and facilitate Ordio responding to a rapidly changing industry. Weaker candidates discussed functional and/or divisional structures that were not relevant and/or did not link their discussion of innovation and competitive advantage to Ordio's organisational structure.

Total possible marks

10

Maximum full marks

9

2. Data analysis and performance evaluation

Appendix of possible calculations (figures in red are given in the scenario)

* Quarterly information extracted from Exhibit 2: Figure 2 and 3

| | Budget 2020 | Actual 2020 | Actual 2019 |
|------------------------|-------------|-------------|-------------|
| Revenue £m | | | |
| Ads | 550 | 560 | 490 |
| % increase | +1.8% | | +14.3% |
| Premium | 5,500 | 5,465 | 4,245 |
| % increase | -0.6% | | +28.7% |
| Total | 6,050 | 6,025 | 4,735 |
| % change | -0.4% | | +27.2% |
| Sales mix | | | |
| Ads | 9.1% | 9.3% | 10.3% |
| Premium | 90.9% | 90.7% | 89.7% |
| Gross profit £m | | | |
| Ads | 100 | 57 | 88 |
| Premium | 1,450 | 1,393 | 1,148 |
| Ordio Total | 1,550 | 1,450 | 1,236 |

| | | | |
|-----------------------------------|---------|---------|---------|
| Premium - share of gross profit | 93.5% | 96.1% | 92.9% |
| GP margin | | | |
| Ads | 18.2% | 10.2% | 18.0% |
| Premium | 26.4% | 25.5% | 27.0% |
| Ordio Total | 25.6% | 24.1% | 26.1% |
| Overheads £m | (1,550) | (1,630) | (1,216) |
| % change | +5.2% | | +34.0% |
| as % of sales | 25.6% | 27.1% | 25.7% |
| Operating profit (loss) £m | Nil | (180) | 20 |
| Operating margin | 0 | -3.0% | 0.4% |

| Revenue Analysis | 2020 budget | 2020 actual | 2019 actual |
|------------------------------------|-------------|-------------|-------------|
| Ads £m | 550 | 560 | 490 |
| Number of free users m | 135 | 139 | 107 |
| Average revenue per free user £ | 4.07 | 4.03 | 4.58 |
| Premium £m | 5,500 | 5,465 | 4,245 |
| No. of premium users m | 110 | 112 | 86 |
| Average revenue per premium user £ | 50 | 48.79 | 49.36 |
| Total revenue £m | 6,050 | 6,025 | 4,735 |
| Total users m | 245 | 251 | 193 |
| Average revenue per user £ | 24.69 | 24.00 | 24.53 |

Based on Exhibit 2:

| At end of | Q1 | Q2 | Q3 | Q4 (=2020 actual) | 2020 budget | 2019 actual |
|---|-------|-------|-------|-------------------|-------------|-------------|
| Total number of users (million) | 201 | 213 | 230 | 251 | 245 | 193 |
| % growth | 4.1% | 6.0% | 8.0% | 9.1% | 2.4% | 30.1% |
| Free users (m) (Fig 2) | 111 | 116 | 127 | 139 | 135 | 107 |
| % growth rate | 3.7% | 4.5% | 9.5% | 9.4% | 3.0% | 29.9% |
| Premium users (m) (Fig 2) | 90 | 97 | 103 | 112 | 110 | 86 |
| % growth rate | 4.7% | 7.8% | 6.2% | 8.7% | 1.8% | 30.2% |
| % of premium users inactive in period | 10% | 7% | 6% | 5% | unknown | unknown |
| Number of inactive premium users (m) | 9.0 | 6.8 | 6.2 | 5.6 | | |
| Number of active users (m) | 192.0 | 206.2 | 223.8 | 245.4 | | |
| % increase | | 7.4% | 8.5% | 9.7% | | |
| Churn rate (PS) | 5.3% | 5.1% | 4.9% | 4.8% | unknown | unknown |
| Number of spoken pods available ('000) | 166 | 293 | 450 | 630 | 700 | n/a |
| % increase | | 76.5% | 53.6% | 40% | -10% | |
| % all active users engaging with podcasts | 5% | 9% | 13% | 16% | unknown | n/a |

Market share based on number of users:

| | Number of premium users 2019 | Ordio's relative share (based on premium users) | Number of total users 2019 | Ordio's relative share (based on total users) |
|--------------|------------------------------|---|----------------------------|---|
| Ordio | 86m | | 193m | |
| Competitor 1 | 60m | 1.43x | 60m | 3.22x |
| Competitor 2 | 55m | 1.56x | 55m | 3.51x |

Commentary

To date Ordio has focussed on growth rather than profitability and has largely been loss-making. This is evidenced by the fact that in 2019 it made an operating profit of only 0.4% and was targeting break-even for 2020.

