Solving Multi-Step Inequalities

3.6
Some inequalities involve more than ______ operation. To ______ the inequality, work ______ to undo the ______, just as did in solving multi-step ______.

-6x + 15 > 9
Example 2

\[-2(3x + 1) > 6x + 4\]
Example 3

\[
\frac{3x - 1}{4} \leq -8
\]
Example 4

\[ \frac{-3 - 6(5x + 6)}{5} > -12 \]
Example 5

\[-5n + 6 \geq -7(5n - 6) - 6n\]
Word Problem
Each group pick 1 and solve.

Akeem has $75 in his savings account. He earns $6.00 an hour mowing lawns. How many hours must he mow lawns in order to save enough money to buy a video game system which costs at least $147?

The science club is sponsoring a dance to make money. They will charge $4 per student admission, but must pay $140 for publicity and chaperones. If \( s \) is the number of students who attend the dance, how many students must attend if the science club is to earn at least $640.

Write and solve an inequality.