

Concept : Ratio Word Problems (Unchanged difference)

Khairul and Faizal had sweets in the ratio of 5:11.
 After each of them get 70 extra sweets, the ratio became 2:3.
 How many sweets did Faizal have in the end?

1) Using the “Before-Change-After” table to help you organise your information, this is how the table will look like at first:

	Khairul	Faizal	Difference
Before	5u	11u	6u
Change	+ 70 sweets	+ 70 sweets	
After	2u	3u	1u

2) Then we make the before & after total ratio to be the same by multiplying:

	Khairul	Faizal	Difference
Before	5u	11u	6u
Change	+ 70 sweets	+ 70 sweets	
After	$2u \times 6 = 12u$	$3u \times 6 = 18u$	$1u \times 6 = 6u$

After you’ve made the difference of the before & after ratio the same, we can start solving the question.

At first, Khairul had 5 units. But after he get 70 sweets, he had 12 units. So, how many units represents the 70 sweets he got?

(Ans : 7 units represents the 70 sweets)

7 units \rightarrow 70 sweets

1 unit $\rightarrow 70 \div 7 = 10$ sweets

18 units $\rightarrow 10 \times 18 = 180$ sweets

Ans : 180 sweets