At the start of 2020 Ordio acquired two podcast companies with the aim of providing greater value to listeners, thereby defending its market share, increasing the number of free users that convert to premium subscribers, retaining subscribers for longer and eventually increasing its prices.

The success of the strategy can be analysed in a number of different ways:

In relation to budget, Ordio has broadly achieved the targeted sales mix (91% premium, 9% free) and increase in revenue (falling only 0.4% short). From a profitability point of view, gross margins have dropped more than expected (24.1% overall compared to a budget of 25.6%) and overheads have increased 5.2% more than budgeted, leading to a loss of £180m for 2020 (and an operating profit margin of -3%) compared to an expected break-even position.

In relation to 2019, revenue has grown by 27.2% overall but the gross profit margin has fallen from 26.1% to 24.1% and the small £20m operating profit achieved in 2019 has become a £180m loss in 2020.

The fact that Ordio has seen margins fall and made a loss overall is likely to reflect increased cost of sales due to increased delivery and podcast costs and the amount Ordio has had to invest, as a result of the acquisitions, in marketing and sourcing non-music content. More information is required on the relative royalty rates for podcasts to understand whether this content is more or less profitable for Ordio than music.

If we analyse revenue, the average revenue per premium user fell 1.2% from £49.36 in 2019 to £48.79 in 2020, implying that Ordio has marginally reduced its premium rates. It may be that this reflects incentives for premium users eg free initial periods like those given to GTC, or reduced rates for friends and family. Alternatively Ordio may have had to reduce its rates to compete with rivals.

Average revenue per free user has fallen from £4.58 in 2019 to £4.03 in 2020, which may reflect the fact that Ordio has had to reduce its rates to increase volumes, eg due to advertisers' reluctance to spend money during the 2020 pandemic.

Financially Ordio is highly dependent on premium users which account for 90.7% of revenue and 96.1% of gross profit, although since the source of most new premium users (60%) is from the ad-supported free users, it could be argued that increasing the free user base is actually strategically more critical.

Given that Ordio is currently focussed on growth and number of users rather than profitability, these measures may be more indicative of success. Essentially Ordio is operating a cost leadership/loss leader strategy by offering free streaming initially to attract users in the hope they will then convert to premium subscribers.

The launch of the podcast strategy at the start of 2020 appears to have been successful in attracting a wider audience. Total users have increased by 30.1% year on year, with broadly comparable growth rates in the number of premium users (30.2%) and free users (29.9%).

Looking at Figure 2, the numbers have grown each quarter, along with the number of podcasts made available, although correlation does not necessarily equate to causation and it is not clear what increase would have been achieved without the podcasts.

Prior to the podcast strategy, at the end of 2019, Ordio as market leader was bigger than its two rivals in terms of number of paid users by 1.43 and 1.56 times. Since neither of these rivals offers a free service, in terms of total users Ordio has significantly more at 3.22 and 3.51 times. More information on competitors' share is required to assess the market position at the end of 2020 but since Ordio's user numbers have increased by 30.1% during 2020 it is likely that the podcast strategy has helped it retained its market leadership.

Ordio's founders were hoping the podcast strategy would enhance engagement, reduce churn and increase conversion rates. Looking at Figure 1, in terms of engagement, the % of users engaging with podcasts rose from 5% in the first quarter to 16% by Q4 and the number of inactive premium users also fell from 10% to 5%, suggesting an increase in user engagement. The churn rate among premium users fell from 5.3% in Q1 to 4.8% in Q4 representing an increase in retention rates and suggesting a lengthening of the period which users remain with Ordio.

Summary

The podcast strategy implemented at the start of 2020 does appear to have met the founders' criteria for success, defending market share by increasing the user base, increasing the conversion rate from free to premium users and reducing churn. However it has not resulted in Ordio being able to charge increased prices, with average revenue per user falling across the year.

The key question for Ordio is the extent to which it is sustainable in the long term for the business to continue as a loss-making operation. Given the number of users it would be expected to have the economies of scale/volumes to be profitable. It may be that the reason the rivals do not offer a free service is because this does not bring in sufficient revenue and is not viable in the long term.

Ordio has identified the need to increase prices in the long term. It can do this either by abandoning the concept of a free service or by increasing premium rates. Having started out with a cost leadership strategy, Ordio may find its listeners are reluctant to give up their free streaming services and premium users may not be happy to pay higher rates to continue to subsidise the listening of others.

Ordio may need to consider introducing tiered subscription rates where those users who want access to everything pay extra for a differentiated service.

This requirement, which incorporated the more traditional data analysis element, was generally well done.

Candidates were expected to give some thought to what data to select from the various exhibits and the most useful calculations to perform to explain the change in performance.

As usual marginal candidates simply produced a long list of year-on-year percentage changes which were not very insightful and for which there were limited marks available. Better answers included calculations analysing the relative performance of the two revenue streams and considered the quarterly and budgeted data provided as well as the year-on-year trends.

