

5 by 5 5 by 5 Addition Prediction

Step 1. Have a student come up to the board. Ask the student to write down any 5 digit number towards the top of the board.

Step 2. You write down a prediction and place it in full sight for all to see.

Step 3. Turn back around and ask the student to write down **2 more** 5 digit numbers exactly under the first number.

Step 4. Turn around and as fast as you can write down 2 more 5 digit numbers. To explain my numbers I say "to make it even more random I will put down my social security number and my license plate number. Now we have 5 really random numbers.

Step 5. State that there are 5 random numbers on the board. Draw a line under them and ask the student to add up the 5 numbers. Be sure to give them time to work but watch to be sure they are correct.

Step 6. Have the student pick up the prediction and show the class that you predicted the total.

How does it work:

The prediction is based on the 5 digit number the student first writes down. Let's say they write down 56839. To make your prediction put a **2 in front of the far left digit** (in the 6th place) and **subtract 2 from the far right digit** (the ones digit)

Example 1: Student writes 56839 you think **2** 5683(9-2) and write 256837

Example 2: Student writes 61342 you think **2** 2134(2-2) and write 261340

The 2 numbers you write down: The first number you write down will have digits in each place value so that your number and the second number's place values total 9. If the student wrote 38567 then you must write down digits so $3 + ? = 9$ and $8 + ? = 9$ and $5 + ? = 9$ etc. So the student's 38567 has you write 61432 and the student's 97451 has you write 12548

They write 56723 You predict 256721

They write 38567

They write 97451

You write 61432 The common place values of the 2nd and 4th numbers total 9

You write + 12548 The common place values of the 3rd and 5th numbers total 9

The total is 256721

Note: An extensive version of this effect can be found on my web site listed as Supper Add Cards 2D and 3D.