



THE QUICKEST WAY TO GET CERTIFIED

EXAMSHEETS

Exam: 310-080

**Title : Java 2 Enterprise Edition (J2EE) Web Component
Developer**

Ver : 12.03.2003

Note: Section A contains 103 questions. Section B contains 59 questions. The total number of questions is 162.

Section A

QUESTION 1 Given:

```
1. public class Servlet Test extends Http Servlet{
2. public void doGet(
3. HttpServletRequest request
4. HttpServletResponse response)
5. throws ServletException, IOException
6. {String message = *In doGet*;
7. }}
```

Which two, inserted individually at line 8, will each place an entry in the servlet log file? (Choose two)

- A. log(message);
- B. request.log(message);
- C. getServletInfo().log(message);
- D. getServletConfig().log(message);
- E. getServletContext().log(message);
- F. request.getSession().log(message);

Answer: A. E

QUESTION 2

```
1. <%@ taglib uri='example' prefix='example'%>
2. <example: aTagWithABody>
3. <%= "BODY CONTENT"%>
4. </example: aTagWithABody>
```

If the aTagWithABody tag extends javax.servlet.jsp.tagext.TagSupport, and anr1 that tag's handler returns EVAL_BODY_BUFFERED from doStartTag, what is the result of processing the JSP code?

- A. Compilation fails.
- B. "BODY CONTENT" is returned in the generated response.
- C. "<%=BODY CONTENT%>" is returned in the generated response.
- D. Because the tag's body content will be buffered, it will not be returned in the generated response.

Answer: A

QUESTION 3 In a JSP custom tag, which method would you use to access the JSP implicit variable that references the application scope?

- A. PageContext.getOut()
- B. JspFactory.getPagetContext()
- C. TagSupport.getValue(String)
- D. PageContext.getServletContext()

Answer: D

QUESTION 4 Which method is used to retrieve objects from an HTTP session?

- A. getAttribute method of javax.servlet.Session

- B. getAttribute method of javax.servlet.HttpSession
- C. getAttribute method of javax.servlet.http.Session
- D. getAttribute method of javax.servlet.http.HttpSession

Answer: D

QUESTION 5 Which method is used by a servlet to place its session ID in a URL that is written to the servlets response output stream?

- A. The encode URL method of the HttpServletRequest interface.
- B. The encode URL method of the HttpServletResponse interface.
- C. The rewrite URL method of the HttpServletRequest interface.
- D. The rewrite URL method of the HttpServletResponse interface.

Answer: B

QUESTION 6 What is the name of the tag library descriptor element that declares that an attribute of a tag is mandatory?

Answer: required

QUESTION 7 Which statement is true?

- A. A try statement must have at least one corresponding catch block.
- B. Multiple catch statements can catch the same class of exception more than once.
- C. An Error that might be thrown in a method must be declared as thrown by that method, or be handled within that method.
- D. Except in case of VM shutdown, if a try block starts to execute, a corresponding finally block will always start to execute.
- E. Except in case of VM shutdown, if a try block starts to execute, a corresponding finally block must always run to completion.

Answer: D

QUESTION 8 Which correctly defined "data integrity"?

- A. It guarantees that your confidential files are kept encrypted on your Web server.
- B. It guarantees that only a specific set of users may access your confidential files.
- C. It guarantees that delivery of your confidential files will not be read by a malicious user.
- D. It guarantees that delivery of your confidential files will not be altered during transmission.
- E. It guarantees that access to your confidential files will prompt the user for their password of the Web browser.

Answer: D

QUESTION 9 When a session becomes invalid, which method will be invoked on a session attribute object that implements the corresponding interface?

- A. session Destroyed of the HttpSessionListener interface
- B. value Unbound of the Http Session Binding Listener interface
- C. attribute Removed of the Http Session Attribute Listener interface
- D. session Will Passivate of the Http Session Activation Listener interface

Answer: B

QUESTION 10 Which two are equivalent? (Choose two)

- A. `<%= CertkillerBean.size%>`
- B. `<%= CertkillerBean.getSize()%>`
- C. `<%= CertkillerBean.getProperty("size")%>`
- D. `<jsp:getProperty id="CertkillerBean" param="size"/>`
- E. `<jsp:getProperty name="CertkillerBean" param="size"/>`
- F. `<jsp:getProperty id="CertkillerBean" property="size"/>`
- G. `<jsp:getProperty name="CertkillerBean" property="size"/>`

Answer: B, G

QUESTION 11 Which statement is true about assertions in the Java programming language?

- A. Assertion expressions should not contain side effects.
- B. Assertion expression values can be any primitive type.
- C. Assertions should be used for enforcing preconditions on public methods.
- D. An Assertion Error throws as result of a failed assertion should always be handled by the enclosing method.

Answer: A

QUESTION 12 Which JSP directive declares a tag library used by the page?

Answer: taglib

QUESTION 13 Given a tag library with the following tags:

- A tag called `ge CertKiller` that has one attribute called `hierarchy` that accepts a dynamic value.
- A tag called `get Chapter` that has one attribute called `num`.

Which three options are valid of these custom tags in a JSP page? (Choose three)

- A. `<mT:getCertkiller hierarchy="vol1,chap1"/>`
- B. `<mT:getCertkiller hierarchy="<mT:getChapter num=1/>"/>`
- C. `<mT:getCertkiller hierarchy='<mT:getChapter num="1"/>'/>`
- D. `<%String chapter = "chap1";%> <mT:getCertkiller hierarchy=<%=chapter%>/>`
- E. `<%String chapter="chap1";%> <mT:getCertkiller hierarchy"<%=chapter%>"/>`

Answer: A, C, E

QUESTION 14 Which two authentication techniques (defined by the `auth-method` element in the deployment descriptor) use built-in HTTP mechanisms? (Choose two)

- A. FORM
- B. BASIC
- C. DIGEST
- D. CLIENT-CERT

Answer: B, C

QUESTION 15 Which Tag Support method can access any outer tag handler object?

- A. `getParent`
- B. `find Ancenstor`
- C. `getParentWithClass`
- D. `findAncenstorWithClass`

Answer: D

QUESTION 16 Within a Web application deployment descriptor, what is the name of an element that can contain an <error-page> element?

- A. error
- B. web-app
- C. servlet
- D. error-page-config

Answer: B

QUESTION 17 Which four constants describe the attributes of a JSP custom tag in a tag library descriptor? (Choose four)

- A. Name
- B. Type
- C. Required
- D. Name-given
- E. Short-name
- F. Rtexprvalue
- G. Display-name

Answer: A, B, C, F

QUESTION 18 Which statement describes a normal default security restriction applied to classes loaded from untrusted sourced by Java-enabled browsers?

- A. Untrusted classes cannot load trusted classes.
- B. Untrusted classes cannot create server sockets.
- C. Untrusted classes cannot load untrusted classes.
- D. Untrusted classes cannot initiate any network connections.
- E. Untrusted classes cannot display windows outside of the browser.

Answer: B

QUESTION 19 Given:

```
11. public void doGet(HttpServletRequest request, HttpServletResponse response) throws IOException {  
12.     PrintWriter out = response.getWriter();  
13.     out.print("<h1>Hello</h1>");  
14.   
15.     response.sendError(HttpServletResponse.SC_NOT_FOUND);  
16. }
```

Which, inserted at line 14, will ensure that an `IllegalStateException` is NOT thrown at line 15?

- A. `response.flushBuffer();`
- B. `response.resetBuffer();`
- C. `response.clearStatus();`
- D. `if(response.getError()==-1)`
- E. `if(response.getStatus()==-1)`
- F. `if(response.isCommitted()==false)`

Answer: A

QUESTION 20 How many times can the do After Body method be called when processing a custom tag handle in a JSP page?

- A. Only one
- B. Zero or one
- C. One or more
- D. Zero or more

Answer: D

QUESTION 21 Which is true of all servlets?

- A. If the service method is over-ridden, its definition must include the synchronized modifier.
- B. Every instance of the servlet has access to a thread-safe Servlet Context Object.
- C. The servlet container may maintain a pool of multiple servlet objects for a given servlet instance.
- D. The developer has responsibility for synchronizing access to session attributes across multiple concurrent requests.

Answer: D

QUESTION 22 In a JSP page you are required to insert a JSP fragment called insert.jsp, where this JSP fragment requires an additional request parameter called title. What is necessary to perform this insertion?

- A. `<%@ include file='insert.jsp'title=Web Wonk'%>`
- B. `<jsp:include page="insert.jsp" title=Web Wonk"/>`
- C. `<%@ include file='insert.jsp' %>Web Wonk<%@include%>`
- D. `<jsp:include page='insert.jsp'> <jsp:param title="Web Wonk"/> </jsp:include>`
- E. `<jsp:include page='insert.jsp'> <jsp:param name='title' value='Web Wonk'/> </jsp:include>`

Answer: E

QUESTION 23 You are designing a Web application to guide users through a problem-solving process. All the information about the problems, and their solutions, will be stored in a database. The application will use a central controller to:

- Dispatch requests to the appropriate JSP page.
- Manage the workflow process across pages.
- Load the behavior of the controller dynamically for flexibility.

