

ConnectEase™

**Microsoft Windows™ Open
Database Connectivity (ODBC)
Driver for DataEase™**

User's Manual



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Foreword

I would like to personally welcome you to the world of open-architecture Open Database Connectivity (ODBC) access to DataEase. As a loyal DataEase user, you have long impressed yourself by using DataEase to rapidly develop fully functional database applications with a minimum of fuss or technical programming knowledge. Quite simply, in terms of being able to move rapidly from 'concept to implementation' with an application, there is still nothing more effective on the market than DataEase.

As I am sure you know all too well, the world has moved far beyond DOS. It is simply unacceptable now to platform new systems in the text-oriented style of DataEase for DOS. As superior as DataEase remains - even when compared to the latest tools - in yielding fast-track transactional systems, any technology must address the demands of the marketplace. The mindset has shifted and the world has openly embraced Windows as the desktop platform of choice and simply won't accept text-based applications, no matter what advantages they may offer. That is reality.

This has left you with few options. The DataEase relational data schema has, until now, been a closely held secret, which meant that DataEase data remained inaccessible, except through batch

exports and imports, to mainstream Windows software such as Microsoft Access or Crystal Reports. All the while, you have likely been in a quandary; faced with massive legacy applications that worked well, but needed to make an appearance in Windows to be sellable. Until now, you had one painful option: A lengthy and expensive total redevelopment of your applications.

This was the impetus that prompted us to develop ConnectEase, the first ODBC driver for DataEase databases. We believe ConnectEase represents a watershed development for you, the loyal DataEase developer. Now, for the first time, you will be able to incrementally migrate your existing DataEase applications to the Windows world. You will be able to easily deploy native Windows interfaces on your legacy DataEase applications using the ODBC-compliant tools you want. Your users will no longer have to see the dated yellow, black and blue of DataEase. You can now construct graphical interfaces to your existing apps using Microsoft Access, Visual Basic, Delphi, Powerbuilder and any of dozens of other tools. Using the Gold Edition, you can achieve this while leaving important elements of your application executing in native DataEase.

We truly believe that with ConnectEase a new day dawns for you, the loyal DataEase developer. You can now satisfy the demand for Windows access to your DataEase data, all while working in the environment that you are most comfortable.

Sincerely,

Jesse R. Brin
President

Using this Manual

This manual is your reference to the Lanimation Technology ConnectEase ODBC drivers.

This manual contains the following chapters:

Chapter 1, "Introduction" explains the ConnectEase driver and ODBC, discusses environment-specific issues and explains the error messages returned by the drivers.

Chapter 2, "Installation" describes how to install the ConnectEase driver on your PC workstation. ConnectEase must be installed on each PC workstation that requires access to your DataEase data from Windows. This chapter also describes the ConnectEase registration process.

Chapter 3 is "Configuring ConnectEase" which describes the steps necessary to configure ConnectEase to access your DataEase databases.

Chapter 4, "Using ConnectEase", provides systematic instructions on how to connect to your DataEase databases with popular Windows applications.

Appendix 1 is "Product Support and Upgrades" which describes the various technical support options available to ConnectEase users.

Appendix 2, "ODBC Initialization Files" explains the structure of the various initialization options defined by the ODBC specification.

Appendix 3 is "Release Notes" which describe the differences between this and previous releases of ConnectEase.

If you are writing programs to access ODBC drivers, you should obtain a copy of the ODBC Programmer's Reference for the Microsoft Open Database Connectivity Software Development Kit, available from Microsoft Corporation.

Conventions Used in this Manual

This manual uses various conventions to aid in its readability. The typography, terminology, and callouts to environment-specific information used are intended to make this manual easy to use, regardless of the operating environment you are using. The following section describe these conventions.

Typography

This manual uses various typefaces, fonts, and characters to indicate certain types of information, as follows:

Convention	Explanation
<i>italics</i>	Used to introduce new terms that you may not be familiar with, and occasionally for emphasis.
bold	Used to emphasize important information.
UPPERCASE	Indicates the name of a file. For operating environments that use case-sensitive filenames, the correct capitalization is used in information specific to those environments.
monospace	Syntax examples, values that you specify, or results that you receive.
vertical rule	Indicates an OR separator to delineate items.
brackets []	Indicate optional items; for example, SELECT [DISTINCT] . In this example, DISTINCT is an optional keyword.
braces {}	Indicate that you must select one item. For example, {yes no}. In this example, you must specify either yes or no.

This manual uses the following terminology:

The term *ODBC.INI* refers to the ODBC.INI file format as defined by the Microsoft ODBC specification. The appendix, "ODBC Initialization Files" discusses how ODBC.INI is implemented in all environments.

The suffix .DLL refers to a dynamic link library file.

Environment-Specific Information

Windows. Information specific to the Microsoft Windows operating environment.

Windows 95/98. Information specific to the Microsoft Windows 95 and Windows 98 operating environments.

Windows NT/2000/XP. Information specific to the Microsoft Windows NT or Windows 2000 or Windows XP (Home and Professional Editions) operating environments.

This manual uses examples that are specific to Windows XP Professional. If you are using the driver on other Windows versions, the examples may differ slightly from those depicted here.

Introduction to ConnectEase

Chapter 1

ConnectEase is a Microsoft Windows™ Open Database Connectivity (ODBC) Driver for DataEase™ databases. An ODBC driver is the link between an ODBC-compliant Windows application and a database. ODBC is a standard application programming interface (API) developed by Microsoft for accessing databases. Derived from the call level interface (CLI) published by the SQL Access Group and X/Open in 1992, ODBC provides a common access method to a variety of databases from most popular Windows applications. Examples of ODBC-compliant Windows applications include: Microsoft Access, Seagate Crystal Reports, Borland Delphi, Powersoft PowerBuilder, Lotus 1-2-3, Microsoft Excel, Microsoft Visual Basic and Corel WordPerfect. ConnectEase brings ODBC to the world of DataEase.

ConnectEase reliably and seamlessly integrates your mission-critical DataEase databases with Windows. ConnectEase easily connects ODBC-compliant software packages to your DataEase database applications. Finally, Windows applications can access your MS-DOS DataEase data.

ConnectEase Versions

ConnectEase ODBC for DataEase databases is available in four distinct versions; which one is right for you depends upon your specific requirements.

Demo Edition (DE)

ConnectEase Demo Edition (DE) is a limited version of ConnectEase that permits reading and writing of data to records contained in a DataEase database. It is intended to demonstrate the features and capabilities of the product. It locks the DataEase database exclusively to ensure data integrity, so it is not suitable in a multi-user environment. The Demo Edition will only retrieve the first 100 records from a DataEase table.

Consultant's Edition (CE)

ConnectEase Consultant's Edition (CE) permits read and write access to records contained in DataEase databases. There is no limit on the number of records returned. The Consultant's Edition locks DataEase data sources exclusively, so it is unsuitable in a multi-user environment with other concurrent users. The Consultant's Edition is intended to address the needs of independent consultants who find themselves called on frequently to work in mixed DataEase and Windows environments.

Silver Edition (SE)

ConnectEase Silver Edition (SE) permits read-only access of records from DataEase databases. The Silver Edition is suitable for use in Novell multi-user environments, either with other ConnectEase Silver or Gold users or with DataEase users. Silver

Edition is intended to address advanced reporting and data-extraction requirements by making DataEase data accessible to programs such as Seagate Crystal Reports Pro or Microsoft Excel.

Gold Edition (GE)

ConnectEase Gold Edition (GE) permits reading and writing to records contained in DataEase databases. ConnectEase Gold Edition performs record locking, so it is suitable for deployment in Novell multi-user environments alongside other ConnectEase Gold, Silver or native DataEase users. Gold Edition is intended to address the most demanding requirements prevalent in environments where DataEase serves to deploy and support mission-critical business applications.

ConnectEase Features

With ConnectEase you will be able to:

- ◆ Mine DataEase data with popular Windows applications such as Microsoft Access, Seagate Crystal Reports and Borland Delphi.
- ◆ Unify information from multiple DataEase databases, other ODBC-compliant data sources and client/server databases with a single Windows application.
- ◆ Migrate legacy character-based DataEase applications to Windows incrementally as your requirements dictate.
- ◆ Allow everyone in your organization to have access to DataEase data using the application they choose.
- ◆ Protect your investment in your extensive DataEase databases.

ConnectEase supports Windows 95/98 and Windows NT/2000/XP applications.

The ConnectEase drivers support DataEase version 4.53.

System Requirements

Windows 95/98

Minimum memory: 16 MB (64 MB Recommended)

Disk space: 2 MB

Windows NT/2000/XP

Minimum memory: 64 MB (128 MB Recommended)

Disk Space: 2 MB

Environment-Specific Information

The following section contains information specific to the various operating environments supported, such as filenames, initialization files, etc. Information is provided for Windows 95/98 and Windows NT/2000/XP.

For Windows 95/98 and Windows NT/2000/XP Users

On Microsoft Windows 95/98 and Windows NT/2000/XP systems, the ConnectEase drivers are 32-bit drivers. If you plan to access a DataEase database on a network, all standard network drivers must be loaded and properly configured to allow access to the network from your Windows 95/98 or Windows NT/2000/XP system.

Windows 95/98/NT/2000 Registry Information

The **Windows 95/98/NT/2000** Registry contains information necessary to access ODBC data sources. This information is maintained by the ODBC Administrator program which can be run from the **Windows 95/98/NT/2000** Control Panel.

Because **Windows 95/98/NT/2000** can support multiple users, the ODBC information is stored in the registry for each user of the system.

The format of the registry information is the same as the ODBC.INI file documented in an appendix to this manual.

Error Messages

ODBC error messages may be generated by:

- ◆ The Microsoft ODBC Driver Manager, or
- ◆ The ConnectEase Driver

Errors reported by an ODBC component have the following general format:

[vendor] [component] message text

The vendor is Lanimation for the ConnectEase Driver or Microsoft for the Microsoft ODBC Driver Manager. The component refers to the ODBC component in which the error occurred. The message text describes the error that occurred.

The Microsoft ODBC Driver Manager is a Dynamic Link Library (DLL) that establishes connections with ODBC drivers, submits requests to the drivers, and returns results to applications. An error that occurs in the driver manager has the general format:

[Microsoft] [ODBC DLL] message text

An example of this type of message would be:

[Microsoft] [ODBC DLL] Driver does not support this function

An error that occurs in the ConnectEase Driver has the following format:

[LANimation] [ConnectEase ODBC Driver] message text

An example message from the ConnectEase driver is:

[LANimation] [ConnectEase ODBC Driver] Column not
found: Total Amount (#1021)

ConnectEase Specifications

Developed with the Microsoft ODBC SDK

ODBC Level 1 Compliant

Supports Open Standards Committee (OSC) minimum SQL syntax

Provides access to DataEase database applications

This chapter describes how to install ConnectEase. You must install the ConnectEase version specific to your operating system. To use ConnectEase, you must be using Windows 95/98/NT/2000. ConnectEase is distributed as a download package from our web site at www.connectease.com

Before you Begin

You must know the full path to the DataEase database that you wish to access. DataEase' internal catalog of forms (AKA Tables) is named

RDRRxAAA.DBM

where 'x' is replaced by a single character that represents the **ID** of the database. Each DataEase database has one and only one RDRRxAAA.DBM file. To establish an ODBC Data Source that points to your DataEase application, you need to identify RDRR file to the ODBC setup program. The easiest way to do this is to select '**Database Maintenance**' from the main DataEase menu. Then choose **Database Status**. Select 'Forms' as the type of object for the status report.



This will produce a screen similar to the above.

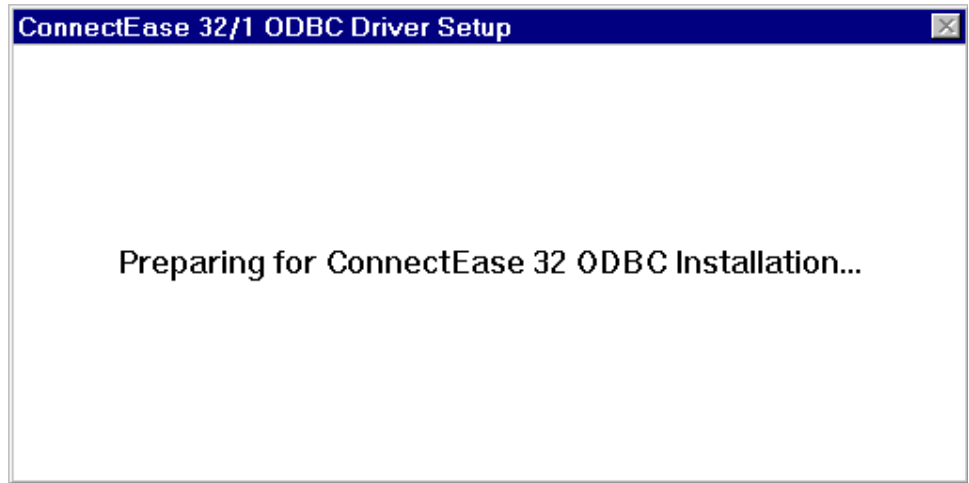
If you look at the first file (**Users**), the third column identifies the name of the file system file for DataEase Users form for the database (**USERGAAA.DBM**). The fifth letter of the filename ('**G**') is the database **ID** of the database. The name of the RDRR file in this example would be **RDRRGAAA.DBM**.

Running Setup

Please Note: This section depicts a typical installation and configuration on a Windows XP Professional operating system. The actual screens you receive may not exactly match that depicted below depending upon your specific configuration, but they should be close.

To install ConnectEase, download and unzip the install image from our [web site](#) into a temporary directory or onto a CD or diskette. After unzipping the install package, run the supplied SETUP.EXE program.

While the setup program is loading you will see the following screen.

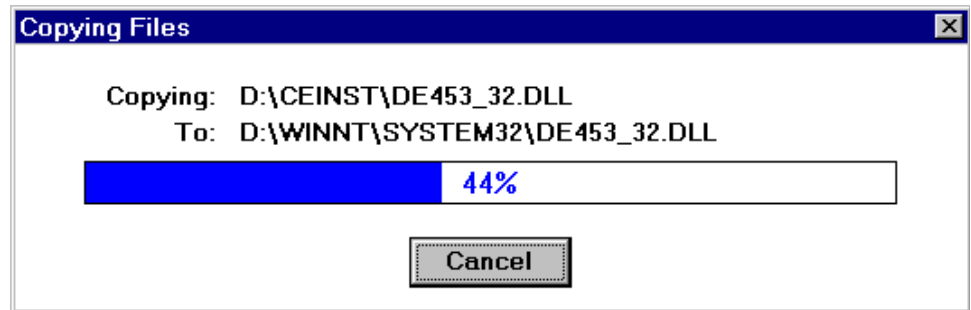


When the setup program has finished loading, the following screen will appear.

