## TripleCross - Hard Puzzle \#23

This puzzle is like a crossword, but with numbers. Each digit occupies a hexagonal cell and can be a part of a "word" in the across, up, and down directions.

## Rules:

1. "Words" may not start with a zero.
2. "Words" in the 'across' direction read from left to right.
3. "Words" in the 'up' direction read along the upward diagonal to the right.
4. "Words" in the 'down' direction read along the downward diagonal to the right.
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.


## Across

145 across divided by 31 across
3 Fifty-seven times a prime number
7 Fifteen times a square
9 Mean of 16 across and 23 up
1146 down divided by 46 up
13 Mean of 27 across and 28 up
1537 up plus 42 down
16 Twice a prime number
1958 across plus 47 up
21 Nineteen times a prime number
24 Thirty-eight times a prime number
27 Mean of 38 up and 31 across
2850 across plus 29 across
2915 across minus half of 11 across
31 A cube
3340 down minus 23 up
3413 across minus 50 across
35 Forty-three times a square
39 Last two digits are the same as last two digits of 14 down
4310 up minus 29 up
4546 down minus 29 across
48 A square
4952 down minus 34 across
5010 up minus 19 across
51 Fifty-two times 54 down
53 Thirteen times a prime number
55 Twenty-eight times a prime number
5838 up minus 43 across

## Up

98 down plus 33 across
1049 down plus 4 down
12 Eight times a prime number
14 Twice the result of 34 up plus 10 up
1555 up plus 44 up
2251 down minus 9 up
2327 up plus half of 37 up
2546 down divided by 46 up
26 A prime number
2750 across plus 49 down
2855 up plus half of 8 down
29 Mean of 42 down and 47 up
30 Thirteen thousand three hundred seventy-three less than 41 down
34 Four times a prime number
3610 up minus 33 across
37 Mean of 31 across and 17 down
381 down plus half of 56 up
4351 down minus half of 15 down
44 Seven times a prime number
4625 up minus 43 across
4711 across minus 50 down
4951 up minus 30 up
51 Twice a prime number
5515 across minus 43 up
568 down plus 55 up
5751 down times 48 across
582 down divided by 52 down
5944 up plus 16 across

## Down

1 Mean of 58 across and 34 across
2 Eighty-nine times a prime number
4 Mean of 16 down and 6 down
5 Forty-one times 23 up
63 across divided by 27 across
743 up plus 47 up
8 Mean of 56 up and 33 across
14 Five times a prime number
15 Mean of 15 across and 52 down
1649 down minus half of 4 down
1715 down minus 29 up
18 Sixteen times a prime number
20 Eight hundred sixteen less than 41 down
22 Mean of 41 down and 57 up
24 Mean of 27 across and 9 across
27 Mean of 55 up and 51 across
28 A prime number
32 Last two digits are the same as 52 down
3955 up reversed
4031 across plus 27 across
41 Sixty-seven times a prime number
4236 up minus 37 up
4610 up times 33 across
49 Mean of 42 down and 22 up
5019 across minus 28 across
511 across plus 29 up
5247 up plus 1 across
54 Same as 50 down

## Solution:



