

Namespace ASE_Assignment

Classes

[AppCanvas](#)

Implements drawing commands from ICanvas interface

[AppCommandFactory](#)

Command Factory is a class representing a design pattern for creating new commands

[AppInt](#)

Class for Int command. Extends Boose's Int command and removes its restrictions.

[AppReal](#)

Class for Real command. Extends Boose's Real command and removes restrictions.

[AppWrite](#)

Class for AppWrite Command. Implements ICommand Interface and extends CommandOneParameter.

[BooseForm](#)

BooseForm is a class representing the windows form for the BOOSE interpreter. Deals with user interface and program execution.

Class AppCanvas

Namespace: [ASE Assignment](#)

Assembly: ASE Assignment.dll

Implements drawing commands from ICanvas interface

```
public class AppCanvas : ICanvas
```

Inheritance

[object](#) ← AppCanvas

Implements

ICanvas

Inherited Members

[object.Equals\(object\)](#), [object.Equals\(object, object\)](#), [object.GetHashCode\(\)](#), [object.GetType\(\)](#), [object.MemberwiseClone\(\)](#), [object.ReferenceEquals\(object, object\)](#), [object.ToString\(\)](#)

Constructors

AppCanvas()

Initializes instance of AppCanvas. Sets

```
public AppCanvas()
```

Properties

PenColour

Get/Set Pencolour for current Pen.

```
public object PenColour { get; set; }
```

Property Value

[object](#)

Xpos

X position of cursor.

```
public int Xpos { get; set; }
```

Property Value

[int](#)

Ypos

Y position of cursor.

```
public int Ypos { get; set; }
```

Property Value

[int](#)

Methods

Circle(int, bool)

Draw a circle with specified radius.

```
public void Circle(int radius, bool filled)
```

Parameters

radius [int](#)

Radius of circle.

filled [bool](#)

If True the circle is drawn filled in.

Exceptions

CanvasException

Throws exception if radius is invalid

Clear()

Resets background to default colour (grey).

```
public void Clear()
```

DrawTo(int, int)

Draw a line from current position to specified position using initialized pen object, updates x,y to new position.

```
public void DrawTo(int x, int y)
```

Parameters

x [int](#)

X position to draw to.

y [int](#)

Y position to draw to.

Exceptions

CanvasException

Throws exception if specified x,y positions are invalid.

MoveTo(int, int)

Moves cursor position to specified x,y.

```
public void MoveTo(int x, int y)
```

Parameters

x [int](#)

specified x position.

y [int](#)

specified y position.

Exceptions

CanvasException

Throws exception if x,y are invalid.

Rect(int, int, bool)

Draws a rectangle with specified width,height.

```
public void Rect(int width, int height, bool filled)
```

Parameters

width [int](#)

width of rectangle.

height [int](#)

height of rectangle.

filled [bool](#)

True if rectangle is to be filled.

Exceptions

CanvasException

Throws exception if width,height are invalid

Reset()

Reset cursor positon to 0,0.

```
public void Reset()
```

Set(int, int)

Sets canvas size and creates bitmap.

```
public void Set(int xsize, int ysize)
```

Parameters

xsize [int](#)

width of canvas

ysize [int](#)

height of canvas

SetColour(int, int, int)

Sets colour of pen based on specified r,g,b values.

```
public void SetColour(int red, int green, int blue)
```

Parameters

red [int](#)

amount of red.

green [int](#)

amount of green.

blue [int](#)

amount of blue.

Exceptions

CanvasException

Tri(int, int)

Draws a triangle with specified width and height. Not implemented yet.

```
public void Tri(int width, int height)
```

Parameters

width [int](#)

width of triangle

height [int](#)

height of triangle

Exceptions

[NotImplementedException](#)

Not implemented yet

WriteText(string)

Draws text onto the output window.

```
public void WriteText(string text)
```

Parameters

`text` [string](#) 

Text to be drawn.

getBitmap()

Returns bitmap

```
public object getBitmap()
```

Returns

[object](#) 

bitmap

Class AppCommandFactory


Namespace: [ASE Assignment](#)

Assembly: ASE Assignment.dll

Command Factory is a class representing a design pattern for creating new commands

```
public class AppCommandFactory : CommandFactory, ICommandFactory
```








Inheritance

[object](#)  ← CommandFactory ← AppCommandFactory

Implements

ICommandFactory

Inherited Members

[object.Equals\(object\)](#)  , [object.Equals\(object, object\)](#)  , [object.GetHashCode\(\)](#)  , [object.GetType\(\)](#)  , [object.MemberwiseClone\(\)](#)  , [object.ReferenceEquals\(object, object\)](#)  , [object.ToString\(\)](#) 

Constructors

AppCommandFactory()

```
public AppCommandFactory()
```

Methods

MakeCommand(string)

Makes a Command Object from a String Passed. Currently creates int, real and write.

```
public override ICommand MakeCommand(string commandType)
```

Parameters

commandType [string](#) 

String representing command to be created. It is made lower and trimmed.