The discussion of performance was generally reasonable, with the vast majority of candidates using information from the scenario to help explain performance in relation to both budget and prior year. Weaker candidates described changes in performance rather than analysing the reasons for those changes. They also, as usual, reiterated the figures from the question or those they had calculated, without adding value or analysis.

Some marginal candidates omitted part of the requirement and failed to clearly evaluate the impact of the podcast strategy. Better answers identified Ordio's objectives for the introduction of the strategy then used the quarterly data provided to analyse whether these had been met.

The standard of presentation of workings varied considerably. When candidates are using large amounts of data from the exam paper in their spreadsheet workings, professional presentation requires that they indicate clearly where new, additional calculations are being performed, and they should label the relevant columns and headings so it is clear what the new calculations relate to.

| | |
|----------------------|----|
| Total possible marks | 23 |
| Maximum full marks | 20 |

3. Benefits and risks of Ordio Youth**Benefits**

- The Ordio Youth service is a market development strategy per Ansoff and offers scope to increase revenue and profit.
- Young people have the highest penetration of mobile phone/tablet ownership. Online platforms are a core aspect of young people's lives so there is likely to be demand for the new product
- If Ordio captures an audience young and establishes brand loyalty, this should lead to a permanent long-term increase in the customer base
- Younger people may be more likely to engage in social media so will help publicise Ordio free of charge and increase their brand awareness/audience base
- High quality content may be well-received by parents and make them more inclined to sign up for Ordio's service for themselves as well as their children
- The strategy may attract more families to take out subscriptions
- The strategy may attract a wider range of artists/media companies which are prepared to make their content available via Ordio

Risks

- Editors will need to be careful regarding selection of tracks/content to ensure that it is age-appropriate
- The youth market may interact with technology differently from adults. Editors have less experience of the target audience so Ordio may need to recruit new staff with appropriate skills
- Increased compliance requirements are likely due to the age of the audience
- There are potential ethical/safeguarding issues – Ordio will need to ensure that security is appropriate and there may need to be controls over advertising content
- There is reputation risk if Ordio attracts any bad publicity due to content
- Streaming is a competitive market - competitors may have similar apps established already
- The youth market has limited disposable income and can be quite fickle
- It is often parents who make the final payments for this age group so marketing will need to appeal to more than one target market
- Content may become out of date quickly so Ordio will need to keep updating playlists etc.
- The product may have a short life cycle if users cannot be retained

Ordio should ensure appropriate market research has been undertaken. On the face of it the strategy appears to be a reasonable fit, but care will need to be taken to manage the risks associated with a younger audience.

This was well answered by most candidates, and benefits and risks were generally well discussed. In many cases candidates identified that this strategy constituted market development in the context of Ansoff's matrix. Weaker efforts just concentrated on the cyber security/safeguarding issues of targeting the youth market. Better candidates discussed whether the target market was in fact children (who may have limited disposable income) or their parents, and identified that in the long run this strategy could attract more paid users in the form of families.

| | |
|----------------------|---|
| Total possible marks | 9 |
| Maximum full marks | 8 |

4. How finance function as business partner could assist in relation to the proposed partnership with Kovar

The finance function as business partner (BP) model is one where finance professionals are integrated within a business' operational departments or business units and provide commercial insights which can help the organisation in achieving their objectives.

Currently Ordio's accounting is outsourced. It is not clear to what extent it has in-house finance professionals or whether the finance BP role would be provided by an external party.

With respect to the proposed strategic partnership with Kovar, the finance BP could assist management in undertaking due diligence on Kovar by the evaluation of quantitative and qualitative data and the preparation of budgets and forecasts. This would help them to make a more informed strategic decision which can help ensure that the strategic partnership is only undertaken if it has real commercial merit.

The finance BP could:

- Assist management in analysing Kovar's financial and non-financial performance
- Robustly challenge the financial credentials of the proposal
- Support management in undertaking and understanding any relevant investment appraisal and sensitivity analysis
- Work closely with the management team during discussions about the financial terms of any partnership

If a decision is taken to go ahead with the partnership, the finance function can help with strategic planning for the partnership by:

- ensuring that financial resources are available
- collaborating with managers in producing budgets and forecasts
- establishing the necessary performance measures
- establishing appropriate operational and financial controls
- assisting with the design of information systems so that the financial requirements and outputs needed from the system are captured and incorporated into the final design

On an ongoing basis, the BP can provide 'real time' support in the form of detailed data and information to monitor the implementation of the strategy and the partnership's success.

Answers were very varied. Some candidates were well prepared to discuss the role of the finance function as a business partner and how this might help assess the potential and indeed the operations of the strategic partnership. Many weaker candidates seemed to lack the requisite knowledge or appeared to answer a different requirement on the pros and cons of the strategic partnership proposal.

