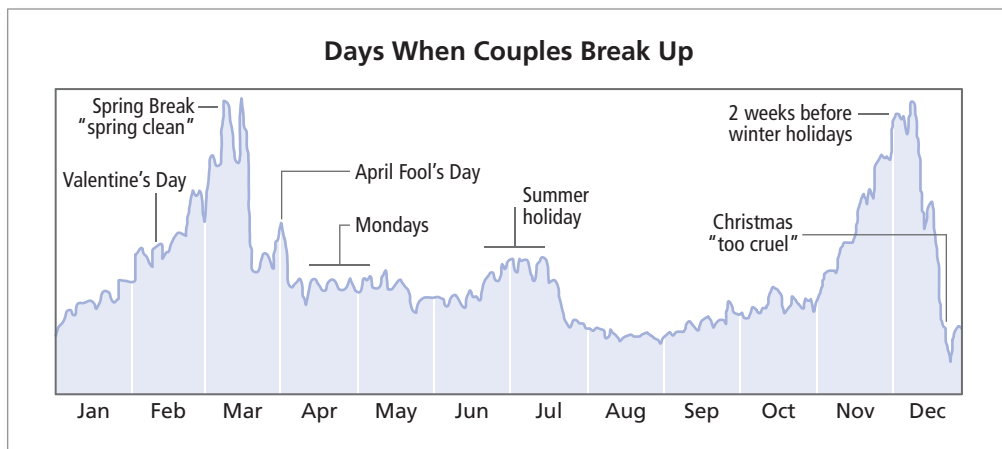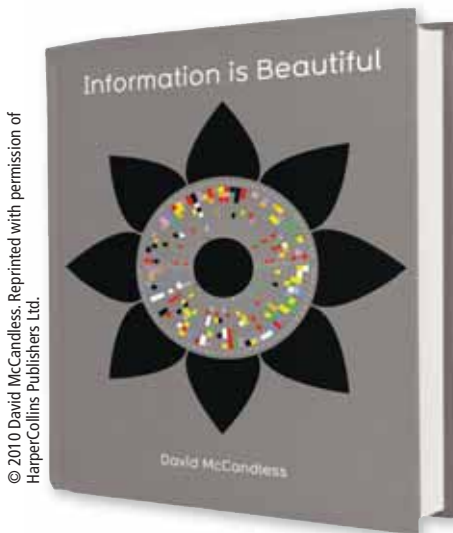EXAMPLE 4   **Drawing an Area Graph**

The following area graph is taken from *Information is Beautiful* by David McCandless. Describe the information and patterns presented in the graph.

Days When Couples Break Up

Spring Break —
"spring clean"

Valentine's Day

April Fool's Day

Mondays

Summer
holiday

2 weeks before
winter holidays

Christmas
"too cruel"

Jan   Feb   Mar   Apr   May   Jun   Jul   Aug   Sep   Oct   Nov   Dec

Information is Beautiful

David McCandless

David McCandless's book on information design is "a visual guide to the way the world really works."

SOLUTION

The graph shows the results of tracking 10,000 Facebook status updates to determine when people in relationships broke up.

There are several patterns that you can observe in the graph.

● The two peak times during the year when people break up are in the month leading up to Spring Break and the month leading up to Christmas.

● The spike in the number of breakups on April Fool's Day may be a result of people changing their relationship statuses as a joke.

● The frequency of breakups is relatively low from late July through October.

● The day of the year when people are least likely to break up is Christmas.

✓ **Checkpoint**   Help at *Math*.and**YOU**.com

What observations can you make about the area graph below?

Revenue from Top 12 Movies by Week of the Year (2009)

Revenue (millions)

$500
$400
$300
$200
$100
$0

1   4   7   10   13   16   19   22   25   28   31   34   37   40   43   46   49   52

Week