Which design pattern is intended to achieve these goals?

- A. Front Component
- B. Data Access Object
- C. Mode-View-Controller
- D. Session Entity Façade

Answer: A

QUESTION 24 Given:

```
<jsp:useBean id="fum" class="fee.fie.Fo" scope: "application"/>
```

In which type of object is fum stored as an attribute?

- A. Servlet
- B. Http Servlet
- C. Servlet Config
- D. Servlet Context

E. Application Context

Answer: D

QUESTION 25 Given:

```

1. public class Jumping Bean {
2. private String title - "Jumping Bean";
3. private int num = 10;
4.
5. public void set Title(String title) {
6. this.title = title;
7. }
8. public String get Certkiller() {
9. return title;
10. }
11. public void set Num(int num) {
12. this.num = num;
13. }
14. public int getNum() {
15. return num;
16. }
17. }

```

Given index.jsp:

```

1. <html><body>
2. <jsp:useBean id="bean" class="com.Certkiller.JumpingBean"/>
3. <jsp:setProperty name="bean" property="*" />
4. Title: <%=bean.getCertkiller()%><br>
5. Num: <%=bean.getNum()%><br>
6. </body></html>

```

For the given URL:

http://localhost/index.jsp?num=3

Which two are returned in the generated HTML? (Choose two)

- A. "Num: 0
"
- B. "Num: 3
"
- C. "Title:
"
- D. "Num: 10
"
- E. "Title: null
"
- F. "Title: Jumping Bean
"

Answer: B, F

QUESTION 26 Given:

```

11. public class Acc extends Http Servlet{
12. private StringBuffer bar = new StringBuffer("bar");
13. private static StringBuffer xyz = new StringBuffer();
14. public void do Post(HttpServletRequest req, HttpServletResponse resp){
15 StringBuffer Certkiller = new StringBuffer("Certkiller");
16. Http Session session = req.getSession();

```

17. }
18. }

Which two variables reference objects that are thread-safe? (Choose two)

- A. req at line 14
- B. Certkiller at line 15
- C. bar at line 12
- D. xyz at line 13
- E. session at line 16

Answer: A, B

QUESTION 27 Which two are benefits of the Value Object design patterns for implementing Web applications? (Choose two)

- A. It improves response time for accessing data.
- B. It separates business logic from presentation logic.
- C. It can greatly reduce network traffic for accessing data.
- D. It separates resource interface from resource implementation.
- E. It allows software developers and page authors to work in parallel with few dependencies.

Answer: A, C

QUESTION 28 You are designing a large, complex Web application that will be structured in a multi-tier architecture. You must provide interfaces based on both HTML and XML. The application must be maintainable over many development and deployment iterations. Which design pattern is intended to achieve these goals?

- A. Remote Proxy
- B. Business Delegate
- C. Bimodal Data Access
- D. Model-View-Controller

Answer: D

QUESTION 29 Within a Web application deployment descriptor, what is the name of the child element of <context-param> that describes a parameter?

- A. desc
- B. usage
- C. param-desc
- D. description
- E. param-usage
- F. param-description

Answer: D

QUESTION 30 Which two are true about the basic HTTP authentication mechanism? (Choose two)

- A. An HTML form is used to collect username and pass phrase.
- B. The username and pass phrase information is passed "in the clear".
- C. The username and pass phrase information is passed in an encryption form.
- D. The Web browser uses a browser-specific mechanism to collect username and pass phrase.

Answer: B, D

QUESTION 31 Which method is invoked on a servlets session object so that a session is never timed out by the servlet container?

- A. set Timeout(0)
- B. set Timeout(-1)
- C. set Max Inactive Interval(0)
- D. set Max Inactive Interval(-1)
- E. set Timeout(Integer.MAX_VALUE)
- F. set Max Inactive Interval(Integer.MAX_VALUE)

Answer: D

QUESTION 32 Which deployment description snippet would you use to declare the use of a tag library?

- A.
 - 7. <taglib>
 - 8. <uri>http://Certkiller.com/taglib.tld</uri>
 - 9. <location>/WEB-INF/taglib.tld</location>
 - 10. </taglib>
- B.
 - 7. <taglib>
 - 9. <taglib-uri>http://Certkiller.com/tablib.tld</taglib-uri>
 - 10. <taglib-location>/WEB-INF/tablib.tld</taglib-location>
 - 11. </taglib>
- C.
 - 7. <tag-lib>
 - 9. <uri>http://Certkiller.com/taglib.tld</uri>
 - 10. <location>/WEB-INF/taglib.tld</location>
 - 11. </tag-lib>
- D.
 - 7. <tag-lib>
 - 8. <taglib-uri>http://Certkiller.com/taglib.tld</taglib-uri>
 - 9. <taglib-location>/WEB-INF/taglib.tld</taglib-location>
 - 10. </tag-lib>

Answer: B

QUESTION 33 Given:

```
public class CertKiller Servlet extends Generic Servlet implements Single Thread Model{ public void do
Post(Servlet Request req, Servlet Response resp){
} } Which is true?
```

- A. CertKiller Servlet will compile successfully as is.
- B. My servlet must define
public void service(Servlet Request req, Servlet Response resp) for it to compile successfully.
- C. My Servlet must define
public void destroy() and
public void service(Servlet Request req, Servlet Response resp) for it to compile successfully.
- D. My servlet must define
public void lock(Servlet req, Servlet resp) and

public void unlock(Servlet req, Servlet resp)
of the Single Thread Model interface for it to compile successfully.

Answer: B

QUESTION 34 Given that a custom tag is meant to be used without a body, which value would you use in the body-content element?

Answer: empty

QUESTION 35 Given:

11. `<%${%>`
12. `<jsp:useBean id="buffer" class="java.lang.StringBuffer"/>`
13. `<%buffer.append("xyz");%>`
14. `<%}%>`
15. buffer is `<%=buffer%>`

What appears on the response stream?

- A. An error occurs at compile time.
- B. An error occurs at translation time.
- C. The string "buffer is xyz" appears in the response stream.
- D. The string "buffer is null" appears in the response stream.

Answer: A

QUESTION 36 Which is a requirement of a distributable Web application?

- A. It must not call the send Redirect method.
- B. It must not rely on URL-rewriting for session tracking.
- C. It must not rely on any notification when a session is activated or passivated.
- D. It must not rely on the propagation of events caused by the manipulation of session attributes.

Answer: D

QUESTION 37 Which two are true of parameters defined using the `<context-param>` element within a Web application deployment descriptor? (Choose two)

- A. They are accessible across sessions.
- B. They are defined within the scope of a specific servlet definition.
- C. They are accessible to any servlet or JSP page within the Web application.
- D. They can be modified with the set Attribute method of the Session Context interface.
- E. They can be modified with the set InitParameter method of the Servlet Config interface.

Answer: A. C

QUESTION 38 When a servlet context is initialized, which method will be invoked on an object implementing the specified interface?

- A. context Created of the javax.servlet.ServletContextListener interface
- B. context Initialized of the javax.servlet.ServletContextListener interface
- C. context Created of the javax.servlet.http.HttpServletContextListener interface
- D. context Initialized of the javax.servlet.http.HttpServletContextListener interface

Answer: B

QUESTION 39 Which static value from the javax.servlet.jsp.tagext.Tag interface must be returned from a tag handler's doEndTag method so that the rest of the JSP page following the tag is NOT processed?

Note: Do not specify the interface name in your response.

Answer: SKIP_PAGE

QUESTION 40 Many programmers write classes for use in your customer's systems. Programmers are granted authority to write classes for general use by the IT department. Each programmer supplies a certificate along with their classes. The certificate is intended to identify the author of the classes, and validate the "authority to write" of that programmer. Which three items form a minimum criteria set that will allow users (or their systems) to

validate that the "authority to write" has been granted to a given set of classes? (Choose three)

- A. The classes should be loaded using HTTPS.
- B. The programmer's certificate should be self-signed.
- C. The classes should be deployed from a trusted host.
- D. The programmer's certificate should be signed by the IT department management.
- E. Programmers should distribute their classes in jar files signed using the key represented by their certificates.
- F. The certificate of the IT department management should be installed as a trusted certificate in the key store database of each user.
- G. The certificate of the programmer should be installed as a trusted certificate in the key store database for each user.

Answer: D, E, F

QUESTION 41 Which statement describes a normal default security restriction applied to untrusted classes by a Java-enabled browser?

- A. Untrusted classes cannot read data from arbitrary files.
- B. Untrusted classes cannot initiate any network connections.
- C. Untrusted classes cannot write sensitive data to the screen.
- D. Untrusted classes cannot make unrestricted use of CPU power.
- E. Untrusted classes cannot read sensitive data from the keyboard.

