



First Name: _____

Last Name: _____

Grade: _____

Teacher: _____

Parent's email: _____

Mixed Problems

Welcome to the Math Challenge #11. This set has a mix of problems, which will stretch your arithmetic, problem solving and logical thinking skills.

Kinder & First Grade: solve at least 3 problems.

Second & Third Grade: solve at least 7 problems.

Fourth Grade and above: solve at least 12 problems.

Answer

1.	Wanda saw a car, a van, and a truck crossing a bridge. The truck crossed the bridge after the van. The car crossed the bridge before the van. List the order of each vehicle crossing the bridge. <i>First</i> _____, <i>Second</i> _____, <i>Third</i> _____	
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2.	What is the sum of the numbers that are not in the rectangle? 	
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3.	Tom has half as many coins as Sarah. Sarah has 8 coins. Raina has 3 more coins than Tom. How many coins do they have in total?	
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4.	Tamara is given a piece of paper with the numbers 1 to 9 as shown below. She follows the following steps in order. <ul style="list-style-type: none">• Cross out two numbers whose sum is 3.• Cross out two new numbers whose sum is 8.• Cross out two new numbers whose sum is 12• Cross out two new numbers whose sum is 15 <p>After all steps are taken, which number will be left uncrossed?</p>	
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5.	 Vijay bought 8 tubes of different color paint. Then, he traded 3 of his tubes for 11 of his friend's smaller tubes. How many tubes of paint does he have now?	
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6.	June 30 is Thursday. What day is July 10 of the same year?	
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7.	<p>How many pencils can you buy with one dollar bill?</p>	
8.	<p>The Redmondtown Players perform 2 daytime shows and 3 evening shows per week. Their current play will run for 30 shows. How many of the shows will be daytime shows?</p>	
9.	<p>An elevator was on the third floor of a building. It went up 8 floors, down 9 floors, up 13 floors, down 4 floors, and then up 14 floors to the top floor of the building. How many floors are in the building, if no numbers are skipped?</p>	
10.	<p>From the bottom of a thirty-foot hole, a frog can climb up four feet each day, but slips back two feet each night. In how many days does the frog escape from the hole?</p>	
11.	<p>Shanti can cut a long log into three shorter pieces in 24 minutes. At this rate, how long will it take her to cut another similar log into eight shorter pieces?</p>	
12.	<p>Carpenter Mark makes 3-legged stools and 4-legged chairs, using the same kind of legs. If carpenter Mark has 100 legs on hand, and he would like to use all 100 legs, how many chairs can he make if he makes 28 seats altogether?</p>	
13.	<p>A zookeeper is ordering food for the zebras. She knows that three zebras eat 25 pounds of hay every three days. How much hay should she order for 12 zebras to have enough hay for 30 days?</p>	
14.	<p>At the end of the game the players from two little league teams of 14 players each shook hands. Each player shook hands with all of the players on the opposing team once. How many handshakes were there? Hint: try a simpler problem.</p>	

15. Twenty one people tied for first place in a contest and were eligible for the grand prize. The contest manager invited all the finalists to sit at a large round table where he devised a plan to choose one winner. He counted each person around the table and every other person was sent away. (The first person stayed, the second was sent away, the third person stayed, the next was sent away, and so on) He continued in this manner until only one person was left. If you were a finalist, where should you sit to win the grand prize?	
16. In a tug of war, 5 donkeys are exactly equal to 2 elephants. In another tug of war, 3 elephants are equal to one car. Which team should win if a car and 3 donkeys are matched against 4 elephants? 	
17. Mrs. Walden wrote seven consecutive integers on a whiteboard. When one of them is erased, the sum of the remaining six integers is 857. What is the sum of the original seven integers she wrote?	
18. A gas tank went from three-eighths full to two-thirds full by adding seven gallons of gas. How many more gallons must now be added to completely fill the tank?	

Solution is available on March 18, 2022, at www.mathinaction.org