

STARDUST ASSIGNMENTS

LESSON 1: ATOMS & THE PERIODIC TABLE

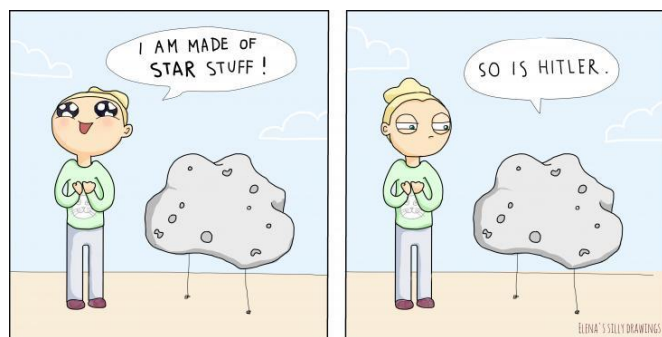
INSTRUCTIONS:

1. Look at your assignment to see whether it needs printing or not. Assignments are provided as pdf files and word documents. Open the pdf (compatible with all machines) unless you want to edit the document on your computer, then open the docx file (formatting may be affected with anything other than windows 10 Microsoft word). There will usually be an online assignment as well, but it is good to practice writing (in most cases) for your exam.
2. Read revision sheets. They will contain everything you need to complete assignments.
2. A range of assignments are provided each week. It's your responsibility to do as many as you need to understand the topic. We understand it's not always possible to do all assignments but bear in mind you can come back to them as revision activities. Completing the bare minimum won't get you the mark you deserve.

COMIC STRIP STORY TIME

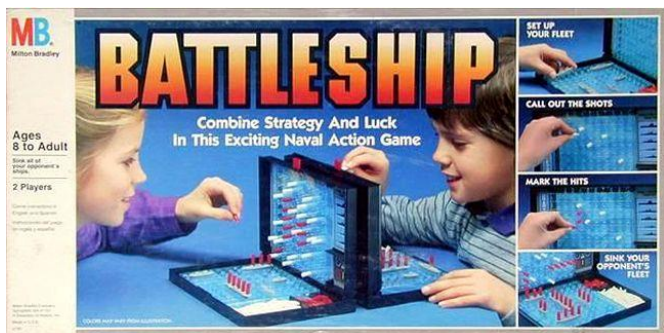
Draw a comic strip, write a story or write a paragraph about how stars make elements. Include the words atom or atoms, element or elements, hydrogen, helium, small, gravity, heavier, bonding or bonded.

Complete below or on your own document/paper.



BATTLESHIPS

With a friend or family member play 'Periodic table Battleships'.



INSTRUCTIONS:

1. Print off two copies of the periodic table. Make sure you and your partner cannot see each other's periodic table.
2. Colour in three 'boats' that are 2 by 1 square long each.
3. Youngest starts first. Guess a 'period and group' that your opponent's battleship may be on. If you 'hit' they must cross out/colour in the element. Remember: not all columns are groups!
4. Continue to take turns guessing the period and group that make up the elements of each other's boats.
5. First person to sink all the opponent's boats wins.

WORKSHEET

Fill in the blanks and answer the questions in the worksheet on the next page.

	Element	Element symbol	Atomic number	Atomic mass	Number of protons	Number of neutrons	Number of electrons	Period	Group	Number of electrons in outer shell
1	Carbon	C	6	12	6	6	6	2	4	4
2	Potassium	K	19			20	19			1
3	Magnesium	Mg								
4	Neon		10							
5	Argon	Ar	18	40	18	22	18			8
6	Fluorine									7
7	Nitrogen									5
8	Aluminum									3
9	Lithium	Li			3					
10	Calcium									
11	Oxygen									
13	Silicon									

14. Explain how you would calculate the number of neutrons of an element from a periodic table?

15. Are you allowed a calculator in all IGCSE Chemistry exams with your exam board, Edexcel?