Answer: A

QUESTION 42 Given:

1. public class SListener implements HttpSessionAttributeListener{
2. public void attribute Added(HttpSessionBindingEvent sce){
3. }
4. public void attribute Removed(HttpSessionBindingEvent sce){
5. }
6. }

What is true?

- A. The class will compile as is.
- B. The public method void attribute Changed(HttpSessionBindingEvent c) must be defined for the class to compile correctly.
- C. The public method void attribute Updated(HttpSessionBindingEvent c) must be defined for the class to compile correctly.
- D. The public method void attribute Replaced(HttpSessionBindingEvent c) must be defined for the class to

compile correctly.

Answer: D

QUESTION 43 Which J2EE design pattern increase reusability by partially decoupling data presentation, data representation, and application operations?

- A. Data Access Object
- B. Model-View-Controller
- C. Session Entity Façade
- D. Bimodal Data Access

Answer: B

QUESTION 44 Given:

```
<jsp:useBean id="CertkillerBean" class="com.Certkiller.JellyBean"/>
```

Where is the declared Java Bean accessible?

- A. Throughout the remainder of the JSP page.
- B. Within other servlets or JSP pages in the same Web application.
- C. Within other servlets or JSP pages in the same servlet context.
- D. Throughout all future invocations of the JSP page, until the session expires.
- E. Throughout all future invocations of the JSP page, until the servlet container is stopped or the JSP page is changed.

Answer: A

QUESTION 45 Given this code in a servlet method:

```
Principal user = request.getUserPrincipal();
```

If this servlet is used to respond to a request in which the user HAS NOT been authenticated, what happens at runtime?

- A. Null is returned from the getUserPrincipal method.
- B. The getUserPrincipal method throws the java.security Digest Exception.
- C. A Principal object is returned, but the getName method of the principal returns null.
- D. A Principal object is returned method, but the getName method of the principal returns an empty string.

Answer: A

QUESTION 46 Which XML tag may be used to specify the JSP page directive?

- A. <jsp />
- B. <page />
- C. <jsp.page />
- D. <jsp:page />
- E. <jsp:directive.page />

Answer: E

QUESTION 47

Exhibit:

1. public class Jellybean {
2. private int count;
3. public void set Count(int count) {
4. this.count = count;

```

5. }
6. public int getCount() {
7. return count;
8. }
9. }

```

Given:

```

1. <html>
2. <body>
3. <jsp:useBean id="CertkillerBean" class="JellyBean">
4.
5. </jsp:useBean>
6. </body>
7. </html>

```

Which two inserted individually at line 4, will initialize the count property of the newly created JellyBean CertkillerBean? (Choose two)

- A. CertkillerBean.count = 1;
- B. <% CertkillerBean.count = 1; %>
- C. <% CertkillerBean.setCount(1); %>
- D. <jsp:init property="count" value="1" />
- E. <jsp:setProperty name="CertkillerBean" property="count" value="1" />

Answer: C, E

QUESTION 48 Given:

```
<jsp:useBean id="baz" class="com.Certkiller.Certkiller" type="com.Certkiller.Bar" />
```

Which two are true? (Choose two)

- A. An object of type com.Certkiller.Certkiller is instantiated and assigned to a variable baz of type com.Certkiller.Bar.
- B. An object of type com.Certkiller.Bar is instantiated and assigned to a variable baz of type com.Certkiller.Certkiller.
- C. To avoid error, com.Certkiller.Bar must be super class of com.Certkiller.Certkiller or an interface implemented by com.Certkiller.Certkiller.
- D. To avoid error, com.Certkiller.Certkiller must be a super class of com.Certkiller.Bar or an interface implemented by com.Certkiller.Bar.

Answer: B, D

QUESTION 49 Given:

```
<jsp:useBean id="CertkillerBean" class="com.Certkiller.Certkiller" scope="xxxx" />
```

Which value, substituted for xxxx, will automatically store CertkillerBean as an attribute in the JSP page's Servlet Context?

- A. page
- B. global
- C. servlet
- D. request
- E. http session
- F. application

Answer: F

QUESTION 50

Exhibit:

```
1. package beans;
2. public class Value Bean {
3. private int value;
4. public Value Bean() {
5. this.value = 200;
6. }
7. public void set Value(int value) {
8. this.value = value;
9. }
10. public int getValue() {
11. return value;
12. }
13. }
```

Given:

```
1. <jsp:useBean id='valueBean' class='beans.ValueBean'>
2. <jsp:setProperty name='valueBean' property='value'
3. value='<%- 100 %>' />
4. </jsp:useBean>
5. <%- valueBean.getValue() %>
6. <jsp:useBean id='valueBeanTwo' class='beans.ValueBean' />
7. <%- valueBeanTwo.getValue() %>
```

What is the result?

- A. The JSP page will not compile
- B. 200 100 will be printed in the browser.
- C. 100 200 will be printed in the browser.
- D. 100 101 will be printed in the browser.
- E. 200 200 will be printed in the browser.

Answer: C

QUESTION 51 Which two are true about Web application archive files? (Choose two)

- A. They must NOT be signed.
- B. They may contain JAR files.
- C. They must have a ".web" extension.
- D. They may serve files from the META-INF directory.
- E. They may contain JSP files in addition to HTML files.
- F. They CANNOT define their dependencies in the manifest.mf file.

Answer: B, D

QUESTION 52 Given that the deployment descriptor for a Web application named test contains:

```
12. <servlet-mapping>
13. <servlet-name>Certkiller</servlet-name>
14. <url-pattern>*.bop</url-pattern>
15. </servlet-mapping>
```

Which will invoke the servlet instance named Certkiller?

- A. `http://servername/test.bop`
- B. `http://servername/Certkiller/bar.bop`
- C. `http://servername/test/Certkiller/bop`
- D. `http://servername/baz/bat/boo.bop`
- E. `http://servername/test/Certkiller/bar/baz.hop`

Answer: A

QUESTION 53 Where must the class file for CertKiller Servlet be located?

- A. `test/WEB-INF/CertkillerServlet.class`
- B. `test/classes/com/testcorp/CertkillerServlet.class`
- C. `test/classes/com.testcorp.CertkillerServlet.class`
- D. `test/webapp/classes/com.testcorp.CertkillerServlet.class`
- E. `test/WEB-INF/classes/com/testcorp/CertkillerServlet.class`

Answer: E

QUESTION 54 Which element name is used in a deployment descriptor to specify the name of the a servlet definition?

- A. `name`
- B. `class`
- C. `instance`
- D. `servlet-name`
- E. `servlet-class`
- F. `instance-name`

Answer: D

QUESTION 55 Which two methods of `HttpServletResponse` will allow an HTTP header to be set in the response? (Choose two)

- A. `setHeader`
- B. `SetHeaders`
- C. `SetDataHeader`
- D. `SetHeaderValue`

Answer: A, C

QUESTION 56 You are developing a servlet to generate a GIF image stream:

Given:

- 12. `response.setContentType("image/gif");`
- 13. `// Write image to out.`
- 14. `out.close();`

Which, inserted at line 13, will initialize the out variable?

- A. `PrintWriter out = response.getWriter();`
- B. `PrintWriter out = response.getOutputStream();`
- C. `OutputStream out = response.getOutputStream();`
- D. `ServeletOutputStream out = response.getServletOutput();`

Answer: A

QUESTION 57 Place the steps of a JSP life cycle in the correct order.

Steps

Load class	Place Step 1 here
Call jspInit	Place Step 2 here
Call jspDestroy	Place Step 3 here
Create instance	Place Step 4 here
Page translation	Place Step 5 here
JSP Compilation	Place Step 6 here
Call _jspService	Place Step 7 here

Answer:

Page translation
JSP compilation
Load class
create instance
call jspInit
call _jspService
call jspDestroy

QUESTION 58 Which method in Http Servlet, apart from service, handles an HTTP GET request?

Note: Type only the same of the method, without parameters. The answer is case sensitive.

Answer: doGet

QUESTION 59 The service method of a servlet instance is invoked under which three conditions? (Choose three)

- A. The servlet instance receives an HTTP GET request.
- B. An HTTP POST request is made of the servlet instance.
- C. The servlet instance is activated by the servlet container.
- D. An instance of the servlet is loaded by the servlet container.
- E. A browser sends an HTTP HEAD request to the servlet instance.
- F. An instance of the servlet is placed into service by the servlet container.

Answer: A, B, E

QUESTION 60 Which two are valid arguments for the getRequestDispatcher method of the Servlet Context interface?

- A. /fred.txt
- B. error.html
- C. /error.html
- D. www.sun.com/error.html
- E. http://www.sun.com/error.html

Answer: A, C

QUESTION 61 Which two methods can be used to access static content within a Web application? (Choose two)

- A. get Resource of the Webapp interface.
- B. get Resource of the Http Servlet class.
- C. get Resource of the Servlet Context interface.
- D. getResourceAsStream of the Webapp interface.
- E. getResourceAsStream of the Http Servlet class.
- F. getResourceAsStream of the Servlet Context interface.

