

```
1 //using is a directive
2 //System is a name space
3 //name space is a collection of features that our needs to run
4 using System;
5 using System.Xml.Linq;
6 using System.Linq;
7 //public means accessible anywhere
8 //partial means this class is split over multiple files
9 //class is a keyword and think of it as the outermost level of grouping
10 //:System.Web.UI.Page means our page inherits the features of a Page
11 public partial class _Default : System.Web.UI.Page
12 {
13     protected void Button1_Click(object sender, EventArgs e)
14     {
15         sampLabel.Text = ""; //clear label on every button click so stuff does not accumulate
16         //create a nice XML tree structure for searching: store is the root, inside that is shoes,
17         //and then under shoes are three different brands
18         XElement store = new XElement("store",
19             new XElement("shoes",
20                 new XElement("brand", "Nike", new XAttribute("price", "65")),
21                 new XElement("brand", "Stacy Adams", new XAttribute("price",
22                     "120")),
23                 new XElement("brand", "Florsheim", new XAttribute("price",
24                     "90"))));
25
26         store.Save(@"c:\data\storefile.xml"); //save file to drive to confirm it looks like
27         healthy XML
28
29         //search down to the level of the price attribute, and compare that value against the
30         //value entered in the search box by the user
31         var shoeSearch = from shoes in store.Descendants("shoes").Descendants("brand")
32             where (decimal)shoes.Attribute("price") > decimal.Parse
33             (TextBox1.Text)
34             select shoes;
35
36         //display all the shoe brands, and the prices
37         foreach(XElement shoeBrand in shoeSearch)
38         {
39             sampLabel.Text += $"<br>Brand:{shoeBrand}<br>Price:{(decimal)shoeBrand.Attribute
40                 ("price"):C}";
41         }
42     }
43 }
```