Total possible marks

9

Maximum full marks

8

Question 2**Total marks: 32****General comments**

This scenario concerns Bevatna, a company that sells premium quality bottled water. It owns an exclusive licence to source water from an underground spring which is regularly replenished by melt from a large glacier. It is packaged at Bevatna's bottling facility and exported to markets in Europe.

The European market for bottled water is well-established and competition is intense. It is segmented based on four types of water: still, sparkling, flavoured and functional. Bevatna itself has three products: still water, fruit-flavoured water and water with added vitamins (functional water). Candidates were provided with a variety of market data, including an analysis of the market by product type and packaging type, market growth rates, and revenue for Bevatna and its largest competitors.

Bevatna's water and operations have been certified as carbon neutral. However, extracts from social media were provided, with critics questioning the right of companies like Bevatna to purchase and use natural resources that should be for the public benefit.

Bevatna's board is concerned about the sustainability of the bottled water market as environmentally-aware consumers switch to refillable bottles or purchase refrigerators with water dispensers. As a result, it is considering selling spring water from the glacier, in bulk, to companies producing luxury skincare products and has identified one possible customer, FaceUp.

This question provided a suggested structure in the form of headings but, as in previous sittings, it tested higher skills because the marks were not broken down. This leaves candidates to decide on relative importance, although there was some flexibility in the marking. Weaker responses tended to focus disproportionately on some headings at the expense of others.

The vast majority of candidates produced an answer in the form of a report although some weaker candidates failed to score this easy mark.

Report on the future direction of the business**To:** Directors of Bevatna**From:** A. Consultant**Date:** September 2021**1. Competitive strategy and product portfolio**

According to Michael Porter, Bevatna is a luxury bottled water producer that has adopted a differentiation strategy – using its exclusive licence to the glacier water to create premium products that consumers are willing to pay extra for.

This differentiation is reflected in the distinctive glass bottles bearing Bevatna's logo and also in the distribution strategy, with BePure and BeFlav sold via high-end retailers and, in the case of BeVee, available in upmarket hotels, luxury spas and at high-end sports events.

Initially Bevatna chose to offer one type of water (still water), and by offering glass bottles only focussed on packaging that represents 17% of the market (Figure 2). It is likely that glass bottles are also seen as more expensive than plastic and possibly more in keeping with natural, glacier water, which therefore increases the perceived quality of the product. With the subsequent addition of BeFlav and BeVee, Bevatna has broadened its range to cover 22% of the market segmented by packaging types (Figure 2) and 80% of the market by product (Figure 1).

It is clear from a comparison of prices that Bevatna is positioned as a premium brand offering high quality at a high price. Bevatna's still water product is priced at 5x the market average and 75% of the most expensive product. Flavoured and Functional water are already differentiated market segments and reflect a general market trend to premiumisation. Within this premium market however, BeFlav and BeVee command higher prices, at 2.33x and 1.74x the market average respectively and 58%/50% of the highest priced competitor product.

| Market segment | Average product price per litre Euro | Bevattna price | Bevattna price/ Average price | Product price range Euro | Bevattna price/Highest price |
|---------------------------|--------------------------------------|----------------|-------------------------------|--------------------------|------------------------------|
| Still water BePure | 0.60 | 3.00 | 5 | 0.30 – 4.00 | 75% |
| Flavoured water BeFlav | 1.50 | 3.50 | 2.33 | 0.70 – 6.00 | 58% |
| Functional water BeVee | 2.30 | 4.00 | 1.74 | 0.90 – 8.00 | 50% |

Product portfolio

Considering Bevattna's product portfolio, it has products in all segments of the bottled water market apart from sparkling water, which represents 20% of the European market (Figure 1). It does not produce water in plastic bottles. Whilst this is the largest market segment at 78% (Figure 2) it is also the area that is likely to face the largest decline due to environmental concerns.

Bevattna's product portfolio can be analysed in terms of the BCG matrix as follows

| Product | Sales revenue | Largest Competitor revenue | Bevattna relative share | Market growth rate | BCG analysis | Sales mix |
|---------|---------------|----------------------------|---|--------------------|--------------------|-----------|
| | Euro million | Euro million | | | | |
| BePure | 325 | 680 | 48% | 3% (low) | Cash cow | 52% |
| BeFlav | 181 | 950 | 19% | 11% (high) | Problem child/star | 29% |
| BeVee | 119 | 35 | Mkt leader 3.4x competitor (High) | 16% (high) | Star | 19% |

BePure is the cash cow product. It is well established on the marketplace and accounts for 52% of Bevattna's revenue. (Note: it is likely to have a small share of the still water market, a relatively higher share of the luxury still water market and a very high share if the market is defined as glacier water.)

