

Name \_\_\_\_\_



## Inverse Property of Operations: Influencer Edition

### Part A: Addition & Subtraction - Social Stats

Write an equation for each situation. Let  $x$  represent the unknown number.

1. Emma started the week with some followers. She gained 350 new followers and now has 1,200.
2. Jay lost 45 subscribers after posting a new video. He now has 910 left.
3. A gaming streamer earned 2,000 total points after gaining 600 in one round.
4. Mia's post got 1,500 likes, which is 300 more than her previous post.
5. Alex's total engagement was 4,000 reactions - 700 more than last week.

### Part B: Multiplication & Division - Views, Merch, and Earnings

Write an equation for each. Let  $x$  be the unknown quantity.

1. A TikToker's video had 6 times more views this week than last week - this week's total was 18,000.
2. A YouTuber's earnings are split evenly between 4 videos. If she made \$200 total, how much per video?
3. A gaming influencer sold 8 merch items, earning \$240. How much does each item cost?
4. A post had 3 times as many comments as another post, for a total of 180 comments.
5. A channel's total subscribers doubled to reach 5,000.

### Part C: Mixed Operations - Sponsorships & Challenges

Write an equation that models each situation. Let  $x$  be the unknown.

1. A brand offered an influencer \$50 for each sponsored post plus a \$200 bonus. Her total was \$550.
2. A TikTok creator's total watch hours (1,200) were 4 times the number of videos plus 120 hours from a live event.
3. A gamer's total score of 950 came from doubling their base score and adding 150 bonus points.
4. A fashion influencer's total outfit cost \$260 after adding \$60 in accessories to twice the cost of the main outfit.
5. A podcaster earned \$420 from 6 ads plus a \$60 donation.