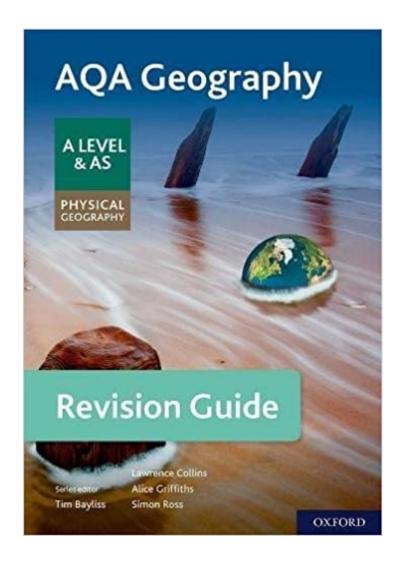


Theory meets strategy

## THAT BROWN ENVELOPE MOMENT?



## HAVE YOU GOT A FULL SET OF NOTES?



#### **BIOLOGY A Level revision AQA**

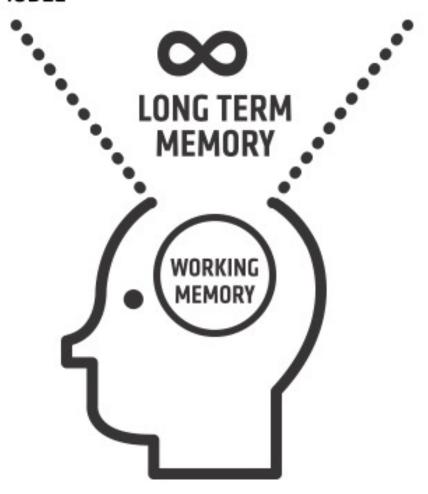
**UNIT 3.1** 

CONTENT	Key concepts	-
3.1 Biological Molecules	1000	
All life on Earth shares a common chemistry. This provides indirect evidence for evolution.  Despite their great variety, the cells of all living organisms contain only a few groups of carbon-based compounds that interact in similar ways.  Carbohydrates are commonly used by cells as respiratory substrates. They also form structural components in plasma membranes and cell walls.  Lipids have many uses, including the bilayer of plasma membranes, certain hormones and as respiratory substrates.  Proteins form many cell structures. They are also important as enzymes, chemical messengers and components of the blood.  Nucleic acids carry the genetic code for the production of proteins. The genetic code is common to viruses and to all living organisms, providing evidence for evolution.		
<ul> <li>The most common component of cells is water; hence our search for life elsewhere in the universe involves a search for liquid water.</li> </ul>		
1.1 Monomers and Polymers		
The variety of life, both past and present, is extensive, but the biochemical basis of life is similar for all living things.	1.5.	
Monomers are the smaller units from which larger molecules are made.		
Polymers are molecules made from a large number of monomers joined together.		
Monosaccharides, amino acids and nucleotides are examples of monomers.		_
A condensation reaction joins two molecules together with the formation of a chemical bond and involves the elimination of a molecule of water.		
A hydrolysis reaction breaks a chemical bond between two molecules and involves the use of a water molecule.		
3.1.2 Carbohydrates		
Monosaccharides are the monomers from which larger carbohydrates are made. Glucose, galactose and fructose are common monosaccharides.	7	
A condensation reaction between two monosaccharides forms a glycosidic bond.		
Disaccharides are formed by the condensation of two monosaccharides:  maltose is a disaccharide formed by condensation of two glucose molecules  sucrose is a disaccharide formed by condensation of a glucose molecule and a fructose molecule  lactose is a disaccharide formed by condensation of a glucose molecule and a galactose molecule.		
Glucose has two isomers, α-glucose and β-glucose, know the structures		
Polysaccharides are formed by the condensation of many glucose units.  • Glycogen and starch are formed by the condensation of α-glucose.  • Cellulose is formed by the condensation of β-glucose.		
The basic structure and functions of glycogen, starch and cellulose. The relationship of structure to function of these substances in animal and plant cells.		T



Why do we forget things?

### WILLINGHAM'S SIMPLE MEMORY MODEL





# So what is retrieval practice?



Retrieval practice & low stakes testing refers to the act of recalling learned information from memory (with little or no support).



The goal is for you to be able to recall information from memory and reinforce learning through quick daily assessments. Evidence shows that actively accessing learned material—rather than merely being retaught it—boosts retention.

# What is NOT good revision?

Reading your notes

Highlighting key information

Re-writing your notes

None of these make you think so you won't remember it.