Answer: C, F

QUESTION 62 Which two are true about the HTTP POST method? (Choose two)

- A. POST requests are faster.
- B. It supports multipart MIME requests.
- C. Request data is sent in a separate content block.
- D. Parameters are accessible using the getQueryString method of the HttpServletRequest interface.

Answer: C(?), D

QUESTION 63 Which element name in the Web application deployment descriptor is used to declare that a custom tag library can be used by the JSP pages in that Web application?

- A. tag
- B. taglib
- C. tag-lib
- D. tag library
- E. tag-library

Answer: B

QUESTION 64 Given that the http://Certkiller.com/myTags library was declared for use by this Web application and the JSP code:

1. <html>
- 2.
3. <h3><x:getCertkiller hierarchy="vol1,chap2"/></h3>
4. <html>

Which would you use in line 2 to permit the custom tag use on line 3?

- A. <%@ taglib uri="myTags" prefix="x" %>
- B. <%@ taglib uri="myTags" prefix="x" %>
- C. <%@ taglib uri="http://Certkiller.com/myTags" prefix="x" %>
- D. <%@ taglib uri="http://Certkiller.com/myTags" prefix="x" %>

Answer: C

QUESTION 65 Given a tag library with the following tag: a tag called get Certkiller that has one attribute called hierarchy that is not mandatory

Which two options are a valid use of this tag in a JSP page? (Choose two)

- A. <mT:getCertkiller>
- B. </mT:getCertkiller>
- C. <mT:getCertkiller></mT:getCertkiller>
- D. <mT:getCertkiller hierarchy="vol1,chap1">
- E. </mT:getCertkiller hierarchy="vol1,chap1">
- F. <mT:getCertkiller hierarchy="vol1,chap1"/>

Answer: D, F

QUESTION 66 Which three constants describe the body content of a JSP custom tag in a tag library descriptor? (Choose three)

- A. JSP
- B. none
- C. empty
- D. tei-class
- E. tag dependent

Answer: A, C, E

QUESTION 67 What is the meaning of the SKIP_PAGE constant when it is returned from the do End Tag method?

- A. SKIP_PAGE is not a valid return value for the do EndTag method.
- B. SKIP_PAGE directs the JSP page to disregard the body of the custom tag.
- C. SKIP_PAGE directs the JSP page to disregard the rest of the JSP page content.
- D. SKIP_PAGE directs the JSP page to disregard any included JSP fragments from the jsp:include standard action.

Answer: C

QUESTION 68 Given:

1. <html>
2. <body>
3. <%
4. for(int i = 0; i < 10; i++) {
5. }
6. %>
7. </body>
8. </html>

Which can appear at line 5 without causing an error?

- A. <%= i %>
- B. i
- C. %><%= i %><%
- D. <h1>Hello</h1>

Answer: C

QUESTION 69 Given:

3. <a:tagX attr-"123">
4. <a:tagY>
5. <a:tagZ/>
6. </a:tagY>
7. </a:tagX>

Which Tag Support method can be used by the tagZ handler class to access the tagX handler?

- A. getParent
- B. find Ancestor
- C. getParentWitchClass
- D. findAncestorWitchClass

Answer: D

QUESTION 70 Given a tag that iterates over a set of values, which static value from the

javax.servlet.jsp.tagext.Tag interface must be returned from the do After Body method to end the iteration?

Note: Do not specify the interface name in your response.

Answer: SKIP_BODY

QUESTION 71 Which tag library descriptor element name identifies the type of body content for a JSP custom tag?

- A. JSP
- B. Body
- C. content
- D. body-content

Answer: D

QUESTION 72 Given:

1. public class CertkillerTag extends BodyTagSupport {
2. public int do After Body() throws JspException {
3. Object obj = pageContext.getAttribute("anObject");
4. return 2;
5. }
6. }

Assuming that the Object reference returned in line 3 is not null, in what scope does that object reside?

- A. page
- B. session
- C. request
- D. application

Answer: A

QUESTION 73 What is the name of the tag library descriptor element that declares the name of a tag?

Answer: name

QUESTION 74 How many times can the do EndTag method be called when processing a custom tag handler in a JSP page?

- A. Only one, regardless of the return value of the doStartTag method.

- B. Zero or one, depending on the return value of the doStartTag method.
- C. One or more, depending on the return value of the doStartTag method.
- D. Zero or more, regardless of the return value of the doStartTag method.

Answer: A

QUESTION 75 Given servlet A:

1. public class A extends HttpServlet {
2. public void doPost(HttpServletRequest req, HttpServletResponse resp) throws ServletException {
3. String id = "Certkiller";
- 4.
5. }
6. }

Servlet A and servlet B share the same active session. Which, inserted at line 4, will allow servlet B to access the value "Certkiller" in subsequent POST requests to servlet B?

- A. req.getSession().put("ID",id);
- B. req.getSession().setValue("ID",id)
- C. req.getSession().putAttribute("ID",id);
- D. req.getSession().setAttribute("ID",id);

Answer: D

QUESTION 76

Exhibit:

```

// Class definition for servlet ABC
1. public class ABC extends HttpServlet {
2.     public void doGet(HttpServletRequest request,
3.                         HttpServletResponse response)
4.         throws IOException {
5.         request.getSession().setAttribute("FROM",
"ABC");
6.         generateResponse(request, response);
7.     }
8.     public void
generateResponse(HttpServletRequest request,
9.                 HttpServletResponse response)
10.        throws IOException {
11.        response.setContentType("text/html");
12.        PrintWriter out = response.getWriter();
13.        out.println("<html><body>");
14.        out.println("<form method='post'
15.                    action='http://localhost:8080/webapp/xyz'>");
16.        out.println("<input type=submit
value='Submit to XYZ' >");
17.        out.println("</form>");
18.        out.println("</body></html>");
19.    }
20. }

// Class definition for servlet XYZ
1. public class XYZ extends HttpServlet {
2.     public void doPost(HttpServletRequest req,
3.                         HttpServletResponse resp)
4.         throws IOException {
5.         String f =

```

Assume xyz and servlet abc are in the webapp Web application. Further assume you are using a browser with ALL cookies disabled and you submit an HTTP GET request to abc. Which is true regarding the result of pressing the "Submit to XYZ" button on the page generated by abc?

- A. "<h1></h1>" is returned in xyz's generated response.
- B. An exception is thrown at line 5 of xyz's do Post method.
- C. "<h1>ABC</h1>" is returned in xyz's generated response.
- D. "<h1>null</h1>" is returned in xyz's generated response.

Answer: D

QUESTION 77 Which interface must a class implement so that instances of that class will be notified when they are added as attributes of an HTTP session?

- A. java.util.EventListener
- B. javax.servlet.http.HttpSessionListener
- C. javax.servlet.http.HttpSessionValueListener
- D. javax.servlet.http.HttpSessionBindingListener

Answer: D

QUESTION 78 Given:

```
11. public class Certkiller extends Http Servlet {
12. public void do Post(HttpServletRequest req,
    HttpServletRequestResponse resp) {
13.
14. }
15. }
```

Assume that no other servlets participating in the same session as servlet Certkiller explicitly invalidate the session. Which, inserted at line 13, will ensure that the session remains valid for at least six minutes?

- A. req.getSession().set Timeout(6);
- B. req.getSession().set Timeout(360);
- C. Nothing can be inserted to ensure the given condition.
- D. req.getSession().set Max Inactive Interval(6);
- E. req.getSession().set Max Inactive Interval(360);

Answer: E

QUESTION 79 Which declares the current JSP page to be an error page?

- A. <%@ page info="error" %>
- B. <%@ page error Page="true" %>
- C. <%@ page is Error Page="true" %>
- D. <%@ page pageEncoding="error" %>
- E. <%@ page extends="javax.servlet.jsp.JspErrorPage" %>

Answer: C

QUESTION 80 Given:

```
11. public class Acc1 extends Http Servlet implements Single Thread Model {
12. private StringBuffer bar = new StringBuffer("bar");
13. private static StringBuffer xyz = new StringBuffer();
```

```

14. public void do Post(HttpServletRequest req, HttpServletResponse resp) {
15. StringBuffer Certkiller = new StringBuffer("Certkiller");
16. Http Session session = req.getSession();
17. }
18. }

```

Which three variables reference objects that are thread-safe? (Choose three)

- A. bar at line 12.
- B. xyz at line 13.
- C. Certkiller at line 15.
- D. req at line 14.
- E. session at line 16.

Answer: A, D, E

QUESTION 81 If a servlet is designed to execute in single-threaded mode as part of a distributed Web application, which is true?

- A. The servlet container must only instantiate one instance of the servlet within each Java Virtual Machine.
- B. The servlet definition in the Web application deployment descriptor must include the <distributable/> element.
- C. The servlet container may instantiate multiple instances of that servlet in each Java Virtual Machine within the container.
- D. The servlet container manages the thread-safety of the session object within each of the Java Virtual Machines in the distributed application.

