Answers and mark guide

Q	Answer	Working	Marks
1	**negative correlation**	As x increases, y decreases.	2
2	**positive correlation**	As x increases, y increases.	2
3	**positive correlation**	As x increases, y increases.	2
4	**negative correlation**	As x increases, y decreases.	2
5	**positive correlation**	As x increases, y increases.	2
6	**32 (accept a small tolerance)**	y = 2x + 18	3
7	**-19 (accept a small tolerance)**	y = -2x + 5	3
8	**-22 (accept a small tolerance)**	y = -3x + 11	3
9	**18.5 (accept a small tolerance)**	y = 0.5x + 16	3
10	**11 (accept a small tolerance)**	y = -2x + 19	3
11	**y = 3x + 10**	y = mx + c	4
12	**8**	Read across from y, then down.	4
13	**No: extrapolation beyond the range of data**	40 is far outside the data.	3
14	**gradient -3**	y falls by 3 for each extra unit of x	4
15	**An outlier; it can be ignored when drawing the line**	It does not follow the trend.	3
16	**-5.625**	y = -3×6.875 + 15	5
17	**Extrapolation is unreliable**	The pattern may not continue outside the range of the data.	3
18	**3**	The gradient is 3	4
19	**6**	-3x + 18 = 0	5
20	**negative**	As x increases, y changes in the direction of the trend.	3

My score: _____ / **63** Questions 1–15 = 43 marks (Foundation focus)