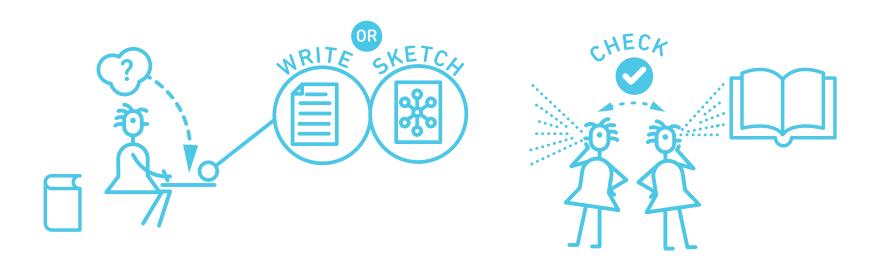


### Retrieval Practice

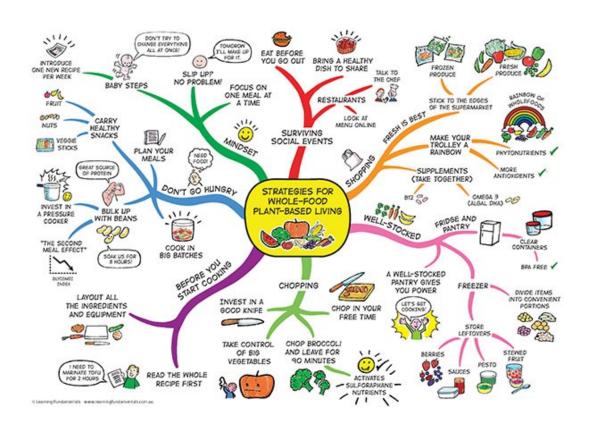


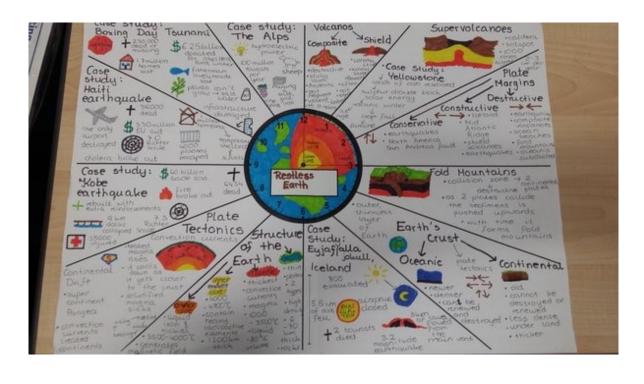
### HOW TO DO IT

Put away your class materials, and write or sketch everything you know. Be as thorough as possible. Then, check your class materials for accuracy and important points you missed.



## Mind mapping, brain dumps and revision clocks





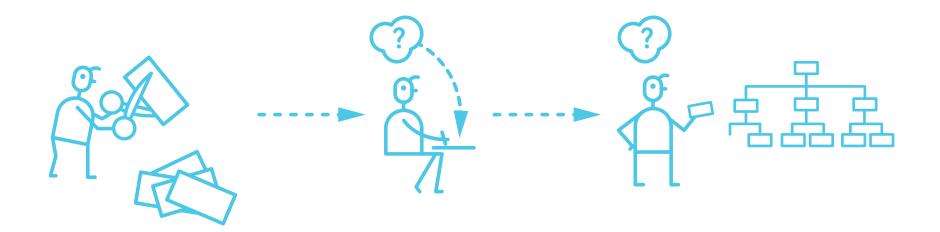


### Retrieval Practice

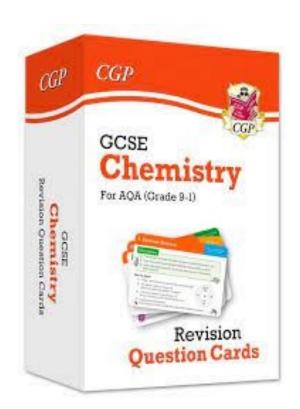


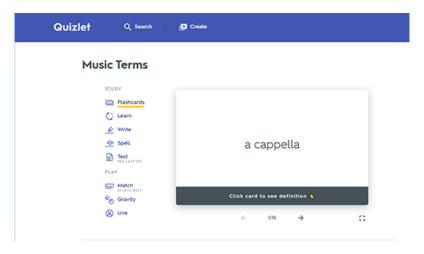
### HOW TO DO IT

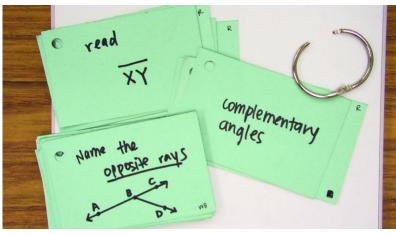
You can also make flashcards. Just make sure you practice recalling the information on them, and go beyond definitions by thinking of links between ideas.