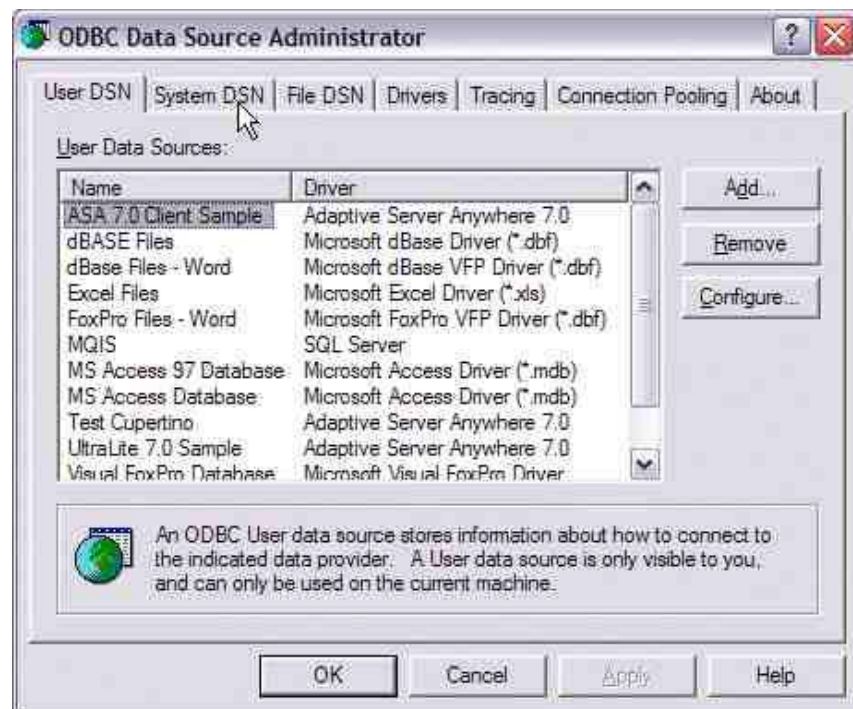


Click on **Continue** to begin the installation process or click on **Exit** to terminate the program.

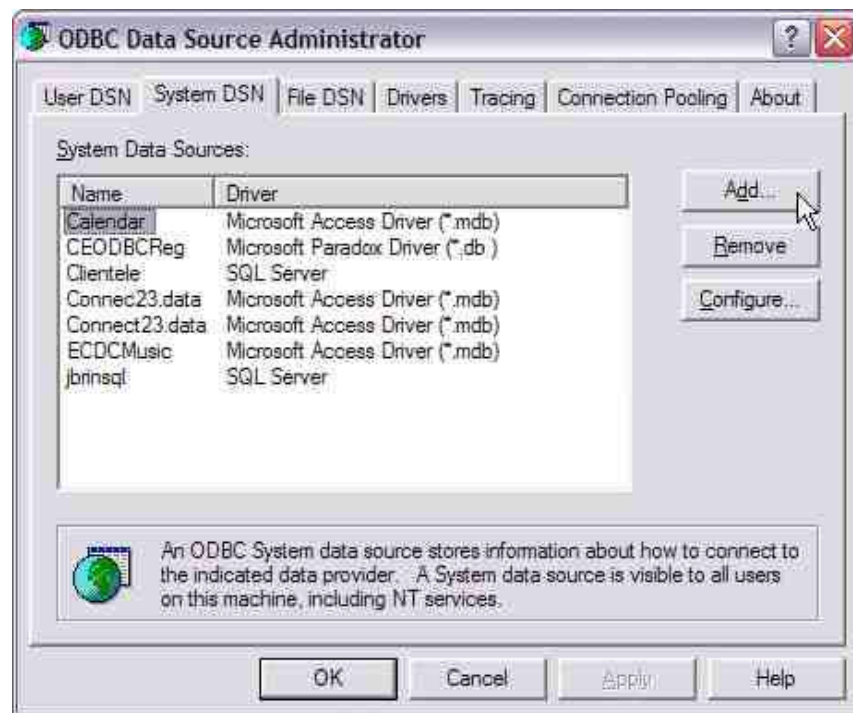
The following message screen will appear while the setup program copies the ConnectEase files to your system.



When all files have been copied, the following **Data Sources** screen will be displayed.

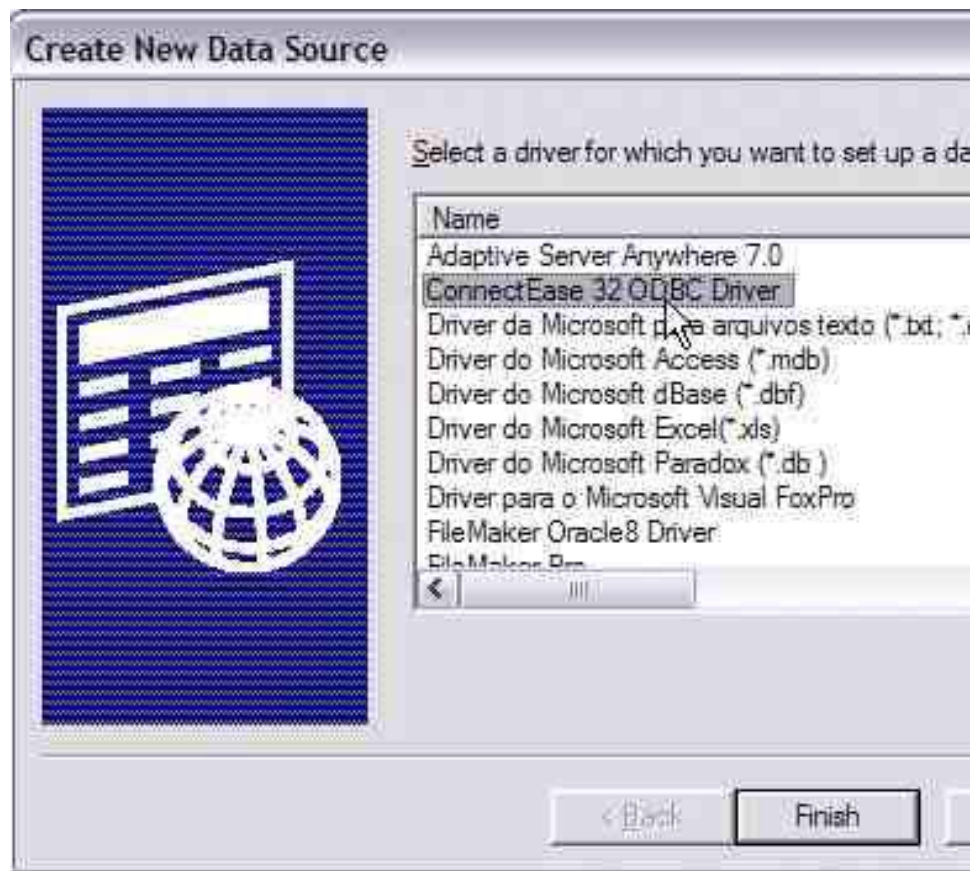


You should select the **System DSN** tab.



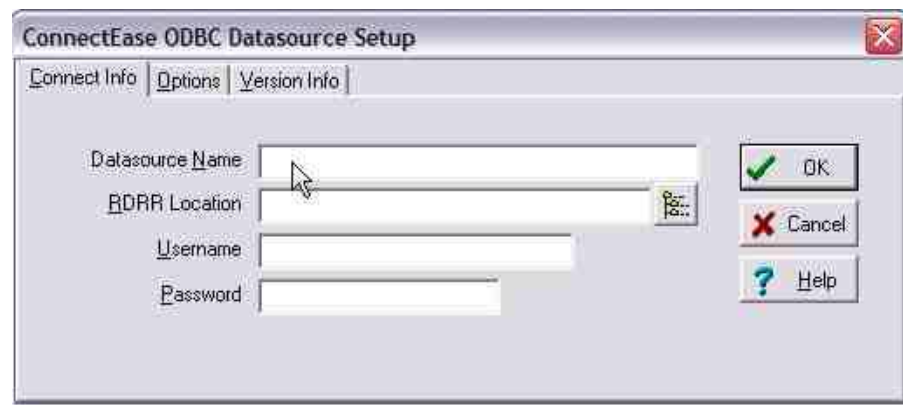
Click on **Add** to add your DataEase database to the ODBC configuration. Please note, you must *add* a data source for each DataEase database that you plan to access. See Chapter 3, “Configuring ConnectEase” for more information on adding data sources.

The **Create New Data Source** screen will appear.



Click on **ConnectEase 32 ODBC Driver** in the list of installed ODBC drivers, then click on **OK**.

The **ConnectEase ODBC Datasource Setup** screen will then appear. The setup screen is organized into a tabbed notebook dialog box with different pages accessible through tabs appearing across the top of the window. To successfully setup a ConnectEase data source, you must at least complete the information requested by the Connect Info page of the setup dialog box.



This section of the setup program requires you to assign a name to your data source, specify the location of the DataEase database system catalog (the RDRR file) and the user name and password to be used to gain access to the database.

The RDRR file contains the descriptive information needed to access the database forms and data. It is always located in the same sub-directory as the other files comprising a database. Its file name begins with RDRR and it always has a .DBM extension. The only variant portion of the file name is the fifth character, which is a unique identifier (within a sub-directory) for the database.

The RDRR file entry must specify a valid DataEase RDRR file name, including a complete path and drive specification. The

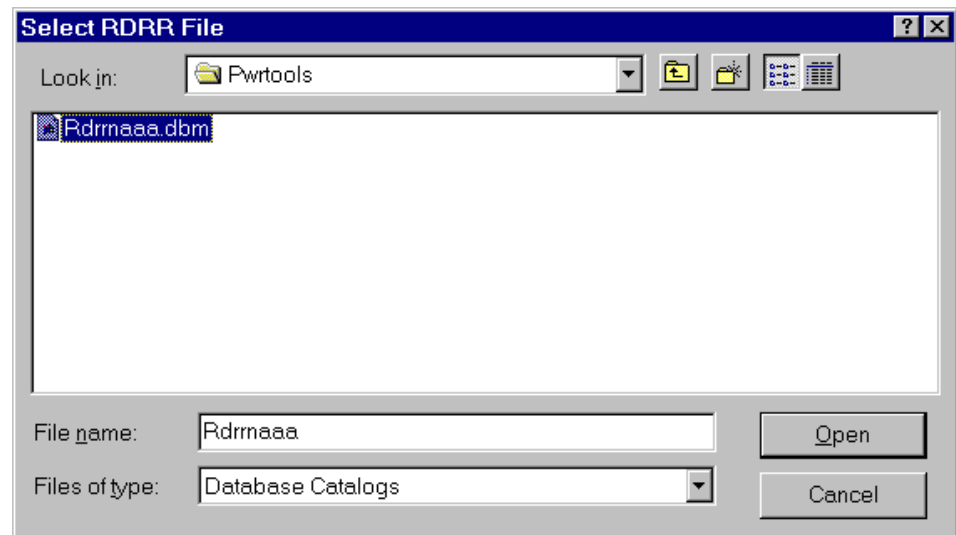


button appearing to the right of the entry invokes a browse dialog that makes locating specific RDRR files easier.

If you use the browse feature, the Data Source Name entry will be automatically populated with the database name stored within the selected DataEase database.

You may also type the full path to your DataEase database in the

RDRR Location field, or you may click the  button to enter the path with the **Select RDRR File** dialog shown below.



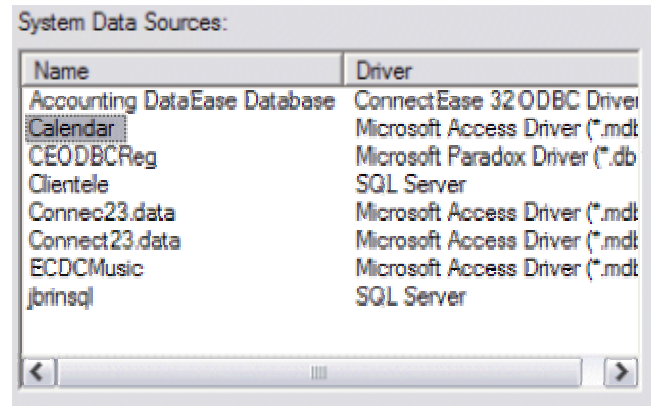
The Select RDRR File dialog allows you to navigate the drives on your system to find the directory that contains your DataEase RDRR file.

You should then enter a name for the DataEase database that you wish to access. The setup program will use the name from your DataEase database as the default name for your data source. This name should be descriptive of the data in your database. It is often beneficial to include DataEase in the name to distinguish this data source from other ODBC data sources that are accessible on your computer.

You should enter your DataEase user name and password in the **Username** and **Password** fields. The entries should be valid for the selected database. If the **Username** or **Password** fields are left blank or are not valid, you will be required to enter a valid user name and password each time you use ConnectEase to attach to the database.

Click on **OK** when you have entered all of the required information.

The **Data Sources** window will then appear with your new data source listed in the data sources list.



Click on **Close** to complete the configuration.

ConnectEase is now installed on your computer. To configure additional DataEase databases, refer to the chapter "Configuring ConnectEase". To register ConnectEase, refer to the chapter "ConnectEase Product Registration".

DataEase Settings

In databases that ConnectEase users will share with native DataEase users, we suggest setting the DataEase locking option: **'When in Record Entry, how should viewed records be locked?'** to *Shared*. You will find this setting in the Define Configuration record in the System Administration section of DataEase.

Registration/Activation of Demo Software

ConnectEase is initially distributed as 'trialware'. You must register the software with the publisher in order to obtain full access to its features. You must contact LANimation or your dealer to register the product. The registration can also be performed online World Wide Web at <http://www.ConnectEase.com>.

The demo version of ConnectEase is fully functional except for the following limitations:

- The demo displays an '**About**' box each time the driver is used.
- The demo limits the amount of data returned from a DataEase table to the first 100 records
- There are no locks either placed or respected on the data being manipulated through the driver.

To activate the demonstration version, you must simply click the '**Register**' button on the '**About**' box as shown below. Clicking on **OK** allows execution to continue as a demo version.

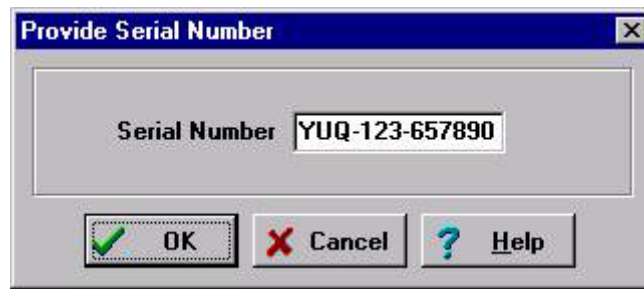


Clicking the 'Register' button in the About box activates the **Registration Wizard**, which allows you to choose the options you want and provides you with the 'secret code' you supply to the **Registration Wizard** to unlock the specific features you desire for your environment.



If the software has never been serialized (i.e. a download), then you will first be required to [obtain a serial number](#). The serial number simply allows us to track the software. You are only required to enter a serial number once.

PLEASE DO NOT CALL TO OBTAIN A SERIAL NUMBER. The phone number shown in the dialog box above is no longer available correct. You may obtain your serial number at the connectease.com web site.



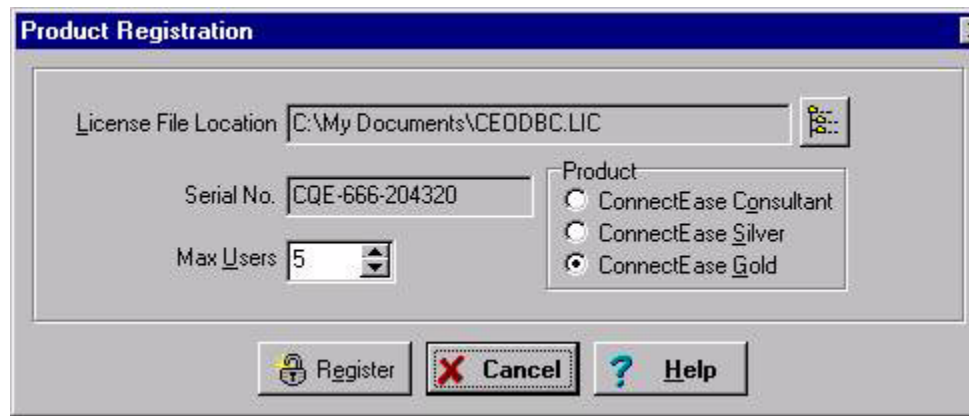
Following serialization, the registration process requires three items of information: The location of the license 'certificate' file, the product class to be licensed (Consultant, Silver or Gold), and the number of users that are to be licensed. With the consultant edition (single-user), the location of the license file is unimportant as long as it is located in a place accessible by the driver at run-time and the number of users is, of course, one.

