The 100% Club – Homework Pack (F)
Know your basics!

Name: _____

To achieve well in the Foundation tier paper it is essential that you achieve 100% at the beginning of the paper and with key fluency questions.
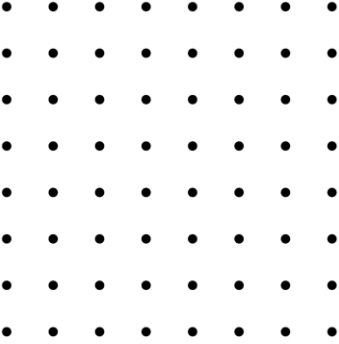
Each question in this pack relates to one of these key questions from the pre seen mocks you have been doing.
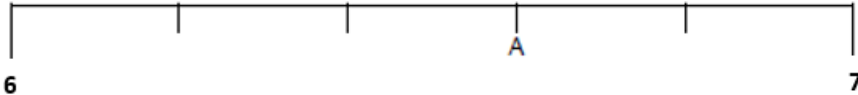
Aim to achieve 100% in these questions and you will be well prepared for your next assessment.
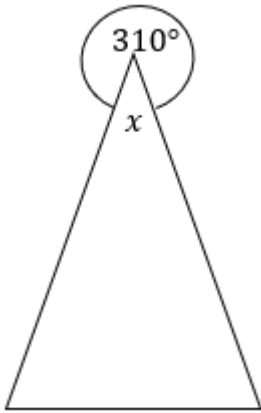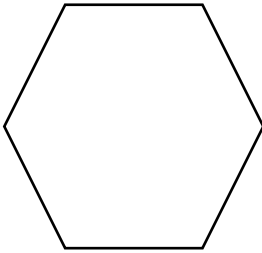
This homework is **in addition** to your independent revision on Hegarty Maths.

Session	Time Taken	Score	Percentage	Date Due
1		/10		06/03/20
2		/10		
3		/10		13/03/20
4		/10		
5		/10		20/03/20
6		/10		
7		/10		27/03/20
8		/10		
9		/10		03/04/20
10		/10		

Exam Q #	Homework 1 – Paper 1 (Non Calculator)
1	Which type of angle is the smallest? Right Reflex Obtuse Acute
2	Solve $3x = 15$ $x = 45$ $x = 5$ $x = \frac{3}{5}$ $x = 1.5$
3	Work out $10 - (-3)$ -13 7 13 -7
4	Circle the calculation which works out half of 16 $16 \div 0.5$ $2 \div 16$ $16 \times \frac{1}{2}$ $16 \div 50 \times 100$
5a	Work out 174.4 + 24.3 − 7.09
5b	Work out 13.59 × 2
9a	Write down **all** the factors of 24

9b	Work out the lowest common multiple (LCM) of 6 and 20
11a	Draw a parallelogram on the grid shown. . . . .
12	Work out 55% of 300
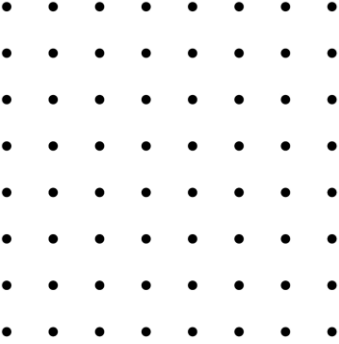
Exam Q #	Homework 2 – Paper 2 (Calculator)
1	Circle the number that is one **more** than a cube number. 7 8 9 10
2	Circle the fraction which is equal to 0.75 $\frac{1}{75}$ $\frac{1}{4}$ $\frac{7}{5}$ $\frac{9}{12}$
3	Here is a number line. Which number is A? 6.3 6.55 6.6 6.8
4	How many millimetres are equal to 1.09 metres? 10.9 109 1090 10900
5	Which is longer, $\frac{1}{10}$ of a day or 150 minutes. You must show your working

6a	Use your calculator to work out $$\frac{9.75^2}{1.875} - 2.4^4$$ Give your answers a decimal and write down your full calculator display.	
6a	Round your answer to Q6a to one decimal place	
6b	Estimate $$\frac{2.65^3}{8.875} + 6.4^2$$ by rounding each value to the **nearest whole number**.	