Answer: C

QUESTION 82 Given:

```

public class CertKiller Servlet extends Generic Servlet implements Single Thread Model { public void do
Post(Servlet Request req, ServletResponse resp) {
} } Which is true?

```

- A. CertKiller Servlet will compile successfully as is.
- B. CertKiller Servlet must define public void service(Servlet Request req, Servlet Response resp) for it to compile successfully.
- C. CertKiller Servlet must define public void destroy() and public void service(Servlet Request req, Servlet Response resp) for it to compile successfully.
- D. CertKiller Servlet must define public void lock(Servlet req, Servlet resp) and public void unlock(Servlet req, Servlet resp) of the Single Thread Model interface for it to compile successfully.

Answer: B

QUESTION 83 You are developing a Web application to provide inventory management for a wine store. The application will require an Inventory class, to manage the whole store inventory, and an Inventory Items class, to represent the specific information about an item in the inventory.

The Inventory Item class has the following goals:

- The information an Inventory Item object is immutable.
- The inventory data is stored in a remote server.
- The Inventory Item will be referenced multiple times in the same JSP.

Which design pattern matches the goals of the Inventory Item class?

- A. Façade

- B. Value Object
- C. Front Component
- D. Model-View-Controller

Answer: B

QUESTION 84 Which J2EE design pattern unifies and simplifies workflow by interpreting user request and dispatching screen from a single point?

- A. Value Object
- B. Front Component
- C. Data Access Object
- D. Model-View-Controller
- E. Session Entity Façade

Answer: D (or B)

QUESTION 85 As a programmer at Certkiller Inc you are developing a Web application that must load information from several different sources, including databases and XML files. Which design pattern is intended to support this functionality?

- A. Value Object
- B. Front Component
- C. Template Method
- D. Data Access Object

Answer: E

QUESTION 86 Which J2EE design pattern provides flexible, extensible access to data and other resources?

- A. Value Object
- B. Front Component
- C. Data Access Object
- D. Bimodal Data Access
- E. Session Entity Façade

Answer: C

QUESTION 87 Given this code from the doGet method, where response is an HttpServletResponse:

12. response.setStatus(HttpServletResponse.SC_MOVED_TEMPORARILY);
13. response.setHeader("Location", "http://www.Certkiller.com");

Which is equivalent?

- A. response.forward("http://www.Certkiller.com");
- B. response.include("http://www.Certkiller.com");
- C. response.redirect("http://www.Certkiller.com");
- D. response.setLocation("http://www.Certkiller.com");
- E. response.setRedirect("http://www.Certkiller.com");

Answer: E

QUESTION 88 Given:

1. public class Servlet CertKiller extends Http Servlet {
2. public void doGet(HttpServletRequest request,
3. HttpServletResponse response)


```

4. throws ServletException, IOException
5. {
6. try {
7. Integer.parseInt("one");
8. } catch(Exception e) {
9. String message = "Caught exception";
10.
11. }
12. }
13. }

```

Which two, inserted individually at line 10, will place a descriptive message and the stack trace of the caught exception in the servlet log file? (Choose two)

- A. log(message, e);
- B. request.log(message, e);
- C. getServletInfo().log(message, e);
- D. getServletConfig().log(message, e);
- E. getServletContext().log(message, e);
- F. request.getSession().log(message, e);

Answer: A, E

QUESTION 89 Which two represent valid JSP expressions? (Choose two)

- A. <% x %>
- B. <%= Match.random() %>
- C. <%= "Certkiller" + "EXAMINATOR" %>
- D. <%= Match.random(); %>
- E. <% int x = "4" + "2"; %>
- F. <% String x = "4" + "2" %>

Answer: B, C

QUESTION 90 Which event is received by the appropriate listeners when a servlet context is first created?

- A. javax.servlet.ServletContextEvent
- B. javax.servlet.ServletCreatedEvent
- C. javax.servlet.ServletInitializedEvent
- D. javax.servlet.http.HttpServletContextEvent
- E. javax.servlet.http.HttpServletInitializedEvent

Answer: A

QUESTION 91 Within a Web application deployment descriptor, which specifies an HttpSessionActivationListener implemented by the class wcd.http.ActivationListener?

- A. <listener> wcd.http.ActivationListener </listener>
- B. <listener> <class>wcd.http.ActivationListener</class> </listener>
- C. <attr-listener> <class>wcd.http.ActivationListener</class> </attr-listener>
- D. <listener> <listener-class> wcd.http.ActivationListener </listener-class> </listener>
- E. <session-listener> <listener-class> wcd.http.ActivationListener </listener-class> </session-listener>

Answer: D

QUESTION 92 What single method is defined by javax.servlet.http.HttpSessionEvent?

Note: Provide only the method name; for example, Certkiller NOT Certkiller().

Answer: getSession

QUESTION 93 Given this fragment from a Web application deployment descriptor?

12. <context-param>

13. <param-name>user</param-name>

14. <param-value>Jacking</param-value>

15. </context-param>

From within a servlets do Post method, which retrieves the value of the user parameter?

- A. getServletConfig().getAttribute("user");
- B. getServletContext().getAttribute("user");
- C. getServletConfig().getInitParameter("user");
- D. getServletContext().getInitParameter("user");

Answer: D

QUESTION 94 What is true regarding a session within a distributed Web application?

- A. URL rewriting may not be used when redirecting responses.
- B. Attributes in the session object CANNOT be shared between servlet contexts.
- C. An instance of HttpSessionActivationListener must be defined for each Java VM in the servlet container.
- D. Object attributes in the session object must implement the HttpSessionActivationListener interface.

Answer: B

QUESTION 95 Given the JSP page, Certkiller.jsp:

1. <html>

2. <jsp:include page="abc.jsp">

3. <jsp:param name="subTitle" value="Registration Form"/>

4. </jsp:include>

5. </html>

Which would you use in the abc.jsp fragment to produce the HTML response?

<h3>Registration Form</h3>

- A. <h3><jsp:getParam name="subTitle"/></h3>
- B. <h3><jsp:include param="subTitle"/></h3>
- C. <h3><%= request.getParameter("subTitle") %></h3>
- D. <h3><%= request.getAttribute("subTitle") %></h3>

Answer: C

QUESTION 96 Which correctly defines authentication?

- A. Authentication identifies a user and verifies the user's pass phrase.
- B. Authentication protects the Web server from denial-of-service attacks.
- C. Authentication uses the user's pass phrase to encrypt the TCP stream.
- D. Authentication verifies that a user has access to a specific resource on the Web server.

Answer: A

QUESTION 97 Which two API techniques can be used to get the name of an authenticated user? (Choose two)

- A. Use the get User on the HTTP servlet request object.
- B. Use the get Username on the HTTP servlet request object.
- C. Use the getRemoteUser on the HTTP servlet request object.
- D. Retrieve the principal object from the HTTP servlet request object using get User and use the getName on the principal object.
- E. Retrieve the principal object from the HTTP servlet request object using getPrincipal and use the getName on the principal object.

Answer: C, E

QUESTION 98 Which deployment descriptor elements are used to configure Web services for authorization?

- A. security-constraint, login-form, realm-name
- B. security-constraint, login-config, security-role
- C. web-resource-constraint, login-form, security-role
- D. web-resource-constraint, login-config, security-role

Answer: A

QUESTION 99 Your Web application requires that an authenticated request guarantee that the Servlet Request method is Secure returns true. Which value of the auth-method deployment descriptor will cause this behavior?

- A. HTTPS
- B. DIGEST
- C. CLIENT-CERT
- D. CERTIFICATE

Answer: C

QUESTION 100 Which will print the value of the Accept-CharSet HTTP header in a JSP page?

- A. `<%= headers.get("Accept-CharSet") %>`
- B. `<%= page.getHeader("Accept-CharSet") %>`
- C. `<%= headers.getValue("Accept-CharSet") %>`
- D. `<%= request.getHeader("Accept-CharSet") %>`

Answer: D

QUESTION 101 Which includes a file in a JSP page at request time?

- A. `<%@ include file="Certkiller.html" %>`
- B. `<%@ include page="Certkiller.html" %>`
- C. `<%@ page include="Certkiller.html" %>`
- D. `<jsp:include file="Certkiller.html" />`
- E. `<jsp:include page="Certkiller.html" flush="true" />`

Answer: E

QUESTION 102 Which two set the content type of a JSP page? (Choose two)

- A. `<%@ content Type "text/plain" %>`
- B. `<jsp:contentType "text/plain">`
- C. `<%@ page content Type="text/plain" %>`
- D. `<% session.setContentType("text/plain"); %>`
- E. `<% request.setContentType("text/plain"); %>`

F. `<% response.setContentType("text/plain"); %>`

Answer: C, F

QUESTION 103 Which attribute and value of the `jsp:setProperty` action causes a JSP page to iterate over all Servlet Request parameters and assign values of the corresponding properties in a Java Bean?