For multi-user versions of the software, the license certificate file ***must*** be on a shared network drive that all ConnectEase users may access (Shared read-write access to this directory is required). The software will function with the license file on a local drive, but proper file and record locking ***will not*** occur and data integrity could be ***at risk!***

After choosing a license file location and the product options desired, you should click the **Register** button. This activates the Registration Wizard, which allows you to specify the options you want and to register the software license.

If you obtained your copy of ConnectEase electronically (e.g. from the Internet), you will be required to obtain a serial number. See the section, "Obtaining a Serial Number", later in this chapter for information on how to complete this process.

The **Product Registration** screen will appear as follows.



The 'Product Registration' dialog box contains the following fields and controls:

- License File Location:** A text box containing 'C:\My Documents\CEODBC.LIC' with a browse button (three dots) to its right.
- Serial No.:** A text box containing 'CQE-666-204320'.
- Max Users:** A spin box set to '5'.
- Product:** A group box containing three radio buttons:
 - ☐ ConnectEase Consultant
 - ☐ ConnectEase Silver
 - ☒ ConnectEase Gold
- Buttons:** 'Register' (with a lock icon), 'Cancel' (with a red X), and 'Help' (with a question mark).

Complete the form. At that point, the screen shown below will appear which confirms the choices made and provides a 'Installation Identification Key' value.



The confirmation dialog box displays the following information:

- Your Installation Identification Key is:** A text box showing the key '838E3D53'.
- Product Type:** A text box showing 'ConnectEase Gold'.
- Maximum Users:** A text box showing '5'.
- Please enter your Product Activation Key Below:** An empty text box for the user to input the activation key.
- Buttons:** 'OK' (with a green checkmark), 'Cancel' (with a red X), and 'Help' (with a question mark).

It is this key value, along with the other pertinent registration information, that must be conveyed to your dealer or to us in order to complete the process. Note that the Installation Identification Key is static, so we can be contacted via fax or e-mail and the Product Activation Key (unlock code) we provide back will be valid the next time you run the registration process.

Once you have entered a valid Product Activation Key, the product is enabled for the level and number of users chosen. When installing additional workstations on a network, simply locate the existing certificate file on the shared drive and leave the rest of the information unchanged. The Registration Wizard will use the information contained in the existing certificate file; no other registration steps are necessary.

If you ever want to upgrade your software to a higher level or more users, simply remove or rename the certificate file. This will force the registration process to repeat, at which time new features can be selected and a fresh Product Activation Key entered.

Interim product updates can simply be downloaded and installed over the previous version without the need to re-register.

Occurrences that will require re-registration are:

The certificate file becomes corrupted or disappears.

The certificate file is moved from its original location.

The network file server serial number changes or the volume name of the drive where the certificate is stored changes (applies to Silver/Gold only).

Clients that download and register electronic versions of the software will receive documentation kits free of charge.

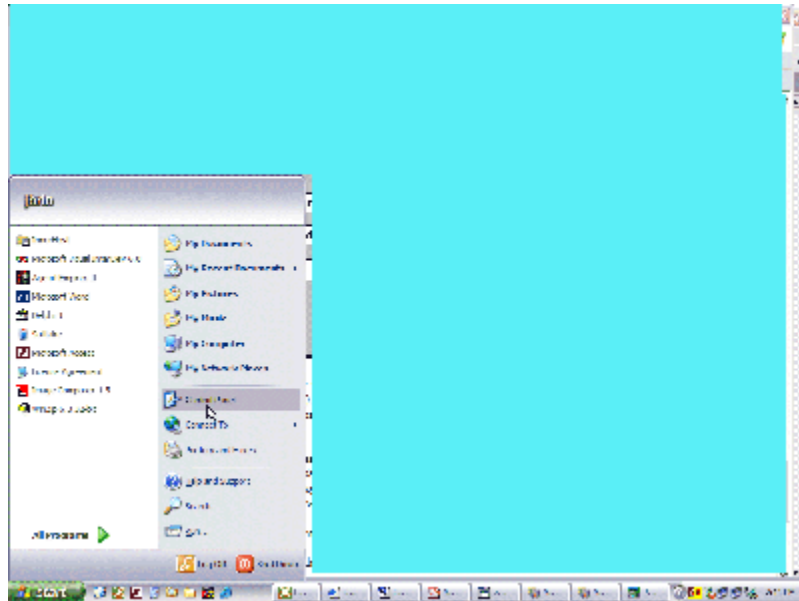
Connecting ConnectEase to Your Database

Chapter 3

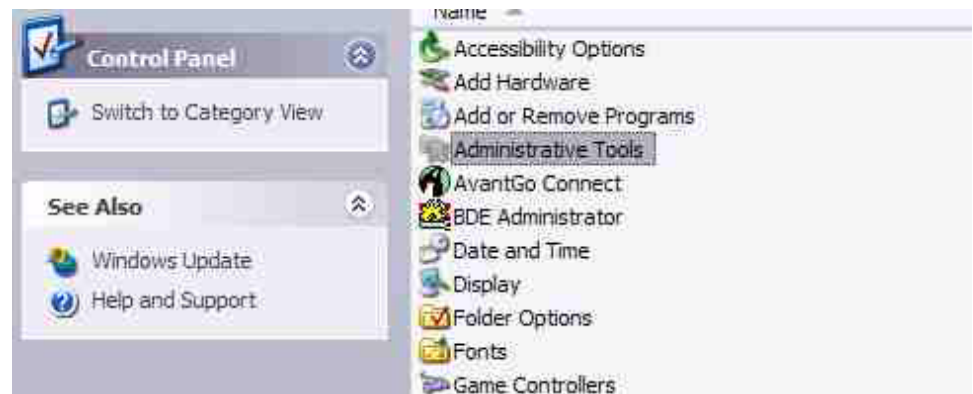
This chapter describes how to configure ConnectEase to access a DataEase database. The Microsoft Open Database Connectivity specification requires that each ODBC data source be defined to the system with the ODBC Administrator program. The ConnectEase setup program described in the “Installing ConnectEase” chapter of this manual allows you to define a DataEase data source during the installation process.

If you need to modify the data source defined in the installation process or add additional DataEase databases to your configuration, follow the steps outlined below.

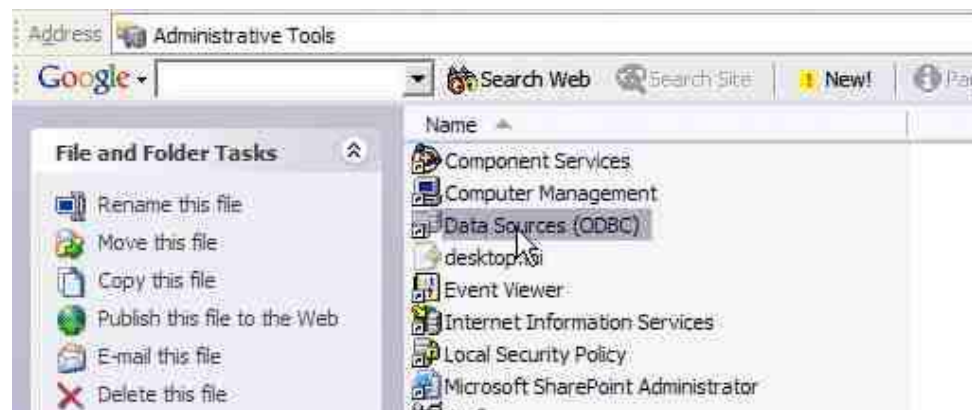
Click **‘Start’** and the select **‘Control Panel’** selection on the Windows Start Menu.



This will launch this screen:



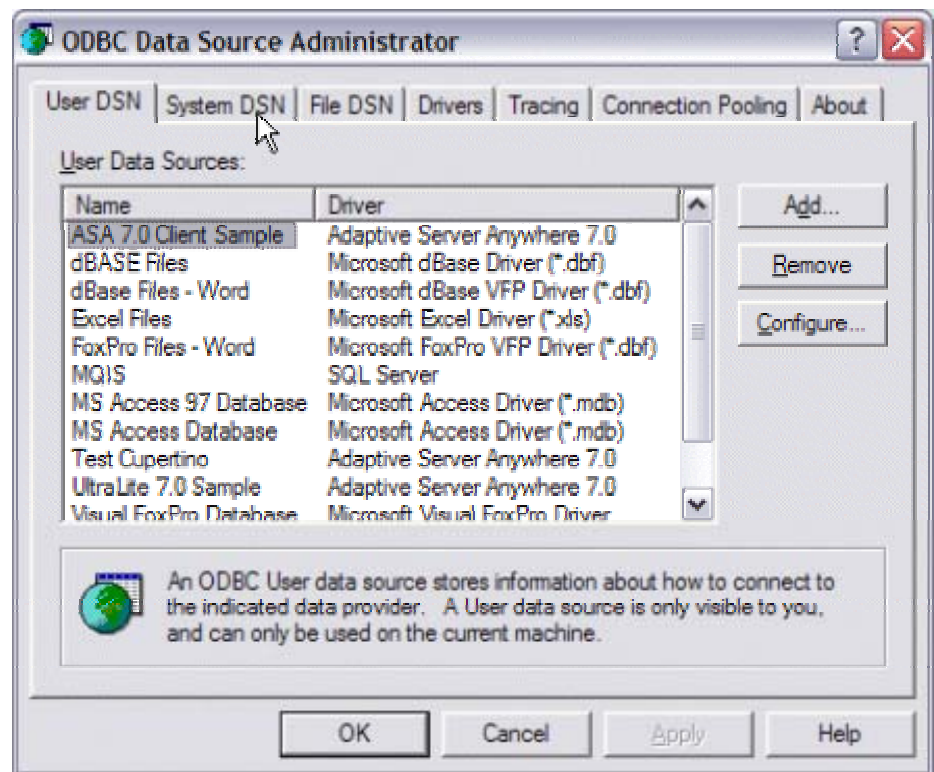
Then select '**Data Sources (ODBC)**' from the Administrative Tools console.



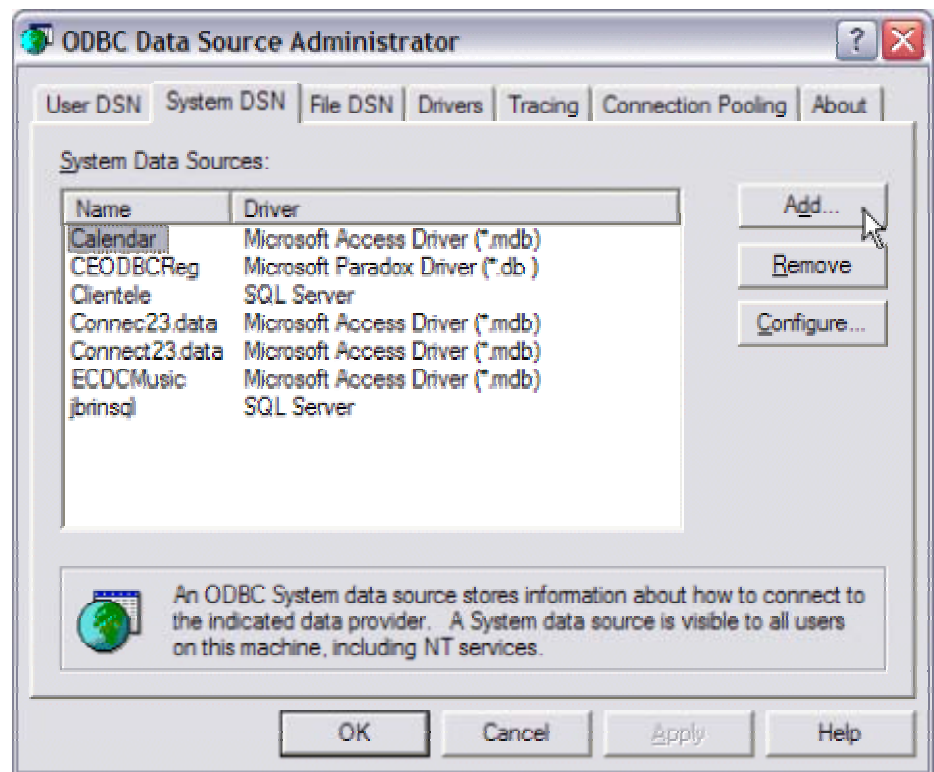
All Users

Double-click on the **ODBC** icon to start the **ODBC Administrator**

The **ODBC Data Source Administrator** screen will appear.



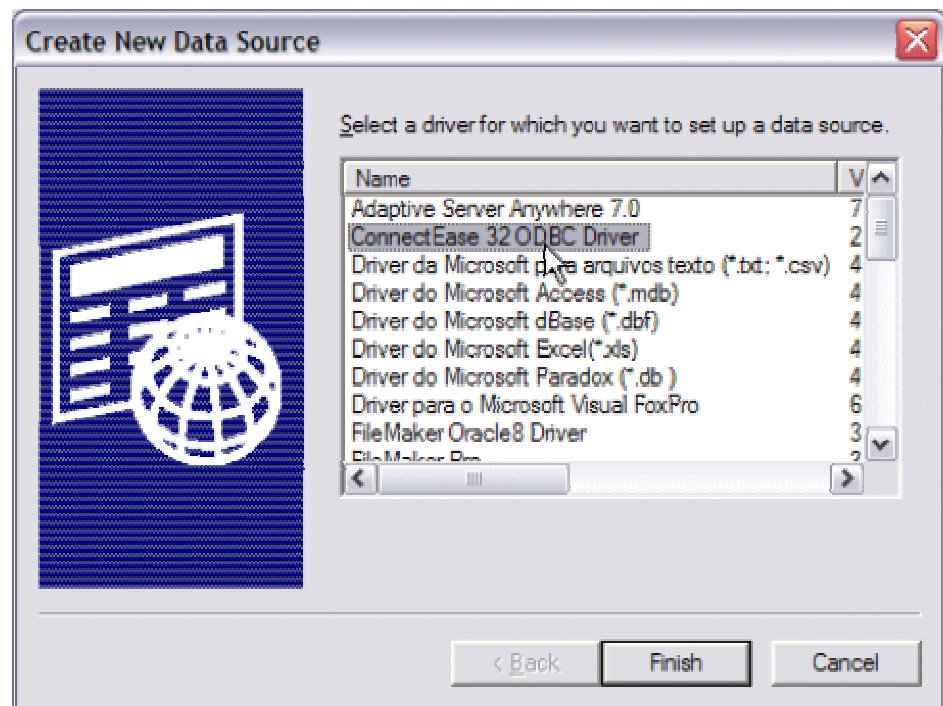
You should select the **System DSN** tab.



Click the **Add** button to add another DataEase database to your ODBC configuration. Please note, you must *add* a data source for each DataEase database that you plan to access. Otherwise, scroll through the list of **User Data Sources** until you find the DataEase database entry that you want to change. Click on the entry that you want to change and then click on **Configure** to start the **ConnectEase ODBC Data Source Setup** utility.

If you selected **Add** you will see the following screen, otherwise skip to the next step.

The **Create New Data Source** screen will appear.



Click on the **ConnectEase ODBC Driver** entry in the driver list and then click the **Finish** button.

