

# **2016 VCE Industry and Enterprise examination report**

## **General comments**

In the 2016 Industry and Enterprise examination the majority of students completed all questions. Most responses were detailed and demonstrated sound knowledge of key aspects of the study. However, despite obvious depth in knowledge many responses did not accurately address the question command word(s). Answers must accurately address a question. Students need an understanding of the requirements implicit in designated command words. If an answer does not address the question in a way that meets those requirements, full marks cannot be awarded.

Many answers needed to further link theoretical knowledge to the stimulus materials provided. It is important to refer to and/or incorporate stimulus material in a response. While precise knowledge of a wide range of case studies was demonstrated, many answers did not consider the relevance of the stimulus material to the question being asked.

It was apparent that many responses contained prepared content. These responses tended not to apply directly to the specific question asked. It is recommended that students practise application of knowledge through case study materials throughout the year in order to address this issue. It is also recommended that students complete past examinations and focus on accurately addressing command words and utilising theory in addressing case study scenarios.

# **Specific information**

This report provides sample answers or an indication of what answers may have included. Unless otherwise stated, these are not intended to be exemplary or complete responses.

The statistics in this report may be subject to rounding resulting in a total more or less than 100 per cent.

#### Question 1a.

Marks	0	1	2	Average
%	7	35	59	1.6

'Lifelong learning' has flexible and diverse meanings that encompass the pursuit of knowledge for personal and/or professional reasons. Learning is available to an individual throughout their life and can be accessed in a variety of locations (including work), is both formal and informal, and can be transferred between different jobs and to life in general.



#### Question 1b.

Marks	0	1	2	3	4	Average
%	1	3	2	24	70	3.6

Students could have selected and described any two work-related skills. These included enterprise capabilities and employability skills. Students needed to outline the essential elements of each skill.

The following is an example of a possible response.

Managing and leading is one skill I developed. This involves the ability to take charge of myself and others at work so that tasks can be completed. It means developing the ability to reflect on performance and make improvements, and to manage and lead others. Another work-related skill is communication, which is the accurate exchange of information between a sender and a receiver. I demonstrated these skills in a variety of situations during my structured work placement. This included dealing with customer queries in the workplace as well as drafting written responses to emails.

#### Question 1c.

Marks	0	1	2	3	Average
%	7	25	35	32	1.9

The majority of students could link the development of work-related skills to their lifelong learning. They responded either by using specific skills or by writing a more general response demonstrating the importance of skills to lifelong learning in general. Responses that were awarded full marks explained the link with the use of actual examples as illustration.

The following is an example of a possible response.

The attitude of my employer showed me that it was acceptable to say that I did not know something. This meant that I learnt to be more of a risk-taker by asking for help. I became more confident in my work and in my relationship with my employer. She gave me more responsibility and asked what I thought about issues. This helped me to develop my initiative. Overall, she taught me that I am more capable than I thought I was as a young worker. It means that in the future I will be more open to learning and approach it with a positive attitude.

#### Question 2a.

Marks	0	1	2	Average
%	17	28	55	1.4

An 'enterprise culture' is one where the values and beliefs and ways of behaving in the community or work setting, and the individuals in it, support innovative thinking and risk-taking. Workers and employers will show initiative and be creative problem-solvers who function as a team where each individual brings a variety of skills.

#### Question 2b.

Marks	0	1	2	3	Average
%	6	26	34	35	2

To be awarded full marks students needed to show precisely how they were able to apply their work-related skills to assist the community or work setting to develop, or maintain, an enterprise culture.

The following is an example of a possible response.

An enterprising worker is one who demonstrates many of the enterprise capabilities. These include adaptability, initiative and problem-solving. Adaptability means being flexible when things change. An adaptable worker is one who is open to new ideas and concepts, to working independently or as part of a team, and to carrying out multiple tasks or projects. The worker is able to manage multiple assignments and tasks, set priorities, and adapt to changing conditions and/or work assignments. They can take on the challenge and work with a variety of people. These capabilities contribute to the development of an enterprise culture where a workplace is achieving its objectives through monitoring that these enterprise capabilities are being used in the workplace. If all the workers are demonstrating these capabilities then synergy will occur and the workplace will be more enterprising.