Returns

ICommand

returns an ICommand object on success

Class AppInt

Namespace: [ASE Assignment](#)

Assembly: ASE Assignment.dll

Class for Int command. Extends Boose's Int command and removes its restrictions.

```
public class AppInt : Int, ICommand
```











Inheritance

[object](#)  ← Command ← Evaluation ← Int ← AppInt

Implements

ICommand

Inherited Members

Int.Compile() , Int.Execute() , Evaluation.expression , Evaluation.evaluatedExpression ,
Evaluation.varName , Evaluation.value , [Evaluation.CheckParameters\(string\[\]\)](#)  ,
[Evaluation.ProcessExpression\(string\)](#)  , Evaluation.Expression , Evaluation.VarName , Evaluation.Value ,
Evaluation.Local , Command.program , Command.parameterList , Command.parameters ,
Command.paramsint , [Command.Set\(StoredProgram, string\)](#)  , [Command.ProcessParameters\(string\)](#)  ,
Command.ToString() , Command.Program , Command.Name , Command.ParameterList ,
Command.Parameters , Command.Paramsint , [object.Equals\(object\)](#)  , [object.Equals\(object, object\)](#)  ,
[object.GetHashCode\(\)](#)  , [object.GetType\(\)](#)  , [object.MemberwiseClone\(\)](#)  ,
[object.ReferenceEquals\(object, object\)](#) 

Methods

Restrictions()

```
public override void Restrictions()
```

Class AppReal

Namespace: [ASE Assignment](#)

Assembly: ASE Assignment.dll

Class for Real command. Extends Boose's Real command and removes restrictions.

```
public class AppReal : Real, ICommand
```











Inheritance

[object](#)  ← Command ← Evaluation ← Real ← AppReal

Implements

ICommand

Inherited Members

Real.Compile() , Real.Execute() , Real.Value , Evaluation.expression , Evaluation.evaluatedExpression , Evaluation.varName , Evaluation.value , [Evaluation.CheckParameters\(string\[\]\)](#)  , [Evaluation.ProcessExpression\(string\)](#)  , Evaluation.Expression , Evaluation.VarName , Evaluation.Local , Command.program , Command.parameterList , Command.parameters , Command.paramsint , [Command.Set\(StoredProgram, string\)](#)  , [Command.ProcessParameters\(string\)](#)  , Command.ToString() , Command.Program , Command.Name , Command.ParameterList , Command.Parameters , Command.Paramsint , [object.Equals\(object\)](#)  , [object.Equals\(object, object\)](#)  , [object.GetHashCode\(\)](#)  , [object.GetType\(\)](#)  , [object.MemberwiseClone\(\)](#)  , [object.ReferenceEquals\(object, object\)](#) 

Methods

Restrictions()

```
public override void Restrictions()
```

Class AppWrite





Namespace: [ASE Assignment](#)

Assembly: ASE Assignment.dll

Class for AppWrite Command. Implements ICommand Interface and extends CommandOneParameter.

```
public class AppWrite : CommandOneParameter, ICommand
```










Inheritance

[object](#)  ← [Command](#)  ← [CanvasCommand](#)  ← [CommandOneParameter](#)  ← [AppWrite](#)

Implements

ICommand

Inherited Members

[CommandOneParameter.param1](#) , [CommandOneParameter.param1unprocessed](#) ,
[CommandOneParameter.CheckParameters\(string\[\]\)](#)  , [CanvasCommand.yPos](#) , [CanvasCommand.xPos](#) ,
[CanvasCommand.canvas](#) , [CanvasCommand.Canvas](#) , [Command.program](#) , [Command.parameterList](#) ,
[Command.parameters](#) , [Command.paramsint](#) , [Command.Set\(StoredProgram, string\)](#)  ,
[Command.Compile\(\)](#) , [Command.ProcessParameters\(string\)](#)  , [Command.ToString\(\)](#) ,
[Command.Program](#) , [Command.Name](#) , [Command.ParameterList](#) , [Command.Parameters](#) ,
[Command.Paramsint](#) , [object.Equals\(object\)](#)  , [object.Equals\(object, object\)](#)  , [object.GetHashCode\(\)](#)  ,
[object.GetType\(\)](#)  , [object.MemberwiseClone\(\)](#)  , [object.ReferenceEquals\(object, object\)](#) 

Constructors

AppWrite()

```
public AppWrite()
```

Methods

Execute()

Overridien method execute. Checks parameters equal 1 and on success calls WriteText method from AppCanvas Class with parsed parameters.

```
public override void Execute()
```

Exceptions

CommandException

Exception raised if invalid parameters

Class BooseForm








Namespace: [ASE Assignment](#)