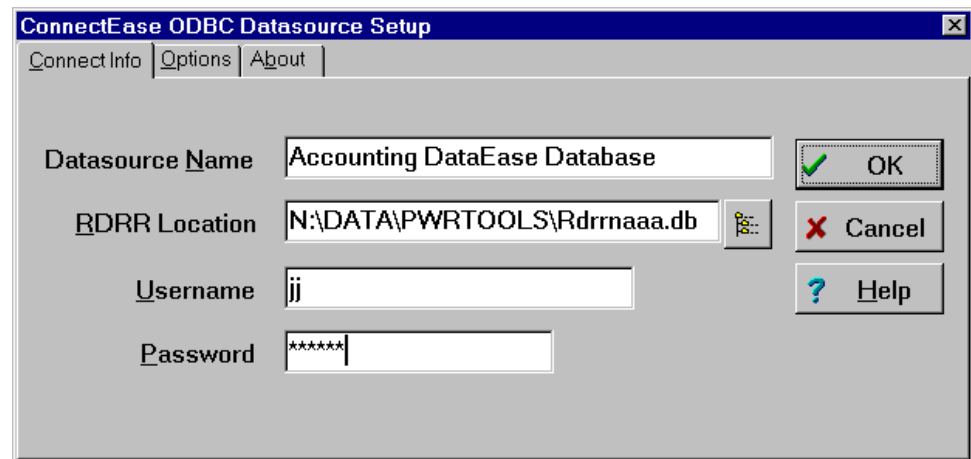
The **ConnectEase ODBC Datasource Setup** screen will then appear. The setup screen is organized into a tabbed notebook dialog box with different pages accessible through tabs appearing across the top of the window. To successfully setup a ConnectEase data source, you must at least complete the information requested by the **Connect Info** page of the setup dialog box.

This section of the setup program requires you to assign a name to your data source, specify the location of the DataEase database system catalog (the RDRR file) and the user name and password to be used to gain access to the database.

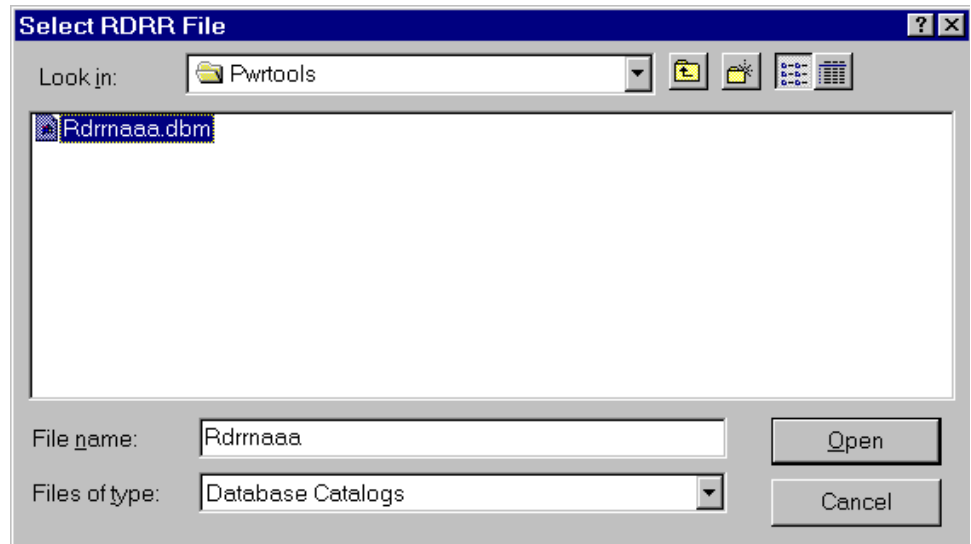
The RDRR file contains information needed to access the database forms and data. It is always located in the same sub-directory as the other files comprising a database. Its file name begins with RDRR and it always has a .DBM extension. The only variant portion of the file name is the fifth character, which is a unique identifier (within a sub-directory) for the database.

The RDRR file entry must specify a valid DataEase RDRR file name, include a complete path and drive specification. The button appearing to the right of the entry invokes a browse dialog that makes locating specific RDRR files easier.

If you use the browse feature, the Data Source Name entry will be automatically populated with the database name stored within the selected DataEase database.



You may type the full path to your DataEase database in the **RDRR Location** field, or you may click on the  button to enter the path with the **Select RDRR File** dialog shown below.



The Select RDRR File dialog allows you to navigate the drives on your system to find the directory that contains your DataEase RDRR file.

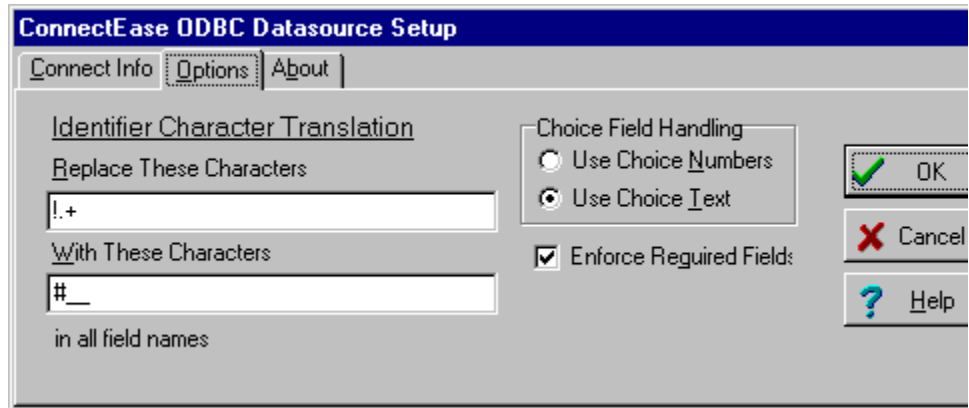
You should now enter a name for the DataEase database that you wish to access in the **Datasource Name** field. The setup program will use the name from your DataEase database as the default name for your data source. This name should be descriptive of the data in your database. It is often beneficial to include DataEase in the name to distinguish this data source from other ODBC data sources that are accessible from your computer.

You should enter your DataEase user name and password in the **Username** and **Password** fields. The entries should be valid for the selected database. If the **Username** or **Password** fields are left blank or are not valid, you will be required to enter a valid user name and password each time you use the data source to attach to the database.

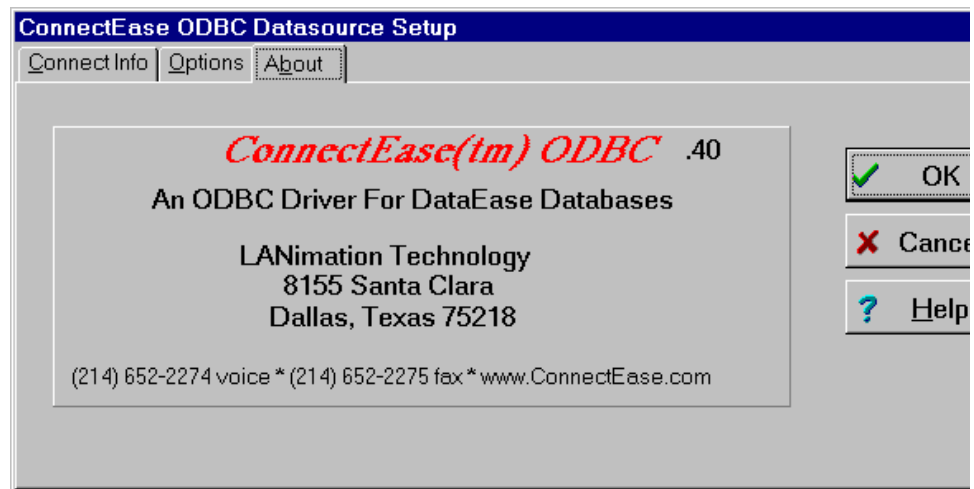
The **Options** tab allows you to specify character translations for field names in your DataEase databases. Some special characters

and international characters allowed by DataEase are not acceptable to certain Windows applications. For example, Microsoft Access does not allow the following characters in field names: exclamation point, period, left bracket [, right bracket], and back quote `.

The following example shows a character translation of '!' to '#', '.' to '_' and '+' to '_'. This will cause a field named '!Amount.Total' to be displayed by the Windows application as '#Amount_Total'.

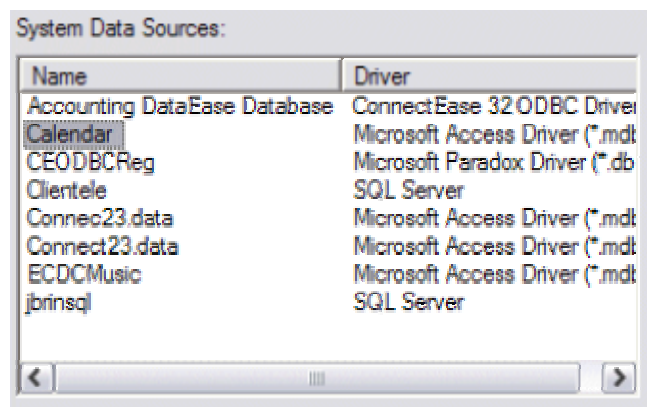


If you click on the **About** tab the following ConnectEase information screen will be displayed.



Click on **OK** when you have entered all of the required information.

The **Data Sources** window will then appear with your new data source listed in the data sources list.



Click on **Close** to complete the configuration.

Connecting Applications to Your Data with ConnectEase

Chapter 4

This chapter describes how to access a DataEase database from within selected Windows applications. Since ODBC is a universal protocol and the numbers and types of specific ODBC-enabled application software packages is virtually limitless, it would be impossible for us to cover connection steps for every specific application on the market. We have chosen to outline steps for using ConnectEase with some of the more popular packages. Even if your package is not one of those listed, the steps for using ConnectEase with it *should be similar* to those shown in this section.

For specific information on connecting your package to ODBC data sources, ALWAYS rely first on the instructions provided with your specific application by the manufacturer

Connection examples are included for the following applications:

- ◆ Microsoft Access
- ◆ Seagate Crystal Reports
- ◆ Borland Delphi
- ◆ Powersoft Powerbuilder
- ◆ Microsoft Visual Basic
- ◆ Microsoft Excel

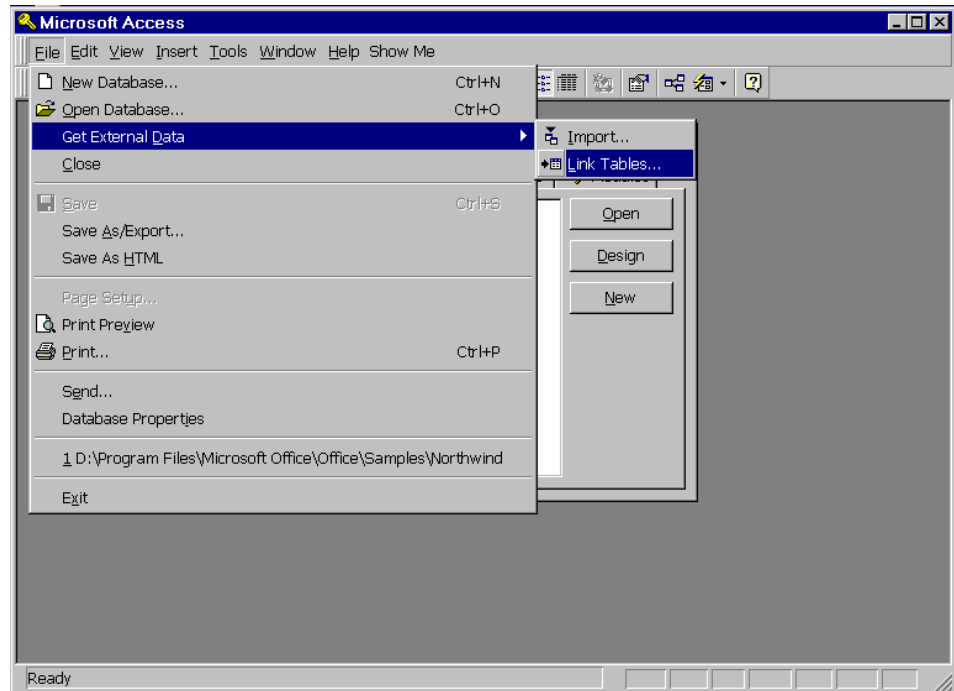
Using Microsoft Access

The following example shows how to use Microsoft Access to connect to a DataEase database.

Open Microsoft Access as you would normally.

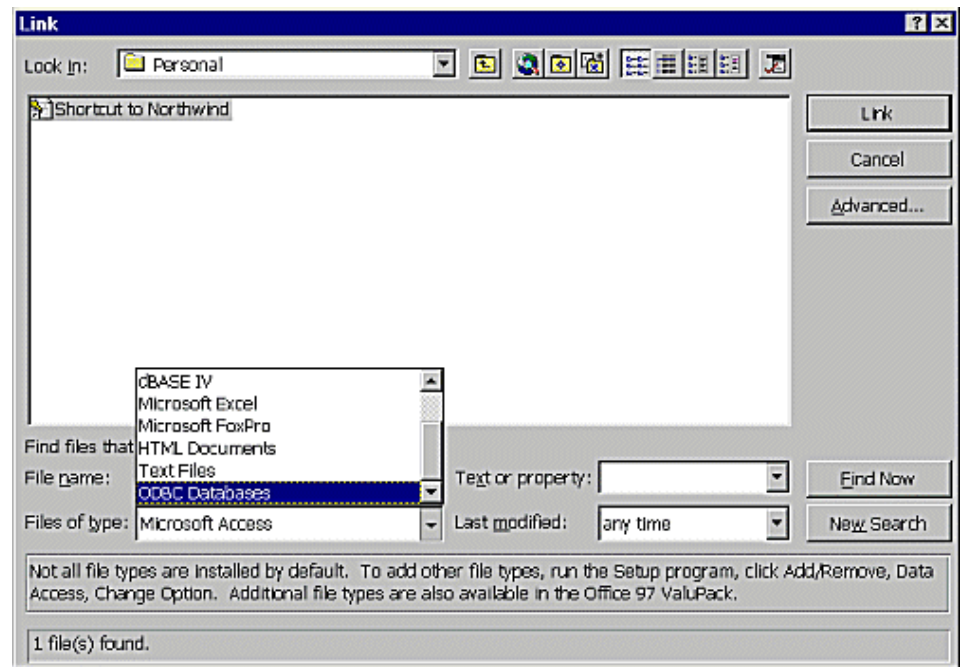
Select your Microsoft Access Database.

From the Microsoft Access **File** menu, choose the **Link Tables** sub-menu from the **Get External Data** menu. See the example pictured below.

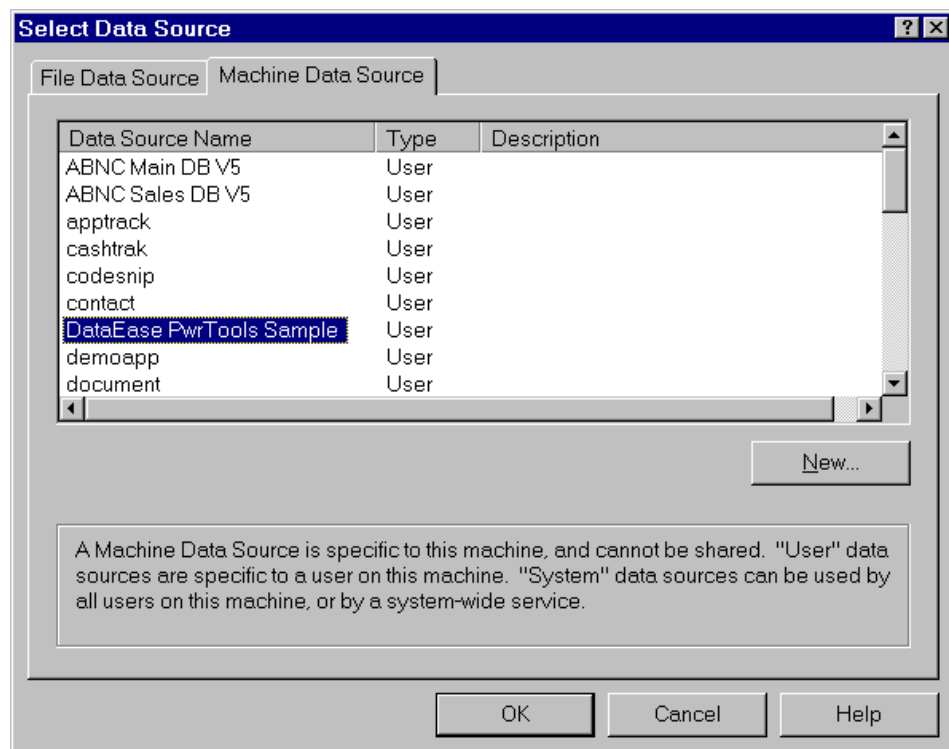


The **Link** screen will appear as shown below.