Note: Type the attribute and value exactly as they would appear within the `jsp:setProperty` element. Do not type any other part of the `jsp:setProperty` element.

Answer: `property="*"`

Section B

QUESTION 1 Given:

```
1. public void Certkiller(boolean a, boolean b){
2. if(a){
3. System.out.println("A");
4. }else if(a&&b){
5. System.out.println("A&&B");
6. }else{
7. if( !b ){
8. System.out.println("notB");
9. }else{
10. System.out.println("ELSE");
11. }
12. }
13. }
```

What is correct?

- A. If a is true and b is true then the output is "A&&B".
- B. If a is true and b is false then the output is "notB".
- C. If a is false and b is true then the output is "ELSE".
- D. If a is false and b is false then the output is "ELSE".

Answer: C

QUESTION 2 Given:

```
1. public class Test{
2. public void Certkiller(){
3. assert false;
4. assert false;
5. }
6. public void bar(){
7. while(true){
8. assert false;
9. }
10. assert false;
```

11. }

12. }

What causes compilation to fail?

A. Line 13

B. Line 14

C. Line 18

D. Line 20

Answer: D

QUESTION 3 Given:

1. public interface Test{

2. int frood=42;

3. }

4. class TestImpl implements Test{

5. public static void main(String[]args){

6. System.out.println(++frood);

7. }

8. }

What is the result?

A. 0

B. 1

C. 42

D. 43

E. Compilation fails.

F. An exception is thrown at runtime.

Answer: E

QUESTION 4 Which statement is true?

A. Memory is reclaimed by calling Runtime.gc().

B. Objects are not collected if they are accessible from live threads.

C. Objects that have finalize() methods are never garbage collected.

D. Objects that have finalize() methods always have their finalize() methods called before the program ends.

E. An OutOfMemory error is only thrown if a single block of memory cannot be found that is large enough for a particular requirement.

Answer: B

QUESTION 5 Given:

1. for (int i=0;i<3;i++){

2. switch(i){

3. case 0:break;

4. case 1:System.out.print("one");

5. case 2:System.out.print("two");

6. case 3:System.out.print("three");

7. }

8. }

9. System.out.println("done");

What is the result?

- A. Done
- B. One two done
- C. One two three two three done
- D. Compilation fails.

Answer: C

QUESTION 6 Given:

```
1. try{
2. int x=0;
3. int y=5/x;
4. }catch(Exception c){
5. System.out.println("Exception");
6. }catch(ArithmeticException ac){
7. System.out.println("Arithmetic Exception");
8. }
9. System.out.println("finished");
```

What is the result?

- A. finished
- B. Exception
- C. Compilation fails.
- D. Arithmetic Exception

Answer: C

QUESTION 7 Given:

```
1. public Object m(){
2. Object o=new Float(3.14F);
3 Object[]oa=new Object[1];
4. ao[0]=o;
5. o=null;
6. oa[0]=null;
7. return o;
8. }
```

When is the Float object, created in line 11, eligible for garbage collection?

- A. Just after line 13.
- B. Just after line 14.
- C. Just after line 15.
- D. Just after line 16(that is, as the method returns).

Answer: C

QUESTION 8 Given:

```
1. class Test{
2. private Demo d;
3. void start(){
4. d=new Demo();
5. this.takeDemo(d);
```

```
6. }  
7. void takeDemo(Demo demo){  
8. demo=null;  
9. demo=new Demo();  
10. }  
11. }
```

When is the Demo object created on line 4, eligible for garbage collection?

- A. After line 5.
- B. After line 9.
- C. After the start() method completes.
- D. When the takeDemo() method completes.
- E. When the instance running this code is made eligible for garbage collection.

Answer: E

QUESTION 9 Given:

```
1. Float f=new Float("12");  
2. switch(f){  
3. case 12:System.out.println("Twelve");  
4. case 0:System.out.println("Zero");  
5. default: System.out.println("Default");  
6. }
```

What is the result?

- A. Zero
- B. Twelve
- C. Default
- D. Twelve Zero Default
- E. Compilation fails.

Answer: E

QUESTION 10 Which four can be thrown using the throw statement? (Choose four)

- A. Error
- B. Event
- C. Object
- D. Throwable
- E. Exception
- F. RuntimeException

Answer: A, D, E, F

QUESTION 11 Which statement is true?

- A. Programs will not run out of memory.
- B. Objects that will never again be used are eligible for garbage collection.
- C. Objects that are referred to by other objects will never be garbage collected.
- D. Objects that can be reached from a live thread will never be garbage collected.
- E. Objects are garbage collected immediately after the system recognizes they are eligible.

Answer: D

QUESTION 12 Given:

```
1. public class Certkiller{  
2. static String s;  
3. public static void main(String[]args){  
4. System.out.println("s="+s);  
5. }  
6. }
```

What is the result?

- A. s=
- B. s=null
- C. An exception is thrown at runtime.
- D. Compilation fails because of an error at line 2.
- E. Compilation fails because of an error at line 4.

Answer: B

QUESTION 13 Given:

```
1. public void test(int x){  
2. int odd=x%2;  
3. if(odd){  
4. System.out.println("odd");  
5. }else{  
6. System.out.println("even");  
7. }  
8. }
```

What statement is true?

- A. Compilation fails.
- B. "odd" will always be output.
- C. "even" will always be output.
- D. "odd" will be output for odd values of x, and "even" for even values.
- E. "even" will be output for odd values of x, and "odd" for even values.

Answer: A

QUESTION 14 Given:

```
1. public class ExceptionTest{  
2. class TestException extends Exception{}  
3. public void runTest()throws TestException{}  
4. public void test()/*Point X*/{  
5. runTest();  
6. }  
7. }
```

At Point X on line 4, which code is necessary to make the code compile?

- A. No code is necessary.
- B. throws Exception
- C. catch(Exception c)
- D. throws RuntimeException

E. catch(TestException c)

Answer: B

QUESTION 15 Which item provides tools to allow the formatting of currency and date information according to local conventions?

- A. java.text package
- B. java.util.Locale class
- C. java.lang.String class
- D. Pluggable look and feel in Swing.
- E. Readers and Writers in the java.io package.

Answer: A

QUESTION 16 Given:

```
1. public class Test{
2. public static void main(String[]args){
3. int x=0;
4. assert(x>0)?"assertion failed":"assertion failed";
5. System.out.println("Finished");
6. }
7. }
```

What is the result?

- A. finished
- B. Compilation fails.
- C. An Assertion Error is thrown and finished is output.
- D. An Assertion Error is thrown with the message "assertion failed".
- E. An Assertion Error is thrown with the message "assertion passed".

Answer: B

QUESTION 17 Given:

```
1. public class X{
2. public static void main(String[]args){
3. try{
4. badMethod();
5. System.out.print("A");
6. }
7. catch(Exception ex){
8. System.out.print("B");
9. }
10. finally{
11. System.out.print("C");
12. }
13. Sytstem.out.print("D");
14. }
15. public static void badMethod(){
16. throw new RuntimeException();
17. }
```

18. }

What is the result?

- A. AB
- B. BC
- C. ABC
- D. BCD
- E. Compilation fails.

Answer: D

QUESTION 18 Given:

- 1. for(int i=0;i<4;i+=2){
- 2. System.out.println(i+"");
- 3. }
- 4. System.out.println(i);

What is the result?

- A. 0 2 4
- B. 0 2 4 5
- C. 0 1 2 3 4
- D. Compilation fails.
- E. An exception is thrown at runtime.

Answer: D

QUESTION 19 Given:

- 0. public float getSalary(Employee c){
- 1. assert validEmployee(c);
- 2. float sal=lookupSalary(c);
- 3. assert (sal>0);
- 4. return sal;
- 5. }
- 6. private int getAge(Employee c){
- 7. assert validEmployee(c);
- 8. int age=lookupAge(c);
- 9. assert (age>0);
- 10. return age;
- 11. }

Which line is a violation of appropriate use of the assertion mechanism?

- A. Line 21
- B. Line 23
- C. Line 27
- D. Line 29

Answer: A

QUESTION 20 Given:

- 1. public class Alpha1 {
- 2. public static void main(String[] args){
- 3. boolean flag; int i=0;

```
5. do{
6. flag=false;
7. System.out.println(i++);
8. flag=i<10>;
9. continue;
10. }while((flag)?true; false);
11. }
12. }
```

What is the result?

- A. 0000000000
- B. 0123456789
- C. Compilation fails.
- D. The code runs with no output.
- E. The code enters an infinite loop.
- F. An exception is thrown at runtime.

Answer: B

QUESTION 21 Given:

```
1. package Certkiller;
2.
3. import java.util.Vector;
4.
5. protected class MyVector extends Vector{
6. int i=1;
7. public MyVector(){
8. i=2;
9. }
10. }
11.
12. public class MyNewVector extends MyVector{
13. public MyNewVector();
14. i=4;
15. }
16. public static void main(String args[]){
17. MyVector v=new MyNewVector();
18. }
19. }
```

What is the result?

