

Fishy Math Problems

1. a. If a female salmon lays 10,000 eggs and 40% of them hatch, how many hatchlings will there be? _____
 b. If 30% of the hatchlings make it to the ocean, how many will make it there? _____
 c. If 30% of those that get to the ocean make it back to the mouth of the river on their way to the spawning grounds, how many will start up the river? _____
 d. If 50% of the salmon starting upstream actually get to the spawning grounds, and 50% of those are female, how many eggs will be laid? _____
2. Given the following assumptions, answer the questions. The average salmon caught weighs 14 lbs. (6 kilograms). A fishing boat can carry 4200 lbs. (1800 kilograms).
 a. How many fish can be caught and stored in the hold of the boat? _____
 b. If the fisherman gets \$1.39 per pound (\$3.24 per kilogram), how much money can he sell all the fish for? _____
 c. If the captain's expenses for the fishing trip include the following, what will be his profit for the trip?
 Pay for helpers: 2 men x 3 days x \$100 each per day = how much? _____
 Fuel for boat: \$150 per day x 3 days = how much? _____
 Boat rental: \$750 per day x 3 days = how much? _____
 Profit = amount left over = how much? _____
3. If the boat must travel 96 miles (150 kilometers) to the fishing grounds, and the boat's average speed is 16 miles per hour (25 kilometers per hour), how long will it take to get there?

4. If the average fish after cleaning and readying for canning weighs 7.5 lbs. (3 kilograms), how many cans containing $\frac{1}{4}$ lb. (.1 kilogram) will one fish fill? _____
5. The cannery used the fish waste to make cat food. Based on the above problems, answer the following questions:
 a. How much waste is there per fish? _____
 b. How many $\frac{1}{4}$ lb. (.1 kilogram) cans of cat food can be made per fish? _____
 c. If the cannery gets \$.25 per can of cat food, how much do they make per fish? _____
6. a. If the grocery store sells the cat food for \$.50 per can, and your cat eats one can each day, how much will you spend for cat food per week? _____
 b. How much will you spend per thirty-day month? _____
7. If your part time job after school pays you \$3.00 per hour, how many hours per month will you have to work to pay for cat food each month? _____