In the **Files of type** selection box, select files of type: **ODBC Databases**.



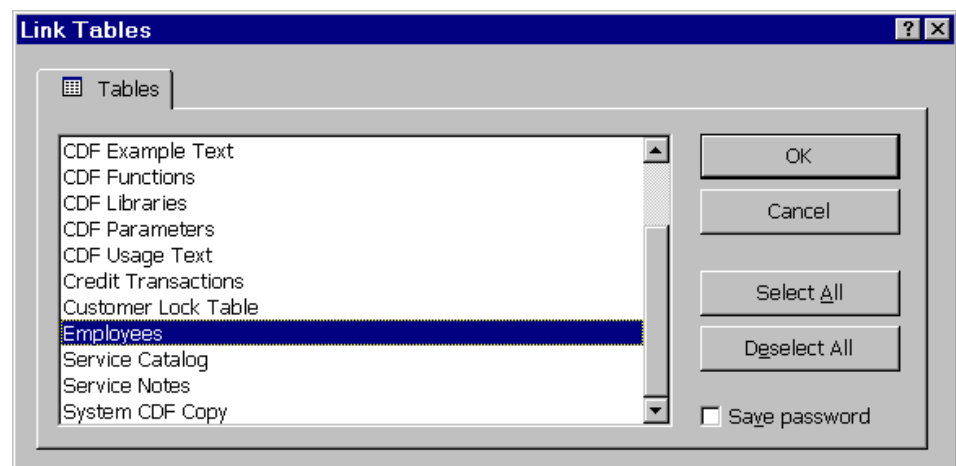
Click on the **Link** button. The **Select Data Source** window appears.



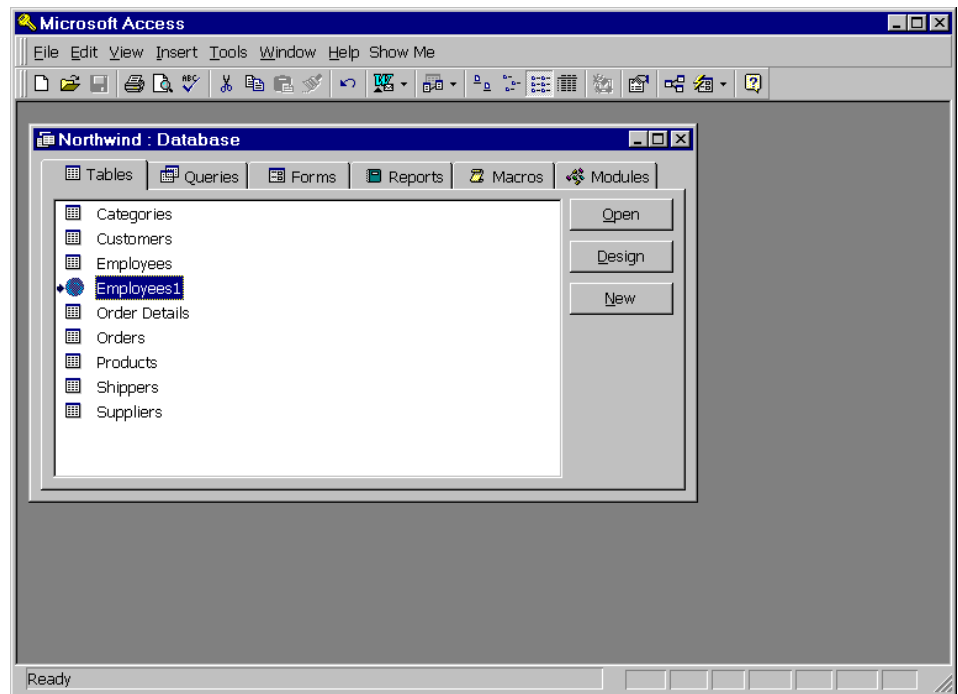
Click on the **Machine Data Source** tab and a list of data sources will be displayed. From the list of Machine Data Sources, select the DataEase data source that you want to access. You defined the Data Source when you first installed ConnectEase or by using the ODBC Administrator program described in the “Configuring ConnectEase” chapter of this manual.

After you make your selection, click on **OK**. The **Link Tables** screen will appear as shown below.

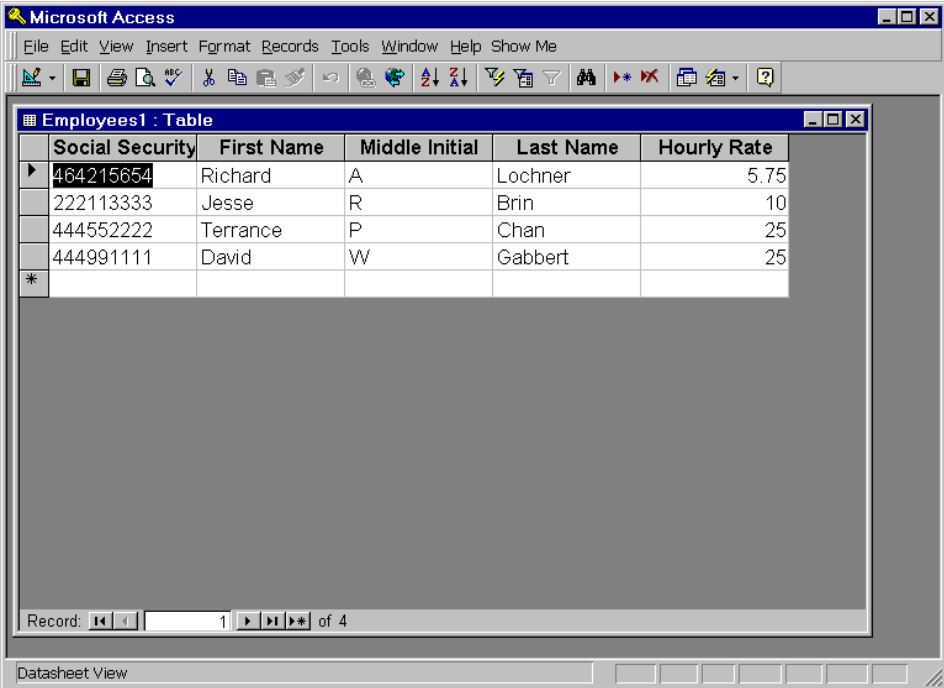
From the list of tables, click on the table or tables you wish to access.



After you have made your selection, click the **Save password** check box and then click the **OK** button. The following screen should appear with your tables added to the list.



From the supplied list, open your selected table as you would any other Microsoft Access table.



Microsoft Access

File Edit View Insert Format Records Tools Window Help Show Me

Employees1 : Table

	Social Security	First Name	Middle Initial	Last Name	Hourly Rate
▶	464215654	Richard	A	Lochner	5.75
	222113333	Jesse	R	Brin	10
	444552222	Terrance	P	Chan	25
	444991111	David	W	Gabbert	25
*					

Record: 1 of 4

Datasheet View

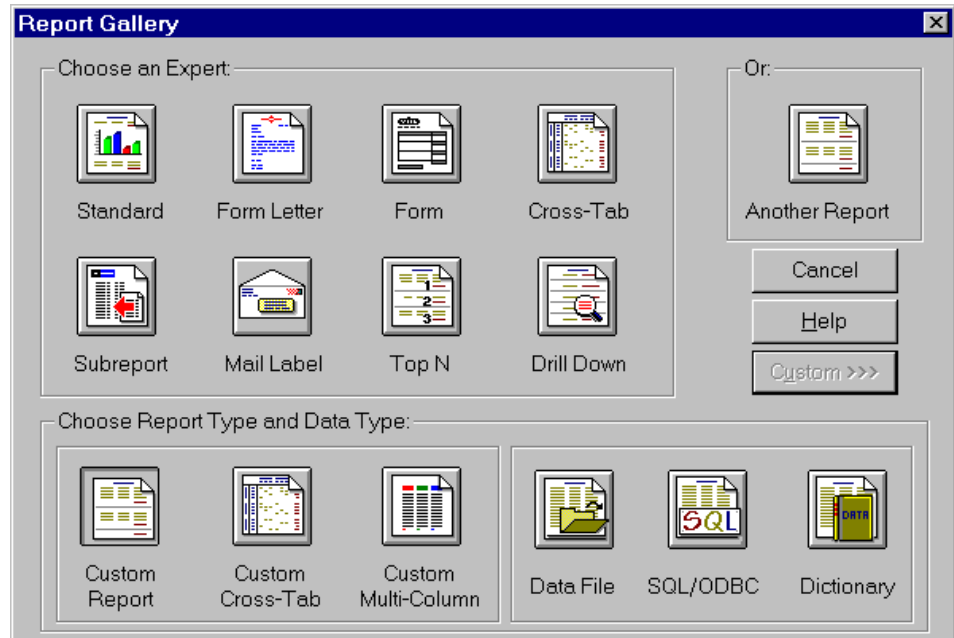
Your data should appear similar to above example.

Using Seagate Crystal Reports

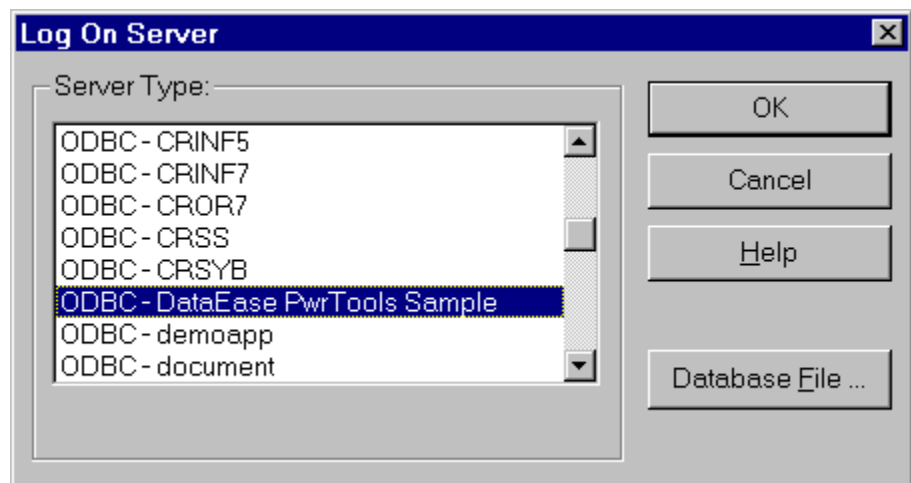
The following example shows how to use Seagate Crystal Reports to connect to a DataEase database.

Open Crystal Reports as you would normally.

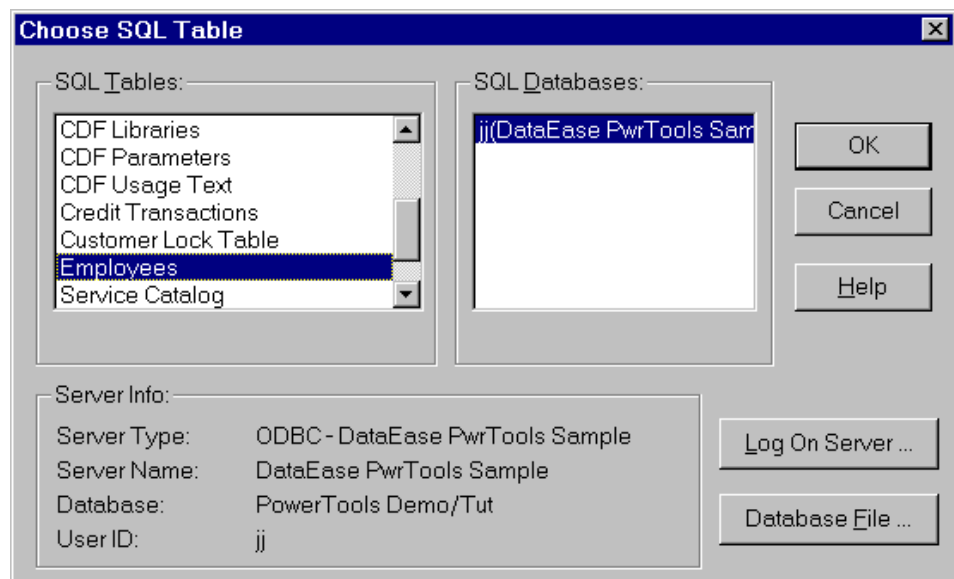
From the **Report Gallery**, click on **SQL/ODBC** icon.



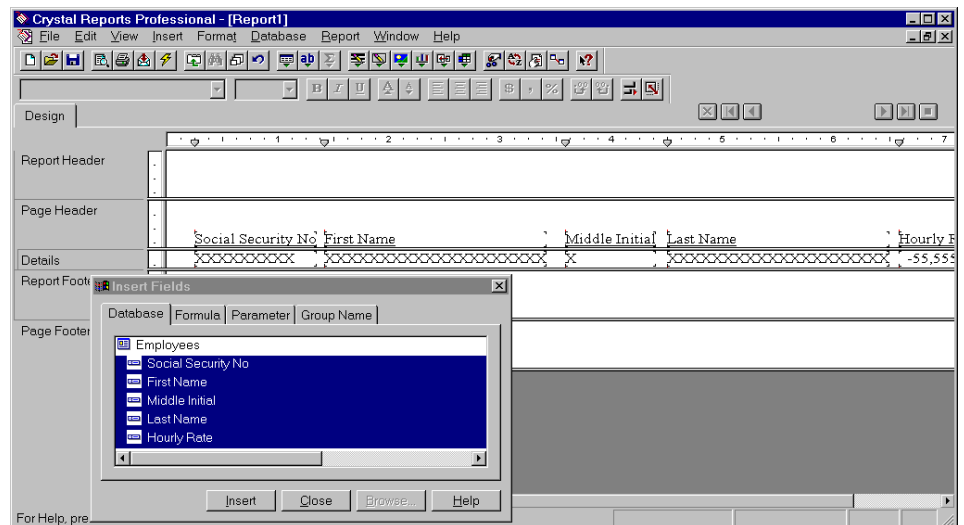
The **Log On Server** screen will appear.



Click on the ODBC Data Source for your DataEase database and then click on **OK**. The **Choose SQL Table** window appears.

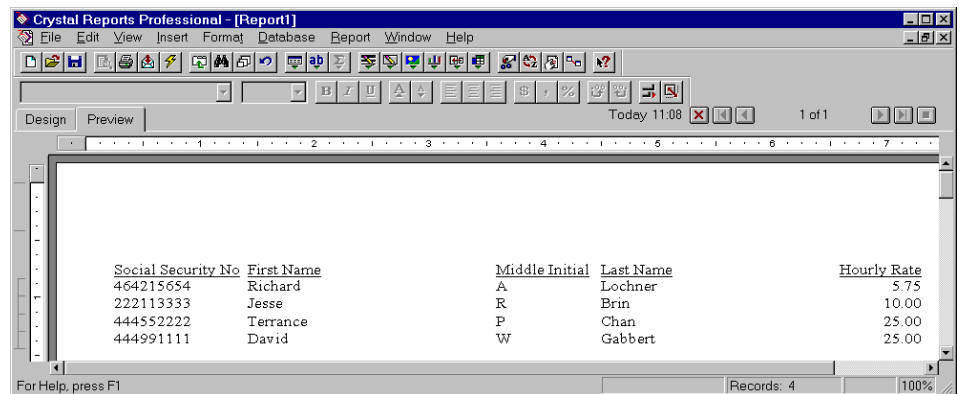


Under **SQL Tables**, click on the table or tables from the database that you wish to access and click the **OK** button. The **Insert fields** window will appear as shown below.



