

## Monday

For all positive integers, let  $\boxed{n} = n + g$ , where  $g$  is the greatest factor of  $n$ , and  $g < n$ . If  $\boxed{18} = x$ , then  $\boxed{x} =$

- (A) 9.                      (B) 8.  
(C) 27.                     (D) 36.

## Tuesday

**CRITICAL THINKING** The members of the Math Club need to elect a president and a vice-president. They determine that there are a total of 272 ways that they can fill the positions with two different members. How many people are in the Math Club?

## Wednesday

A number is chosen at random from the set  $\{1, 2, 3, \dots, 20\}$ . What is the probability that the number is odd and divisible by 3?

- (A)  $\frac{3}{20}$                       (B)  $\frac{3}{10}$   
(C)  $\frac{7}{20}$                       (D)  $\frac{13}{20}$

## Thursday

### Concept Summary

- Margin of sampling error:  $ME = 2\sqrt{\frac{p(1-p)}{n}}$  if the percent of people in a sample responding in a certain way is  $p$  and the size of the sample is  $n$

In a survey taken at a local high school, 75% of the student body stated that they thought school lunches should be free. This survey had a margin of error of 2%. How many people were surveyed?

## Friday

The utility bills in a city of 5000 households are normally distributed with a mean of \$180 and a standard deviation of \$16. See Example 2 on pages 672 and 673.

About how many utility bills were between \$164 and \$196?