

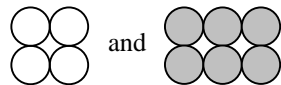
Adding Integers using a Checking Account Analogy – Part 3

The next Activity will use a checking account analogy to make sense of these operations. For the checking account analogy, the first number in the problem represents the current account balance. If the account is overdrawn, the first number is negative; if the account has money, then the first number is positive. Adding a negative number represents a withdrawal of money from the account, as in writing a check. Adding a positive number represents making a deposit into the account.

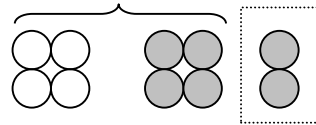
The process of adding corresponds to making entries to the account, either withdrawals or deposits. The result of the problem is the account balance after all the withdrawals and deposits are made.

Example:

$$-4 + 6 = ?$$



can be rearranged as



This can be interpreted as $(-4 + 4) + 2$. Removing the zero leaves two gray chips so $-4 + 6 = 2$.



1. Interpret this chip sequence in terms of a checking account. Use ideas like *withdraw*, *deposit*, *account is overdrawn*, *account has money*.

2. Write a sentence for each problem using the checking account analogy.

a. $-4 + 7 =$

b. $15 + (-10) =$

c. $-50 + (-50) =$

3. Determine the sum, thinking of the checking account analogy.

$$85 + (-100) =$$

4. Imagine that you received a report of transactions, but one digit in each number was smudged (●) and unreadable. For each of the following, determine whether the result will be positive, zero, negative, or impossible to determine.

a. $-67\bullet3 + 43\bullet$

b. $7\bullet1 + (-2\bullet4)$

c. $\bullet37 + (-\bullet42)$

d. $-5\bullet48 + (-23\bullet)$

5. With what combination of numbers will the checking account balance end up positive?

6. Do you have an analogy for working these problems that you like better than the checking account? Write it here.