The market for flavoured water is growing as consumers move away from sugared beverages. The BeFlav product accounts for 29% of Bevattna's sales and is likely to be somewhere between a problem child and a star, depending on the market share of other competitors. A number of the global bottled water brands that bring product innovations to this market are likely to compete in this space, as are some of the more well-known beverage companies like Coca Cola and Pepsi. This may put pressure on prices and margins. Relatively the premium for flavouring seems smaller than for functional water (Bevattna charges 0.50 euro/litre for flavour but an additional 1.00 euro for vitamins. The average European market price for flavoured water is 2.5 times the price for still water and 3.8 times the price for functional water).

BeVee is the rising star – the market is growing rapidly at 16% and Bevattna is the market leader having introduced a product in aluminium cans. Given society's concerns about health and hydration, demand is likely to continue to grow although the popularity of the market will attract new players, so Bevattna will need to defend its market position.

This section was typically well-answered. The vast majority of candidates identified that Bevattna had adopted a differentiation strategy, based on the perceived quality of its water and that its competitive position was enhanced by an exclusive licence to extract water from the glacier. Most went on to analyse Bevattna's three products in terms of either the product lifecycle or BCG matrix. Better candidates then went on to discuss the implications of the current product portfolio for Bevattna's future profitability and possible future strategies given market trends. Many, but not all, candidates used the numbers in the question to support their analysis although a significant number did not produce any additional calculations, despite the clear instruction in the requirement to do so.

| | |
|----------------------|----|
| Total possible marks | 12 |
| Maximum full marks | 11 |

2. Sustainability of bottled water industry

Sustainability is about maintaining the world's resources rather than depleting or destroying them, to ensure they support human activity now and in the future. Sustainability can be considered on three fronts: financial, social and environmental.

Sustainability is closely linked to the concept of natural capital - the natural assets (eg, air, water, land, habitats) that provide everyday resources and ecosystem services. Organisations that keep drawing down stocks of natural capital without allowing or encouraging nature to recover run the risk of local, regional or even global ecosystem collapse. Poorly managed natural capital therefore becomes not only an ecological liability, but a social and economic liability too.

Environmental sustainability

The natural capital argument is that the world's resources, such as water, need to be conserved and should be available for all to use not just for some to profit from. This is a criticism that has been levied at many of the global bottled water companies. In Bevattna's case, the argument is that the local spring is permanently refilled due to snowmelt and run-off so it is not consuming a finite resource by using the glacier water, but this is not necessarily true for all water companies.

Other environmental issues are:

- the excess waste generated from single use plastic (which accounts for 78% of the packaging in European market – Figure 2). Consumer pressure is such that the water companies will increasingly need to switch to alternative packaging or use plastic with a high level of recycled content to comply with new regulations. Again Bevattna could be argued to be taking steps to act sustainably by using glass bottles only, which can be recycled, and developing an aluminium can for its BeVee product.
- the carbon footprint arising from production, packaging and transportation. The social media feed (Exhibit 3) claims the carbon footprint of bottled water is 1,000 times that of tap water, although we need to exercise some professional scepticism over such feeds as they are not necessarily a balanced or representative view. In Bevattna's case it has a carbon neutral certification so it appears to be behaving responsibly in this regard.

Social sustainability

A comment in the social media feed reiterates the ethical marketing argument that expenditure on marketing is wasteful as it persuades people to buy products they do not need – bottled water is a good example of an unnecessary product if tap water is perfectly acceptable to drink. However one could argue that consumers have a choice whether to spend this money or not, so bottled water companies are just meeting market demand. The fact that the market is still growing suggests people are happy to make this choice.

In areas where tap water is unsafe or unpalatable to drink however the bottled water companies offer a much-needed service. Also providing bottled water in the event of natural disasters is important when access to drinkable tap water is lost.

Another health argument is that bottled water helps people stay hydrated and reduces the alternative quantity of sugary drinks and beverages they consume. Thus it could be argued bottled water is socially sustainable as it helps protect people's health and wellbeing.

Financial sustainability

The European market data (Figure 1) suggests that all segments will grow next year. The global market is expected to grow by 7.5% pa to 2025, with demand in Europe expected to grow by 4% pa over the same period. Thus it appears there is long-term sustainable demand, particularly if the bottled water companies respond to consumer pressure for alternative packaging.

A threat to the industry's financial sustainability is that environmentally-conscious or budget-conscious consumers switch to refillable bottles or purchase refrigerators with water dispensers. However this is likely to be counteracted by increasing demand for flavoured and functional waters and the continued focus on health which drives consumers to switch from sugary carbonated beverages to water in various forms.

Answers were variable in quality.

Better answers defined sustainability and then used economic, social and environmental headings to discuss the industry's likely future, identifying that there were both favourable and unfavourable factors at play.

Weaker candidates wrote in general terms about environmental impact or produced answers assessing the sustainability of Bevattna rather than the wider industry.

