High Tunstall College of Science Curriculum Intent

Subject: Chemistry Year: 9

Thread 1—Atomic Structure and the Periodic table



	Chemistry Thread 1		Progress		
Торіс	Key ideas	R	Α	G	
Atomic Struc-	I can describe atoms, elements and compounds				
Periodic Table	I can produce word and symbol equations for reactions				
	I can explain the structure of the atom and calculate number of protons, neutrons and electrons				
	I can explain how electrons are arranged in atoms				
	I can explain how the periodic table is arranged and link this to trends in properties of elements				
	I can explain how mixtures can be separated by a variety of means, including filtration, evapora- tion, crystallisation, distillation and chromatography				

Lesson	Learning Focus	Assessment	Key Words
1	How are atoms, elements and compounds different?	Completion of tasks including identifica- tion of atoms, elements and compounds	Atom, element, compound
2	How do we show chemical reactions?	Completion of word and symbol equations	Reactant, product, equa- tion
3	What are atoms like?	Differentiated activities looking at atomic structure and calculation of PEN numbers	Atom, nucleus, proton, electron, neutron
4	How are electrons arranged?	Completion of task showing electronic configuration in atoms	Atom, nucleus, proton, electron, neutron
5	How are elements arranged?	Differentiated tasks exploring the arrange- ment of the periodic table and how this relates to atomic structure	Atom, element, group, period, trend
6-7	How do we separate mixtures?	Completion of a series f practical activities looking at methods of separation, and application tasks	Filtration, evaporation, crystallisation, distillation, chromatography