1	(a)	2.7	1	B1	condone 2.7 million
	(b)	Malaysia	1	B1	cao
	(c)	Correct bar drawn	1	B1	for correct bar at a height of 5.4 (within half small square) allow any bar width or location (no gap required) condone stick at correct height.
	(d)	Russia	1	B1	cao
					Total 4 marks

2	e.g. 360 – (30 + 45 + 165) (= 120)		4	M1	method to calculate One Stop Shoes angle
	e.g. $\frac{30}{45}$, 18 (= 12) or $\frac{30}{120}$, 48 (= 12) oe			M1	method to calculate ABC Shoes frequency
,	e.g. $165 \div 45 \times 18$ (= 66) oe or $165 \div 30 \times$ "12" (= 66) oe or $165 \div$ "120" \times 48 (= 66) oe or $18 + 48$ having shown or implied that $120 + 45 = 165$ and a clear intention that this is the method for Superfast Trainers (= 66)			M1	method to calculate Superfast Trainers frequency
		12, 120, 66		A1	fully correct table
					Total 4 marks

3	(a)		correct bar	1	B1 for bar drawn at correct height of 13
					Allow a line instead of a bar
	(b)		Brazil	1	B1
	(c)	29		2	M1 for $\frac{29}{k}$ with $k > 29$ or $\frac{n}{113}$ with $n < 113$ oe May work in millions Allow incorrect notation e.g. 29 out of 113 or 29:113 oe
			$\frac{29}{113}$		A1 oe Allow 0.26 or 0.256(6371)
			113		Total 4 marks

4	(a)	$\begin{vmatrix} \frac{16}{40} \times 360 \text{ oe or } \left(\frac{16}{40} \times 100\right) \frac{40}{100} \times 360 \text{ oe or} \\ 360 \div (40 \div 16) \end{vmatrix}$		2	M1 Allow two stages e.g. $\left(\frac{16}{40} \times 100 \text{ and}\right) \frac{'40'}{100} \times 360 \text{ oe}$
			144		A1 cao
	(b)	E.g.		2	M1
		48 ÷ 192 × 56 oe or			
		$\left(\frac{48}{192} \times 100 = 25 \right) \frac{25}{100} \times 56 \text{ oe or} $			
		$(192 \div 48 (= 4) \text{ and}) 56 \div '4' \text{ or}$			
		$192 \div 56 = 3.4$ and $48 \div 3.4$			
			14		A1 cao
					Total 4 marks

5	(a)	$95 \div (30 \div 24)$ oe eg $95 \div 1.25$ or $95 \times (24 \div 30)$ oe eg 95×0.8		2	M1	
		Working not required, so correct answer scores full marks (unless from obvious incorrect working)	76		A1	Answer may be in the table or clearly stated on the diagram
	(b)	French "76" Arabic 60° English 60 and 75° Spanish 100°	Correct "76" and 60, angles of 60 ^[o] , 75 ^[o] and 100 ^[o] and correct pie chart	3	В3	B3 for fully correct pie chart (including labels) and 3 correct angles and <i>their</i> 76 (answer from (a)) for frequency for French and 60 for frequency for English in the table OR
						B2 for 3 or 4 numbers from <i>their</i> 76 or $60^{[\circ]}$ or 60 or $75^{[\circ]}$ or $100^{[\circ]}$ in the table and at least one angle in pie chart correct or 5 numbers: <i>their</i> 76, $60^{[\circ]}$, 60 , $75^{[\circ]}$ and $100^{[\circ]}$ in the table with no pie chart (or incorrect pie chart)
						OR
						B1 for two numbers from <i>their</i> 76 or $60^{[\circ]}$ or 60 or $75^{[\circ]}$ or $100^{[\circ]}$ in the table
						NB Use their value from part (a) throughout their working
						Total 5 marks

6	(e)	eg Heights of bars (cms): 7, 5.5, 3 or		2	B2	B2 for all bars at correct heights with a
		heights of 3.5, 2.75, 1.5 cms	bars at correct heights and correct scale			correct scale (at least one value, not contradicted. 0 implied) If not B2 then B1 for 1 error on heights or no scale, but with heights in correct
						proportion eg 7, 5.5, 3 cms

