Math 11: Unit 6.5B: applications of Rational equations
In grade 8, we did uniform motion problems like:
Ex: Superman flies to Los Angeles at $600 \mathrm{~km} / \mathrm{hr}$. The Flash starts 15 minutes later, but runs at $700 \mathrm{~km} / \mathrm{hr}$. How long will it take for the Flash to catch up to Superman?

Now: Superman and the Flash want to fly to Vancouver, 4 kilometers away. They both finish at the same time, but Superman starts 1 minute before the Flash, who runs 1 km/hr faster than Superman can fly. At what speed are they traveling?

In grade 8, we did 'rate of work' problems like:
Ex: It takes Prince Charming 2 hours to cook dinner for Cinderella. However, it takes Shang 3 hours to cook dinner for Mulan. Working together, how long does it take for them to cook dinner?

Now:
Ex: Prince Charming and Shang are working together to build the Great Wall of Canada. Since Shang has experience building the Great Wall in China, he can build the Great Wall of Canada in 6 hours. Prince Charming is new to civil engineering, so it takes him 16 hours to build the wall. If they work together, Prince Charming works 5 hours longer than Shang. How hours does each person work?
-read WB pg 237-241
-do WB pg 242 \#1-3: pick 10