8a	An isosceles triangle is shown below. Find the missing angle x.	8b	Draw the lines of symmetry onto this regular hexagon.
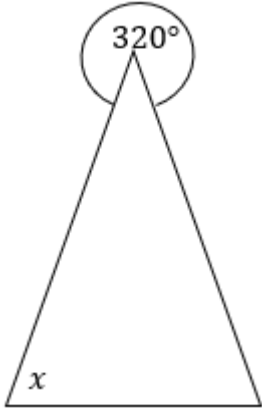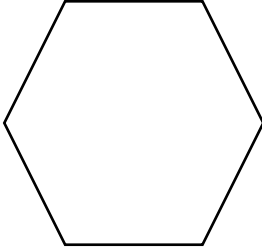
Exam Q #	Homework 3 – Paper 3 (Calculator)
1	Circle the value of the digit 6 in the answer to $3600 \div 10$ 6 60 600 6000
2	Solve $x - 5 = 7$. $x = 12$ $x = 2$ $x = -12$ $x = -\frac{7}{5}$
3	Circle the fraction that is equal to $1\frac{2}{5}$ $\frac{3}{5}$ $\frac{2}{5}$ $\frac{7}{5}$ $\frac{12}{5}$
4	Circle the expression which mean a divided by b $\frac{a}{b}$ $\frac{b}{a}$ $\frac{1}{ab}$ $\frac{1}{a+b}$
5	Place these numbers in order from smallest to largest $\frac{39}{50}$ 0.835 $\frac{81}{100}$ $\frac{4}{5}$

6	Josh downloads album A that has 9 tracks. The total cost of downloading album A is £9.90. How much does each track cost, assuming each track costs the same amount?
12	The first four triangular numbers are 1, 3, 6, 10 Circle the next triangular number. 14 15 16 17
13	Write down all the prime numbers between 40 and 50
15	Circle the correct statement. $\frac{2}{3} \leq 60\%$ $\frac{2}{3} = 60\%$ $\frac{2}{3} < 60\%$ $\frac{2}{3} \neq 60\%$
17	A shop sells ice creams. Each ice cream has three scoops. The possible flavours are strawberry (S), chocolate (C) and mint (M). The three scoops can be the same flavour or different flavours. List all the possible options for the three scoops

Exam Q #	Homework 4 – Paper 1 (Non Calculator)
1	Which type of angle is 156°? Right Reflex Obtuse Acute
2	Solve $\frac{x}{3} = 15$ $x = 45$ $x = 5$ $x = \frac{3}{5}$ $x = 315$
3	Work out $-10 + (-3)$ 13 -7 -13 7
4	Circle the calculation which works out one quarter of 12 $12 \div 0.25$ $4 \div 12$ $12 \times \frac{1}{4}$ $12 \div 4 \times 10$
5a	Work out $118.4 - 24.7 + 5.09$
5b	Work out 42.79×3
9a	Write down **all** the factors of 36