Many candidates repeated comments from the question about the use of natural resources without properly exploring the issue of natural capital (an important topic which seemed to have passed most candidates by completely) or demonstrating any added value.

Total possible marks

10

Maximum full marks

10

3. Commercial/ethical implications of Bevattna's bulk water strategy

Commercial implications of bulk water strategy

Bevattna's proposed bulk water strategy represents diversification of risk as it reduces reliance on the bottled water industry. Increased concerns about the environment and criticisms regarding unnecessary consumption of bottled water may lead to declining demand for BePure which represents 52% of Bevattna's sales, so this may improve the financial sustainability of the business.

The European bottled water market is mature and highly competitive, and this strategy offers opportunity for revenue growth.

There appears to be a plentiful amount of water to resource this strategy, available at no cost since Bevattna already own the rights to use it, although there may be some negative publicity associated with this. Bevattna will also need to check the terms of its licence.

Bevattna will need funds to invest in appropriate technology and processes – and may need to install new pipelines etc. The costs of transporting bulk water may be prohibitive or may reduce profit margins.

Bevattna needs to assess likely demand from cosmetic companies – it appears that one business, FaceUp, is interested but have any provisional contracts been signed? Will there be long-term demand from the industry or is it a short-term marketing ploy? Large skincare companies may have greater bargaining power than Bevattna and be able to dictate terms and margins.

Are any competitors doing this? Bevattna may have first mover advantage or alternatively there may be no existing businesses because the strategy is not profitable.

Bevattna's core competence is in the sale of bottled water – bulk water is a different market and sales are business-to-business, although it does have existing contracts with hotels, spas etc for BeVee so it has some experience in this market.

To properly evaluate the strategy we need to see forecasts of profit and cashflows, NPV, return on investment, payback etc.

A key risk for Bevattna is that all its business relies on access to the glacier spring but actions by local/global governments designed to improve sustainability may affect either the amount or price at which this is available.

Ethical implications

Bevattna needs to respect legalities so should consider whether its existing licence/ contract permits it to extract water from the spring in bulk quantities for business markets.

Sustainable development recognises the interdependence between business, society and the environment. There is a self-interest threat here – Bevattna is bound to argue that the amount of water it uses is negligible and not damaging to the natural resource, so it may help to have an expert authenticate this. One option is

traceable permits where governments ration the allocation of scarce resources, perhaps in the form of limits to the amount of water that Bevattna is allowed to extract. Alternatively Bevattna could voluntarily self-impose limits.

Bevattna needs to be transparent: transportation of water in bulk may result in carbon emissions which are environmentally damaging. This could affect Bevattna's carbon neutral certification.

Although the primary stakeholders of a company are its shareholders, increasingly there is a need for an organisation to consider other stakeholders and wider areas of social responsibility. Bevattna must consider local communities' attitude to use of their natural resources and consult with stakeholders to assess their needs/interests.

From a corporate social responsibility point of view Bevattna provides employment income for its work force and pays taxes to sustain the economy. The new bulk water strategy may help alleviate natural disasters and water shortages in other parts of the world due to drought etc.

It could therefore argue it is helping to reduce the extremes between the 'haves' and 'have nots' and to alleviate the issues caused in the developing world by poor sanitation/polluted water. However, professional scepticism suggests that it may be easier for Bevattna to promise to help in the event of a natural disaster than to actually be committed to seeing that promise through.

Conclusion and Recommendations

There is some threat to the sustainability of the bottled water industry as environmentally-conscious or budget-conscious consumers switch to refillable bottles or purchase refrigerators with water dispensers. In the long term Bevattna should increase its focus on sales of flavoured and functional waters where demand is predicted to grow as a result of consumers' continued focus on health. The diversification into bulk water would reduce Bevattna's reliance on the bottled water market and provide a long-term alternative market, but it would need to be handled sensitively from a corporate social responsibility perspective.

Generally, this section was not at all well-answered. Most candidates were able to discuss the pros and cons of the proposed diversification, though many did not sufficiently focus on risk. However, as the requirement related to organisational ethics and did not lend itself to use of the transparency/effect/fairness framework, weaker candidates seemed to struggle with the ethics element, with many limiting their answer to a discussion of reputational issues. A significant minority asserted that the proposal might be illegal without reference to the terms of Bevattna's licence. Better candidates discussed Bevattna's corporate social responsibility and expressed professional scepticism, both in relation to the accuracy of the claims in the social media feed and in relation to Bevattna's promised contribution of bulk water in the event of natural disasters.

Recommendation

Although not specified as a separate heading, a significant number of candidates demonstrated higher skills and identified the overall requirement to provide recommendations for Bevattna's future direction. Most either gave advice at the end of each section or at the end of the report, but the quality of these varied, with weaker candidates making unjustified assertions rather than reasoned recommendations that followed from their analysis.

