

ShowSession3.java

```
1 package coreservlets;
2
3 import java.io.*;
4
5
6
7
8
9 /** Servlet that uses session-tracking to keep per-client
10 *  access counts. Also shows other info about the session.
11 *  <p>
12 *  From <a
13 *  href="http://courses.coreservlets.com/Course-Materials/">th
14 *  e
15 *  coreservlets.com tutorials on servlets, JSP, Struts,
16 *  JSF, Ajax, GWT,
17 *  Spring, Hibernate, JPA, and Java</a>.
18 */
19
20 @WebServlet("/show-session3")
21 public class ShowSession3 extends HttpServlet {
22     @Override
23     public void doGet(HttpServletRequest request,
24                       HttpServletResponse response)
25         throws ServletException, IOException {
26         response.setContentType("text/html");
27         HttpSession session = request.getSession();
28         synchronized(session) {
29             String heading;
30             Integer accessCount =
31                 (Integer)session.getAttribute("accessCount");
32             if (accessCount == null) {
33                 accessCount = 0;
34                 heading = "Welcome, Newcomer";
35             } else {
36                 heading = "Welcome Back";
37                 accessCount = accessCount + 1;
38             }
39         }
40     }
41 }
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36 // Integer is an immutable data structure. So, you
37 // cannot modify the old one in-place. Instead, you
38 // have to allocate a new one and redo setAttribute.
39 session.setAttribute("accessCount", accessCount);
40 PrintWriter out = response.getWriter();
41 String title = "Session Tracking Example";
42 String docType =
43     "<!DOCTYPE HTML PUBLIC "-//W3C//DTD HTML 4.0 " +
44     "Transitional//EN">\n";
45 out.println(docType +
46     "<HTML>\n" +
47     "<HEAD><TITLE>" + title +
48     "</TITLE></HEAD>\n" +
49     "<BODY BGCOLOR=\"#FDF5E6\"\>\n" +
50     "<CENTER>\n" +
51     "<H1>" + heading + "</H1>\n" +
52     "<H2>Information on Your Session:</H2>\n"
53     +
54     "<TABLE BORDER=1>\n" +
55     "<TR BGCOLOR=\"#FFAD00\"\>\n" +
56     "  <TH>Info Type<TH>Value\n" +
57     "<TR>\n" +
58     "  <TD>ID\n" +
59     "  <TD>" + session.getId() + "\n" +
60     "<TR>\n" +
61     "  <TD>Creation Time\n" +
62     "  <TD>" +
63     new Date(session.getCreationTime()) +
64     "\n" +
65     "<TR>\n" +
66     "  <TD>Time of Last Access\n" +
67     "  <TD>" +
68     new Date(session.getLastAccessedTime()) +
69     "\n" +
```

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```
66         "<TR>\n" +
67         "   <TD>Number of Previous Accesses\n" +
68         "   <TD>" + accessCount + "\n" +
69         "</TABLE>\n" +
70         "</CENTER>" +
71         "<a href=\""+
72         response.encodeURL("show-session3") +
73         "\">show-session3</a>" +
74         "</BODY></HTML>");
75     }
76 }
77 }
78
```