**BTEC Assignment Brief**

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| **Qualification** | | Pearson BTEC Level 3 National Extended Diploma in Computing | |
| **Unit number and title** | | **Unit 9: The Impact of Computing** | |
| **Learning aim(s)** (For NQF only) | | **A:** Understand the impact of developments in computing on an organisation  **B:** Investigate the impact of developments in computing technology | |
| **Assignment title** | | Computing impact articles | |
| **Assessor** | |  | |
| **Issue date** | |  | |
| **Hand in deadline** | |  | |
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| **Vocational Scenario or Context** | | You have obtained a part time job writing articles for a computing blog. The editor has asked you to write two related articles about the impact of computing,  the first about the impact that computing developments have had on a specific organisation and the second about the impact the developments in computing have had on society in general. | |
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| **Task 1** | | Write your first article on an organisation of your choice such as a bank, supermarket or other retailer.  To begin with you will need to explain the changes to computers over the last 25 years with particular reference to:   * Improvements in hardware and software * Improvements in devices such as the transition from desktop to mobile * Improvements in network connectivity including broadband and the results such as increased use of social media and cloud technologies * Increasing automation * The rise of big data   You then need to explain the impact these changes have had on an organisation of your choice and on individuals. These impacts should be supported by real world examples.  Good work will analyse the risks associated with these changes including:   * Security issues * Changes in working practices * Increased reliance on IT * Information overload and difficulties with large quantities of data   Outstanding work will evaluate the changes considering the positive and negative aspects.  Finally, you need to extend your article to consider one emerging development and explain the likely impact it will have on your organisation.  You should use high quality fluent technical vocabulary throughout your work. You can be creative and use voice overs supported with written evidence to cover these articles. | |
| **Checklist of evidence required** | | Completed article covering the risks and impact of implementing a new computer system, the impact that computing developments have had and the possible impact of emerging technologies. | |
| **Criteria covered by this task:** | | | |
| Unit/Criteria reference | To achieve the criteria you must show that you are able to: | |
| **9/A.D1** | Evaluate the impact that implementing a new computer system can have on an organisation. | |
| **9/A.M1** | Analyse the risks related to implementing a new computer system in an organisation | |
| **9/A.P1** | Explain the impact that developments in computing have had on an organisation. | |
| **9/A.P2** | Explain the likely impact of an emerging technology on organisations. | |
| **Task 2** | | For your second article you will begin by looking at developments in computing and assessing the environmental and ethical impacts they’ve had on society including:   * The use of electricity * Recycling and disposal of components and electronic waste material * The digital divide * Difficulties for an ageing population and those with disabilities * Privacy and personal data * Legal considerations such as computer misuse * Loss of control of personal data shared online * AI * Robotics and robotic weapon systems * Internet: personal use, copyright and criminal activity   As part of this you should explain how a lack of understanding or access to computing can negatively impact on people.  Extend this article to analyse the benefits and disadvantages of developments in computing on society considering the social and employment impacts.  You need to evaluate one specific development in computing technology (e.g. increasing use of mobile devices, development of on-line retailing etc.), and consider the social, ethical and environmental impacts of this development in particular. | |
| **Checklist of evidence required** | | Completed article covering the impact of a specific development in computing has had on society in general**.** | |
| **Criteria covered by this task:** | | | |
| Unit/Criteria reference | To achieve the criteria you must show that you are able to: | |
| 9/B.D2 | Evaluate the impact that the implementation of a specific development in computing technology has had on wider society. | |
| 9/B.M2 | Analyse the benefits and disadvantages of the social impact of computing technology developments | |
| 9/B.P3 | Assess the potential ethical and environmental impacts of developments in technology. | |
| 9/B.P4 | Explain how lack of understanding or access to IT can disadvantage certain groups of people | |
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| **Sources of information to support you with this Assignment** | | Magazines:  New Scientist, Reed Business Information. Covers lots of developments in technology and other areas.  Scientific American, Nature America. Also covers technology developments although can be very technical.  Websites  BBC News: [www.bbc.co.uk/news/technology](http://www.bbc.co.uk/news/technology)  The technology section of the BBC news website comprises up-to-date articles about the latest technology developments.  LiveScience: [www.livescience.com/technology/](http://www.livescience.com/technology/)  LiveScience is a commercial website with lots of science- and technology-related articles.  IEEE Spectrum:  Spectrum.IEEE.org, magazine style web sites from IEEE (Institute of Electrical and Electronic Engineers). Lots of articles about developments in engineering, specific pages dedicated to articles about computing, robotics and other relevant areas  The Guardian technology pages  [www.theguardian.com/uk/technology](http://www.theguardian.com/uk/technology) Articles on technology but mostly focused on consumer electronics  The Telegraph technology pages:  www.telegraph.co.uk/technology/ Articles on technology development including issues and risks. | |
| **Other assessment materials attached to this Assignment Brief** | |  | |