

A Square Deal

Complete the magic square using the numbers 1 to 25 once each.
 Each row, column, and diagonal adds up to 65.
 Each square is identified by its column and row.

5					
4					
3					
2					
1					
	a	b	c	d	e

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

Here are the clues:

Perfect squares are in b5, b3, d3, b1, and c1.

Prime numbers are in a5, c5, e5, c4, a3, c3, e3, e2, and a1.

Triangular numbers are in d5, e4, d3, a1, e1, and c2.

Perfect cubes are in d3 and b2.

Powers of 2 are in b5, b2, e2, d3, and b1.

Palindromic numbers are in a5 and d1.

Factors of 100 are in b5, d5, c4, b3, d3, a2, and e2.

The median of all the numbers is in c3.

Row 3 and column c are all odd.

Numbers that are the same upside-down are in a5, d3, d4, d5, a1, c3, and b2.

When you believe you have solved this problem and can articulate your understanding, go to Room 305 in Jordan Hall to present your solution to the Master Teacher. Be sure to bring with you your unused hints in a sealed envelope. The envelope needs to be sealed by the room monitor. If it is tampered with, your solution will not be accepted.