# Quizlet, CGPbooks or your own



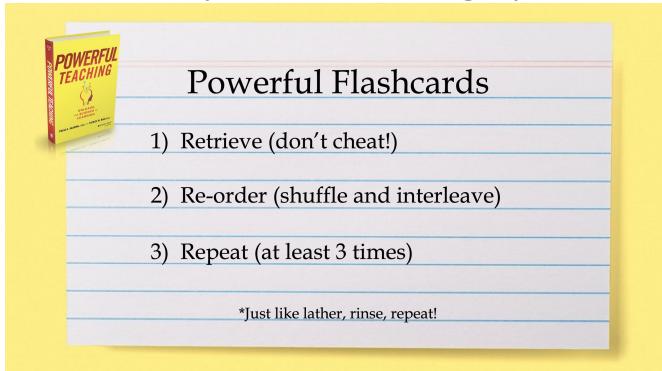




## HOW TO MAKE AND USE FLASHCARDS

 Make them simple with key information – they are really good for learning definitions and factual knowledge

Make lots of them so you are building up knowledge of a topic



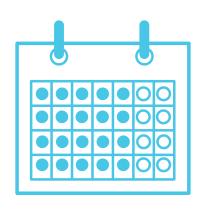


### Retrieval Practice



### HOW TO DO IT

Take as many practice tests as you can get your hands on. If you don't have ready-made tests, try making your own and trading with a friend who has done the same.





## Exam board past papers & Seneca









### **Spaced Practice**



### HOW TO DO IT

Start planning early for exams, and set aside a little bit of time every day. Five hours spread out over two weeks is better than the same five hours all at once.























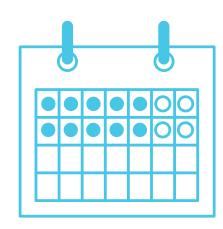






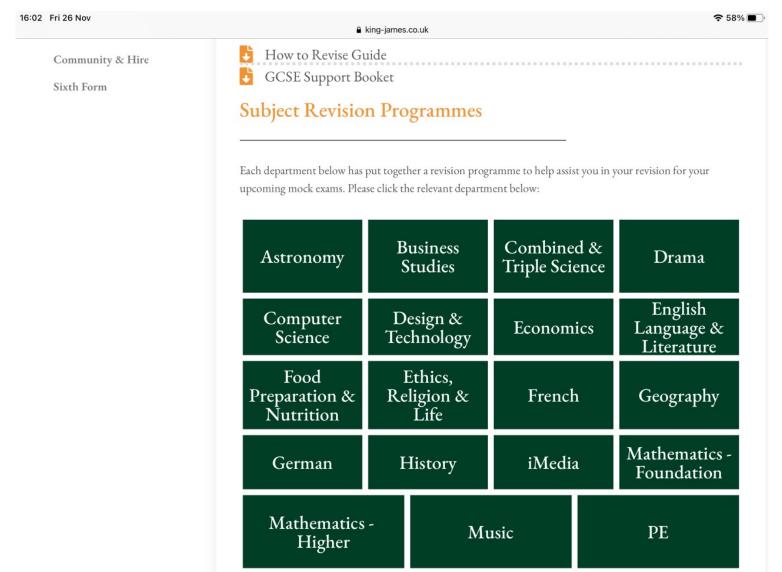








# KJS subject revision programmes



## KJS revision programme



Your teachers have developed a structured revision programme that breaks down the content that you need to know for your exam. Make sure you plan your time effectively to learn this.



Draw up a weekly revision timetable – build in break times, mix up subjects, keep it simple

