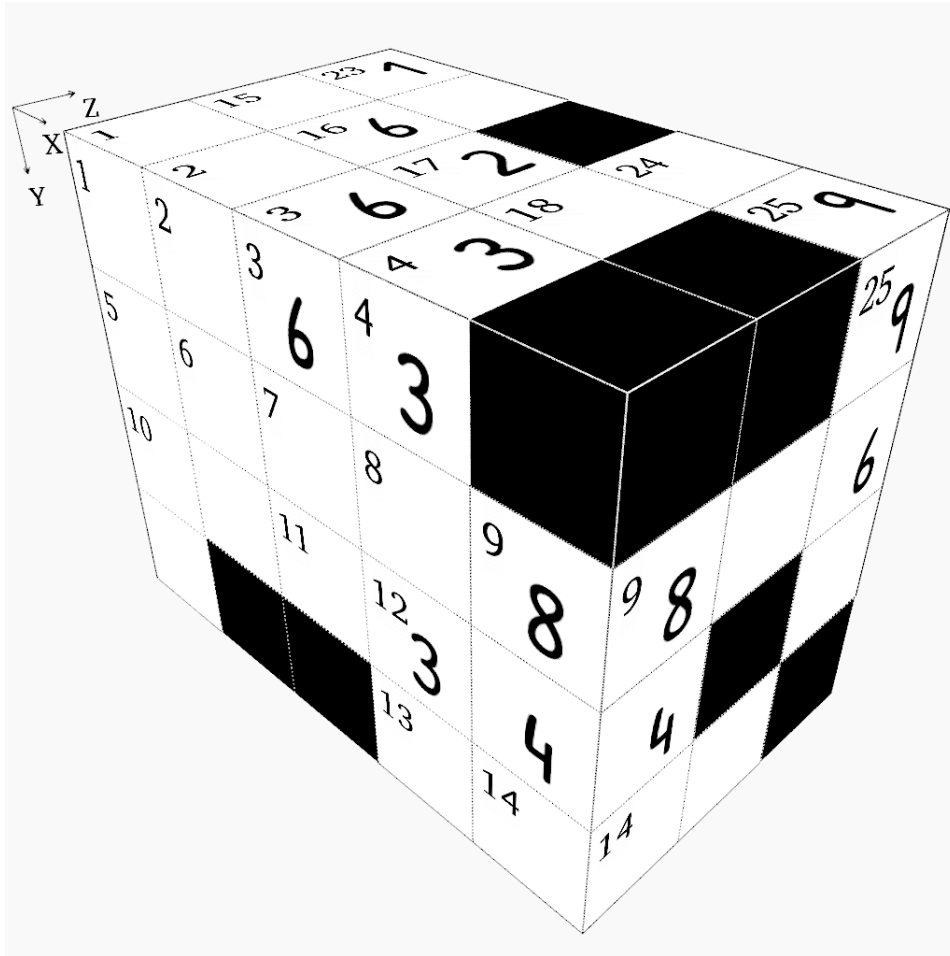


Difficulty: ★★★★★

Box - Beginner Puzzle #25



This puzzle is like a crossword, but with numbers. Each digit occupies a 3D block and can be a part of a "word" in the X,Y, and Z directions.

Rules:

1. "Words" may not start with a zero.
2. "Words" in the X direction read from left to right.
3. "Words" in the Y direction read from top to bottom.
4. "Words" in the Z direction read from front to back.
5. There is one unique solution which satisfies all the clues given below.
6. Some "words" may not have clues. They will be determined by the "words" which intersect them.

If we take the box pictured above and divide it into individual X-Y layers, we will get these planes:

1	2	3	4		15	16	17	18		23			24	25
		6	3			6	2			1				9
5	6	7	8	9	19		0			9				6
10		11	12		6		20						26	
			3	4										
						21		22		27				
			13	14		6								

X Direction

- 1 Three times a prime number
- 5 First two digits are the same as X26
- 10 Y3 times Z3
- 13 Z14 reversed
- 15 First two digits are the same as Y16
- 19 First two digits are the same as first two digits of Y25
- 20 Two-thirds of X13
- 22 Z7 minus Z1
- 23 A square
- 24 A prime number
- 26 All digits are the same
- 27 Twice the result of Y23 minus Z9

Y Direction

- 1 Three times a prime number
- 2 Z9 minus X23
- 3 X10 divided by Z21
- 4 Thirty-nine times a prime number
- 9 Twice a prime number
- 15 Twenty-four times a prime number
- 16 Twice X26
- 17 Twelve times a prime number
- 18 Mean of Y1 and Z14
- 23 Eighteen times a prime number
- 25 Nine times a prime number
- 26 X20 minus X23

Z Direction

- 1 Z21 plus Z5
- 2 Twice the result of Z10 minus X26
- 3 X27 divided by Z6
- 4 Z5 minus Z11
- 5 X23 plus Z12
- 6 A square
- 7 X5 divided by Y16
- 8 Z5 divided by nineteen
- 9 Eighteen times X22
- 10 Mean of Y16 and Z2
- 11 Half of X15, then subtract Y4
- 12 A prime number
- 13 Twice the result of Y15 minus Z4
- 14 A cube
- 21 X27 divided by Z6

Solution:

4	8	6	3		6	6	2	2		1	6		5	9
3	3	5	2	8	9	6	0	1	4	9		8		6
4	0	7	3	4	6		4	8		6			3	3
1			7	2		6		4	7	2	2	3	2	