faq	**ORACLE** FUSION MIDDLEWARE
	Oracle Application Server 10*g* Release 2 Forms
	Frequently Asked Questions
	February 2007

This FAQ addresses frequently asked questions relating to Oracle Forms for both development and runtime.

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1.0 Strategy and Roadmap

1.1 How long will Forms continue to be supported?

Oracle Forms has a large and active user base. It continues to be developed and enhanced, and is an important component of Oracle Application Server. It is not the policy of Oracle to state how long a product will be supported, whether it's Forms, Oracle Application Server, or the database, say. However the development resources that Oracle has already committed to Forms will take the product through to, at least, 2013.

Read the Forms Statement of Direction for more information:

> http://www.oracle.com/technology/products/forms/pdf/10g/ToolsSOD.pdf

1.2 I heard that Forms is "going away", is that true?

This is not true, refer to 1.1, above.

Forms 6i was desupported January 2005 (apart from Extended Support) and that was the last version of Forms that could deploy client/server and character mode. From the release after that, Forms 9i (9.0.2), and higher, Forms can only be deployed to the web.

It's possible that some people confused the desupport of client/server and character mode with the desupport of the product itself, leading them to think that Forms is going away. This is not the case, of course.

1.3 Should I do new development in Forms or JDeveloper using Application Development Framework (ADF)?

People sometimes see Forms and JDeveloper as competing with each other, and think they have to use one or the other. This is not the case. They produce different types of applications for different requirements.

For example, if you have an application that requires a rich, interactive user interface such as multiple windows, instance refresh, stacked canvasses, etc, then Forms might be more appropriate. If your application is more self-service oriented (think Amazon.com, for example) then a JSP/HTML application using JDeveloper might make more sense.

If your developers come from a Forms background, or they're more familiar with PL/SQL than Java, then they may find Forms easier to develop an application with. If they're Java gurus, then perhaps JDeveloper would make them more productive.

These are just a couple points to consider. But also don't make the mistake of thinking you must use either Forms **or** JDeveloper. There's no reason why you can't use a combination of the two, and integrate your applications together. Forms can call out to Java or invoke other web applications. Your JSP, say, could launch a Forms application and pass in parameters or share data through the database.

1.4 I am on client/server or character mode. How can I move forward, and preserve my investment in Forms?
This is a broad question and can't be answered in this small space since there are so many varying factors from customer to customer. However Oracle's general recommendation can be summarized here: upgrade and integrate.

Upgrade

If you are on client/server or character mode, you should upgrade to Forms on the web so that you are on the latest version of Forms, in a supported environment, and integrated with Oracle Application Server. For the majority of customers, upgrading to Forms on the web is relatively straight forward. The Forms Upgrade Center contains a lot of information about how to upgrade to Forms on the web, such as whitepapers, tips, customer testimonials, etc:

http://www.oracle.com/technology/products/forms/htdocs/upgrade/index.html

You can then enhance your existing applications using new features in Forms, add new functionality to your applications, or build new applications using Forms.

Integrate

For those customers interested in doing development in J2EE using Oracle Application Development Framework (ADF) there is no need to throw away your investment in Forms. Once your Forms applications are upgraded to the web, you can do new development in ADF, and integrate it together with your Forms applications. You can also continue doing new development in Forms, there's no need to choose only one or the other. Refer to 1.3, above.

By putting your PL/SQL in the database, your Forms and ADF applications can share business logic for improved integration.

When you follow the upgrade and integrate approach, you have the option of deploying future functionality in the most appropriate environment, Forms or ADF.

1.5 I am a Forms developer. Will I be able to use Oracle Application Development Environment (ADF)?

ADF is the natural choice for Forms and Designer developers who would like to build enterprise applications in J2EE. ADF is the most productive J2EE development environment, with many of the ideas and concepts that makes Forms so productive. In fact, there are more similarities between Forms and J2EE development using ADF than you'd think:

> http://otn.oracle.com/formsdesignerj2ee

2.0 Oracle Application Server Forms Services

2.1 Can I deploy my Forms application over the Internet through firewalls and proxies?
Yes. Forms uses standard servlet session-based HTTP communication, so should work with any firewalls and proxies that support that.

2.2 What if I only want to run Forms and Reports? Do I need to install everything?
Oracle Application Server has a Forms and Reports Services installation configuration. It comprises OracleAS J2EE core components + Forms Services + Reports Services only; there is no Infrastructure to install and configure.

2.3 Are there any restrictions with the Forms and Reports Services installation?
If you use the OracleAS Forms and Reports Services installation, the following applies:

- There is no Infrastructure to install and configure.

- There is no Single Sign-on integration.