7	(a)	Transport walk bus bicycle car	Tally	7 6 4 3 3	2 B2	for all correct frequencies (B1 for 2 or 3 correct frequencies or 2, 3 or 4 correct tallies with no frequencies (or incorrect frequencies) or frequencies written as probabilities with 2, 3 or 4 correct numerators)
	(b)	6 5 4 3 2	ik bus bicycle	car	3 B2	(B1ft for 2 or 3 correct bars ft from table)
						Total 5 marks

8	(a)	$150 \div (90 \div 18)$ oe eg $150 \div 5$			2	Ml	for a complete method to find the number of people for running
				30		A1	if answer line is blank, check the table for answer
	(b)	eg 360 – (90 + 150 + 15 × "5") (= 45) oe	eg 360 ÷ "5" (= 72)		3	M1	for working out the angle for swimming or the total number of people check the table for answers ft their "5" from 90 ÷ 18
		"45" ÷ "5"	"72" – (18 + 15 + "30")			M1	for a complete method to work out the number of people for swimming ft their "5" from 90 ÷ 18 ft their "30" from (a)
				9		A1	if answer line is blank, check the table for answer
							Total 5 marks

9	(a)				Do	r drawn of hei	abt 0	1	B1		
9	(a)				Da	USA	gm o	1	B1		
	(b)									•	
	(c)					France		1	B1		
	(d)					13		1	B1	Allow 13 000 000	
										To	otal 4 marks
- 10		1									
10	(a)					В		1	B1	Accept b or 'Country B	
	(L)					1 1	1. 67	1	D1	incorrect spelling if mea	ning is clear
	(b)					bar at heig		1	B1	any width is acceptable Allow 11 million or 11 (200 000 :
	(c)					11		1	B1		000 000 m
										the answer space	tal 3 marks
										10	tai 3 marks
11	(a)	1				40)	1	B1		
- 11	(b)	-				US		1	B1	•	
	_ ` '					95		1			
	(c)	_						1	B1	•	
	(d)					Bar drawn	neight 25	1	B1	Т.	. 1 4 1
										100	tal 4 marks
									1		
12	(b)	Type	Tally	Frequency				2		r all frequencies correct	2 - 11:
		of rice	"	' '						or 2 frequencies correct o	
										et or 1 tally with its frequence	ency
		arborio	Ш	4					соттес	٠١)	
		basmati	11#11	6							
		jasmine	ІІШНІ	7							
		,									
		wild	III	3							
						_					
13	(a)	40 (((0))				8		1	B1 ca		
13	(a) (b)	40 – ("8"	+ 14 + 1	11) oe or 40 –	33 or	8		1 3	M1 fc	or 40 minus their 3 readin	
13		40 – ("8" or 18 – 11	+ 14 + 1 or 21 -	11) oe or 40 – - 14 or 15 – "8	33 or	8			M1 fo	or 40 minus their 3 reading one incorrect reading from	
13		or 18 – 11	+ 14 + 1 or 21 -	11) oe or 40 – - 14 or 15 – "8	33 or "	8			M1 fo (allow or 11)	or 40 minus their 3 reading from the or 40 minus the or	om 8 or 14
13		40 – ("8" or 18 – 11	+ 14 + 1 or 21 -	11) oe or 40 – - 14 or 15 – "8	33 or	8			M1 fo (allow or 11) A1(ft	or 40 minus their 3 reading one incorrect reading from	om 8 or 14
13		or 18 – 11	or 21 –	- 14 or 15 – "8	,,		1. 61		M1 fo (allow or 11) A1(ft 11))	or 40 minus their 3 reading one incorrect reading from the for 15 – "8" or 40 – ("8")	om 8 or 14
13		or 18 – 11 7 Correct a.	or 21 –	- 14 or 15 – "8 cores full mark	33 or " ks (unless from	Correct heig	ght of bar		M1 fo (allow or 11) A1(ft 11)) A1 ft	or 40 minus their 3 reading one incorrect reading from the for 15 – "8" or 40 – ("8" dep on M1	om 8 or 14 + 14 +
13		or 18 – 11	or 21 –	- 14 or 15 – "8 cores full mark	,,		ght of bar		M1 fc (allow or 11) A1(ft 11)) A1 ft ± half	or 40 minus their 3 reading one incorrect reading from the for 15 – "8" or 40 – ("8" dep on M1 square tolerance for height	om 8 or 14 + 14 +