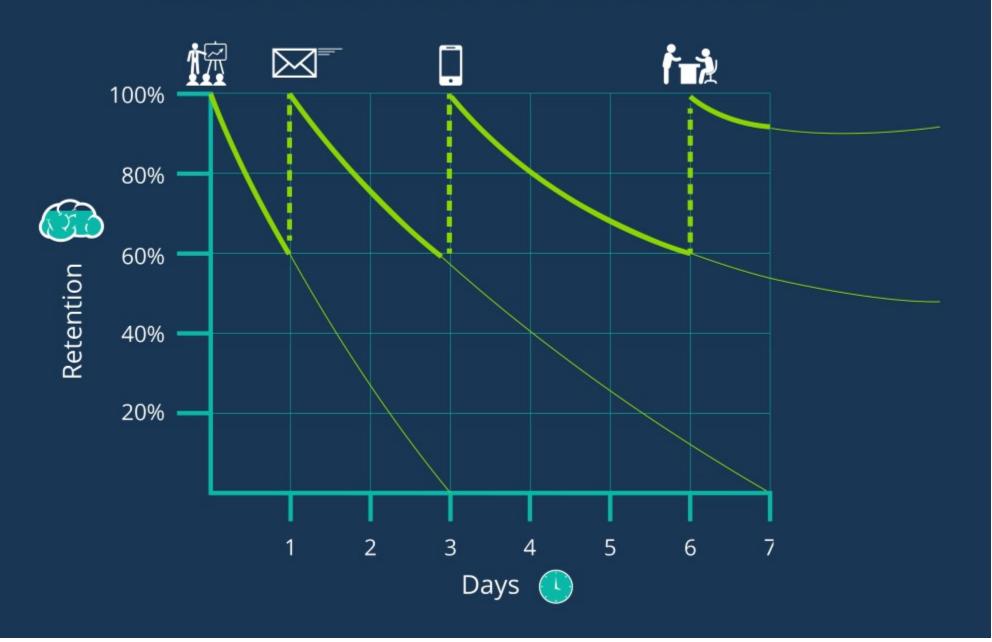


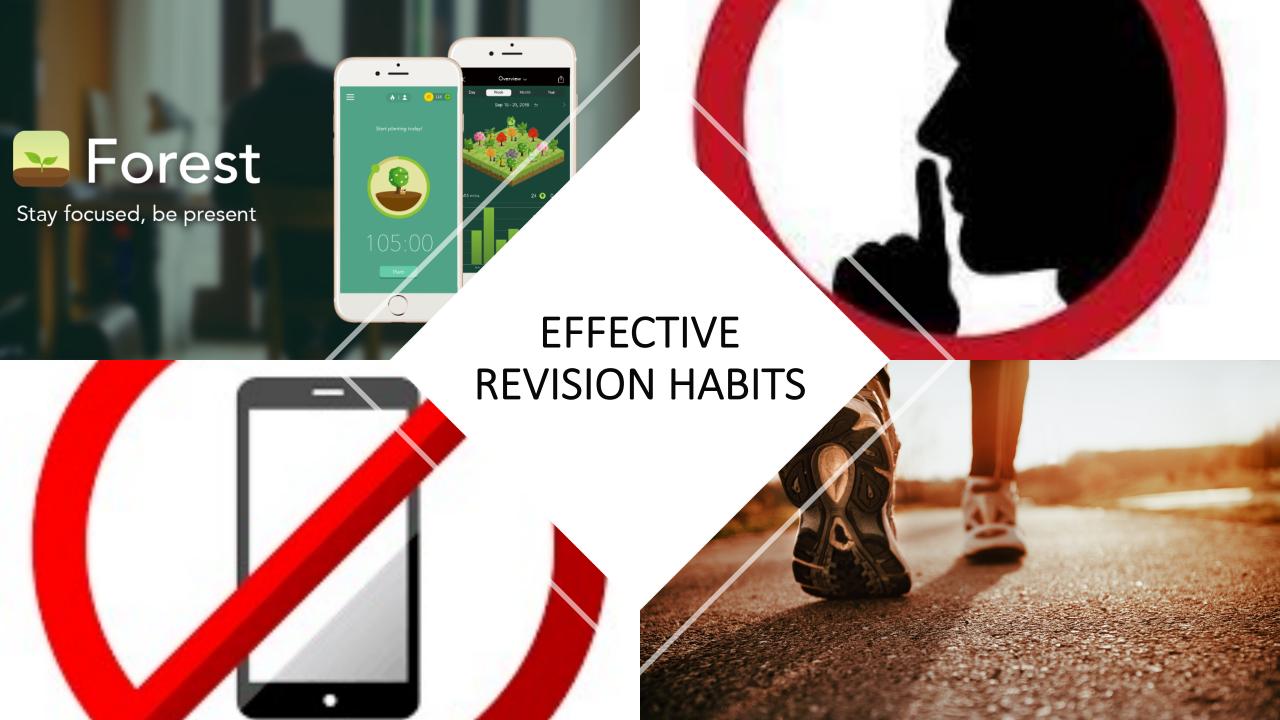
Decide on your preferred revision technique



Try exam questions – go back over ones you have done

# COMBATING THE FORGETTING CURVE





Thanks for listening and good luck!





Remember anything, forever: the basics