- You can associate this installation with an Infrastructure in the future, giving you the option of using Single Sign-on if you end up deciding you need it.

3.0 Platform Support

3.1 Do I need to download JInitiator to the client to run a Forms application?
Forms requires a JVM on the client. For clients on the Windows platform, it is recommended – but not mandatory – that you use JInitiator. (JInitiator is only available on Windows.) For a list of certified JVMs, see the Client Platform Support statement on the Forms page on OTN:

> http://www.oracle.com/technology/products/forms/index.html

3.2 Can I run OracleAS Forms Services on Linux?
Yes, OracleAS Forms Services are available as part of the OracleAS Enterprise Edition on Linux.

4.0 Upgrading

4.1 What versions of Forms can I upgrade to this release?
Oracle Forms 6*i* and higher can upgrade directly to Oracle Forms 10*g* Release 2 (10.1.2.0.2). Earlier versions of Forms first need to upgrade to Oracle Forms 6*i*.

4.2 Can I run Client/Server or Character Mode applications in this release?
No. Forms 6i was the last version of Forms to support client/server and character mode. All subsequent versions only support web deployment.

4.3 What changes will I have to make to my application before upgrading?
Many Client Server and Character Mode features have been removed from the Forms product for 9i and 10g. The removed features mainly relate to features that were only maintained in Forms 6i for the purpose of backwards compatibility. A detailed list of all of the obsolete features can be found on OTN

   http://otn.oracle.com/products/forms/pdf/featuresobsolescence.pdf

4.4 Is there an easy way to find out if my modules use obsolete features?
Yes. Oracle supplies a separate utility with the Oracle Forms distribution called the Forms Migration Assistant. This is a utility which will scan your files for obsolete usages and correct them where applicable. It will also alert you to any changes you may have to make manually.

5.0 Builder Environment

5.1 When I press the run button how can I define which browser is used?

Use the Edit->Preferences dialog and set the location of your preferred web browser in the "Web Browser Location" field on the Runtime tab.

5.2 How can I use a particular profile from my formsweb.cfg when running from the builder?
In the Edit->Preferences dialog Runtime tab, you can enter an application server URL. This URL is the one that the builder will append to when constructing the URL to run. Thus, if you specify a particular configuration on the end of this URL

(e.g. *http://myserver/forms90/f90servlet?config=development*), that base configuration will be used, and additional runtime information appended to it.

6.0 Integration

6.1 Is it possible to call Java classes from a Forms application on the application server side?
Yes. Oracle Forms Developer gives you the ability to generate the PL/SQL code necessary to call any Java class from a Forms application, using the Java Importer facility.

With the code generated by this feature, you are able to call compiled Java classes, directly from PL/SQL, in the OracleAS Forms Services on the middle tier.

6.2 Can I base a Forms block on an EJB or ADF Business Components?
The Java importer facility gives you the ability to use an Enterprise Java Bean (EJB) or ADF Business Components as the basis of a Forms Block. However, you should be aware of the following caveats:

- Calling out to Java from Forms has a small but significant performance implication. The Java Native Interface (JNI) that is used to call out from the Forms C code to Java does impose a bottleneck on the operation as values and method calls are transferred. Although this overhead is not noticeable in a simple function call, it may become evident if a Form Block is based on Java in this way. The normal functionality of the block requires many calls back and forth to the datasource and in this case the delay imposed by the JNI bridge, on each call, will result in noticeably slower performance than that for a block based directly on a table, view or PL/SQL stored procedure.

- Whenever a Forms process calls out to Java, it must have a Java Virtual Machine loaded into memory. In prior releases of Forms, there was one JVM per user. In Oracle Forms 10g Release 2, you have the JVM Pooling feature which lets you manage how many JVMs you have thus conserving resources.

- Using a foreign data source in this way is a complex task in terms of hooking the Java Code up to the Forms transactional triggers. The maintenance burden is also high if changes have to be made, as both the PL/SQL interfaces and the Java code itself may need to be changed.

- An EJB or BC4J component will create it's own JDBC connection to the database and not re-use the existing Forms connection, doubling the user load on the database.

6.3 When running a form on the Web, can I use OLE to talk to programs such as MS Word or Excel?
Yes. For OLE integration on the client, Oracle has provided a utility called WebUtil for client-side integration. For more information on WebUtil, including a WebUtil FAQ, visit the WebUtil area on OTN:

http://www.oracle.com/technology/products/forms/htdocs/webutil/webutil.htm

OLE integration also works for external OLE servers invoked using OLE2.CREATE_OBJ. The OLE server you are invoking must be available on the middle tier machine where OracleAS Forms Services resides. Consequently the middle tier machine must be a Windows NT or Windows 2000 machine. Embedded OLE containers and ActiveX (OCX) controls are not supported when running on the Web.

