This book has permission to use the "N&K method of COLORS".

Example: Question: If px + qy = 10and 8x + 10y = 40and p and q are constants. If the equations have many solutions, find the value of $\frac{p}{q}$

For speed, while solving something similar, only THINK the words in blue; WRITE only the words in other COLORS.

Given: 1) the two equation.

Road Map of Solution:

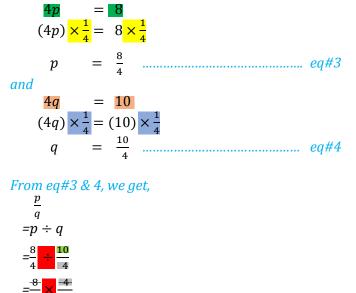
First Step: multiply both sides of the first equation with 4, so that RHS of both equations become equal. Second Step: Compare the coefficients of variables "x" and "y" to find the values of "p" & "q". Third Step: Now that we know the values of "p" & "q", we can find the value of $\frac{p}{a}$

px +	qy	= 10	 eq#1
8x +	10y	= 40	 eq#2

Multiply both sides of the first eq#1 with "4", so that RHS of both equations become equal.

(px +	$(qy) \times 4$	=(10)	× 4	
4px +	4qy	= 40		eq#1b

In eq#2 & eq#1b, since the RHS are the same, when we compare the coefficients of "x" & "y", we get,



 $=\frac{4}{5}$ Answer