1-5C Solutions

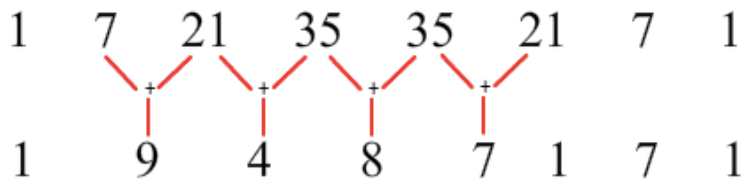
Answer for Question 1:

The next row of Pascal's triangle is:

1 5 10 10 5 1

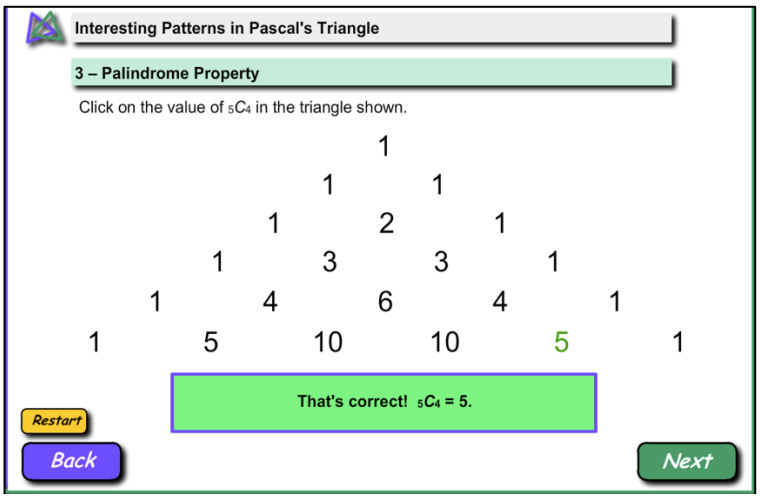
Answer for Question 2:

The value for 11^7 is calculated as follows:



$11^7 = 19487171$

Answer for Question 3:

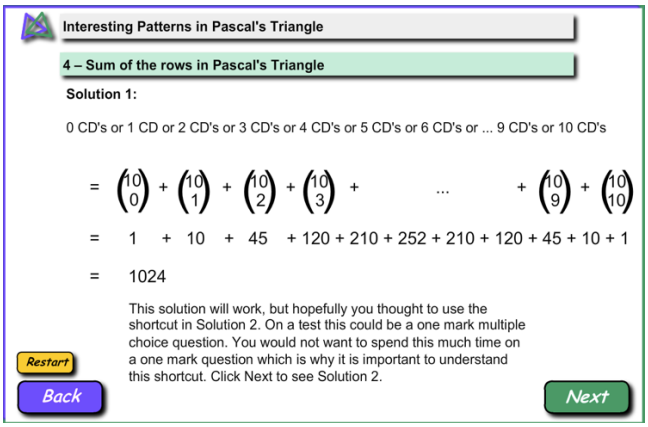


Answer for Question 4:

Sum of each row of Pascal's Triangle:
1
2
4
8
16
32

Answer for Question 5:

My brother has given me a list of 10 CD's that he would like for his birthday. I have not decided how much money I will spend on him, or even if I will buy him anything. How many combinations of the requested CD's might I purchase?



A specific number to choose was not stated, so we can use the sum of the row where n = 10.

$2^{10} = 1024$.

Look at how much time is saved!

Answer for Question 6:

1 3 3 1

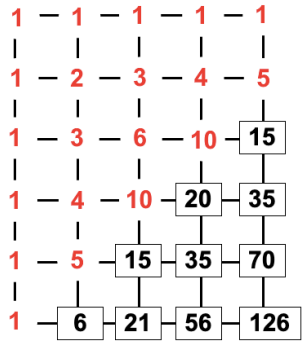
Answer for Question 7:

5 4 1

Answer for Question 8:

5 9 5

Answer for Question 9:



Answer for Question 10: