## Access to H.E. National Programme Unit



Unit Title:	Structure and Bonding		
Graded Unit Code:	GA33CHE09	Ungraded Unit Code:	UA33CHE09
Pathway(s):	Science and Engineering		
Module(s):	Chemistry		
Level:	3	Credit Value:	3
Valid from:	1 <sup>st</sup> August 2014	Valid to:	31 <sup>st</sup> July 2028

## The following QAA grade descriptors must be applied if you are delivering the graded version of this unit:

1	Understanding of the subject
3	Application of skills
7	Quality

LEARNING OUTCOMES	ASSESSMENT CRITERIA	
The learner will:	The learner can:	
Understand atomic structure	Describe the properties of electrons, protons and neutrons using relative charge and mass	
	1.2 Describe the structure of atoms in terms of atomic particles	
	1.3 Define atomic number and mass number	
	Explain isotopes and hence relative atomic mass	
	1.5 Calculate relative atomic masses from isotopic abundance data	
Understand covalent bonding and the structure of molecules	2.1 Describe covalent bonding	
	2.2 Write the formulae of simple covalent compounds	

## Access to H.E. National Programme Unit



LEARNING OUTCOMES	ASSESSMENT CRITERIA	
The learner will:	The learner can:	
	Investigate properties of covalent compounds, including melting and boiling points and solubility	
	2.4 Explain bond polarity in terms of electronegativity	
Understand ionic bonding and some properties of ionic compounds	3.1 Describe the ionic bond	
	3.2 Write the formulae of simple ionic compound	
	3.3 Investigate the properties of typical ionic compounds	