

COUNTDOWN Challenge

Calendar Contest

Here's a contest for you and a friend. First, choose one of the monthly calendars below. Then, choose a three-by-three block of dates. Now for the contest – who can find the sum of all of the numbers in the block the fastest? Have your friend use a calculator to find the sum of the dates, while you take the center number and multiply it by 9. You'll win the contest every time!

Example

September 2008

Sun	Mon	Tue	Wed	Thu	Fri	Sat
	1	2	3	4	5	6
7	8	9	10	11	12	13
14	15	16	17	18	19	20
21	22	23	24	25	26	27
28	29	30				

October 2008

Sun	Mon	Tue	Wed	Thu	Fri	Sat
			1	2	3	4
5	6	7	8	9	10	11
12	13	14	15	16	17	18
19	20	21	22	23	24	25
26	27	28	29	30	31	

Calculator: $1+2+3+8+9+10+15+16+17 = 81$

You: $9 \times 9 = 81$

November 2008

Sun	Mon	Tue	Wed	Thu	Fri	Sat
						1
2	3	4	5	6	7	8
9	10	11	12	13	14	15
16	17	18	19	20	21	22
23	24	25	26	27	28	29
30						

December 2008

Sun	Mon	Tue	Wed	Thu	Fri	Sat
	1	2	3	4	5	6
7	8	9	10	11	12	13
14	15	16	17	18	19	20
21	22	23	24	25	26	27
28	29	30	31			

Calendar Contemplation

Let's contemplate (or think) about these numbers. Take a look at the example above or one of your number blocks and answer the following questions.

1. What do you notice about each pair of numbers surrounding the center number?
2. What is the average or mean for each pair?
3. How many numbers are included in the square?
4. Do you see any connection with this contest and the magic square?