London Gates Education Group
International Education Centre

MATHEMATICS **NAME_____**

TEACHER: SOFIA **GROUP__F2_____**

LESSON 16. QUADRATIC EQUATIONS

HOMEWORK

Solve each of the following quadratic equations using an appropriate method. For non-integer solutions, give answers to 3sf.				
$x^2 - 9x + 14 = 0$	$2x^2 + 3x + 1 = 0$	$x^2 + 2x - 8 = 0$	$2x^2 + 6x + 1 = 0$	$x^2 + 10x + 21 = 0$
$x^2 - x - 6 = 0$	$x^2 - 9x = 0$	$x^2 - 7x + 2 = 0$	$x^2 + 2x + 1 = 0$	$x^2 - 11x - 60 = 0$
$x^2 - 9 = 0$	$2x^2 - 9x = 0$	$5x^2 - 2x - 80 = 0$	$5x^2 - 80 = 0$	$5x^2 + 42x - 80 = 0$
Find a quadratic equation that satisfies each of the following conditions. Can you generalise?				
There are two integer solutions, one positive and one negative.	There are two solutions, but the equation cannot be solved by factorising.	There are two solutions and one of them is zero.	There are two fractional solutions, where one is twice the other.	The equation cannot be solved by any method (I know so far...)

LIVEWORKSHEETS