#### Question 2c.

Marks	0	1	2	3	Average
%	10	27	30	34	1.9

The majority of students were able to explain the benefits of developing an enterprise culture in the context of a community or work setting they had worked in.

The following is an example of a possible response.

An enterprise culture is one that proactively meets challenges by supporting effective communication, where participants are encouraged to be adaptable, demonstrate initiative, solve problems and take on leadership roles. This means that the workplace and the individuals who work there will have a range of enterprise capabilities as well as relevant skills. Individual workers will develop the depth of these capabilities over time in one or more workplaces. They will be able to apply skills consistently and this will help to foster an enterprise culture in the workplace. This process is like a spiral where the worker and the workplace will become even more enterprising. While each set of enterprise capabilities is complete in itself, all the capabilities are complimentary and a workplace cannot be totally enterprising if only one set of capabilities is promoted and developed. Therefore it is essential that the managers in all workplace settings encourage and support the development of each set of capabilities.

### Question 3a.

Marks	0	1	2	3	Average
%	35	40	10	15	1

This question was generally misinterpreted. The command word 'distinguish' required students to show the differences between two things. A large number of responses simply defined quality control and quality assurance. To be awarded full marks differences between the two types of quality management needed to be clearly shown.

The following is an example of a possible response.

A key difference is that quality assurance has a focus on process and identification of the steps in the process to prevent quality issues arising while quality control is the measurement of quality and detection of errors during the manufacture of the good or provision of the service. Quality assurance is an independent system that awards an external certificate while quality control can be designed and administered by a workplace. Finally, quality assurance can be seen as proactive and quality control reactive.

#### Question 3b.

Marks	0	1	2	Average
%	10	38	51	1.4

A wide range of examples was used to show how work-related skills would assist the management of quality. To gain full marks a clear link between work-related skills and quality was required.

The following is an example of a possible response.

If workers develop work-related skills they will be more likely to pay attention to the process and the product/service and to take action if a problem occurs. They may use problem-solving skills to identify ways to resolve problems as they occur, and to communicate with other workers and the employer to resolve any quality issues.

#### Question 3c.

Marks	0	1	2	3	4	Average
%	4	25	34	28	9	2.1

The majority of responses provided some explanation of quality management in an industry or work setting. However, a number of responses did not show both the benefits and challenges as required by the command word (discuss). Frequently responses were limited to a description of a process to manage quality but this did not cover the parameters of a 'discuss' question. Students are reminded that they must precisely relate their comments to the question asked. This will involve directly addressing the specific command word(s) in the question.

#### Question 4a.

Marks	0	1	2	Average
%	12	37	52	1.4

'International competitiveness' is the ability of a firm, industry or nation to compete on price and/or quality in an international market.

This question was generally well answered and students were able to show knowledge of the meaning of the term.

#### Question 4b.

Marks	0	1	2	3	4	5	6	Average
%	14	13	13	15	19	17	10	3.1

The majority of responses included a relevant example of an industry that had responded to the need to be internationally competitive. The most common industries cited were manufacturing,

especially the car industry, retail and agriculture. In general students were prepared for this type of question and most were able to provide a relevant and accurate description of the industry's response to the need to become internationally competitive. However, many students did not build on this framework by evaluating or weighing up the costs and benefits of the industry response. Evaluation questions require a conclusion, supported by the facts presented, which, in this case, was an evaluation about the extent to which the industry responded to the pressure to be internationally competitive.

The following is an example of a possible response.

The urbanisation and growing personal wealth in markets such as China has created increased opportunity for Australian firms. Recent Free Trade Agreements have increased this potential. Asia is Australia's largest export destination and Australian food and beverage is regarded as safe, sustainable and fresh, which places our agricultural businesses looking to export in a great position as preferred suppliers to the region. The opportunities in Asia are undeniable; for example, Singapore imports more than 90 per cent of its food and China consumes the highest amounts of food and beverage in the world with import growth over 15 per cent in recent years.