- A. Compilation succeeds.
- B. Compilation fails because of an error at line 5.
- C. Compilation fails because of an error at line 6.
- D. Compilation fails because of an error at line 14.
- E. Compilation fails because of an error at line 17.

Answer: B

QUESTION 22 Which three statements are true? (Choose three)

- A. Assertion checking is typically enabled when a program is deployed.
- B. It is never appropriate to write code to handle failure of an assert statement.
- C. Assertion checking is typically enabled during program development and testing.
- D. Assertion checking can be selectively enabled or disabled on a per-package basis, but not on a per-class basis.
- E. Assertion checking can be selectively enabled or disabled on both a per-package basis and a

Answer: B, C, E

QUESTION 23 Given:

```

1. public class X{
2. public static void main(String[]args){
3. try{
4. badMethod();
5. System.out.print("A");
6. }
7. catch(Exception ex){
8. System.out.print("B");
9. }
10. finally{
11. System.out.print("C");
12. }
13. System.out.print("D");
14. }
15. public static void badMethod(){}
17. }

```

What is the result?

- A. AC
- B. BC
- C. ACD
- D. ABCD
- E. Compilation fails.

Answer: C

QUESTION 24 Given:

```

1. int i=0,j=5;
2. tp:for(;;){
3. i++;
4. for(;;){
5. if(i>--j){
6. break tp;
7. }
8. }
9. }
10. System.out.println("i="+",j="+j);

```

What is the result?

- A. i=1, j=0
- B. i=1, j=4
- C. i=3, j=4
- D. i=3, j=0
- E. Compilation fails.

Answer: A

QUESTION 25 Which fragment is an example of inappropriate use of assertions?

- A. `assert(!map.contains(x)); map.add(x);`
- B. `if(x>0){ }else{ assert(x==0); }`
- C. `public void at Method(int x){ assert(x>0); }`
- D. `assert(invariantCondition()); return retVal;`
- E. `switch(x){ case 1:break; case 2:break; default:assert(x==0); }`

Answer: C

QUESTION 26 Given:

1. `class Bar{}`
2. `class Test{`
3. `Bar doBar(){`
4. `Bar b=new Bar();`
5. `return b;`
6. `}`
7. `public static void main(String args[]){`
8. `Test t=new test();`
9. `Bar newBar=t.doBar();`
10. `System.out.println("newBar");`
11. `newBar=new Bar();`
12. `System.out.println("finishing");`
13. `}`
14. `}`

At what point is the Bar object, created on line 3, eligible for garbage collection?

- A. After line 8.
- B. After line 10.
- C. After line 4, when `doBar()` completes.
- D. After line 11, when `main()` completes.

Answer: B

QUESTION 27 Given:

1. `public class Certkiller{`
2. `public static void main(String[] args){`
3. `String s;`
4. `System.out.println("s="+s);`
5. `}`
6. `}`

What is the result?

- A. `s=`

- B. s=null
- C. Compilation fails.
- D. An exception is thrown at runtime.

Answer: C

QUESTION 28 Given:

```
1. int i=1,j=10;  
2. do{  
3. if(i>j){  
4. continue;  
5. }  
6. j--;  
7. }while(++i<6);  
8. System.out.println("i="+i+" and j="+j);
```

What is the result?

- A. i=6 and j=5
- B. i=5 and j=5
- C. i=6 and j=4
- D. i=5 and j=6
- E. i=6 and j=6

Answer: A

QUESTION 29 Given:

```
1. public static void main(String[]args){  
2. Object obj=new Object(){  
3. public int hashCode(){  
4. return 42;  
5. }  
6. }  
7. System.out.println(obj.hashCode());  
8. }
```

What is the result?

- A. 42
- B. An exception is thrown at runtime.
- C. Compilation fails because of an error on line 12.
- D. Compilation fails because of an error on line 16.
- E. Compilation fails because of an error on line 17.

Answer: D

QUESTION 30 Given:

```
1. int i=0;  
2. while(1){  
3. if(i==4){  
4. break;  
5. }  
6. ++i;
```

7. }
8. `System.out.println("i="+i);`
 What is the result?
- A. `i=0`
 - B. `i=3`
 - C. `i=4`
 - D. `i=5`
 - E. Compilation fails.

Answer: E

QUESTION 31 Which two are valid declaration within an interface definition? (Choose two)

- A. `void methoda();`
- B. `public double methoda();`
- C. `public final double methoda();`
- D. `static void methoda(double d1);`
- E. `protected void methoda(double d1);`

Answer: A, B

QUESTION 32 Given:

1. `public class Test{`
2. `public static void main(String[]args){`
3. `int x=0;`
4. `assert(x>0):"assertion failed";`
5. `System.out.println("finished");`
5. `}`
6. `}`

What is the result?

- A. finished
- B. Compilation fails.
- C. An Assertion Error is thrown.
- D. An Assertion Error is thrown and finished is output.

Answer: C

QUESTION 33 Given:

1. `public class Delta{`
2. `static boolean Certkiller(char c){`
3. `System.out.print(c);`
4. `return true;`
5. `}`
6. `public static void main(String[]argv){`
7. `int i=0;`
8. `for(Certkiller('A');Certkiller('B')&&(i<2);Certkiller('C')){`
9. `i++;`
10. `Certkiller('D');`
12. `}`
13. `}`

14. }

What is the result?

- A. ABDCBDCB
- B. ABCDABCD
- C. Compilation fails.
- D. An exception is thrown at runtime.

Answer: A

QUESTION 34 Given:

```

1. class A{
2. }
3. class Alpha{
4. private A myA=new A();
5.
6. void do It(Aa){
7. a=null;
8. }
9. void tryIt(){
10. do It(myA);
11. }
12. }

```

Which two statements are correct? (Choose two)

- A. There are no instances of A that will become eligible for garbage collection.
- B. Explicitly setting myA to null marks that instance to be eligible for garbage collection.
- C. Any call on tryIt() causes the private instance of A to be marked for garbage collection.
- D. Private instances of A become eligible for garbage collection when instances of Alpha become eligible for garbage collection.

Answer: B, D

QUESTION 35

```

1. boolean bool=true;
2. if(bool=false){
3. System.out.println("a");
4. }else if(bool){
5. System.out.println("b");
6. }else if(!bool){
7. System.out.println("c");
8. }else{
9. System.out.println("d");
10. }

```

What is the result?

- A. a
- B. b
- C. c
- D. d

E. Compilation fails

Answer: C

QUESTION 36 Given:

```
1. public class X{
2. public static void main(String[]args){
3. try{
4. badMethod();
5. System.out.print("A");
6. }
7. catch(Exception ex){
8. System.out.print("B");
9. }
10. finally{
11. System.out.print("C");
12. }
13. System.out.print("D");
14. }
15. public static void badMethod(){
16. throw new Error();
17. }
18. }
```

What is the result?

- A. ABCD
- B. Compilation fails.
- C. C is printed before exiting with an error message.
- D. BC is printed before exiting with an error message.
- E. BCD is printed before exiting with an error message.

Answer: C

QUESTION 37 Given:

```
1. int i=1,j=10;
2. do{
3. if(i++>--j){
4. continue;
5. }
6. }while(i<5);
17. System.out.println("i="+i+" and j="+j);
```

What is the result?

- A. i=6 and j=5
- B. i=5 and j=5
- C. i=6 and j=4
- D. i=5 and j=6
- E. i=6 and j=6

Answer: D

QUESTION 38 Given:

```

1. class Exc0 extends Exception {}
2. class Exc1 extends Exc0 {}
3. public class Test {
4.     public static void main(String args[]) {
5.         try {
6.             throw new Exc1();
7.         } catch (Exc0 c0) {
8.             System.out.println("Exc0 caught");
9.         } catch (Exception c) {
10.            System.out.println("exception caught");
11.        }
12.    }
13. }

```

What is the result?

- A. Ex0 caught
- B. exception caught
- C. Compilation fails because of an error at line 2.
- D. Compilation fails because of an error at line 6.

Answer: A

QUESTION 39 Which statement is true?

- A. catch(X x) can catch subclasses of X.
- B. The Error class is a RuntimeException.
- C. Any statement that can throw an Error must be enclosed on a try block.
- D. Any statement that can throw an Exception must be enclosed in a try block.
- E. Any statement that can throw a RuntimeException must be enclosed in a try block.

Answer: A

QUESTION 40 Given:

```

1. int x=1,y=6;
2. while(y--){
3.     x++;
4. }
5. System.out.println("x="+x+"y="+y);

```

What is the result?

- A. x=6 y=0.
- B. x=7 y=0.
- C. x=6 y=-1.
- D. x=7 y=-1.
- E. Compilation fails.

Answer: E

QUESTION 41 Given:

```

1. void start(){
2.     Aa=new A();

```

```
3. Bb=new B();
4. a.s(b);
5. b=null;
6. a=null;
7. System.out.println("start completed");
8. }
```

When is the B object, created in line 14 eligible for garbage collection?

