

Jeffrey Zhang

10 Crypto Problem Generator and MSA

1. Numbers (8,3,2,8,8) ; Goal = 0

$$((8-8)*((8+3)/2))$$

MSA : We used two numbers that are a pair and created the zero, then multiplying the zero by everything else available.

2. Numbers (7,2,9,5,5) ; Goal = 5

$$((9*(5-5)) + (7-2))$$

MSA : Our goal was made from subtracting 2 from 7 obtaining 5, we then found a pair of 5s which made a zero; multiply the zero by the remaining number. Lastly add the 5 to zero.

3. Numbers (2,4,0,2,2) ; Goal = 6

$$((0*(2*2)) + (2+4))$$

MSA : Goal was made from two numbers, but since there is a zero within the numbers generated I multiply zero by each number that does not add to the goal.

4. Numbers (9,9,6,5,5) ; Goal = 3

$$((9-6) + ((5-5)*9))$$

MSA : Like problem number 3, it had the same idea of adding two numbers to obtain goal, but then finding a zero through a pair of numbers. Multiply zero with remaining number that does not add to goal, Afterwards add goal plus 0.

5. Numbers (3,1,1,0,0) ; Goal = 8

No Solution

6. Numbers (6,0,6,6,6) ; Goal = 6

$$(6 + ((0*6)*(6*6)))$$

MSA : Our goal was in the problem and there was a zero in the numbers. I multiplied everything by zero then added the goal.

7. Numbers (3,4,7,5,5) ; Goal = 3

$$(3 + ((5-5)*(4+7)))$$

MSA : Our goal was again in the problem and there was a pair of numbers able to create zero. Multiply everything not the goal by zero then add the goal number.

8. Numbers (4,1,4,4,4) ; Goal = 1

$$(1 + ((4-4) + (4-4)))$$

MSA : Our goal was in the problem and there were four copies of the same number. I added two zeroes then added the 1 creating the goal.

9. Numbers (5,2,3,8,8) ; Goal = 6

$$((8-2) + ((5+3) - 8))$$

MSA: I created goal using two numbers, then created a zero using remaining numbers and added those two together.

10. Numbers (4,8,1,0,0) ; Goal = 7

$$((8-1) + (0 + (4*0)))$$

MSA : I created the goal using two numbers, then the remaining three numbers I obtained a zero. Then adding zero plus the goal number.