Question Number	Answer	Acceptable answers	Mark
1(a)(i)	3 (÷ 20) (X100) (1) 15 (%)	**Accept 3** ÷ 13 Full marks for correct bald answer	**(2)**

Question Number	Answer	Acceptable answers	Mark
1(a)(ii)	Any two of the following: can photosynthesise more (1) higher light intensity / more light (1) more water / rain (1) warmer (1) more mineral ions / nutrients(1)	accept: reverse argument for woodland Accept: more competition from trees (for water / mineral ions) (1) bigger leaves (1) less flowers eaten (1) different genes (1)	**(2)**

Question Number	Answer	Acceptable answers	Mark
1(b)(i)	**A** stomata		**(1)**

Question Number	Answer	Acceptable answers	Mark
1(b)(ii)	diffusion / diffusing /	Accept description of diffusion eg carbon dioxide molecules move from an area of high concentration to an area of low concentration accept diffuse	**(1)**

Question Number	Answer	Acceptable answers	Mark
1(b)(iii)	• guard cells change shape / (guard cells) close stomata /guard cells close (1) • to reduce water loss /rate of transpiration reduced (1)	accept stop water loss / keep water in Ignore get more water	**(2)**

Total for Question 1 = 8 marks

Question Number	Answer	Acceptable answers	Mark
2(a)(i)	B		**(1)**

Question Number	Answer	Acceptable answers	Mark
2(a)(ii)	Any two from the following: • diffusion (1) • from an area of high concentration to an area of low concentration/down a concentration gradient (1) • through stoma / stomata (1)	Accept pores / between guard cells Ignore through guard cells	**(2)**

Question Number	Answer	Acceptable answers	Mark
2(a)(iii)	Any three from the following: • (by) photosynthesis (1) • ref to chloroplast / chlorophyll (1) • requires carbon dioxide and water (1) • light (energy) needed (for photosynthesis)(1) • (to produce) glucose (1)	Ignore incorrect balancing of equations throughout Reject (and) respiration Accept if written on arrow in word / formula equation Accept correct formulae word / formula equation Accept if written on arrow in word / formula equation Reject energy is created / produced Accept sugar from word / formula equation	**(3)**

Question Number	Answer	Acceptable answers	Mark
2(b)	water——————— osmosis (1)	3 lines, 1 correct = 0 mark 3 lines, 2 correct = 1 mark 4 lines, 1 correct = 0 mark 4 lines, 2 correct = 0 mark	
	mineral ions \ active transport (1)		**(2)**

(Total for question 2 = 8 marks)