Assembly: ASE Assignment.dll




BooseForm is a class representing the windows form for the BOOSE interpreter. Deals with user interface and program execution.

```
public class BooseForm : Form, IDropTarget, ISynchronizeInvoke, IWin32Window,
    IBindableComponent, IComponent, IDisposable, IContainerControl
```































Inheritance

[object](#)  ← [MarshalByRefObject](#)  ← [Component](#)  ← [Control](#)  ← [ScrollableControl](#)  ← [ContainerControl](#)  ← [Form](#)  ← BooseForm

Implements

[IDropTarget](#) , [ISynchronizeInvoke](#) , [IWin32Window](#) , [IBindableComponent](#) , [IComponent](#) , [IDisposable](#) , [IContainerControl](#) 

Inherited Members

[Form.SetVisibleCore\(bool\)](#) , [Form.Activate\(\)](#) , [Form.ActivateMdiChild\(Form\)](#) , [Form.AddOwnedForm\(Form\)](#) , [Form.AdjustFormScrollbars\(bool\)](#) , [Form.Close\(\)](#) , [Form.CreateAccessibilityInstance\(\)](#) , [Form.CreateControlsInstance\(\)](#) , [Form.CreateHandle\(\)](#) , [Form.DefWndProc\(ref Message\)](#) , [Form.ProcessMnemonic\(char\)](#) , [Form.CenterToParent\(\)](#) , [Form.CenterToScreen\(\)](#) , [Form.LayoutMdi\(MdiLayout\)](#) , [Form.OnActivated\(EventArgs\)](#) , [Form.OnBackgroundImageChanged\(EventArgs\)](#) , [Form.OnBackgroundImageLayoutChanged\(EventArgs\)](#) , [Form.OnClosing\(CancelEventArgs\)](#) , [Form.OnClosed\(EventArgs\)](#) , [Form.OnFormClosing\(FormClosingEventArgs\)](#) , [Form.OnFormClosed\(FormClosedEventArgs\)](#) , [Form.OnCreateControl\(\)](#) , [Form.OnDeactivate\(EventArgs\)](#) , [Form.OnEnabledChanged\(EventArgs\)](#) , [Form.OnEnter\(EventArgs\)](#) , [Form.OnFontChanged\(EventArgs\)](#) , [Form.OnGotFocus\(EventArgs\)](#) , [Form.OnHandleCreated\(EventArgs\)](#) , [Form.OnHandleDestroyed\(EventArgs\)](#) , [Form.OnHelpButtonClicked\(CancelEventArgs\)](#) , [Form.OnLayout\(LayoutEventArgs\)](#) , [Form.OnLoad\(EventArgs\)](#) , [Form.OnMaximizedBoundsChanged\(EventArgs\)](#) , [Form.OnMaximumSizeChanged\(EventArgs\)](#) , [Form.OnMinimumSizeChanged\(EventArgs\)](#) , [Form.OnInputLanguageChanged\(InputLanguageChangedEventArgs\)](#) , [Form.OnInputLanguageChanging\(InputLanguageChangingEventArgs\)](#) , [Form.OnVisibleChanged\(EventArgs\)](#) , [Form.OnMdiChildActivate\(EventArgs\)](#) , [Form.OnMenuStart\(EventArgs\)](#) , [Form.OnMenuComplete\(EventArgs\)](#) , [Form.OnPaint\(PaintEventArgs\)](#) , [Form.OnResize\(EventArgs\)](#) 

[Form.OnDpiChanged\(DpiChangedEventArgs\)](#) , [Form.OnGetDpiScaledSize\(int, int, ref Size\)](#) ,
[Form.OnRightToLeftLayoutChanged\(EventArgs\)](#) , [Form.OnShown\(EventArgs\)](#) ,
[Form.OnTextChanged\(EventArgs\)](#) , [Form.ProcessCmdKey\(ref Message, Keys\)](#) ,
[Form.ProcessDialogKey\(Keys\)](#) , [Form.ProcessDialogChar\(char\)](#) ,
[Form.ProcessKeyPreview\(ref Message\)](#) , [Form.ProcessTabKey\(bool\)](#) ,
[Form.RemoveOwnedForm\(Form\)](#) , [Form.Select\(bool, bool\)](#) ,
[Form.ScaleMinMaxSize\(float, float, bool\)](#) ,
[Form.GetScaledBounds\(Rectangle, SizeF, BoundsSpecified\)](#) ,
[Form.ScaleControl\(SizeF, BoundsSpecified\)](#) , [Form.SetBoundsCore\(int, int, int, int, BoundsSpecified\)](#) ,
[Form.SetClientSizeCore\(int, int\)](#) , [Form.SetDesktopBounds\(int, int, int, int\)](#) ,
[Form.SetDesktopLocation\(int, int\)](#) , [Form.Show\(IWin32Window\)](#) , [Form.ShowDialog\(\)](#) ,
[Form.ShowDialog\(IWin32Window\)](#) , [Form.ToString\(\)](#) , [Form.UpdateDefaultButton\(\)](#) ,
[Form.OnResizeBegin\(EventArgs\)](#) , [Form.OnResizeEnd\(EventArgs\)](#) ,
[Form.OnStyleChanged\(EventArgs\)](#) , [Form.ValidateChildren\(\)](#) ,
[Form.ValidateChildren\(ValidationConstraints\)](#) , [Form.WndProc\(ref Message\)](#) , [Form.AcceptButton](#) ,
[Form.ActiveForm](#) , [Form.ActiveMdiChild](#) , [Form.AllowTransparency](#) , [Form.AutoScroll](#) ,
[Form.AutoSize](#) , [Form.AutoSizeMode](#) , [Form.AutoValidate](#) , [Form.BackColor](#) ,
[Form.FormBorderStyle](#) , [Form.CancelButton](#) , [Form.ClientSize](#) , [Form.ControlBox](#) ,
[Form.CreateParams](#) , [Form.DefaultImeMode](#) , [Form.DefaultSize](#) , [Form.DesktopBounds](#) ,
[Form.DesktopLocation](#) , [Form.DialogResult](#) , [Form.HelpButton](#) , [Form.Icon](#) , [Form.IsMdiChild](#) ,
[Form.IsMdiContainer](#) , [Form.IsRestrictedWindow](#) , [Form.KeyPreview](#) , [Form.Location](#) ,
[Form.MaximizedBounds](#) , [Form.MaximumSize](#) , [Form.MainMenuStrip](#) , [Form.MinimumSize](#) ,
[Form.MaximizeBox](#) , [Form.MdiChildren](#) , [Form.MdiChildrenMinimizedAnchorBottom](#) ,
[Form.MdiParent](#) , [Form.MinimizeBox](#) , [Form.Modal](#) , [Form.Opacity](#) , [Form.OwnedForms](#) ,
[Form.Owner](#) , [Form.RestoreBounds](#) , [Form.RightToLeftLayout](#) , [Form.ShowInTaskbar](#) ,
[Form.ShowIcon](#) , [Form.ShowWithoutActivation](#) , [Form.Size](#) , [Form.SizeGripStyle](#) ,
[Form.StartPosition](#) , [Form.Text](#) , [Form.TopLevel](#) , [Form.TopMost](#) , [Form.TransparencyKey](#) ,
[Form.WindowState](#) , [Form.AutoSizeChanged](#) , [Form.AutoValidateChanged](#) ,
[Form.HelpButtonClicked](#) , [Form.MaximizedBoundsChanged](#) , [Form.MaximumSizeChanged](#) ,
[Form.MinimumSizeChanged](#) , [Form.Activated](#) , [Form.Deactivate](#) , [Form.FormClosing](#) ,
[Form.FormClosed](#) , [Form.Load](#) , [Form.MdiChildActivate](#) , [Form.MenuComplete](#) ,
[Form.MenuStart](#) , [Form.InputLanguageChanged](#) , [Form.InputLanguageChanging](#) ,
[Form.RightToLeftLayoutChanged](#) , [Form.Shown](#) , [Form.DpiChanged](#) , [Form.ResizeBegin](#) ,
[Form.ResizeEnd](#) , [ContainerControl.OnAutoValidateChanged\(EventArgs\)](#) ,
[ContainerControl.OnMove\(EventArgs\)](#) , [ContainerControl.OnParentChanged\(EventArgs\)](#) ,
[ContainerControl.PerformAutoScale\(\)](#) , [ContainerControl.RescaleConstantsForDpi\(int, int\)](#) ,
[ContainerControl.Validate\(\)](#) , [ContainerControl.Validate\(bool\)](#) ,
[ContainerControl.AutoScaleDimensions](#) , [ContainerControl.AutoScaleFactor](#) ,
[ContainerControl.AutoScaleMode](#) , [ContainerControl.BindingContext](#) ,
[ContainerControl.CanEnableIme](#) , [ContainerControl.ActiveControl](#) ,

[ContainerControl.CurrentAutoScaleDimensions](#) , [ContainerControl.ParentForm](#) ,
[ScrollableControl.ScrollStateAutoScrolling](#) , [ScrollableControl.ScrollStateHScrollVisible](#) ,
[ScrollableControl.ScrollStateVScrollVisible](#) , [ScrollableControl.ScrollStateUserHasScrolled](#) ,
[ScrollableControl.ScrollStateFullDrag](#) , [ScrollableControl.GetScrollState\(int\)](#) ,
[ScrollableControl.OnMouseWheel\(MouseEventArgs\)](#) ,
[ScrollableControl.OnRightToLeftChanged\(EventArgs\)](#) ,
[ScrollableControl.OnPaintBackground\(PaintEventArgs\)](#) ,
[ScrollableControl.OnPaddingChanged\(EventArgs\)](#) , [ScrollableControl.SetDisplayRectLocation\(int, int\)](#) ,
[ScrollableControl.ScrollControlIntoView\(Control\)](#) , [ScrollableControl.ScrollToControl\(Control\)](#) ,
[ScrollableControl.OnScroll\(ScrollEventArgs\)](#) , [ScrollableControl.SetAutoScrollMargin\(int, int\)](#) ,
[ScrollableControl.SetScrollState\(int, bool\)](#) , [ScrollableControl.AutoScrollMargin](#) ,
[ScrollableControl.AutoScrollPosition](#) , [ScrollableControl.AutoScrollMinSize](#) ,
[ScrollableControl.DisplayRectangle](#) , [ScrollableControl.HScroll](#) , [ScrollableControl.HorizontalScroll](#) ,
[ScrollableControl.VScroll](#) , [ScrollableControl.VerticalScroll](#) , [ScrollableControl.Scroll](#) ,
[Control.GetAccessibilityObjectById\(int\)](#) , [Control.SetAutoSizeMode\(AutoSizeMode\)](#) ,
[Control.GetAutoSizeMode\(\)](#) , [Control.GetPreferredSize\(Size\)](#) ,
[Control.AccessibilityNotifyClients\(AccessibleEvents, int\)](#) ,
[Control.AccessibilityNotifyClients\(AccessibleEvents, int, int\)](#) , [Control.BeginInvoke\(Delegate\)](#) ,
[Control.BeginInvoke\(Action\)](#) , [Control.BeginInvoke\(Delegate, params object\[\]\)](#) ,
[Control.BringToFront\(\)](#) , [Control.Contains\(Control\)](#) , [Control.CreateGraphics\(\)](#) ,
[Control.CreateControl\(\)](#) , [Control.DestroyHandle\(\)](#) , [Control.DoDragDrop\(object, DragDropEffects\)](#) ,
[Control.DoDragDrop\(object, DragDropEffects, Bitmap, Point, bool\)](#) ,
[Control.DrawToBitmap\(Bitmap, Rectangle\)](#) , [Control.EndInvoke\(IAsyncResult\)](#) , [Control.FindForm\(\)](#) ,
[Control.GetTopLevel\(\)](#) , [Control.RaiseKeyEvent\(object, KeyEventArgs\)](#) ,
[Control.RaiseMouseEvent\(object, MouseEventArgs\)](#) , [Control.Focus\(\)](#) ,
[Control.FromChildHandle\(nint\)](#) , [Control.FromHandle\(nint\)](#) ,
[Control.GetChildAtPoint\(Point, GetChildAtPointSkip\)](#) , [Control.GetChildAtPoint\(Point\)](#) ,
[Control.GetContainerControl\(\)](#) , [Control.GetNextControl\(Control, bool\)](#) ,
[Control.GetStyle\(ControlStyles\)](#) , [Control.Hide\(\)](#) , [Control.InitLayout\(\)](#) , [Control.Invalidate\(Region\)](#) ,
[Control.Invalidate\(Region, bool\)](#) , [Control.Invalidate\(\)](#) , [Control.Invalidate\(bool\)](#) ,
[Control.Invalidate\(Rectangle\)](#) , [Control.Invalidate\(Rectangle, bool\)](#) , [Control.Invoke\(Action\)](#) ,
[Control.Invoke\(Delegate\)](#) , [Control.Invoke\(Delegate, params object\[\]\)](#) ,
[Control.Invoke<T>\(Func<T>\)](#) , [Control.InvokePaint\(Control, PaintEventArgs\)](#) ,
[Control.InvokePaintBackground\(Control, PaintEventArgs\)](#) , [Control.IsKeyLocked\(Keys\)](#) ,
[Control.IsInputChar\(char\)](#) , [Control.IsInputKey\(Keys\)](#) , [Control.IsMnemonic\(char, string\)](#) ,
[Control.LogicalToDeviceUnits\(int\)](#) , [Control.LogicalToDeviceUnits\(Size\)](#) ,
[Control.ScaleBitmapLogicalToDevice\(ref Bitmap\)](#) , [Control.NotifyInvalidate\(Rectangle\)](#) ,
[Control.InvokeOnClick\(Control, EventArgs\)](#) , [Control.OnAutoSizeChanged\(EventArgs\)](#) ,
[Control.OnBackColorChanged\(EventArgs\)](#) , [Control.OnBindingContextChanged\(EventArgs\)](#) ,
[Control.OnCausesValidationChanged\(EventArgs\)](#) , [Control.OnContextMenuStripChanged\(EventArgs\)](#) ,

[Control.OnCursorChanged\(EventArgs\)](#), [Control.OnDataContextChanged\(EventArgs\)](#),
[Control.OnDockChanged\(EventArgs\)](#), [Control.OnForeColorChanged\(EventArgs\)](#),
[Control.OnNotifyMessage\(Message\)](#), [Control.OnParentBackColorChanged\(EventArgs\)](#),
[Control.OnParentBackgroundImageChanged\(EventArgs\)](#),
[Control.OnParentBindingContextChanged\(EventArgs\)](#), [Control.OnParentCursorChanged\(EventArgs\)](#),
[Control.OnParentDataContextChanged\(EventArgs\)](#), [Control.OnParentEnabledChanged\(EventArgs\)](#),
[Control.OnParentFontChanged\(EventArgs\)](#), [Control.OnParentForeColorChanged\(EventArgs\)](#),
[Control.OnParentRightToLeftChanged\(EventArgs\)](#), [Control.OnParentVisibleChanged\(EventArgs\)](#),
[Control.OnPrint\(PaintEventArgs\)](#), [Control.OnTabIndexChanged\(EventArgs\)](#),
[Control.OnTabStopChanged\(EventArgs\)](#), [Control.OnClick\(EventArgs\)](#),
[Control.OnClientSizeChanged\(EventArgs\)](#), [Control.OnControlAdded\(ControlEventArgs\)](#),
[Control.OnControlRemoved\(ControlEventArgs\)](#), [Control.OnLocationChanged\(EventArgs\)](#),
[Control.OnDoubleClick\(EventArgs\)](#), [Control.OnDragEnter\(DragEventArgs\)](#),
[Control.OnDragOver\(DragEventArgs\)](#), [Control.OnDragLeave\(EventArgs\)](#),
[Control.OnDragDrop\(DragEventArgs\)](#), [Control.OnGiveFeedback\(GiveFeedbackEventArgs\)](#),
[Control.InvokeGotFocus\(Control, EventArgs\)](#), [Control.OnHelpRequested\(HelpEventArgs\)](#),
[Control.OnInvalidated\(InvalidateEventArgs\)](#), [Control.OnKeyDown\(KeyEventArgs\)](#),
[Control.OnKeyPress\(KeyPressEventArgs\)](#), [Control.OnKeyUp\(KeyEventArgs\)](#),
[Control.OnLeave\(EventArgs\)](#), [Control.InvokeLostFocus\(Control, EventArgs\)](#),
[Control.OnLostFocus\(EventArgs\)](#), [Control.OnMarginChanged\(EventArgs\)](#),
[Control.OnMouseDoubleClick\(MouseEventArgs\)](#), [Control.OnMouseClicked\(MouseEventArgs\)](#),
[Control.OnMouseCaptureChanged\(EventArgs\)](#), [Control.OnMouseDown\(MouseEventArgs\)](#),
[Control.OnMouseEnter\(EventArgs\)](#), [Control.OnMouseLeave\(EventArgs\)](#),
[Control.OnDpiChangedBeforeParent\(EventArgs\)](#), [Control.OnDpiChangedAfterParent\(EventArgs\)](#),
[Control.OnMouseHover\(EventArgs\)](#), [Control.OnMouseMove\(MouseEventArgs\)](#),
[Control.OnMouseUp\(MouseEventArgs\)](#),
[Control.OnQueryContinueDrag\(QueryContinueDragEventArgs\)](#),
[Control.OnRegionChanged\(EventArgs\)](#), [Control.OnPreviewKeyDown\(PreviewKeyDownEventArgs\)](#),
[Control.OnSizeChanged\(EventArgs\)](#), [Control.OnChangeUICues\(UICuesEventArgs\)](#),
[Control.OnSystemColorsChanged\(EventArgs\)](#), [Control.OnValidating\(CancelEventArgs\)](#),
[Control.OnValidated\(EventArgs\)](#), [Control.PerformLayout\(\)](#), [Control.PerformLayout\(Control, string\)](#),
[Control.PointToClient\(Point\)](#), [Control.PointToScreen\(Point\)](#),
[Control.PreProcessMessage\(ref Message\)](#), [Control.PreProcessControlMessage\(ref Message\)](#),
[Control.ProcessKeyEventArgs\(ref Message\)](#), [Control.ProcessKeyMessage\(ref Message\)](#),
[Control.RaiseDragEvent\(object, DragEventArgs\)](#), [Control.RaisePaintEvent\(object, PaintEventArgs\)](#),
[Control.RecreateHandle\(\)](#), [Control.RectangleToClient\(Rectangle\)](#),
[Control.RectangleToScreen\(Rectangle\)](#), [Control.ReflectMessage\(nint, ref Message\)](#),
[Control.Refresh\(\)](#), [Control.ResetMouseEventArgs\(\)](#), [Control.ResetText\(\)](#), [Control.ResumeLayout\(\)](#),
[Control.ResumeLayout\(bool\)](#), [Control.Scale\(SizeF\)](#), [Control.Select\(\)](#),
[Control.SelectNextControl\(Control, bool, bool, bool, bool\)](#), [Control.SendToBack\(\)](#),