9b	Work out the lowest common multiple (LCM) of 8 and 10
11a	Draw a trapezium on the grid shown.
12	Work out 65% of 460
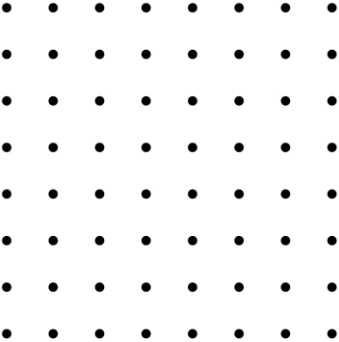
Exam Q #	**Homework 5 – Paper 2 (Calculator)**
1	Circle the number that is one **more** than a square number. 8 9 10 11
2	Circle the fraction which is equal to 0.4 $\dfrac{1}{4}$ $\dfrac{4}{10}$ $\dfrac{10}{4}$ $\dfrac{0}{4}$
3	Here is a number line. Which number is A? 4.1 4.2 4.6 $4\dfrac{1}{6}$
4	How many centimetres are equal to 1.4 kilometres? 140 1400 14 000 140 000
5	Which is longer, $\dfrac{1}{4}$ of a day or 600 minutes. You must show your working
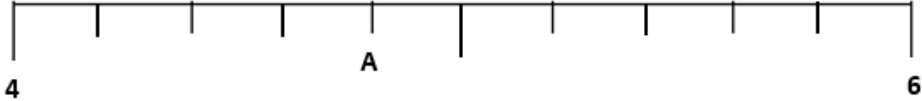
6a	Use your calculator to work out $$\left(\frac{5.32}{1.9}\right)^2 + 1.9^{-2}$$ Give your answers a decimal and write down your full calculator display.
6a	Round your answer to Q6a to two significant figures
6b	Estimate $$\left(\frac{5.62}{1.9}\right)^2 + 1.4^2$$ by rounding each value to the **nearest whole number**.

8a	An isosceles triangle is shown below. Find the missing angle x.	8b	Write down the order of rotational symmetry for this regular hexagon.
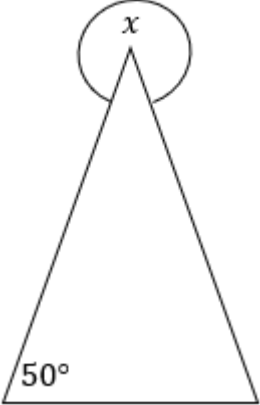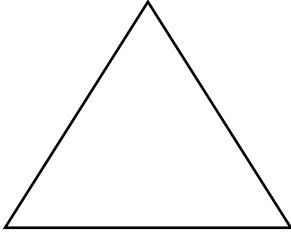
Exam Q #	Homework 6 – Paper 3 (Calculator)
1	Circle the value of the digit 2 in the answer to 12 700 ÷ 10 20　　　　　　200　　　　　　2000　　　　　20 000
2	Solve $x + 2 = 13$ $x = 2$　　　　　$x = 11$　　　　　$x = 15$　　　$x = 6.5$
3	Circle the fraction that is equal to $3\frac{1}{3}$ $\dfrac{3}{3}$　　　　　$\dfrac{4}{3}$　　　　　$\dfrac{31}{3}$　　　　　$\dfrac{10}{3}$
4	Circle the expression which means b divided by a $\dfrac{a}{b}$　　　　　$\dfrac{b}{a}$　　　　　$\dfrac{1}{ab}$　　　　　$\dfrac{1}{a+b}$
5	Place these numbers in order from smallest to largest $\dfrac{36}{100}$　　　0.34　　　$\dfrac{19}{40}$　　　$\dfrac{9}{20}$

6	Josh downloads album A that has 12 tracks. The total cost of downloading album A is £13.20. How much does each track cost, assuming each track costs the same amount?
12	The first four numbers in the Fibonacci sequence are 1, 1, 2, 3 Circle the next number. 3 4 5 6
13	Write down all the prime numbers between 20 and 30
15	Circle the correct statement. $\dfrac{1}{8} \leq 10\%$ $\dfrac{1}{8} = 80\%$ $\dfrac{1}{8} > 80\%$ $\dfrac{1}{8} > 10\%$
17	A shop sells ice creams. Each ice cream has two scoops. The possible flavours are vanilla (V), strawberry (S) and chocolate (C). The two scoops can be the same flavour or different flavours. List all the possible options for the two scoops

Exam Q #	**Homework 7 – Paper 1 (Non Calculator)**
1	Which type of angle describes angles measuring exactly 90°? Right Reflex Obtuse Acute
2	Solve $5x = 2$ $x = 10$ $x = 52$ $x = \frac{2}{5}$ $x = \frac{5}{2}$
3	Work out $-9 - 3$ 12 -12 -6 -6
4	Circle the calculation which works out one quarter of 20 $20 \div 0.25$ $4 \div 20$ $20 \div 4 \times 10$ $20 \times \frac{1}{4}$
5a	Work out $24.3 - 15.09 + 96.9$
5b	Work out 14.03×7
9a	Write down **all** the factors of 20

