Moving Straight Ahead Teaching Aid 3.3A: Set 3 Student Thinking

$$3(x + 1) = 21$$

Corry's Solution

3 times something in the parentheses must be 21.

So 3() = 21.

The something is 7.

So x + 1 = 7, and

x = 6.

$$2 + 3(x + 1) = 6x$$

Hadden's Solution

2 + 3(x + 1) is equivalent to 5(x + 1).

So I can rewrite the original equation as 5(x + 1) = 6x.

Using the Distributive Property, this is the same as 5x + 5 = 6x.

Subtracting 5x from each side, I get 5 = 1x.

So x = 5.

$$-2(2x-3)=-2$$

Jackie's Solution

By using the Distributive Property on the left-hand side of the equality, I get -4x - 6 = -2.

By adding 6 to each side, I get -4x = 4.

By dividing both sides by -4, I get x = -1.