One firm in the regional area where I live decided to take a risk and seek to find a place for their product in the Asian market. As part of my studies I interviewed the owner. His first step was to research the projected trends in the size of the market and type of food demanded. After that the owner, a meat producer, contacted an advisor from Austrade, who gave him information including financial assistance that might be available. Through his own research the owner was able to locate another meat producer in a different state that was successfully exporting to Asia. This has been very valuable in working through the process. With the assistance of his accountant the owner has prepared a business plan to develop timelines and a budget. Next month he will be travelling to Asia and attending a trade fair. He is very optimistic about his ability to compete in the Asian market. The most obvious challenge in this process is the risk he is taking. It will be expensive to introduce new safety and cultural measures to ensure that the product meets Asian requirements. Another challenge was the time taken from other activities in the firm. Overall the potential benefits are so significant that I believe he is warranted in taking this risk. His careful planning and consultation with experts will increase the chances of success.

#### Question 5a.

Marks	0	1	2	Average
%	9	45	46	1.4

Workplace flexibility covers a wide range of work practices that provide flexible arrangements for carrying out work tasks. These are frequently categorised as functional and numerical flexibility. Workplace flexibility includes the ability to work from home (telecommuting), job-sharing, flexible rosters and flex hours.

The majority of responses showed knowledge of the term; however, many did not develop their basic knowledge. A comprehensive definition was required to obtain full marks.

#### Question 5b.

Marks	0	1	2	3	4	Average
%	25	8	34	6	28	2

A significant number of responses did not clearly state two accurate examples of functional flexibility. The majority of these provided examples of numerical flexibility instead. Among the arrangements that could have been cited were job rotation, job enrichment and multi-skilling.

The following is an example of a possible response.

One type of functional flexibility is job rotation – where workers are trained in a wide range of tasks and their work role changes on a regular basis. This allows the worker to gain and regularly use a number of skills in the workplace. Autonomous work teams are another example of functional flexibility. This allows a team of workers to have responsibility for all aspects of the work tasks. The team is often able to independently decide on the allocation of tasks or to modify tasks depending on the demands of the work flow.

#### Question 5c.

Marks	0	1	2	3	4	Average
%	3	2	14	27	55	3.3

Students are reminded that where stimulus material is present responses should refer to it. Most responses cited work-related skills; however, these needed to be linked to older workers, demonstrating clearly how each still could assist an older employee re-entering the workforce. This could have been either skills that older workers had a comparative advantage with or skills that the older workers may need to develop. Full marks were not awarded unless this link was clearly made.

The following is an example of a possible response.

Communication could be a valuable work-related skill for a senior worker who is returning to the workplace. The ability to communicate with prospective clients and fellow workers and be able to impart the wealth of knowledge that a senior person might have would be advantageous for the workplace. However, older workers may not be as skilled with emails and other forms of computer-based communication and so would benefit from training in this area. Teamwork is another employability skill that is desirable when senior people return to the workforce. Being able to work well with other employees will ensure that knowledge and experience is passed on to other employees as well as the senior member of the team gaining knowledge and skill from other team members.

#### Question 6a.

Marks	0	1	2	Average
%	22	26	52	1.3

Most students were able to identify a changing social value related to work practices. Examples cited included: gender roles in the workforce, impact of sustainability initiatives, animal rights/treatment of animals and the desire for a work-life balance.

The following is an example of a possible response.

One changing social attitude is that there is a change in attitudes towards work-life balance. As the roles of men and women, including within a family, has changed many workers want to manage the amount of time that they devote to work. This is especially true of younger more educated professionals. These workers want job flexibility and a limit in their commitment to work especially in terms of hours so that they can maintain their personal and family interests.

#### Question 6b.

Marks	0	1	2	3	4	5	6	Average
%	20	15	13	16	19	9	8	2.6

This question was an 'evaluate' question that required a higher-order response for full marks. Full marks required a weighing up of the effectiveness of the industry response. Many responses did not evaluate the social value described in part a. as instructed. A significant number of responses expanded on the social value but not the response by the workplace or industry and some students did not evaluate at all. Those who addressed the requirements of the question weighed up and came to a logical conclusion regarding the industry response gained full marks.

#### Question 7a.

Marks	0	1	2	3	Average
%	6	30	40	24	1.8

To be awarded full marks students were required to use the stimulus material to establish why the driverless car was an innovative use of technology. To gain full marks responses needed to demonstrate an understanding of what innovation is as well as an understanding of why the driverless car can be classified as innovative.

The following is an example of a possible response.

