



# ASP.NET Mobile Controls



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# Pagination

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- The runtime breaks the output into smaller chunks, adapting the output display to suit the target device.
- Meaning: A single Form control could represent multiple pages.
- For Example: A form collecting a user's personal details might split into a number of parts on a mobile phone to accommodate the phone's limited display capabilities. However, the same form might appear as a single page on a device with a larger screen, like a Pocket PC.

# Form control

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- Activate

- Occurs when a form becomes active, which can happen when:

- A form is first requested

- A form is activated programmatically

- A user follows a link to a form

# Form control

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- Deactivate

- Occurs when the current form becomes inactive, as in the following instances:

- The user follows a link to a form, the current form is deactivated, and the new form is activated.
    - The new form is activated programmatically, and the current form is deactivated.

# Form Control

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- Paginated
  - Occurs when form pagination completes, which happens prior to rendering each request.
  - After this occurs, the `CurrentPage` property of the form contains the actual number of display pages for the form.

# <deviceFilters>

- **In the web.config file:**

```
<deviceFilters>
  <filter name="isHTML32" compare="PreferredRenderingType" argument="html32"/>
  <filter name="isWML11" compare="PreferredRenderingType" argument="wml11"/>
  <filter name="isCHTML10" compare="PreferredRenderingType" argument="html10"/>
  <filter name="isGoAmerica" compare="Browser" argument="Go.Web"/>
  <filter name="isMME" compare="Browser" argument="Microsoft Mobile Explorer"/>
  <filter name="isMyPalm" compare="Browser" argument="MyPalm"/>
  <filter name="isPocketIE" compare="Browser" argument="Pocket IE"/>
  <filter name="isUP3x" compare="Type" argument="Phone.com 3.x Browser"/>
  <filter name="isUP4x" compare="Type" argument="Phone.com 4.x Browser"/>
  <filter name="isEricssonR380" compare="Type" argument="Ericsson R380"/>
  <filter name="isNokia7110" compare="Type" argument="Nokia 7110"/>
  <filter name="prefersGIF" compare="PreferredImageMIME" argument="image/gif"/>
  <filter name="prefersWBMP" compare="PreferredImageMIME" argument="image/vnd.wap.wbmp"/>
  <filter name="supportsColor" compare="IsColor" argument="true"/>
  <filter name="supportsCookies" compare="Cookies" argument="true"/>
  <filter name="supportsJavaScript" compare="Javascript" argument="true"/>
  <filter name="supportsVoiceCalls" compare="CanInitiateVoiceCall" argument="true"/>
</deviceFilters>
```

# DeviceSpecific / Choice construct

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- Used for applying customization techniques to a mobile control in an .aspx file.
- Allows you to identify particular client devices, or groups of devices.

# Example

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```
<mobile:Label id="Label1" runat="server" Text="Default text">
  <DeviceSpecific>
    <Choice Filter="isHTML32" Text="Text for selected devices">
      </Choice>
    </DeviceSpecific>
</mobile:Label>
```

- The Filter="isHTML32" attribute applies a Device Filter.
- isHTML32 is a Device Filter that identifies devices that have HTML 3.2 browsers.
- For those devices, the contents of <Choice>...</Choice> are applied.
- For the example above, this Choice filter applies a property override to HTML 3.2 browsers, changing the Text of the <mobile:Label>



# <DeviceSpecific>

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- A web form can contain only one (1) <DeviceSpecific> element.

# <Choice>

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- You can specify as many Choice elements as you need inside of a DeviceSpecific element.
- You can specify a Choice element *without* a Filter attribute – then that element will be the default Choice.

# <Choice>

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- You do not have to specify a default <Choice> element, but if you do, it should be the last one listed.
- <Choice> elements are evaluated sequentially. Once one is reached that returns true, none of the others are evaluated (similar to a case statement)

# Example

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```
<mobile:Image runat="server" id="myImages" AlternateText="Northwind Corp.">
  <DeviceSpecific>
    <Choice Filter="isHTML32" ImageUrl="Northwindlogo.gif" />
    <Choice Filter="isWML11" ImageUrl="Northwindlogo.wbmp" />
  </DeviceSpecific>
</mobile:Image>
```

- When a client requests this mobile page, the runtime evaluates the first <Choice> element.
- If the isHTML32 filter returns true, then the ImageURL property of the Image control is set to the GIF image.
- If isHTML32 returns false, then isWML11 is evaluated. If isWML11 returns true, then the ImageURL property of the Image control is set to the WBMP image.
- The two device filters used here are defined in the web.config file.

# Other Templates

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- Form Control

- <HeaderTemplate>

- is rendered at the top of the form. When you enable pagination, this template is rendered at the top of each page.

- <FooterTemplate>

- is rendered at the foot of the form. When you enable pagination, this template is rendered at the foot of each page.

# Other Templates

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- Form Control (cont.)
  - <ScriptTemplate>
- Panel Control
  - <ContentTemplate>
- List Control
  - <HeaderTemplate>
  - <FooterTemplate>
  - <ItemTemplate>
  - ...