[Control.SetBounds\(int, int, int, int\)](#), [Control.SetBounds\(int, int, int, int, BoundsSpecified\)](#),
[Control.SizeFromClientSize\(Size\)](#), [Control.SetStyle\(ControlStyles, bool\)](#), [Control.SetTopLevel\(bool\)](#),
[Control.RtlTranslateAlignment\(HorizontalAlignment\)](#),
[Control.RtlTranslateAlignment\(LeftRightAlignment\)](#),
[Control.RtlTranslateAlignment\(ContentAlignment\)](#),
[Control.RtlTranslateHorizontal\(HorizontalAlignment\)](#),
[Control.RtlTranslateLeftRight\(LeftRightAlignment\)](#), [Control.RtlTranslateContent\(ContentAlignment\)](#),
[Control.Show\(\)](#), [Control.SuspendLayout\(\)](#), [Control.Update\(\)](#), [Control.UpdateBounds\(\)](#),
[Control.UpdateBounds\(int, int, int, int\)](#), [Control.UpdateBounds\(int, int, int, int, int, int\)](#),
[Control.UpdateZOrder\(\)](#), [Control.UpdateStyles\(\)](#), [Control.OnImeModeChanged\(EventArgs\)](#),
[Control.AccessibilityObject](#), [Control.AccessibleDefaultActionDescription](#),
[Control.AccessibleDescription](#), [Control.AccessibleName](#), [Control.AccessibleRole](#),
[Control.AllowDrop](#), [Control.Anchor](#), [Control.AutoScrollOffset](#), [Control.LayoutEngine](#),
[Control.DataContext](#), [Control.BackgroundImage](#), [Control.BackgroundImageLayout](#),
[Control.Bottom](#), [Control.Bounds](#), [Control.CanFocus](#), [Control.CanRaiseEvents](#),
[Control.CanSelect](#), [Control.Capture](#), [Control.CausesValidation](#),
[Control.CheckForIllegalCrossThreadCalls](#), [Control.ClientRectangle](#), [Control.CompanyName](#),
[Control.ContainsFocus](#), [Control.ContextMenuStrip](#), [Control.Controls](#), [Control.Created](#),
[Control.Cursor](#), [Control.DataBindings](#), [Control.DefaultBackColor](#), [Control.DefaultCursor](#),
[Control.DefaultFont](#), [Control.DefaultForeColor](#), [Control.DefaultMargin](#),
[Control.DefaultMaximumSize](#), [Control.DefaultMinimumSize](#), [Control.DefaultPadding](#),
[Control.DeviceDpi](#), [Control.IsDisposed](#), [Control.Disposing](#), [Control.Dock](#),
[Control.DoubleBuffered](#), [Control.Enabled](#), [Control.Focused](#), [Control.Font](#),
[Control.FontHeight](#), [Control.ForeColor](#), [Control.Handle](#), [Control.HasChildren](#), [Control.Height](#),
[Control.IsHandleCreated](#), [Control.InvokeRequired](#), [Control.IsAccessible](#),
[Control.IsAncestorSiteInDesignMode](#), [Control.IsMirrored](#), [Control.Left](#), [Control.Margin](#),
[Control.ModifierKeys](#), [Control.MouseButtons](#), [Control.MousePosition](#), [Control.Name](#),
[Control.Parent](#), [Control.ProductName](#), [Control.ProductVersion](#), [Control.RecreatingHandle](#),
[Control.Region](#), [Control.RenderRightToLeft](#), [Control.ResizeRedraw](#), [Control.Right](#),
[Control.RightToLeft](#), [Control.ScaleChildren](#), [Control.Site](#), [Control.TabIndex](#), [Control.TabStop](#),
[Control.Tag](#), [Control.Top](#), [Control.TopLevelControl](#), [Control.ShowKeyboardCues](#),
[Control.ShowFocusCues](#), [Control.UseWaitCursor](#), [Control.Visible](#), [Control.Width](#),
[Control.PreferredSize](#), [Control.Padding](#), [Control.ImeMode](#), [Control.ImeModeBase](#),
[Control.PropagatingImeMode](#), [Control.BackColorChanged](#), [Control.BackgroundImageChanged](#),
[Control.BackgroundImageLayoutChanged](#), [Control.BindingContextChanged](#),
[Control.CausesValidationChanged](#), [Control.ClientSizeChanged](#),
[Control.ContextMenuStripChanged](#), [Control.CursorChanged](#), [Control.DockChanged](#),
[Control.EnabledChanged](#), [Control.FontChanged](#), [Control.ForeColorChanged](#),
[Control.LocationChanged](#), [Control.MarginChanged](#), [Control.RegionChanged](#),
[Control.RightToLeftChanged](#), [Control.SizeChanged](#), [Control.TabIndexChanged](#),