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	(b)	or 18 – 11 7 Correct a obvious in	nswer se	- 14 or 15 – "8 cores full mark working)	,,		ght of bar	3	M1 fc (allow or 11) A1(ft 11)) A1 ft ± half Awar height	or 40 minus their 3 reading for one incorrect reading from 15 – "8" or 40 – ("8" dep on M1 control of a marks for a fully correct of 7	om 8 or 14 + 14 + tht of bar ect bar of
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	(b)	or $18-11$ 7 Correct a obvious in $138 \div \frac{72}{12}$	nswer sacorrect	- 14 or 15 – "8 cores full mark working)	ks (unless from	Correct heig		3	M1 fc (allow or 11) A1(ft 11)) A1 ft ± half Awar-height	or 40 minus their 3 reading for one incorrect reading from 15 – "8" or 40 – ("8" dep on M1 control of a marks for a fully correct of 7	om 8 or 14 + 14 + tht of bar ect bar of
	(b)	or $18 - 11$ 7 Correct a obvious in $138 \div \frac{72}{12}$ Correct a	nswer so	cores full mark working) 88 ÷ "6" cores full mark	,,			3	M1 fc (allow or 11) A1(ft 11)) A1 ft ± half Awar height	or 40 minus their 3 reading for one incorrect reading from 15 – "8" or 40 – ("8" dep on M1 control of a marks for a fully correct of 7	om 8 or 14 + 14 + tht of bar ect bar of
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14	(a)	or $18-11$ 7 Correct a obvious in $138 \div \frac{72}{12}$ Correct a obvious in	nswer so	cores full mark working) 88 ÷ "6" cores full mark working)	ks (unless from ks (unless from Freq rking) Corre	Correct heig 23 uencies of 2, 4, 3, 6 ct bar chart	2	3 2 M1 A1	M1 for (allow or 11) A1 (ft 11)) A1 ft ± half Awar height M1 A1 for at le mark fr If no ott answers B1 for abbrevi: B2ft for	or 40 minus their 3 reading for one incorrect reading from the for 15 – "8" or 40 – ("8" dep on M1 as a fact a for a fully correct to fully correct to for a fully correct to full	t t
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14	(a)	or $18-11$ 7 Correct a obvious in $138 \div \frac{72}{12}$ Correct a obvious in	nswer so	cores full mark working) 88 ÷ "6" cores full mark working)	ks (unless from ks (unless from Freq rking) Corre	Correct heig 23 uencies of 2, 4, 3, 6 ct bar chart	2	3 2 M1 A1	M1 for (allow or 11) A1 (ft 11)) A1 ft ± half Awar height M1 A1 for at le mark fr If no ott answers B1 for abbrevi: B2ft for	or 40 minus their 3 reading for 15 – "8" or 40 – ("8" dep on M1 as a square tolerance for height of 3 marks for a fully correct tof 7 Total as 2 correct tallies or freequencies only – in either ther marks awarded, awards of $7 \times \left(\frac{14.5 - 9y}{2}\right) + 3y = \frac{1}{3}$ labelling the bars (can be altions) in 3 or 4 column heights correct or 3 or 4 column heights correct and incorrect or 3 or 4 column heights correct or 3 or 4 col	t t

16	(a)	$\frac{55}{90} \times 360 \text{oe}$		2	M1	Allow 0.61 × 360
		Correct answer scores full marks	220		A1	Accept 219.6 - 220
		(unless from obvious incorrect working)				
	(b)	$\frac{195}{39} (=5) \text{ or } 5:1$ or $\frac{39}{195} (=\frac{1}{5} = 0.2) \text{ or } 1:5$ or $\frac{75}{195} (=\frac{5}{13} = 0.38) \text{ or } 5:13$		2	M1	starting to work with 195° and 39 people or starting to work with 195° and 75°
		or $\frac{195}{75} \left(= \frac{13}{5} = 2.6 \right)$ or 13:5	15		Al	
		Correct answer scores full marks (unless from obvious incorrect working)	13		AI	
						Total 4 marks