Examining Samples Name:

Solve each problem.

1) In a lake there are 3 types of fish: minnows, goldfish and sunfish. A fisherman wanted to estimate how many of each type there were. He scooped up several nets full and recorded his results (shown below).

Sample #	1	2
minnows	7	3
goldfish	4	7
sunfish	7	7

Based on the information presented can you infer anything about the number of different types of fish in the lake?

Based on the information presented and the small samples gathered it is impossible to make any meaningful assumptions.

2) In a library there was a donation box for books. A librarian wanted to estimate how many fiction and how many non-fiction books were in the box so she pulled out a sample. The results are shown below:

Sample #	1	2	3	4	5	6	7	8
Fiction	40	40	40	41	44	41	44	44
Non-Fiction	48	49	52	51	50	50	51	50

Based on the information presented can you infer anything about the types of books donated?

Based on the information presented there will be 16% more Non-Fiction books donated.

3) A car company was trying to figure out if more men or more women purchased yellow cars. To do this they polled all the customer who bought a yellow car in the last month. Their results are shown below:

Sample #	1	2	3	4	5	6	7
Men	39	40	40	41	38	39	40
Women	41	38	38	39	41	42	38

Based on the information presented what can you infer about who bought yellow cars?

Because of the very small discrepancy in the quantities it is unlikely any deduction can be made about who bought more yellow cars.

Examining Samples Name: **Answer Key**

Solve each problem.

1) In a lake there are 3 types of fish: minnows, goldfish and sunfish. A fisherman wanted to estimate how many of each type there were. He scooped up several nets full and recorded his results (shown below).

Sample #	1	2
minnows	7	3
goldfish	4	7
sunfish	7	7

Based on the information presented can you infer anything about the number of different types of fish in the lake?

Based on the information presented and the small samples gathered it is impossible to make any meaningful assumptions.

2) In a library there was a donation box for books. A librarian wanted to estimate how many fiction and how many non-fiction books were in the box so she pulled out a sample. The results are shown below:

Sample #	1	2	3	4	5	6	7	8
Fiction	40	40	40	41	44	41	44	44
Non-Fiction	48	49	52	51	50	50	51	50

Based on the information presented can you infer anything about the types of books donated?

Based on the information presented there will be 16% more Non-Fiction books donated.

3) A car company was trying to figure out if more men or more women purchased yellow cars. To do this they polled all the customer who bought a yellow car in the last month. Their results are shown below:

Sample #	1	2	3	4	5	6	7
Men	39	40	40	41	38	39	40
Women	41	38	38	39	41	42	38

Based on the information presented what can you infer about who bought yellow cars?

Because of the very small discrepancy in the quantities it is unlikely any deduction can be made about who bought more yellow cars.