[Control.TabStopChanged](#) , [Control.TextChanged](#) , [Control.VisibleChanged](#) , [Control.Click](#) ,
[Control.ControlAdded](#) , [Control.ControlRemoved](#) , [Control.DataContextChanged](#) ,
[Control.DragDrop](#) , [Control.DragEnter](#) , [Control.DragOver](#) , [Control.DragLeave](#) ,
[Control.GiveFeedback](#) , [Control.HandleCreated](#) , [Control.HandleDestroyed](#) ,
[Control.HelpRequested](#) , [Control.Invalidated](#) , [Control.PaddingChanged](#) , [Control.Paint](#) ,
[Control.QueryContinueDrag](#) , [Control.QueryAccessibilityHelp](#) , [Control.DoubleClick](#) ,
[Control.Enter](#) , [Control.GotFocus](#) , [Control.KeyDown](#) , [Control.KeyPress](#) , [Control.KeyUp](#) ,
[Control.Layout](#) , [Control.Leave](#) , [Control.LostFocus](#) , [Control.MouseClick](#) ,
[Control.MouseDoubleClick](#) , [Control.MouseCaptureChanged](#) , [Control.MouseDown](#) ,
[Control.MouseEnter](#) , [Control.MouseLeave](#) , [Control.DpiChangedBeforeParent](#) ,
[Control.DpiChangedAfterParent](#) , [Control.MouseHover](#) , [Control.MouseMove](#) , [Control.MouseUp](#) ,
[Control.MouseWheel](#) , [Control.Move](#) , [Control.PreviewKeyDown](#) , [Control.Resize](#) ,
[Control.ChangeUICues](#) , [Control.StyleChanged](#) , [Control.SystemColorsChanged](#) ,
[Control.Validating](#) , [Control.Validated](#) , [Control.ParentChanged](#) , [Control.ImeModeChanged](#) ,
[Component.Dispose\(\)](#) , [Component.GetService\(Type\)](#) , [Component.Container](#) ,
[Component.DesignMode](#) , [Component.Events](#) , [Component.Disposed](#) ,
[MarshalByRefObject.GetLifetimeService\(\)](#) , [MarshalByRefObject.InitializeLifetimeService\(\)](#) ,
[MarshalByRefObject.MemberwiseClone\(bool\)](#) , [object.Equals\(object\)](#) , [object.Equals\(object, object\)](#) ,
[object.GetHashCode\(\)](#) , [object.GetType\(\)](#) , [object.MemberwiseClone\(\)](#) ,
[object.ReferenceEquals\(object, object\)](#)

Constructors

BooseForm()

Initializes instance of BooseForm class

```
public BooseForm()
```


Methods

Dispose(bool)

Clean up any resources being used.

```
protected override void Dispose(bool disposing)
```

Parameters

`disposing` [bool](#)

true if managed resources should be disposed; otherwise, false.

Namespace BooseTests

Classes

[CanvasTests](#)

[VariableTests](#)

Class CanvasTests

Namespace: [BooseTests](#)








Assembly: BooseTests.dll

```
[TestClass]  
public class CanvasTests
```

Inheritance

[object](#)  ← CanvasTests

Inherited Members

[object.Equals\(object\)](#)  , [object.Equals\(object, object\)](#)  , [object.GetHashCode\(\)](#)  , [object.GetType\(\)](#)  ,
[object.MemberwiseClone\(\)](#)  , [object.ReferenceEquals\(object, object\)](#)  , [object.ToString\(\)](#) 

Methods

TestDrawTo()

Tests the method DrawTo by calling the method and checking if the pen position is correct.

```
[TestMethod]  
public void TestDrawTo()
```

TestMoveTo()

Tests the method MoveTo by calling the method and checking if the pen position is correct.

```
[TestMethod]  
public void TestMoveTo()
```

TestMultiline()

Tests a multiline program by calling multiple MoveTo and DrawTo commands and checking the final pen position.

```
[TestMethod]  
public void TestMultiline()
```

TestWrite()

```
[TestMethod]  
public void TestWrite()
```



Class VariableTests

Namespace: [BooseTests](#)








Assembly: BooseTests.dll

```
[TestClass]  
public class VariableTests
```

Inheritance

[object](#)  ← VariableTests

Inherited Members

[object.Equals\(object\)](#)  , [object.Equals\(object, object\)](#)  , [object.GetHashCode\(\)](#)  , [object.GetType\(\)](#)  ,
[object.MemberwiseClone\(\)](#)  , [object.ReferenceEquals\(object, object\)](#)  , [object.ToString\(\)](#) 

Methods

TestInt()

```
[TestMethod]  
public void TestInt()
```

TestReal()

```
[TestMethod]  
public void TestReal()
```