class SampleCollection<T>

{

 // Declare an array to store the data elements.

 private T[] arr = new T[100];

 // Define the indexer, which will allow client code

 // to use [] notation on the class instance itself.

 // (See line 2 of code in Main below.)

 public T this[int i]

 {

 get

 {

 // This indexer is very simple, and just returns or sets

 // the corresponding element from the internal array.

 return arr[i];

 }

 set

 {

 arr[i] = value;

 }

 }

}

// This class shows how client code uses the indexer.

class Program

{

 static void Main(string[] args)

 {

 // Declare an instance of the SampleCollection type.

 SampleCollection<string> stringCollection = new SampleCollection<string>();

 // Use [] notation on the type.

 stringCollection[0] = "Hello, World";

 System.Console.WriteLine(stringCollection[0]);

 }

}

// Output:

// Hello, World.