6.4 I currently have a client-server application that uses an embedded ActiveX control to communicate with an external device. How can I maintain this functionality when I deploy the application on the Web in Oracle Forms?

Assuming that the device in question (for example, a Scanner) is attached to each client machine, rather than the server, you will use a Pluggable Java Component (PJC) to extend the capabilities of the Forms Java Client and allow it to talk to the hardware in question. Oracle JDeveloper provides a Wizard to help you build such Pluggable Java Components.

WebUtil, a utility for Oracle Forms provided by Oracle, offers other options for client-side integration, such as calling out to DLLs on the client. For more information on WebUtil, including a WebUtil FAQ, visit the WebUtil area on OTN:

> http://www.oracle.com/technology/products/forms/htdocs/webutil/webutil.htm

6.5 How can I upload a file from a browser client to my middle tier?

You can either use a conventional Web upload to do this, or you can use WebUtil, a utility for Oracle Forms provided by Oracle. With WebUtil, you can upload to the application (middle) tier, or to the database. For more information on WebUtil, including a WebUtil FAQ, visit the WebUtil area on OTN:

> http://www.oracle.com/technology/products/forms/htdocs/webutil/webutil.htm

6.6 I want to write a JavaBean for use as a pluggable component for the Forms Java Client. What version of the Java Development Kit (JDK) should I use?

Pluggable Java components for Oracle Forms can be built with 1.3.x or 1.4.x of the JDK.

6.7 When running a Form on the Web where do commands such as HOST and TEXT_IO execute?

In Web-deployed Forms these commands, built-ins, User Exits, and ORA_FFI code execute on the middle tier. To execute the commands on the client browser machine, write your own Pluggable Java Components or use WebUtil, a utility for Oracle Forms provided by Oracle. For more information on WebUtil, including a WebUtil FAQ, visit the WebUtil area on OTN:

> http://www.oracle.com/technology/products/forms/htdocs/webutil/webutil.htm

6.8 Can I use the functions in the D2KWUTIL library when Forms is running on NT?

No. We don't support the use of D2KWUTIL in the middle tier. Many of the functions in the library require access to Window Handles, which will not work in the Web deployment scenario. While some functions, such as WIN_API_ENVIRONMENT.GET_COMPUTER_NAME(), do work, they return information about the application server machine, not the client. Some functions, such as the bitwise operations, continue to function without a problem.

However, Oracle has a provided a utility called WebUtil which will give you parity with the functionality of D2KWUTIL, and more! For more information on WebUtil, including a WebUtil FAQ, visit the WebUtil area on OTN:

> http://www.oracle.com/technology/products/forms/htdocs/webutil/webutil.htm

7.0 Single Sign-on

7.1 Can I use Single Sign-On with Forms Services?

Yes. OracleAS Forms Services applications can be configured as an external application to the Oracle Login Server. The Login Server is the Oracle unified Single Sign-On (SSO) solution, mapping the Forms application user to a Single Sign-On user account.

In addition, your Forms applications can take advantage of Single Sign-on without any modification of your Forms modules!

7.2 Can I use LDAP to authenticate Forms Services?

Not directly. However, Oracle Login Server is able to authenticate against a LDAP directory and thus a Forms application can take advantage of this in a SSO environment. But you cannot use access control information stored in a LDAP directory with Forms.

8.0 Portal Integration

8.1 Can I integrate my Forms application as a portlet in OracleAS Portal?

It is technically possible. You have to edit the relevant static or base .html file (if using the CGI or servlet). In both cases you have to remove the <HTML>,<BODY>, </HTML>, and </BODY> tags. Using the Portal Developer's Kit (PDK) downloaded from OTN (otn.oracle.com), you can set up the URL portlet.

This URL portlet takes an application, referenced by a URL, and brings it as a portlet into a portal page.

However this is not recommended. Portal pages are meant to be refreshed, while Forms is using a stateful applet. Therefore it is recommended to use a URL from your Portal page to open your Forms application in a separate window.

9.0 Security

9.1 Is Forms traffic encrypted when running in HTTP mode?

Only when running in HTTPS mode is the traffic between the Forms client and the Forms Server process encrypted in any meaningful way.

9.2 Is the database login information encrypted?

The database login information is encrypted when running in HTTPS mode.

9.3 Is the communication from WebUtil to the Server encrypted? For example, during file transfer?

If SSL is used all traffic between the client and the server is encrypted.

9.4 Is there any way to determine (from within Forms code) if a user has connected using HTTP or HTTPS?

There is no function in Forms that will return the mode the user is connected with.

Oracle Application Server 10g FAQ

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