

The following errors appear in the Alberta Applied Math 30 KEY, 2009 edition.

Page 81, Unit Review: Cyclic, Recursive and Fractal Patterns

The unit reads, "...The dimensions of the graph can be changed by introducing values for the variable in the following version:  $y = a \sin(bx - c) + d$ ."

It should read, "...The dimensions of the graph can be changed by introducing values for the variable in the following version:  $y = a \sin(bx + c) + d$ ."

Page 82, Unit Review: Cyclic, Recursive and Fractal Patterns

The unit reads, "Most graphing calculators are able to perform a sinusoidal regression to produce an equation for the line of best fit in data in the form of  $y = a \sin(bx - c) + d$ , ..."

It should read, "Most graphing calculators are able to perform a sinusoidal regression to produce an equation for the line of best fit in data in the form of  $y = a \sin(bx + c) + d$ , ..."

Page 82, Unit Review: Cyclic, Recursive and Fractal Patterns

The solution for Example (a) reads, "To answer this, students will have to become familiar with their own particular calculators."

$$y = 20.61 \sin(0.52x + 2.16) + 1.21$$

$$a = 20.61$$

$$b = 0.52$$

$$c = 2.16$$

$$d = 1.21$$

It should read, "To answer this, students will have to become familiar with their own particular calculators."

$$y = 20.61 \sin(0.52x - 2.16) + 1.21$$

$$a = 20.61$$

$$b = 0.52$$

$$c = -2.16$$

$$d = 1.21$$

Page 84, Unit Review: Cyclic, Recursive and Fractal Patterns

The Example (e) reads, "What is the average temperature ...we evaluate the sinusoidal function where  $x - 7.5$ ."

It should read, "What is the average temperature ...we evaluate the sinusoidal function where  $x = 7.5$ ."

Page 84, Unit Review: Cyclic, Recursive and Fractal Patterns

The solution Example (e) reads, “ $y = 20.61\sin(0.52(7.5) + 2.16) + 1.21$   
 $y = -3.35^\circ\text{C}$ ”

Students may also be asked to interpret information given in a graph to produce the sinusoidal function without performing a regression on the calculator.”

It should read, “ $y = 20.61\sin(0.52(7.5) + 2.16) + 1.21$   
 $y \approx 21.5^\circ\text{C}$ ”

Students may also be asked to interpret information given in a graph to produce the sinusoidal function without performing a regression on the calculator in radian mode.”