Exceptions

ArgumentOutOfRangeException

The value in a set operation is less than zero.

-or-

The value in a set operation is greater than or equal to BufferHeight.

SecurityException

The user does not have permission to perform this action.

IOException

An I/O error occurred.

Examples

This example demonstrates the CursorLeft and CursorTop properties, and the SetCursorPosition and Clear methods. The example positions the cursor, which determines where the next write will occur, to draw a 5 character by 5 character rectangle using a combination of "+", "|", and "-" strings. Note that the rectangle could be drawn with fewer steps using a combination of other strings.

```C#
// This example demonstrates the
//      Console.CursorLeft and
//      Console.CursorTop properties, and the
//      Console.SetCursorPosition and
//      Console.Clear methods.
using System;

class Sample
{
    protected static int origRow;
    protected static int origCol;

    protected static void WriteAt(string s, int x, int y)
    {
    try
        {
        Console.SetCursorPosition(origCol+x, origRow+y);
        Console.Write(s);
        }
    catch (ArgumentOutOfRangeException e)
        {
        Console.Clear();
        Console.WriteLine(e.Message);
        }
    }
```

```csharp
    public static void Main()
    {
// Clear the screen, then save the top and left coordinates.
        Console.Clear();
        origRow = Console.CursorTop;
        origCol = Console.CursorLeft;

// Draw the left side of a 5x5 rectangle, from top to bottom.
        WriteAt("+", 0, 0);
        WriteAt("|", 0, 1);
        WriteAt("|", 0, 2);
        WriteAt("|", 0, 3);
        WriteAt("+", 0, 4);

// Draw the bottom side, from left to right.
        WriteAt("-", 1, 4); // shortcut: WriteAt("---", 1, 4)
        WriteAt("-", 2, 4); // ...
        WriteAt("-", 3, 4); // ...
        WriteAt("+", 4, 4);

// Draw the right side, from bottom to top.
        WriteAt("|", 4, 3);
        WriteAt("|", 4, 2);
        WriteAt("|", 4, 1);
        WriteAt("+", 4, 0);

// Draw the top side, from right to left.
        WriteAt("-", 3, 0); // shortcut: WriteAt("---", 1, 0)
        WriteAt("-", 2, 0); // ...
        WriteAt("-", 1, 0); // ...
//
        WriteAt("All done!", 0, 6);
        Console.WriteLine();
    }
}
/*
This example produces the following results:

+---+
|   |
|   |
|   |
+---+

All done!

*/
```

Applies to

Product	Versions

.NET	Core 1.0, Core 1.1, Core 2.0, Core 2.1, Core 2.2, Core 3.0, Core 3.1, 5, 6, 7 Preview 7
.NET Framework	2.0, 3.0, 3.5, 4.0, 4.5, 4.5.1, 4.5.2, 4.6, 4.6.1, 4.6.2, 4.7, 4.7.1, 4.7.2, 4.8
.NET Standard	1.3, 1.4, 1.6, 2.0, 2.1
Xamarin.iOS	10.8
Xamarin.Mac	3.0