FOCUS 4 TASKS - Set 1

Each of the 30 topics is covered once within the 5 sheets

Sheet 1A

Use of Calculator (inc percentages)	Q1
Expand and Simplify	Q2
Linear equations	Q3
Trigonometry	Q4
Rotations	Q5
Plans and Elevations	Q6

Sheet 1B

Two Way Tables	
Expanding Double Brackets	
Circles	
Product of Prime Factors	
Averages from a Table	
Compound Measures	

Sheet 1C

Exchange Rates	Q1
Translations	Q2
Sequences - nth term	Q3
Straight Line Graphs	Q4
Estimation	Q5
Enlargements	Q6

Sheet 1D
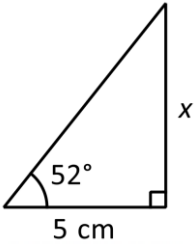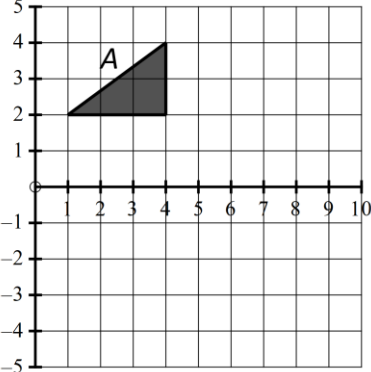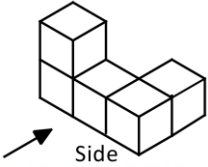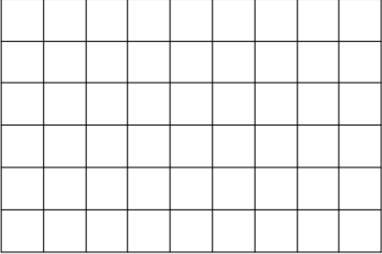
Probability from a Table	
Pythagoras	
Reflections	
Standard Form	
Averages from Grouped Data	
Equivalence	

Sheet 1E

Scatter Graphs	Q1
Alternate and Corresponding Angles	Q2
Index Laws	Q3
Inequalities	Q4
Volume	Q5
Proportion	Q6

FOCUS 4 TASK 1A

NAME _____

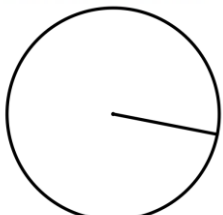## SKILLS CHECK

1) 58 + 98 =	2) 96 - 59	3) 6×7
4) $5 \div 20$	5) $\frac{2}{3} \times \frac{1}{4}$	6) Write in ascending order 0.11, 0.1, 0.101,
7) 15% of £480	8) A distance of 5 km is represented as 10 cm on a map. What is the scale of the map?	9) Divide £320 in the ratio 3 : 5

QUESTION 1	QUESTION 2	QUESTION 3
Work out 2.4% of £244 $\frac{23}{24}$ of £45	Expand and simplify $2(2a + b) + 3(a + 2b)$	Solve $5x + 3 = 3x + 17$

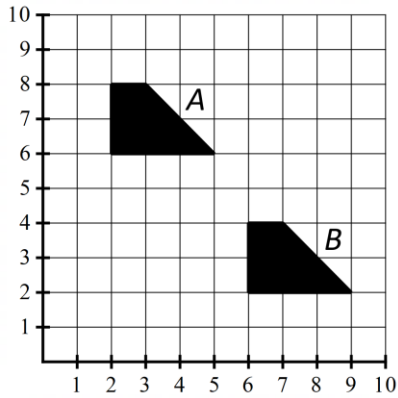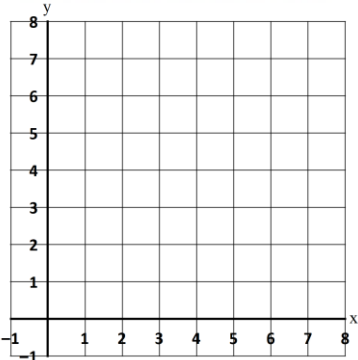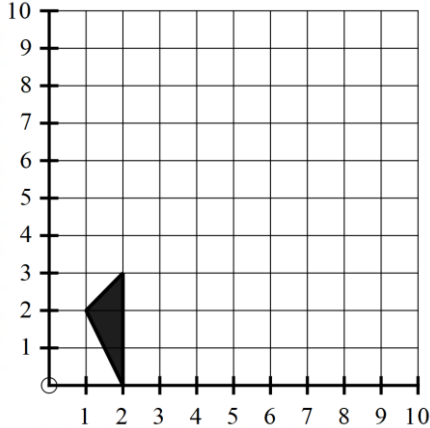| QUESTION 4	QUESTION 5	QUESTION 6
Calculate x correct to 1 decimal place 52° 5 cm	Rotate triangle A, 90⁰ clockwise about centre (0,0) .Label your triangle B 	Draw the plan and side elevation Side

FOCUS 4 TASK 1B

NAME _____

SKILLS CHECK

1) 39 + 76 =	2) 82 - 47	3) 9×8
4) $8 \div 16$	5) $\frac{1}{5} \times \frac{5}{6}$	6) Write in ascending order 0.2, 0.052, 0.502
7) 20% of £68	8) A distance of 2 km is represented as 10 cm on a map. What is the scale of the map?	9) Divide £105 in the ratio 7 : 8