Innovation generally refers to changing or creating more effective processes, products and ideas. This driverless capsule is an innovative example of the use of technology as it represents a revolutionary design that will significantly improve the commuting and travel experience. It is a totally new design aiming to slash travel times from Melbourne to Sydney to less than one hour, making it more efficient and effective than other existing modes of transport. As well as being considerably faster than current modes of transport, the cost to run it would be significantly less.

#### Question 7b.

Marks	Marks 0		2	Average
%	9	31	60	1.5

This question was well answered. The majority of students demonstrated their knowledge of the role of government in promoting and supporting innovation.

The following is an example of a possible response.

It is important to support business innovation, and encourage individuals and businesses to create innovations such as the 'driverless capsule'. The government can do so by investing in education and research and development to enable innovations to be realised. Furthermore, the government can provide grants and tax concessions to those individuals or organisations pursuing innovative products or ideas.

#### Question 7c.

Marks	0	1	2	3	Average
%	9	20	35	36	2

The majority of students were able to specifically link work-related skills, either as a package or individually, to the development of innovative culture. A clear understanding of work-related skills, innovative culture and the link between these needed to be shown.

The following is an example of a possible response.

An innovative culture is one that proactively meets challenges by demonstrating initiative to pose and solve problems by creating new or improved products and processes to achieve high quality outcomes. In order to create an innovative culture participants must have high levels of work-related skills. Workers must acquire the ability to use initiative, problem-solve, be adaptable and embrace change. The ability to plan effectively and organise resources is also imperative, as is the ability to work with available technologies. These skills will enable the firm to generate the ideas, processes and products that define an innovative culture.

#### Question 7d.

Marks	0	1	2	Average
%	18	44	38	1.2

The majority of responses showed some knowledge of the link between technology and innovative culture. To be awarded full marks students had to show how technology can support the development of an innovative culture. Some responses did so through describing an example of how technology had facilitated an innovative culture, while others were more general.

The following is an example of a possible response.

Technology refers to a machine, process or device that can be applied in a practical setting. Technology evolves on a continual basis and brings about higher levels of efficiency and effectiveness in all work and community settings. This is a key element in promoting innovation. It promotes innovation by providing the opportunity and means to encourage new ideas, as well a way to trial and test the innovation.

#### Question 7e.

Marks	0	1	2	3	Average
%	9	37	31	23	1.7

The majority of responses showed an awareness of the link between research and development, and innovation. A comprehensive explanation was required for full marks. A large number of responses were able to describe the relationship but did not fully explain the relationship or link.

The following is an example of a possible response.

Research and development plays a vital role in the innovation cycle. It promotes innovation by encouraging the growth and development of ideas. This sometimes involves computer simulations or the construction of prototypes. This structured risk-taking allows ideas to be refined and focused so that the chances of success are enhanced.

#### Question 7f.

Marks	0	1	2	3	4	5	Average
%	3	7	24	31	17	17	3.1

Responses included a wide range of examples, including Australia Post's drone deliveries in isolated areas and the Degraves Street dehydrator. Many responses comprehensively linked the new technology to work tasks and processors, clearly showing benefits and challenges as required by the question. Responses that were less comprehensive, including those containing less detail, gave only one side of the discussion (for example, benefits only) or did not relate the technology to a specific setting.

The following is an example of a possible response.

I completed my work placement at an electrical contracting company. During the time I was there, the owner implemented a new electronic invoicing system. The new technology enabled the owner to subscribe to an app, allowing him to input data and job items while on-site. Those items were then automatically transferred to an invoice template, without the need to write up at a later date. It also allowed the electrician to input key job details (customer, time sheet and materials used, etc.) while on-site, with no need for clarification by the office receptionist at a later date. Another feature of this app was that staff time sheets were collated automatically, according to log-on points for various jobs. Invoices as a result were emailed to clients immediately upon completion of the job, where they had the option to pay the invoice via a simple link with various payment options available. An email notification would be sent to the business to notify payment of the invoice immediately and the account reconciled instantaneously. The implementation of this improved system did require a financial outlay and the tradespeople had to be trained on the operation and troubleshooting of the application. My supervisor stated that although there were initial implementation problems, including staff resistance, the investment has been well worthwhile.