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| Total possible marks | 13 |
| Maximum full marks | 11 |

Question 3**Total marks: 23****General comments**

This scenario looks at a business in India which sells seeds, fertilisers and pesticides to farmers.

To help address the problems caused by climate change, Kehti has developed a smartphone app. A farmer who downloads the Kehti app will input information about the size of their farm, typical crops, and their sowing and harvesting cycles. The app will use scientific data, machine learning and data analytics to help the farmer make informed decisions on what crops to plant, when to sow seeds, and how and when to irrigate. Use of the app is expected to increase yields for farmers by up to 20%.

Many farmers have very low incomes, so Kehti has not yet decided whether to charge an annual fee for use of the app. However, the app will be linked to Kehti's e-commerce platform which is expected to generate extra in-app sales of Kehti's products. Kehti may also earn revenue by sharing information from the app with seed producers and manufacturers of fertilisers and pesticides.

Three potential target markets have been identified and candidates were provided with the results of initial market research, based on a sample of farmers from each of three target markets:

- Smallholders
- Owners of medium-sized farms (typically more technologically able and willing to apply more sophisticated farming techniques)

A national farming co-operative (which would promote the Kehti app to its membership of owners of small and medium-sized farms).

3.1 Expected uptake and additional income

| Potential market | Number (m) | % owning Smartphone | % app users | Overall % adopters | Expected members |
|------------------|------------|---------------------|-------------|--------------------|------------------|
| Small | 120 | 35% | 10% | 3.5% | 4.2m |
| Medium | 35 | 60% | 5% | 3.0% | 1.05m |
| Co-op | 55 | 40% | 12% | 4.8% | 2.64m |

| Potential market | Expected members | Annual cost of app | In-app annual spend \$ | Total product sales \$m | At 25% margin \$m | Annual income | Total net income \$m |
|------------------|------------------|--------------------|------------------------|-------------------------|-------------------|---------------|----------------------|
| Small | 4.2m | Free | 2.50 | 10.5 | 2.625 | 0 | 2.625 |
| Medium | 1.05m | \$1 | 5.00 | 5.25 | 1.3125 | \$1.05m | 2.3625 |
| Co-op | 2.64m | Free | 3.50 | 9.24 | 2.31 | 0 | 2.31 |
| | | | | | | | 7.2975 |

(Note: figures in red are given in the scenario)

Targeting the small farmers is the most lucrative but may be the hardest market as it is so fragmented. The co-operative gives the least net income but will give economies of scale as it offers one point of contact. Assumptions regarding ownership/adoption etc can be challenged but on the face of it Kehti would be better not charging for the app.

The calculation of the gross profit for each target market was generally very well-answered and most used a clear format to present their workings. The most common error was to misapply the gross profit percentage to the app fee as well as the in-app sales. A minority of weaker candidates omitted the calculations entirely or miscalculated the number of users, but own figure marking applied for the resultant calculations. Some weaker answers completely missed out the requirement to provide a brief commentary or just made basic comments that restated how they had performed the calculations.

| | |
|----------------------|---|
| Total possible marks | 6 |
| Maximum full marks | 6 |

3.2 Barriers to implementation for Kehti app strategy

For Kehti:

- The market is vast and Kehti may not have the resources to target all segments
- The AI/data strategy is likely to need significant up-front investment in IT systems, which will require funding. Capturing and processing data from farmers and about weather etc will also have an ongoing cost
- Depending on how much data Kehti already has, establishing the necessary databases and acquiring suitable analytical software may take a significant amount of time
- Kehti may lack the technological expertise to implement the digital solution or may need to outsource some processes, in which case they may become very dependent on the chosen partner
- Collecting and holding personal data about farmers is likely to have legal and security implications. This is especially true if Kehti decides to share the data with other parties (seed manufacturers, research agencies etc). Kehti's management team will need to ensure that appropriate controls are put in place to prevent information falling into the wrong hands and to ensure compliance with relevant legislation. An outsourced partner may be able to help with this
- The Indian agricultural sector is highly fragmented. Targeting appropriate customers may be very time-consuming. Kehti needs to establish a relationship of trust with farmers – this may be easier to do via the farming co-operative than by targeting individual farmers
- A wide variety of climatic conditions and soil types may mean the AI/soil analysis takes time to be effective/provide the right advice
- Diversity of agriculture, crops, culture and language across regions may present challenges and require local tailoring/strategies
- Strong mobile coverage is required - communication networks and levels of technological development vary widely, especially across rural areas, although national investment in infrastructure should improve this.