Click on the fields from the table that you want and then click the **Insert** button.

Finally, click on the lightning bolt to execute the design. You should get a Crystal report that looks similar to the following.



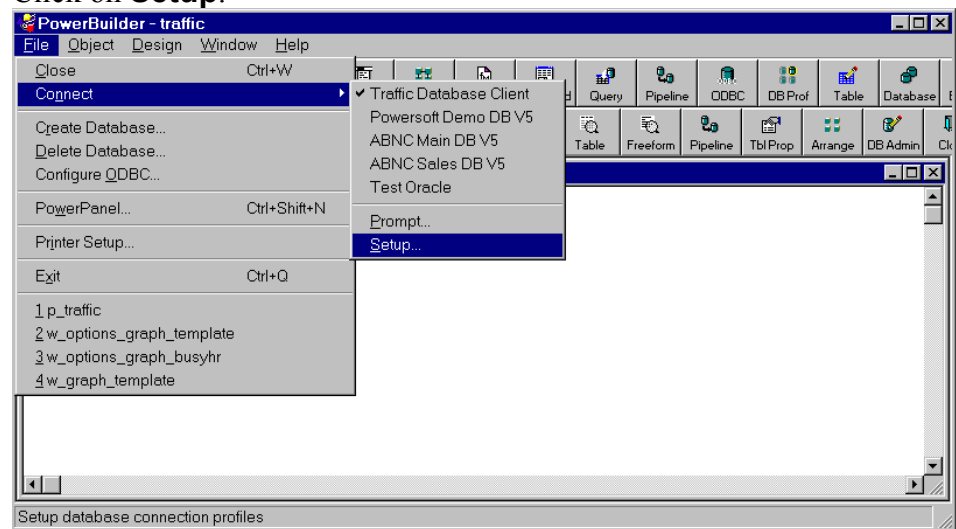
Using Powersoft Powerbuilder

The following example shows how to use Powersoft Powerbuilder to connect to a DataEase database.

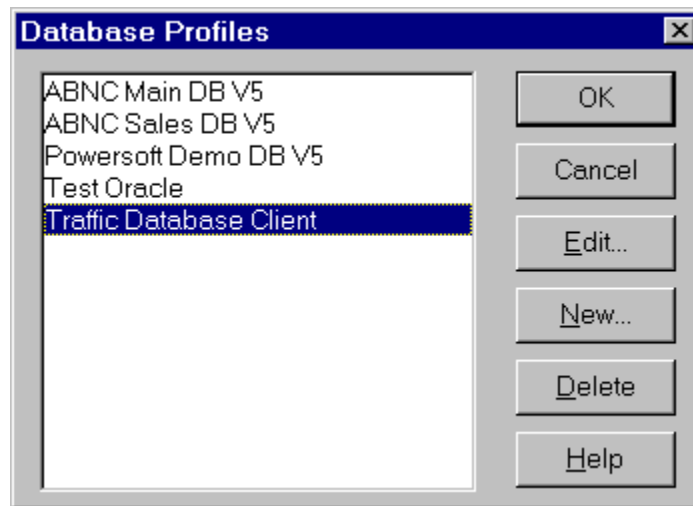
Open Powerbuilder as you would normally.

From the Powerbuilder toolbar, select the **Database** icon.

From the main menu, pull down the **File** menu selections. From the **File** menu, select **Connect**. Another selection list appears. Click on **Setup**.

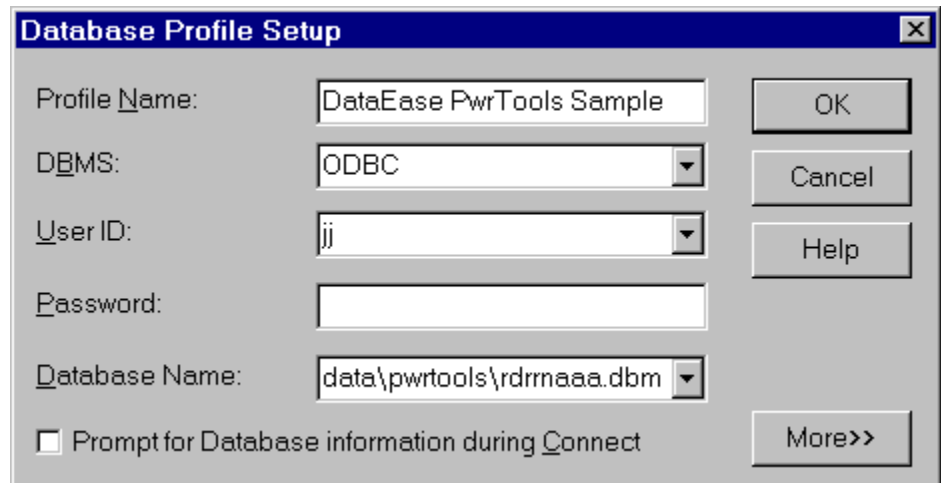


A dialog box, entitled **Database Profiles** will appear.



In the **Database Profiles** dialog box, click on the **New** button.

The **Database Profiles Setup** dialog box appears.



In the **Database Profiles Setup** dialog, type the appropriate information into the blank fields. The Database Name must contain a complete path and filename to your DataEase RDRR file.

When you have completed the data, click on **More**. An additional dialog box, entitled **CONNECT OPTIONS**, appears. See below.

Database Profile Setup

Profile Name: DataEase PwrTools Sample

DBMS: ODBC

User ID: jj

Password:

Database Name: f:\data\pwrtools\rdrnaaa.db

☐ Prompt for Database information during Connect

CONNECT OPTIONS

Server Name:

Login ID:

Login Password:

DBPARM: DelimitIdentifier="Yes"

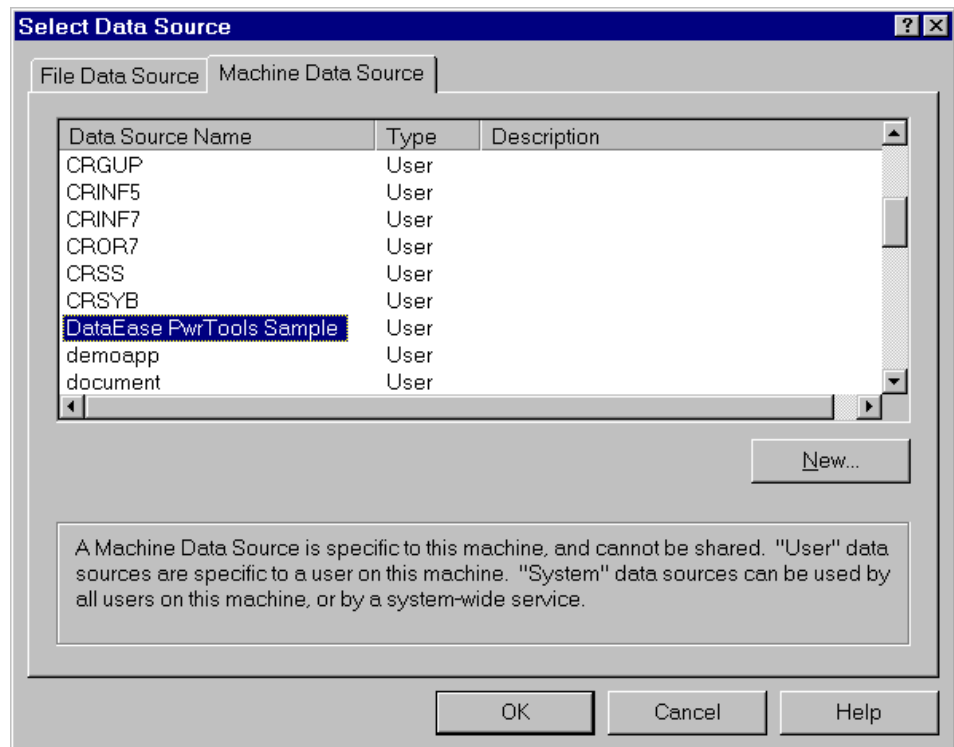
Isolation Level:

☐ AutoCommit Mode

OK Cancel Help

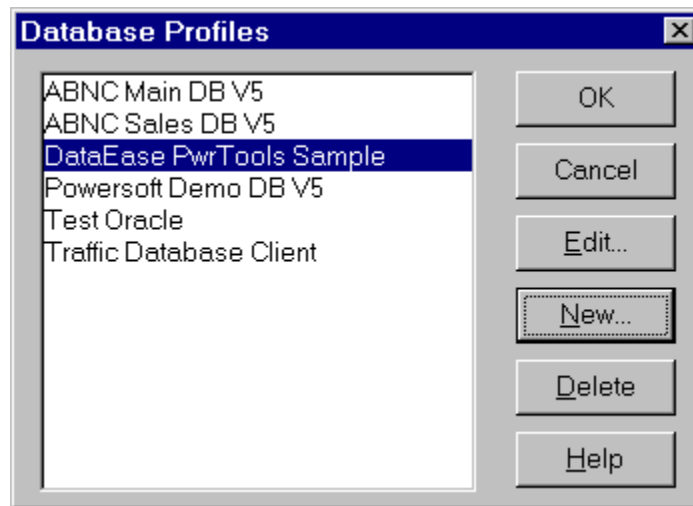
Type “DelimitIdentifier=’Yes’” into the **DBPARM** field, then click on **OK**.

The **Select Data Source** window appears.



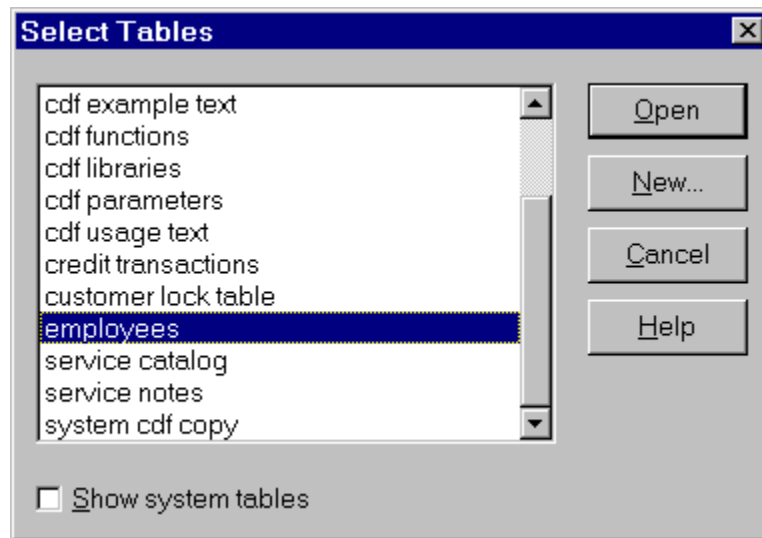
Select the **Machine Data Source** option. Scroll down to and select the DataEase data source you want. Then click on **OK**.

The **Database Profiles** dialog box appears.

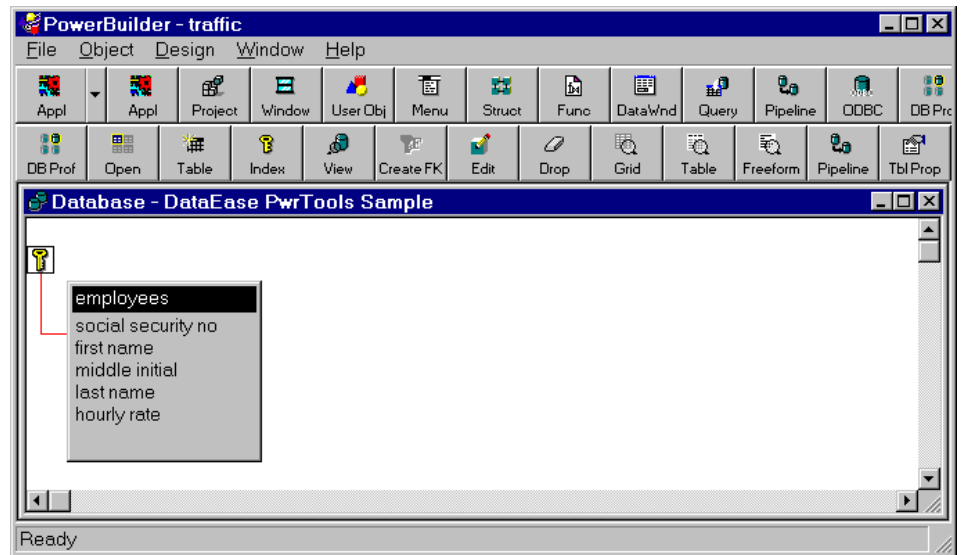


Click the **OK** button.

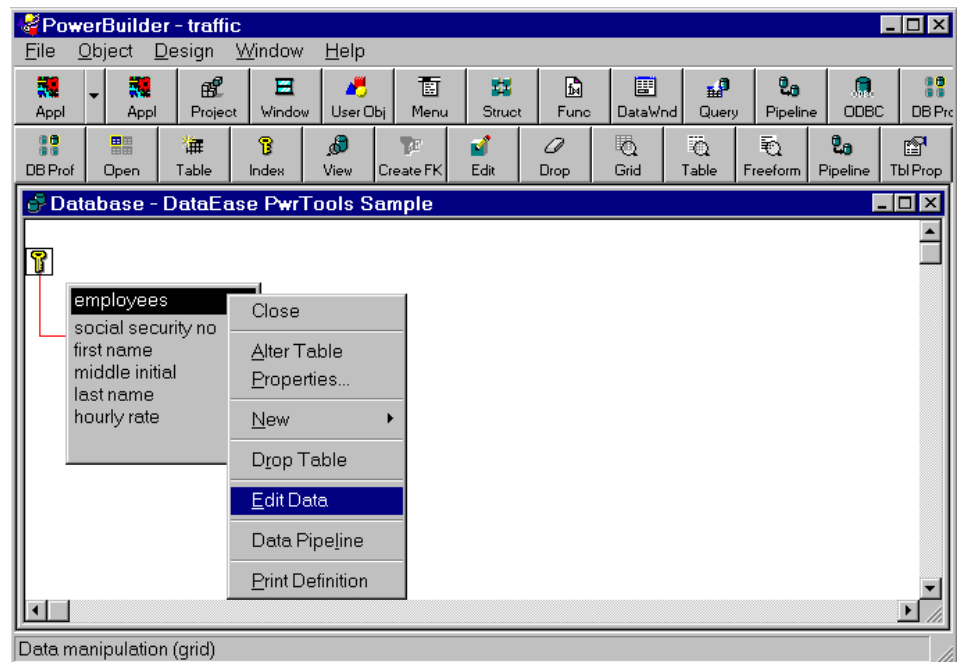
If there are no errors, then you have created a new database profile. Click **OK** to leave the **Database Profiles** dialog box. Powerbuilder will open your DataEase database as shown below.



