

Question Number	Answer	Additional guidance	Mark
8(a)(i)	<p>The only correct answer is D the number of species</p> <p><i>A is not correct because it refers to more than just animals</i></p> <p><i>B is not correct because it refers to more than just plants</i></p> <p><i>C is not correct because that is species evenness</i></p>		(1)

Question Number	Answer	Additional guidance	Mark
8(a)(ii)	<p>A description that includes two of the following points:</p> <ul style="list-style-type: none"> determining the genetic {diversity / variation} (of a species) (1) by the number of different alleles present (1) by calculating the heterozygosity index (1) 	<p>Mark their first method</p> <p>ignore allele frequency ignore genes</p> <p>Accept correct equation</p>	(2)

Question Number	Answer	Additional guidance	Mark
8(b)	<p>An explanation that includes three of the following points:</p> <ul style="list-style-type: none"> deforestation (of mangroves) causing habitat loss (1) reduction in food due to {deforestation (of mangroves) / competition with other species / overfishing} (1) {pollution / change in salinity} of river making it unsuitable habitat (for the crocodile) (1) {disease / hunting} (causing death of crocodiles) (1) 	<p>ignore water levels</p> <p>Accept reduction in food due to pollution of river</p> <p>Accept pollution killed {crocodiles / caused migration of crocodile}</p> <p>Accept fewer mates due to lower population / {gender imbalance / fewer eggs hatching} due to global warming</p>	(3)

Question Number	Answer	Additional guidance	Mark
8(c)(i)	<p>A calculation that shows the following steps:</p> <ul style="list-style-type: none"> calculation of percentage of females (1) calculation of number that would develop (1) 	<p>Example of calculation:</p> <p>$100 - 23 = 77$ $(350 \div 100) \times 77 = 269 / 270$ Do not accept a decimal answer Correct answer with no working shown scores full marks</p>	(2)