For farmers:

- The level of ownership of smartphones/ infrastructure required for internet access may vary from one region to another and for different types of farmer (smallholders vs medium-sized farms) so the product may not be accessible by all
- The expense may be prohibitive for some smallholders with low incomes – Kehti needs to make it as accessible as possible for farmers, and needs to identify an appropriate price point for the launch of the strategy
- Farmers come from various backgrounds and may be resistant to change if they are used to using traditional manual farming techniques
- Farmers will take time to adapt to new technologies and processes. Farmers may need training on how to use the app and technology to maintain and monitor crop health and are likely to need ongoing tech support
- Farmers may be reluctant to adopt digital solutions with unproven benefits so uptake for the first year may be lower than anticipated. They may not trust Kehti and may be reluctant/unable to purchase a soil condition sensor.

Answers to this requirement were very good on the whole, but variable in quality at the lower end. A number of weaker candidates framed their answer in terms of barriers to change rather than barriers to

implementation of the app strategy. Better candidates separated their answer between barriers for Kehti (supply side) and barriers for the farmers (demand side).

Total possible marks

9

Maximum full marks

8

3.3 Marketing strategy for new markets

Examiner note: Candidates may adopt a range of approaches to the discussion of marketing strategy and may choose to focus more on segmentation, targeting and positioning or on the marketing mix. This answer is longer than would be expected to cover a range of answers for marking purposes.

An appropriate marketing strategy involves segmentation, targeting and positioning:

Segmentation divides the market into sub-units in order to help target the marketing effort. There are large numbers of rural farmers in India and a generic, mass marketing strategy may be ineffective. Kehti's marketing manager has identified three possible target markets. Another option might be for Kehti to start by targeting its existing customers ie farmers that already buy Kehti's products (see below).

Targeting is about evaluating the attractiveness of each segment and selecting those to target. If one segment is existing customers, then within that Kehti may be more likely to succeed in first instance with younger farmers who are more forward-thinking and open to change, who are technologically literate and who already use apps/social media – in terms of the consumer adoption model, these farmers would be seen as 'innovators.'

Kehti will also need to decide whether to target the whole of India or specific geographical regions eg where most climate data/sensors are available or where there is better telecommunications infrastructure or greater penetration of smartphone ownership.

Positioning requires a detailed marketing mix to be developed for each selected segment.

Two types of marketing are required:

- (1) to attract farmers to download the app
- (2) to users of the app to stimulate usage and encourage them to purchase Kehti products in response to advice and messages

Note that once the app has been downloaded, Kehti can generate individual marketing, tailored to the specific user.

Kehti needs to undertake further market research to understand the market in India and the requirements of the farmers. Research can take the form of analysing existing secondary data (desk research) or gathering new primary information directly from potential users of the app through interviews, surveys etc (field research)

Marketing mix

The standard marketing mix consists of the 4Ps: Product, Price, Place and Promotion. This can be extended to 7 Ps for services (people, processes and physical evidence). The mix would need to be tailored to the target market selected, for example smallholders may be more price-sensitive than those owning medium-sized farms.

Product – the quality and functionality of the app will be important. This may depend on the number of users as this could affect the amount of data that Kehti is able to capture. Kehti needs to consider whether to have a basic app eg with access to the online guides and then have add ons / tailored services for different users

Price – this may be a key issue. Small farmers may not be able to afford an annual membership fee – Kehti may need to start off with a shorter membership period or allow them to pay monthly. It could also have a free or cheap basic service and then charge extra for add-ons. Promotional pricing strategies would help establish brand name and market presence. Kehti may be able to offer a premium, ad-free service and a cheaper option if users are happy to receive ads

Place – Kehti may need to define the geographical area(s) it wishes to target in the first instance. It also needs to consider how to position the app so farmers can readily access it. Kehti could look for a partner

that readily understands the market eg the local representatives of the farming cooperative or agents for products that Kehti sells which farmers already trust

Processes – the app needs to be readily available and easy to download, and Kehti needs to consider whether it is compatible with operating systems eg both Apple and Android. Channels to market should include Kehti’s website and that of the farming co-operative

People – Kehti may need to establish a permanent support team in some key areas with appropriate technical and agricultural knowledge

Promotion – this is required to create awareness and educate farmers about the app; encouraging users may be more dependent on local knowledge and relationships. Kehti may offer the app free to certain brand ambassadors if they are prepared to promote its use

Physical evidence – this may relate to brand image, logos etc but also tangible evidence of accurate forecasts, reduced disease, improved yields etc will help convince those who are slower to adopt the app

This open-ended requirement on marketing strategy was generally well-attempted. Many candidates chose to apply the 4 or 7Ps of the marketing mix. Some marginal candidates as usual wrote in generic terms, failing to apply their answers to the specific scenario. Better candidates discussed the need to identify from 3.1 the market segments that Kehti wanted to target and recognised that the marketing strategy would need to be tailored accordingly. Some weaker candidates mismanaged their time on the other requirements to this question, and as a result produced limited answers.

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|----------------------|----|
| Total possible marks | 10 |
| Maximum full marks | 9 |