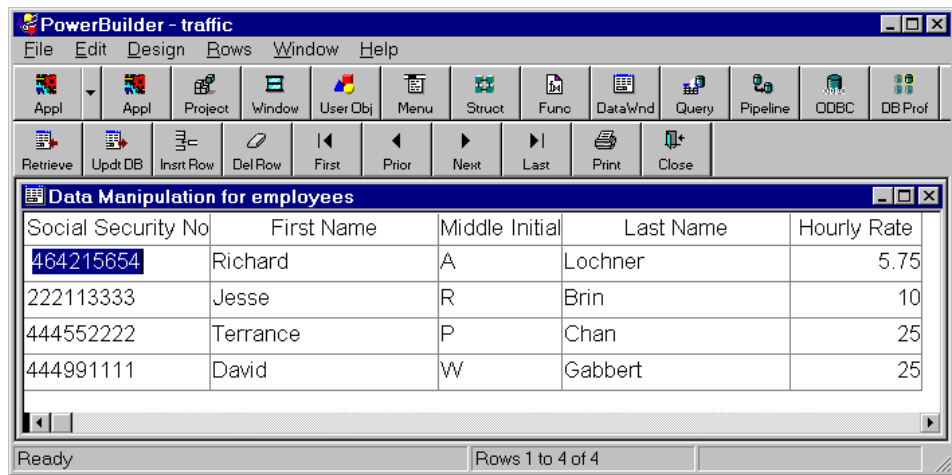
Scroll down to a table that you wish to access and click on **Open**. The following will appear.



Position the cursor over the highlighted table and use the right mouse button to display a pop-up menu.



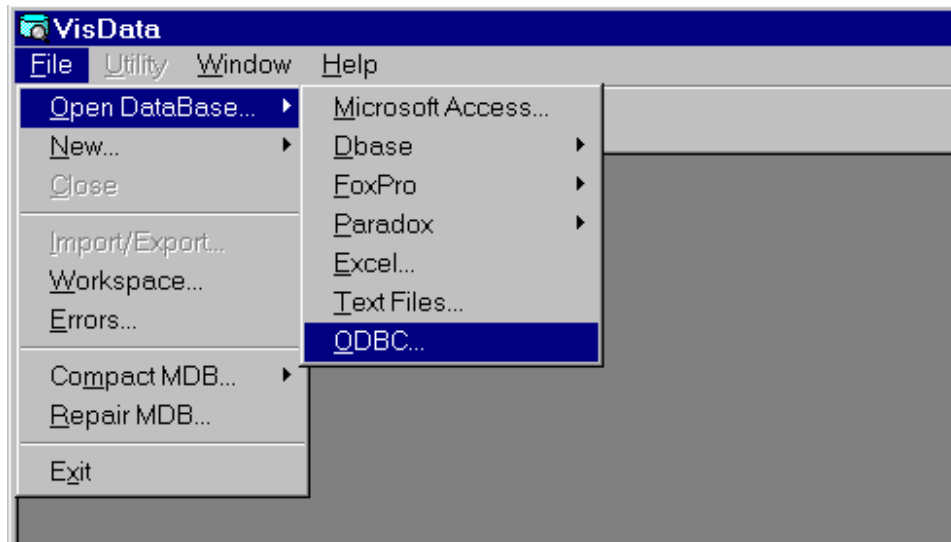
From the pop-up menu, select **Edit Data**. A grid view of the data in the table is displayed as in the example below.



Using Microsoft Visual Basic

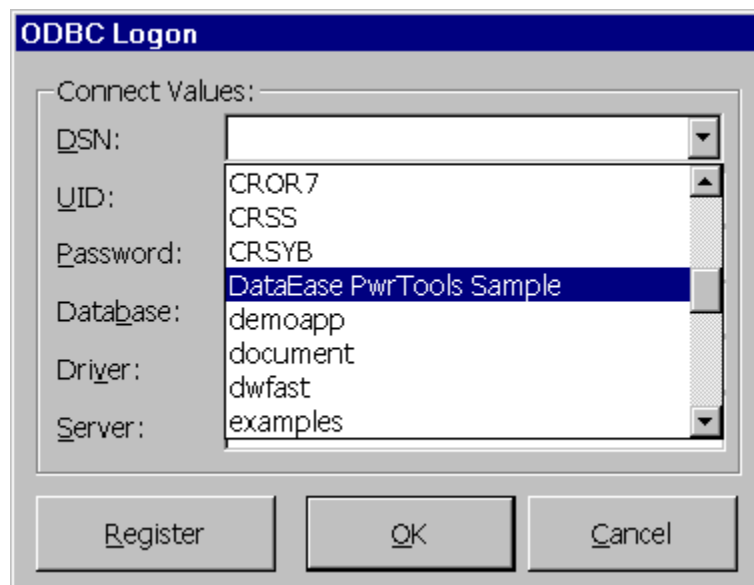
The following example shows how to use Microsoft Visual Basic to connect to a DataEase database.

Open Microsoft Visual Basic as you would normally.

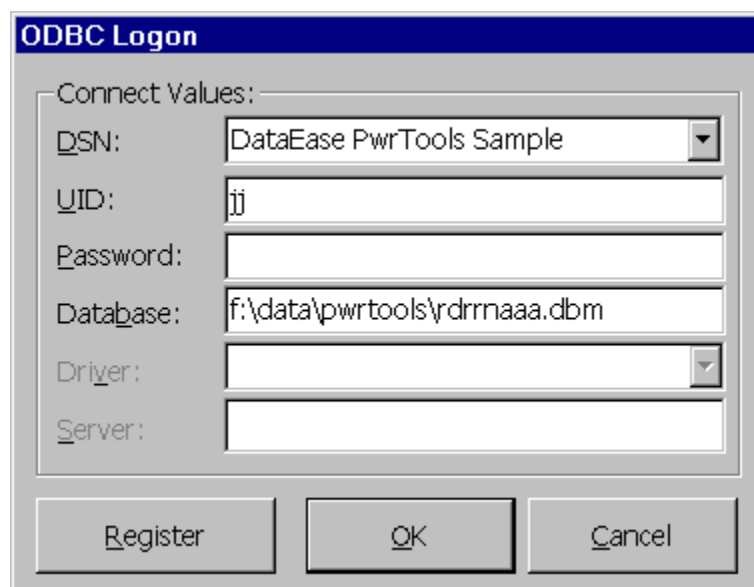


Select the **Visual Data Manager** choice from the **Add-Ins** menu.

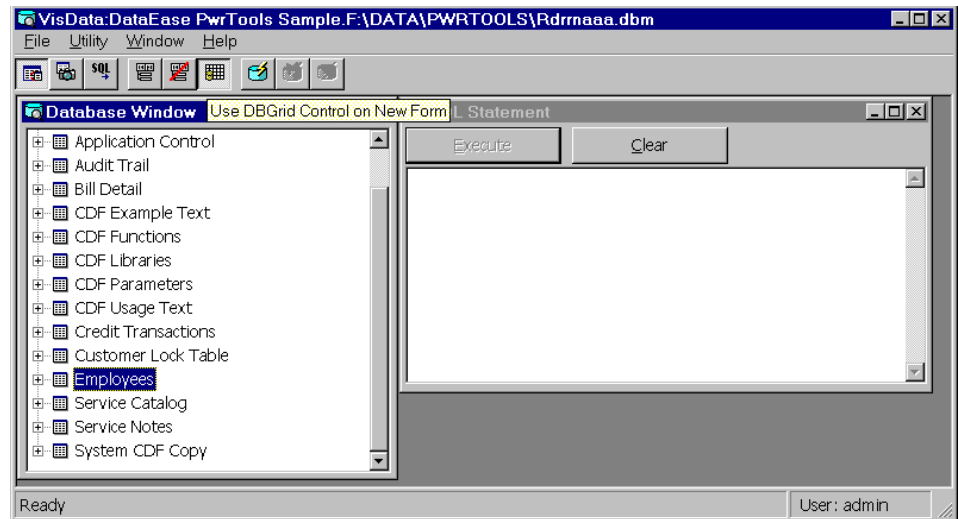
The **VisData** window will open.



Select the **ODBC** choice from the **Open Database** sub-menu of the **File** menu. The **ODBC Logon** screen will appear.



Scroll down to your DataEase data source and double-click on it to select it. The screen will reappear with connection values as shown above.



Click on **OK** to open the data source. The **VisData** screen will reappear with a list of available tables.

Dynaset:Employees

Refresh Sort Filter Close

Social Security No	First Name	Middle Initial	Last Name	Hourly Rate
464215654	Richard	A	Lochner	5.75
222113333	Jesse	R	Brin	10
444552222	Terrance	P	Chan	25
444991111	David	W	Gabbert	25
*				

Right Click for Data Control Properties

Click on the tool bar item “Use DBGrid Control on New Form”. Then double-click on a table to open it. The table will be opened in grid format as shown below.

You have now successfully connected to your data.

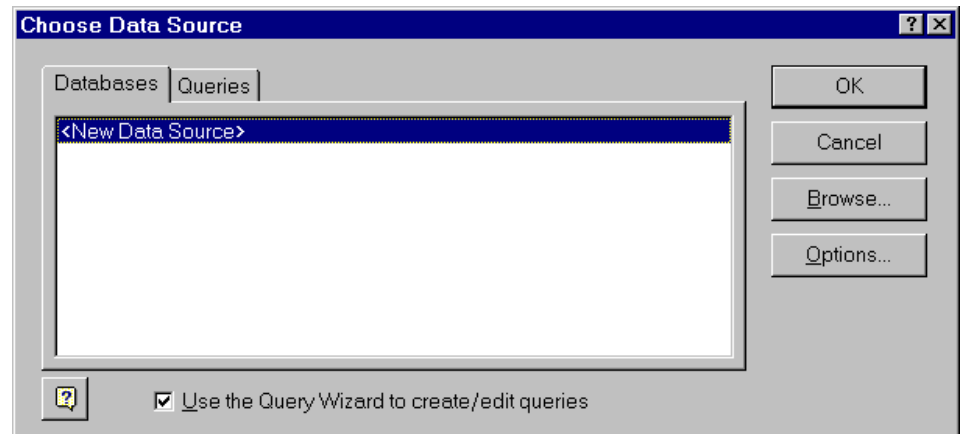
Using Microsoft Excel

The following example shows how to use Microsoft Excel to connect to a DataEase database.

Open Microsoft Excel as you would normally.

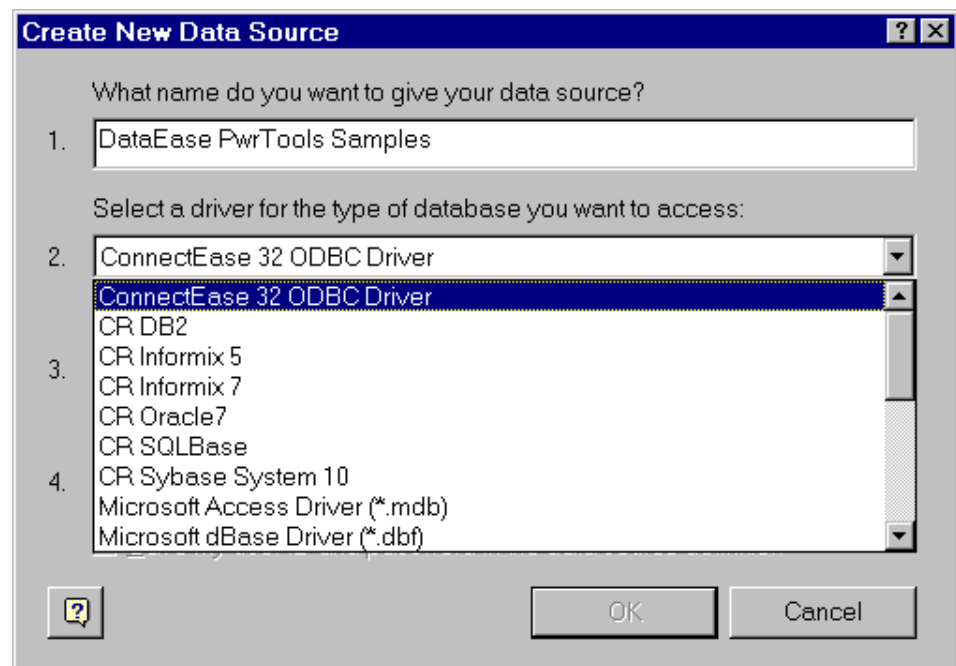
From the Excel main menu, pull down the **Data** menu selection. Select **Get External Data** from the **Data** menu selection. Another menu selection box appears. Select **Create New Query**.

The **Choose Data Source** dialog box appears.



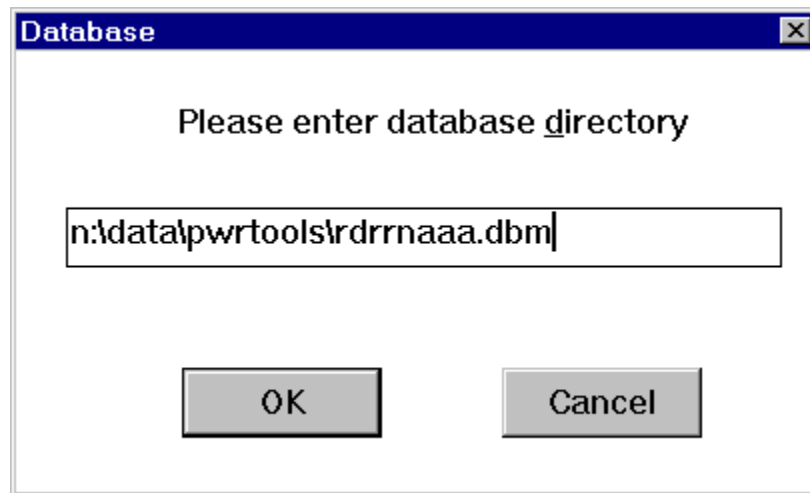
Click on **New Data Source** and then click the **OK** button.

The **Create New Data Source** dialog box appears.

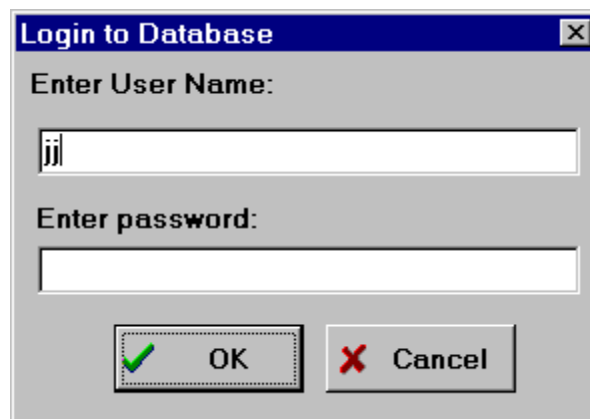


Type in the name for your new data source in field 1. Then, from the offered list, click on **ConnectEase ODBC Driver**.

Click on **Connect**. The following **Database** dialog box will appear.

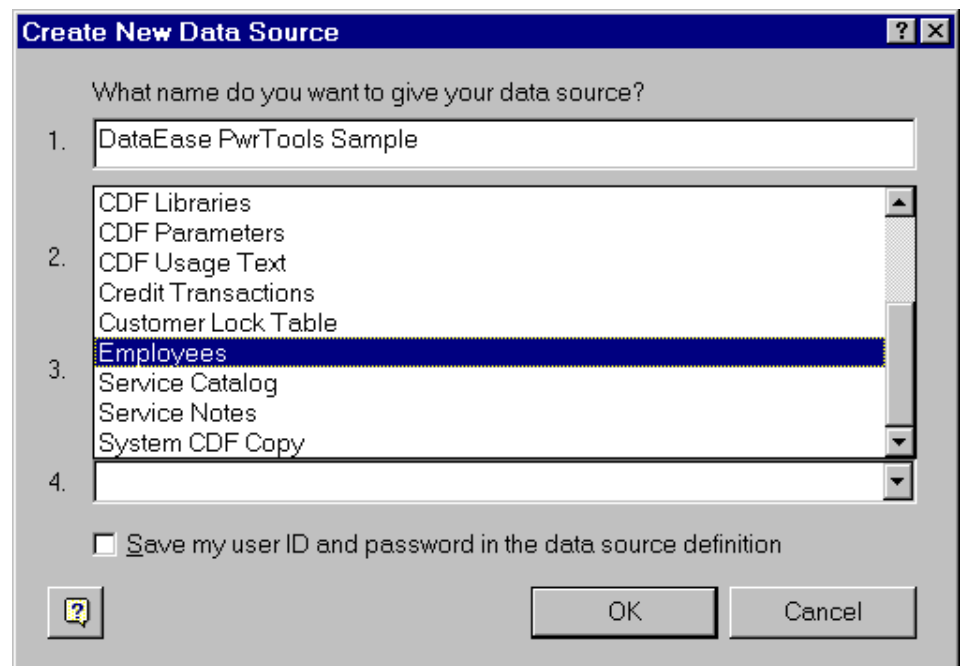


Type in the requested parameters. When done, click on **OK**. The **Login to Database** dialog box will appear next.