- A. After line 16.
- B. After line 17.
- C. After line 18 (when the method ends)
- D. There is no way to be absolutely certain.
- E. The object is NOT eligible for garbage collection.

Answer: D

QUESTION 42 Given:

```
1. public class Test{
2. public static void main(Strings args[]){
3. int i= 1,j=0;
4. switch(i){
5. case2:j+=6;
6. case4:j+=1;
7.default:j+=2;
8. case 0;j+=4;
9. }
10. System.Out.Println("j="+j);
11. }
12. }
```

What is the result?

- A. 0
- B. 2
- C. 4
- D. 6
- E. 9
- F. 13

Answer: D

QUESTION 43 Given:

```
1. public class X{
2. public static void main(String[]args){
3. try{
4. badMethod();
5. System.out.print("A");
6. }
7. catch(RuntimeException ex){
8. System.out.print("B");
9. }
```

```
10. catch(Exception ex1){
11. System.out.print("C");
12. }
13. finally{
14. System.out.print("D");
15. }
16. System.out.print("E");
17. }
18. public static void badMethod(){
19. throw new RuntimeException();
20. }
21. }
```

What is the result?

- A. BD
- B. BCD
- C. BDE
- D. BCDE
- E. ABCDE
- F. Compilation fails.

Answer: C

QUESTION 44 Given:

```
1. public interface Test{
2. int frood=42;
3. }
4. class TestImp1 implements Test{
5. private static int frood;
6. public static void main(String[]args){
7. System.out.println(++frood);
8. }
9. }
```

What is the result?

- A. 0
- B. 1
- C. 42
- D. 43
- E. Compilation fails.
- F. An exception is thrown at runtime.

Answer: B

QUESTION 45 Given:

```
1. public class Test{
2. public static String output="";
3.
4. public static void Certkiller(int i){
5. try{
```

```
6. if(i==1){
7. throw new Exception();
8. }
9. output += "1";
10. }
11. catch(Exception e){
12. output += "2";
13. return;
14. }
15. finally{
16. output += "3";
17. }
18. output += "4";
19. }
20.
21. public static void main(String args[]){
22. Certkiller(0);
23. Certkiller(1);
24.
25. }
26. }
```

What is the value of the variable output at line 23?

Answer: 13423

QUESTION 46 Given:

```
1. public class Certkiller{
2. public static void main(String[] args){
3. try{
4. return;
5. } finally{
6. System.out.println("Finally");
7. }
8. }
9. }
```

What is the result?

- A. Finally
- B. Compilation fails.
- C. The code runs with no output.
- D. An exception is thrown at runtime.

Answer: A

QUESTION 47 Given:

```
11. for(int i=min;i<max;i++){
12. System.out.println(i);
13. }
```

If min and max are arbitrary integers, what gives the same result?

- A. `int i=min; while(i<max){ System.out.println(i++); }`
- B. `int i=min; do{ System.out.println(i++); }while(i<max);`
- C. `for(int i=min;i<max;System.out.println(++i));`
- D. `for(int i=min;i++<max;System.out.println(i));`

Answer: A, B

QUESTION 48 Given:

- 1. `int i=1,j=10;`
- 2. `do{`
- 3. `if(i>j){`
- 4. `break;`
- 5. `}`
- 6. `j--;`
- 7. `}while(++i<5);`
- 18. `System.Out.println("i="+i+" and j="+j);`

What is the result?

- A. `i=6 and j=5`
- B. `i=5 and j=5`
- C. `i=6 and j=4`
- D. `i=5 and j=6`
- E. `i=6 and j=6`

Answer: D

QUESTION 49 Given:

- 1. `public class Certkiller{`
- 2. `public void main(String[]args){`
- 3. `System.out.println("Hello"+args[0];`
- 4. `}`
- 5. `}`

What is the result if this code is executed with the command line: `java Certkiller world`

- A. Hello
- B. Hello Certkiller
- C. Hello World
- D. Compilation fails.
- E. The code does not run.

Answer: E

QUESTION 50 Given:

- 1. `package Certkiller;`
- 2.
- 3. `import java.util.Vector;`
- 4.
- 5. `private class MyVector extends Vector{`
- 6. `int i =1;`
- 7. `public MyVector(){`
- 8. `i=2;`

```

9. }
10. }
11.
12. public class MyNewVector extends MyVector{
13. public MyNewVector(){
14. i=4;
15. }
16. public static void main(String args[]){
17. MyVector v= new MyNewVector();
18. }
19. }

```

What is the result?

- A. Compilation succeeds.
- B. Compilation fails because of an error at line 5.
- C. Compilation fails because of an error at line 6.
- D. Compilation fails because of an error at line 14.
- E. Compilation fails because of an error at line 17.

Answer: C

QUESTION 51 Which statement is true?

- A. Assertions can be enabled or disabled on a class-by-class basis.
- B. Conditional compilation is used to allow tested classes to run at full speed.
- C. Assertions are appropriate for checking the validity of arguments in a method.
- D. The programmer can choose to execute a return statement or to throw an exception if an assertion fails.

Answer: A

QUESTION 52 Given:

```

1. class TestA{
2. TestB b;
3. TestA(){
4. b=new TestB(this);
5. }
6. }
7. class TestB{
8. TestA a;
9. TestB(TestA a){
10. this.a=a;
11. }
12. }
13. class TestAll{
14. public static void main(String args[]){
15. new TestAll().makeThings();
16. //...code continues on
17. }
18. void makeThings(){
19. TestA a=new TestA();

```

20. }

21. }

Which two statements are true after line 15, before main completed? (Choose two)

- A. Line 15 causes a tack overflow.
- B. An exception is thrown at runtime.
- C. The object referenced by a is eligible for garbage collection.
- D. The object referenced by b is eligible for garbage collection.
- E. The object referenced by a is not eligible for garbage collection.
- F. The object referenced by b is not eligible for garbage collection.

Answer: C, D

QUESTION 53 Given:

1. public class test{
2. public static void main(String[]argv){
3. //insert statement here
4. }
5. }

Which statement, inserted at line 3, produces the following output?

Exception in thread "main"java.lang.AssertionError:true at Test.main(Test.java:3)

- A. assert true;
- B. assert false;
- C. assert false:true;
- D. assert false==true;
- E. assert false:false;

Answer: C

QUESTION 54 Given:

1. package Certkiller;
- 2.
3. import java.util.Vector;
- 4.
5. private class MyVector extends Vector{
6. int i=1;
7. public MyVector(){
8. i=2
9. }
10. }
- 11.
12. public class MyNewVector extends MyVector{
13. public MyNewVector(){
14. i=4;
15. }
16. public static void main(String args[]){
17. MyVector v=new MyNewVector();
18. }
19. }

What is the result?

- A. Compilation succeeds.
- B. Compilation fails because of an error at line 5.
- C. Compilation fails because of an error at line 6.
- D. Compilation fails because of an error at line 14.
- E. Compilation fails because of an error at line 17.

Answer: B

QUESTION 55 Given:

```

1. public class Test{
2. public static void aMethod()throws Exception{
3. try{
4. throw new Exception();
5. }finally{
6. System.out.println("finally");
7. }
8. }
9. public static void main(Strings args[]){
10.try{
11. aMethod();
12. }catch(Exception c){
13. System.out.println("exception");
14. }
15. System.out.println("finished");
16. }
17. }

```

What is the result?

- A. finally
- B. exception finished
- C. finally exception finished
- D. Compilation fails.

Answer: C

QUESTION 56 Given:

```

10. public Object m(){
11. Object o=new Float(3.14.F);
12. Object[]oa=new Object[1];
13. oa[0]o;
14. o=null;
15. return oa[0];
16. }

```

When is the Float object, created in line 11, eligible for garbage collection?

- A. Just after line 13
- B. Just after line 14.
- C. Never in this method.

D. Just after line 15(that is, as the method returns).

Answer: C

QUESTION 57 Given:

```
1. int i=0;
2. for(;i<4;i+=2){
3. System.out.print(i+"");
4. }
5. System.out.println(i);
```

What is the result?

- A. 0 2 4
- B. 0 2 4 5
- C. 0 1 2 3 4
- D. Compilation fails.
- E. An exception is thrown at runtime.

Answer: A

QUESTION 58 Given:

```
1. int i=1,j=-1;
2. switch(i){
3. case 0,1:j=1;
4. case 2:j=2;
5. default:j=0;
6. }
7. System.out.println("j="+j);
```

What is the result?

- A. j=-1
- B. j=0
- C. j=1
- D. j=2
- E. Compilation fails.

Answer: E

QUESTION 59 What allows the programmer to destroy an object x?

- A. x.delete()
- B. x.finalize)=
- C. Runtime.getRuntime().gc()
- D. explicitly setting the object reference to null.
- E. ensuring there are no references to the object.
- F. Only the garbage collection system can destroy an object.

Answer: F
