TH-MF Math Fundamentals 9/22 {+ - × ÷}

1.) 4 more than the sum of 9 and 5
+ +
4+9+5 (18)

2.) 5 less than 12 (switch the order)
12-5

3.) The product of 8 and 3 minus 7
*
(8*3)-7

4.) The quotient of 15 and 2
÷
15÷2 $\frac{15}{2}$

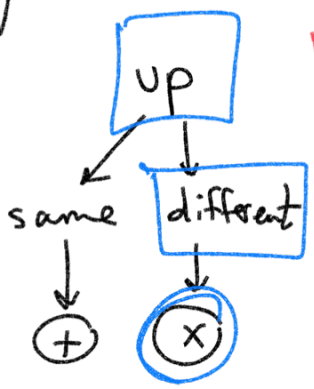
1.) 51, 44, 37, 30, 23, 16, 9, ... (-7) (-7)
-7 -7 -7 -7 -7 -7

2.) 7, 11, 15, 19, 23, 27, ... (+4) (-31) (+4)
+4 +4

3.) 320, 160, 80, 40, 20, ... (÷2) (10)
÷2 ÷2 ÷2
-160 -80

4.) 3, 6, 12, 24, ... (*2) (48) (*2)
*2 *2 *2
+3 +6 *2

Find Pattern



Find Next number

Pattern A	4	7	10	13	16
Pattern B	9	12	15	18	21

(+3) (+5) (+5) (+5) (+5) (+5) (+3)

72 +5 77

Pattern A	2	4	6	8	10
Pattern B	6	12	18	24	30

*3 *3 *3 *3 *3

40 *3 120

$$\begin{array}{r} 40 \\ \times\ 3 \\ \hline \boxed{120} \end{array}$$

On the first day of summer, Nate ate 32 donuts. By the second day, he had eaten 64 donuts. By the third 96 donuts and by the 4th 128 donuts. How many total donuts did Nate eat if the summer was 125 days long?

Day	1	2	3	4	.....	125
Donut total	32	64	96	128		$\boxed{}$

*32 *32 *32 *32 *32

$$\begin{array}{r} {}^{1} \\ 125 \\ \times\ 32 \\ \hline 250 \\ {}^{1}3750 \\ \hline \boxed{4000} \end{array}$$

$\boxed{4{,}000 \text{ donuts}}$

A pattern starts with 4, 2nd number is 8, 3rd number is 12. 4th number is 16 and 5th number is 20.

Find the pattern and the 22nd number

1st → 4 (*4) 2nd → 8 (*4) 3rd → 12 (*4) 4th → 16 (*4) 5th → 20 (*4)

22nd →

22 * 4 = $\boxed{88}$

Function Machine

Input (j)	+18	Output (k)
14	→	32
39	→	57
19	→	37
61	→	79
48	→	66

$j + 18 = k$

Input (y)	+12	Output (z)
73	→	85
69	→	81
70	→	82
56	→	62
14	→	26

$y + 12 = z$

Input (L)	*10	Output (M)
4	→	40
2	→	20
5	→	50
10	→	100
6	→	60

$L * 10 = M$

Input (n)	−6	Output (o)
97	→	91
19	→	13
41	→	35
23	→	17
78	→	72

$n - 6 = o$