9b	Work out the lowest common multiple (LCM) of 10 and 15
11a	Draw a kite on the grid shown.
12	Work out 35% of 560
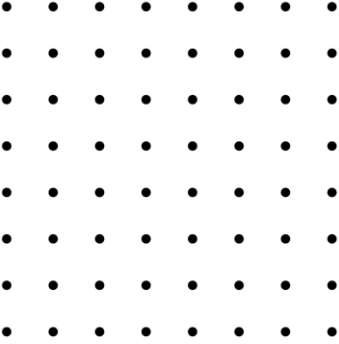
Exam Q #	Homework 8 – Paper 2 (Calculator)
1	Circle the number that is one **less** than a prime number. 7 8 9 10
2	Circle the fraction which is equal to 0.5 $\frac{1}{5}$ $\frac{12}{24}$ $\frac{5}{10}$ $\frac{0}{5}$
3	Here is a number line. Which number is A? 4.2 4.4 4.8 5
4	How many metres are equal to 20 300 millimetres? 2.03 2.3 20.3 203
5	Which is longer, $\frac{1}{2}$ a day or 600 minutes. You must show your working

6a	Use your calculator to work out $$(-3)^2 + \frac{305}{1.6^3}$$ Give your answers a decimal and write down your full calculator display.
6a	Round your answer to Q6a to two decimal places
6b	Estimate $$\frac{2.05}{3.85} + 1.4^2$$ by rounding each value to the **nearest whole number**.

8a	An isosceles triangle is show below. Find the missing angle x.	8b	Draw the lines of symmetry onto this equilateral triangle.

Exam Q #	**Homework 9 – Paper 3 (Calculator)**
1	Circle the value of the digit 7 in the answer to 4700 ÷ 1000 70 7 0.7 0.07
2	Solve $x + 9 = 9$ $x = 18$ $x = 99$ $x = -9$ $x = 0$
3	Circle the fraction that is equal to $5\frac{1}{2}$ $\frac{51}{2}$ $\frac{5}{2}$ $\frac{11}{2}$ $\frac{6}{2}$
4	Circle the expression which mean a multiplied by b $\frac{a}{b}$ ab $\frac{1}{ab}$ $a + b$
5	Place these numbers in order from smallest to largest $\frac{9}{5}$ 0.51 $\frac{5}{10}$ $\frac{5}{100}$

6	Josh downloads album A that has 11 tracks. The total cost of downloading album A is £11.99. How much does each track cost, assuming each track costs the same amount?
12	The first four cube numbers are 1, 8, 27, 64 Circle the next cube number. 25 125 81 15
13	Write down all the prime numbers between 0 and 10
15	Circle the correct statement. $\frac{3}{4} \leq 75\%$ $\frac{3}{4} = 75\%$ $\frac{3}{4} < 75\%$ $\frac{3}{4} \neq 75\%$
17	A shop sells ice creams. Each ice cream has three scoops. The possible flavours are vanilla (V), strawberry (S) and mint (M). The three scoops can be the same flavour or different flavours. List all the possible options for the three scoops

Exam Q #	Homework 10 – Paper 1 (Non Calculator)
1	Circle the angles which are greater than 90^0 Right Reflex Obtuse Acute
2	Solve $6x = 42$ $x = 4.2$ $x = 252$ $x = \frac{6}{42}$ $x = 7$
3	Work out $-10 + (-3)$ -13 7 13 -7
4	Circle the calculation which works out half of 30 $30 \div 0.5$ $2 \div 30$ $30 \times \frac{1}{2}$ $30 \div 50 \times 100$
5a	Work out 138.4 + 17.3 – 7.09
5b	Work out 67.59 × 2
9a	Write down **all** the factors of 36

9b	Work out the lowest common multiple (LCM) of 8 and 20
11a	Draw a rhombus on the grid shown.
12	Work out 85% of 400