QUESTION 1	QUESTION 2	QUESTION 3
Harvey asked 100 students about types of films they enjoyed. Complete the 2 way table	Expand and simplify $(x + 7)(x + 3)$	Calculate the area of the circle. Give your answer correct to 1 decimal place)

	Comedy	Action	Thriller	Total
Female		23		
Male	17			42
Total		44	31	

radius = 2.5 cm

QUESTION 4	QUESTION 5	QUESTION 6
Express 56 as a product of prime factors	Calculate the mean	A car travels for 30 minutes and covers a distance of 24 miles. Calculate the average speed.

x	f
1	5
2	8
3	10
4	11
5	6

What is the modal value?

FOCUS 4 TASK 1C

NAME _____
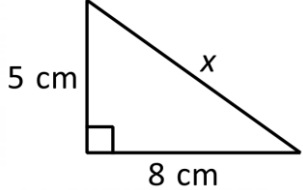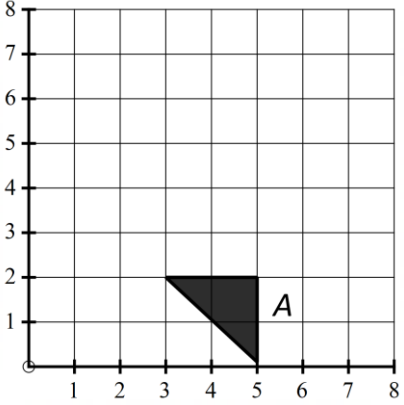
SKILLS CHECK

1) 89+37 =	2) 85 - 58	3) 9×12
4) $9 \div 36$	5) $\frac{5}{8} \times \frac{4}{5}$	6) Write in ascending order 0.5, 0.501, 0.051
7) 35% of £120	8) A distance of 200 m is represented as 10 cm on a map. What is the scale of the map?	9) Divide £480 in the ratio 7 : 9

QUESTION 1	QUESTION 2	QUESTION 3
If the exchange rate is £1 = €1.10 Work out the missing values a) £350 =€..... b) €28.60 = £ …….	Describe the single transformation that maps shape A onto shape B 	Find the nth term of 1, 5, 9, 13, 17 What is the 50 term in the sequence?

QUESTION 4	QUESTION 5	QUESTION 6
Complete the table of values for $x + y = 7$ and plot the graph 	x	1	2	6
y		5	| 	Estimate $2.59 \times 15.43 - 3.98^2$	Enlarge the triangle with centre (0,0) and scale factor 2

FOCUS 4 TASK 1D

NAME _____

SKILLS CHECK

1) 68 +76 =	2) 92 - 48	3) 8×8
4) $9 \div 12$	5) $\frac{3}{4} \times \frac{5}{6}$	6) Write in ascending order 0.3, 0.203, 0.32
7) 40% of £84	8) A distance of 10 m is represented as 10 cm on a map. What is the scale of the map?	9) Divide £520 in the ratio 6 : 7

QUESTION 1	QUESTION 2	QUESTION 3
The table shows the probability of scoring different numbers on a spinner	Calculate x correct to 1 decimal place	Reflect triangle A in the line y = 3. Label your triangle B

Number	1	2	3	4
Probability	$\frac{2}{10}$	$\frac{2}{5}$	$\frac{1}{10}$	

Calculate the probability of scoring a 4

Calculate the probability scoring an even number

5 cm, 8 cm, x

QUESTION 4	QUESTION 5	QUESTION 6
Express in standard form	Calculate an estimate for the mean.	Express

Q4:

1100000000

0.000052

Q5:

Test mark	f		
25 ≤ t < 30	9		
30 ≤ t < 35	15		
35 ≤ t < 40	13		
40 ≤ t < 45	7		
45 ≤ t < 50	6		

Q6:

0.24 as a fraction in its lowest form

$\frac{2}{25}$ as a percentage

FOCUS 4 TASK 1E

NAME _____

SKILLS CHECK

1) 74 +76 =	2) 92 - 38	3) 7 × 8
4) 15 ÷ 20	5) $\frac{7}{10} \times \frac{3}{14}$	6) Write in ascending order 0.5, 0.505, 0.055
7) 95% of £102	8) A distance of 50 m is represented as 10 cm on a map. What is the scale of the map?	9) Divide £1044 in the ratio 1 : 8

QUESTION 1	QUESTION 2	QUESTION 3
The graphs show the age and value of cars Circle the outlier Estimate the value of a 3 year old car	Calculate x and y 100° x y 54°	Simplify $(2x^2y)^3$ Express 3^{-3} as a fraction
QUESTION 4	**QUESTION 5**	**QUESTION 6**
Solve $3x - 6 \geq x - 2$ What is the smallest integer value of x that satisfies the inequality?	Calculate the volume of a sphere with radius 7 cm using the formula V = $\frac{4}{3}\pi r^3$ (answer correct to 1 decimal place)	A recipe for 6 pies uses 160g of flour. How much flour will be needed to make 21 pies?