**Chapter 7: 7.1 Making Predictions**

Probabilities, like statistics, are all around us. For example the chance or probability of winning the lottery is 1 in 1000.

**Probability** is the likelihood or chance of something happening.

Probability is a branch of statistics. In **empirical**, or **experimental probability**, data are collected to make predictions.

**Example:**

The date the ice broke up on the lake where Chris’s family has a cottage has been recorded since 1901. It has always been between March 20 and May 5. The tally chart on page 128 in the text book shows the number of times it broke up over the past 100 year span of 1901 to 2000.

The experimental probability of the ice breaking up on a particular date is:

The number of times ice broke up on a date/The number of years studies

If the ice broke up 5 time on April 20th, the experimental probability of the ice breaking up on April 20th is:

5/100 = 0.05

Answer questions 1, 2, 3 on page 128 – 129.

**Complete question 5 on page 129 and pass it in.**