NAME: _____ **CLASS:** _____ **LOGO EQUALATERIALS**

TASK 1: INTERIOR AND EXTERIOR ANGLES OF REGULAR POLYGONS

Fill in the table columns marked (All). If you find it easy you can fill in the column (Extension):

Name of regular polygon	Number of Sides	Size of exterior angle	Sum of all interior angles	Challenge: Size of interior angle
n-sided polygon	**n**	360 ÷ **n**	(**n** – 2) x 180°	$\frac{(\mathbf{n} - 2) \times 180°}{\mathbf{n}}$
EQUILATERAL TRIANGLE	**3**	360 ÷ **3** = 120°	(**3** – 2) x 180 = 180°	(**3** – 2) x 180 ÷ 3 = 60°
SQUARE		360 ÷ __ = ___ °	(__– 2) x 180 = °	(__ – 2) x 180 ÷ __ =_____°
PENTAGON				
HEXAGON				
HEPTAGON				

TASK 2A: CODING WITH LOGO USING PRIMM

Work down each column then move to the next column!		PREDICT	RUN	INVESTIGATE	MODIFY
		Without running it what do you think this code will do?	Type the code into Logo and draw what happens	What are the similarities and differences between the codes for each one? What is the code doing?	Change the code inside the brackets to make a smaller/larger version and if you get it to work, write the code below
CODE IS ALL WRITTEN ON ONE LINE!	**REPEAT 4 [FD 200 RT 90]**				
	FD 300 RT 90 FD 150 RT 90 FD 300 RT 90 FD 150 RT 90				
	REPEAT 360 [FD 3 RT 1]				
	REPEAT 3 [FD 300 RT 120]				
	REPEAT 5 [FD 200 RT 72]				
	REPEAT 6 [FD 200 RT 60]				
	REPEAT 8 [FD 150 RT 45]				
	REPEAT 9 [FD 150 RT 40]				

TASK 2B: CODING WITH LOGO USING PRIMM

MAKE	
Write the code for a different shape	
Draw the shape that was produced	
<u>Not the shape you expected?</u> Refine your code so it is correct <u>You made the shape you expected</u> Make it more efficient: Can you minimise the number of instructions? Can you make your code into a stored procedure?	
Draw the new shape that was produced	