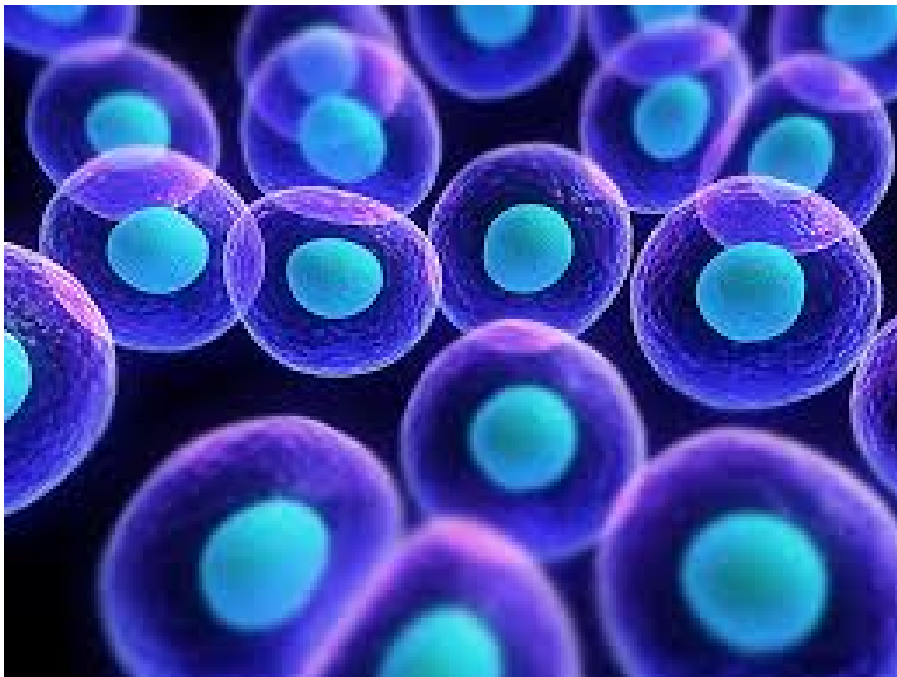




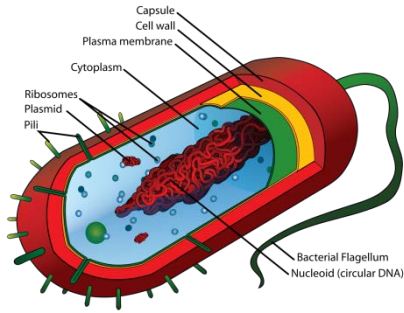
# BTEC Applied Science Diploma (double)

## Summer Work



Hand in – First applied science lesson in September

Name: .....



**Summer Work**

All living things are made up from cells. The structures of different types of cells are related to their functions. Animal cells and plant cells have common features (organelles), such as a nucleus, cell membrane, cytoplasm, ribosomes and mitochondria.

The study of these cells is crucial for us to work out certain processes that take place in the body, and how these cells interlink with each other.

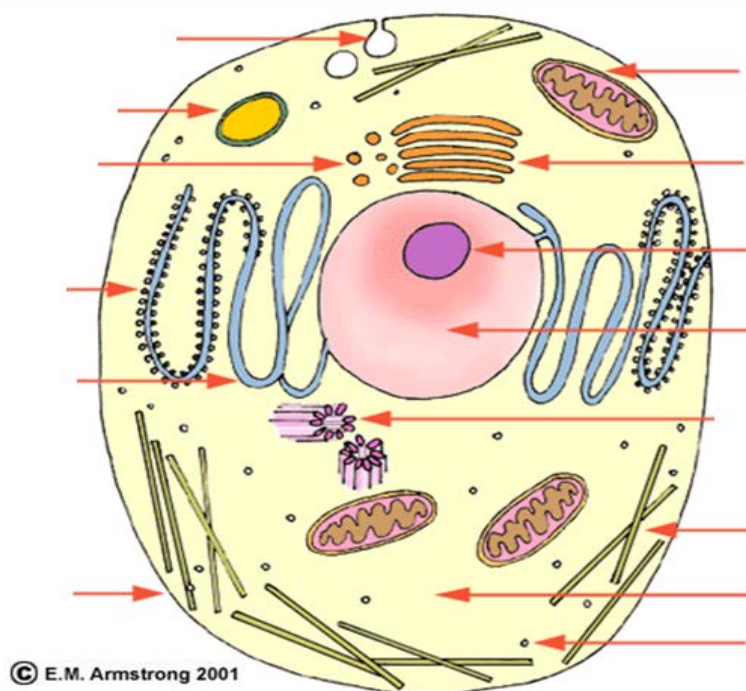
**Task** -Create an article for a biology magazine informing readers of the differences between different types of cells (prokaryotic and eukaryotic).

You need to include the following sections:

**Introduction** – a summary table of the differences between two major types of cells, comparing the types of organelles present in each.

Prokaryotic cells	Eukaryotic cells

**Science** – What are the main features (or organelles) of a eukaryotic cells? Copy and complete the labels for the following diagram of a eukaryotic cell.



**Science explained** – For each of the organelle labelled you need to explain what the function (what its job) is.

**Summary** – Cells become specialised to perform specific functions. There are four types of tissue type in the human body. For each of the following tissues, complete the table.

*Tissue types:*

<b><i>Tissue type</i></b>	<b><i>Where is it found</i></b>	<b><i>How is it used?</i></b>	<b><i>Image of tissue</i></b>
<i>epithelial</i>			
<i>muscular</i>			
<i>nervous</i>			
<i>connective</i>			

The following links might help you explain some of the points above:

[http://www.bbc.co.uk/schools/gcsebitesize/science/add\\_aqa/cells/cellsrev1.shtml](http://www.bbc.co.uk/schools/gcsebitesize/science/add_aqa/cells/cellsrev1.shtml)

<https://www.thoughtco.com/organelles-meaning-373368>

<http://www.news-medical.net/life-sciences/What-Are-Organelles.aspx>

<https://www.sciencedaily.com/terms/organelle.htm>