

Question Number	Answer	Mark
8 (a) (i)	(7mm / largest seed size) because has greatest germination success ;	(1)

Question Number	Answer	Mark
8 (a) (ii)	<ol style="list-style-type: none"> 1. correct values from graph, i.e. 4 (au) and 20 (au) ; 2. correct subtraction e.g. $20 - 4 = 16$; 3. (change \div original) X 100 to give correct answer, e.g. $(16 / 4) \times 100 = 400\%$; <p>For correct answer of 400% - 3 marks</p>	(3)

Question Number	Answer	Mark
8 (a) (iii)	<ol style="list-style-type: none"> 1. idea of maintaining or increasing {genetic diversity / size of gene pool / genetic variation} ; 2. idea of more chance of having beneficial alleles / eq ; 3. increases chance of future survival {if environment changes / due to higher adaptability } / eq ; 4. less chance of all being susceptible to a disease / eq ; 	(3)

Question Number	Answer	Mark
8 (b)	<ol style="list-style-type: none"> 1. details of assessment of seed viability e.g. only select seeds with a living embryo, use of X ray (to detect embryo presence) / eq ; 2. idea of {cleaning seeds / surface sterilisation / eq} ; 3. idea of drying (of the seed) ; 4. idea of storing at low temperatures ; 5. idea of regularly testing viability (during storage of seed) ; 6. idea of what to do if viability decreases, e.g. if less than 75% germinate collect fresh seed for storage ; 	(4)