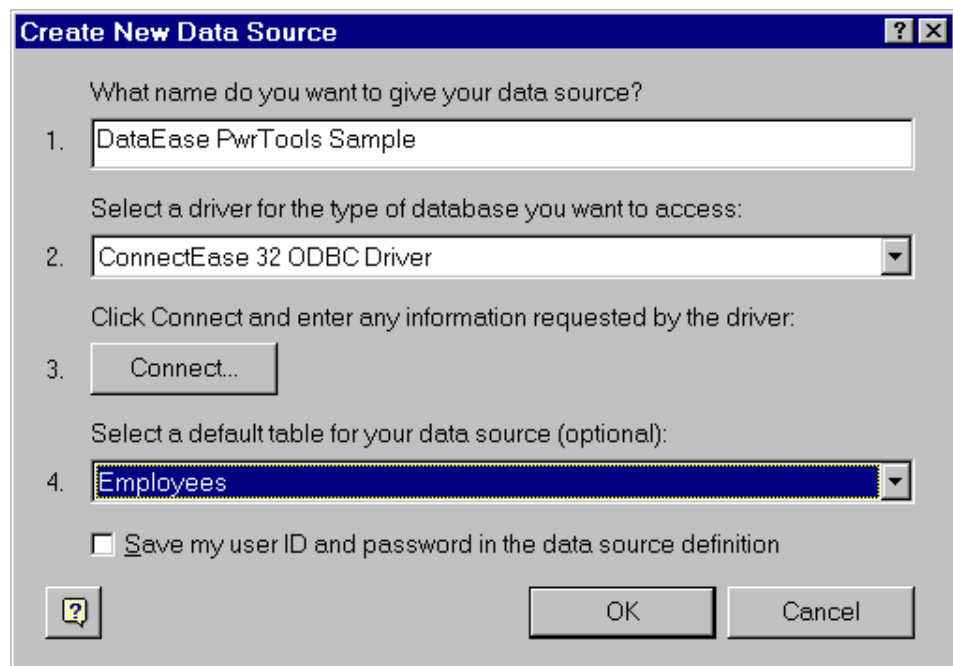


Fill in the **User Name** and **Password** fields, then click on **OK**.

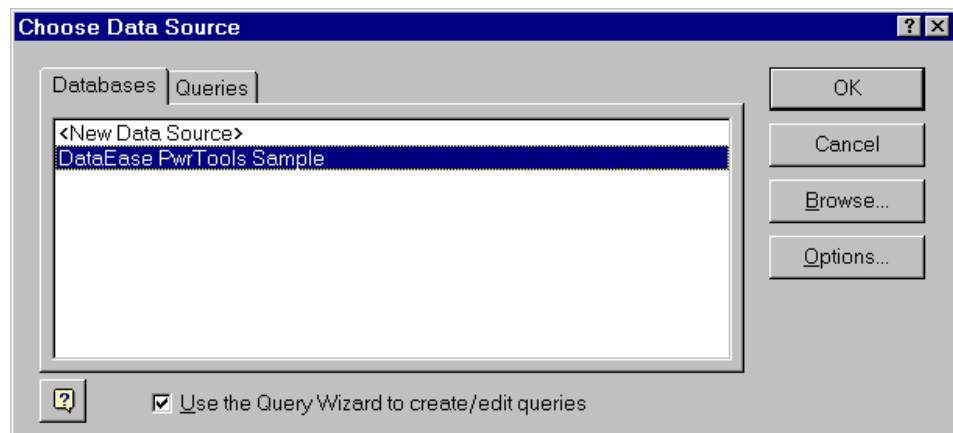
The **Create New Data Source** window appears. Double-click on the table that you want to access.



The **Create New Data Source** window changes to appear as the follows.

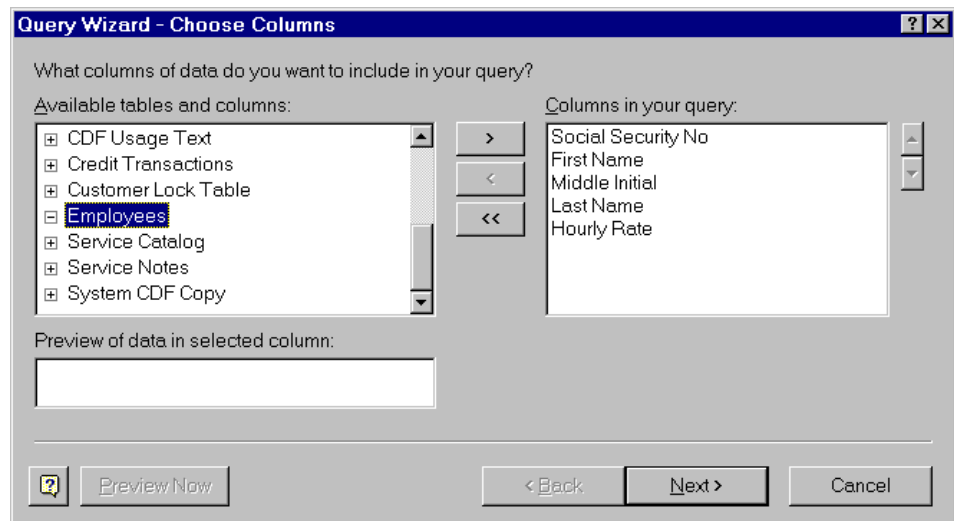


Select **OK**. The **Choose Data Source** window appears.



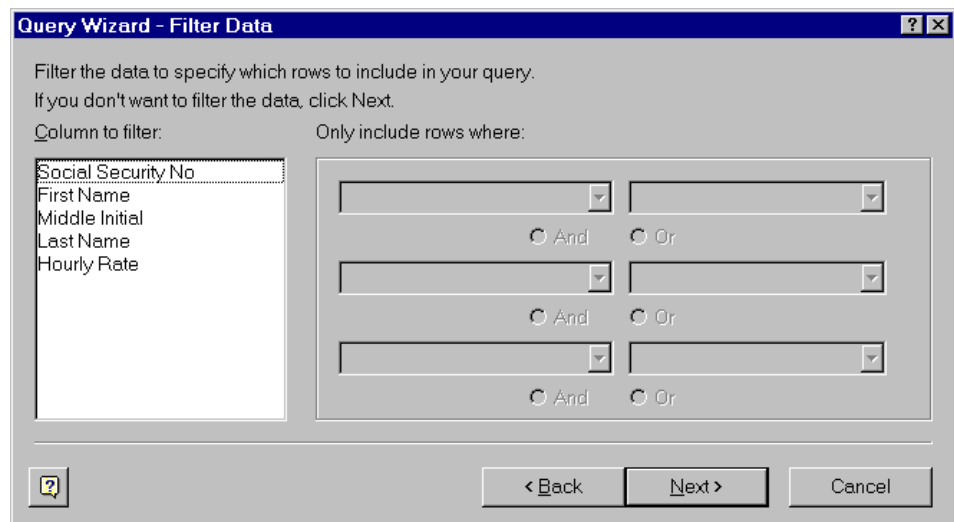
In the **Choose Data Source** selection window, click on the data source you just created. Press **OK**.

The **Query Wizard - Choose Columns** window appears.

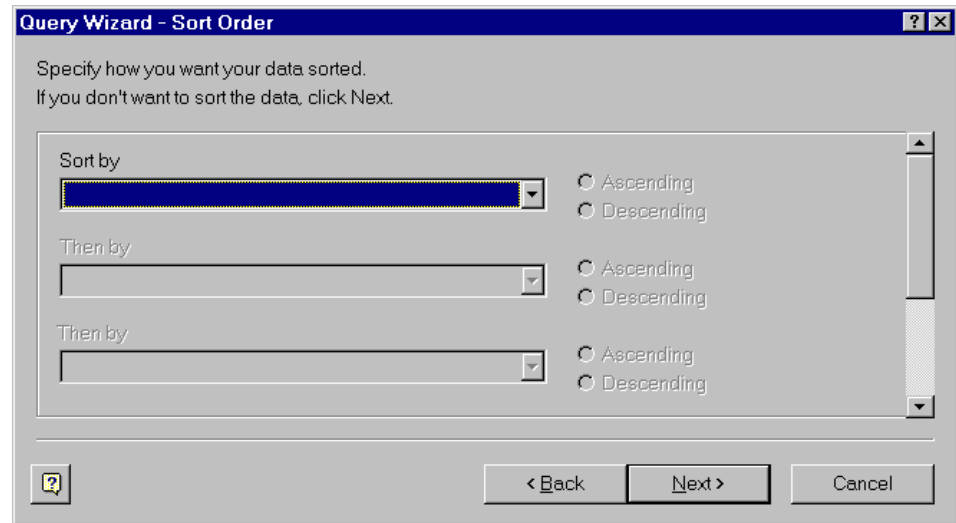


Double-click on the table that you want to access to open the list of available fields. Click on the fields that you want to select and then click on the ">" button to add the columns to the query. Then click the **Next** button.

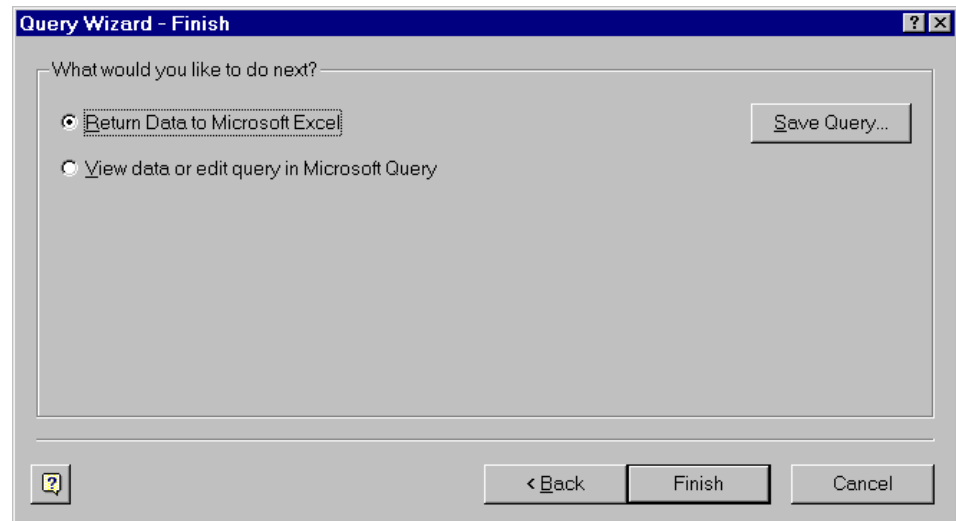
The **Query Wizard - Filter Data** window will open.



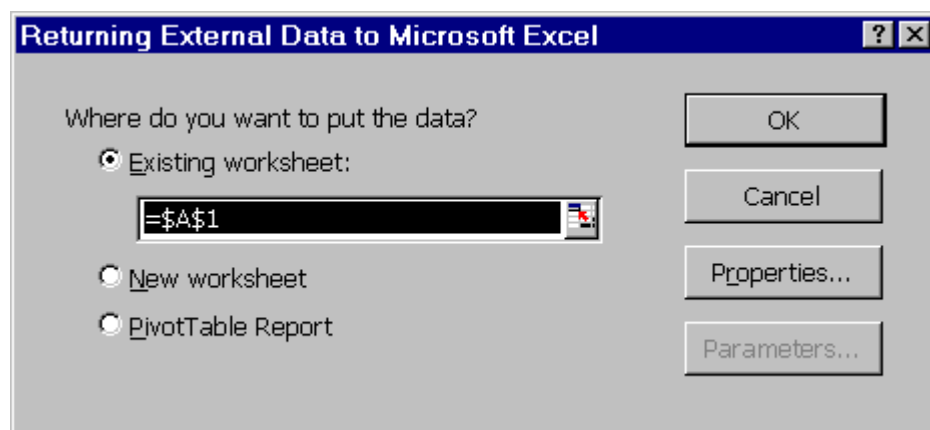
In this example, no filtering is necessary, so click on the **Next** button again. The **Query Wizard - Sort Order** window will appear.



No sorting is necessary in our example, so click on the **Next** button again. The **Query Wizard - Finish** will appear.



In the **Query Wizard - Finish** dialog box, click the **Finish** button to return to MS Excel. You will be returned to Excel to a place where the queried data is displayed. See below.



Product Support and Upgrades

Appendix 1

ConnectEase is a complete and powerful ODBC driver for DataEase databases. Lanimation Technology, Inc. is proud of the quality of the product and has spent a great deal of time and effort to make it easy to install and use. If, however, you are unable to make the product work to your satisfaction, or, if you encounter a problem while using ConnectEase, the following support alternatives are available for you.

Before You Contact Technical Support

Before you contact technical support, make sure you do the following:

- ◆ check the manual
- ◆ check the README.TXT file on the installation diskette
- ◆ check our Internet Web site (<http://www.ConnectEase.com>)

PLEASE HAVE THE FOLLOWING INFORMATION AVAILABLE:

- ◆ serial number
- ◆ product version number
- ◆ operating system you are using (e.g. Window 95)
- ◆ version of DataEase that you are using (e.g. 4.53)
- ◆ network information (e.g. Novell 4.1), if you are accessing a database on the network
- ◆ contents of your AUTOEXEC.BAT and CONFIG.SYS files
- ◆ a list of steps necessary to recreate the problem

Dealer Support

Lanimation Technology's dealer network is your first line of support for the product. Your dealer has been given extensive training on the product, has direct access to the development staff and should be able to provide you with immediate answers to your questions.

Internet Support

The latest information about ConnectEase is available to you 24-hours a day, seven-days a week on our Internet Web site. Product technical bulletins, tips, fixes, upgrades and other information is provided. You may also post a question or a problem report for our technical support staff. As soon as a technical support representative has had a chance to review your question or

problem, one of our technical support representatives will respond to you by return e-mail.

Our Internet Web address is:

<http://www.ConnectEase.com>

Product Return Policy

If you are not satisfied with ConnectEase for any reason, you can return it to the original place of purchase for a refund within 30 days of the purchase date.

Product Replacement Policy

If the ConnectEase media or documentation is defective, then please contact Lanimation Technology, Inc. within 30 days of the purchase date. You may then return the defective product to Lanimation Technology, Inc. for an immediate replacement.

Technical Support Line (214) 324-4778.

ODBC Initialization Files

Appendix 2

The Open Database Connectivity specification requires certain configuration and connection information in order to access a data source. This information is stored in an ODBC Initialization file. This initialization information is normally maintained by the ODBC Administrator program in the Windows Control Panel. See the chapter “Configuring ConnectEase” for information on how to use the ODBC Administrator program.

The format and structure of this initialization information is the same as defined by the Microsoft ODBC specification. This appendix describes the format of this data.

Environment-Specific Information

Windows 95/98 and Windows NT/2000/XP

The ODBC initialization information is stored in the system registry. The system registry is a database of information about your system and is updated by Windows and application programs. The ODBC information is normally maintained by the ODBC Administrator, however, it is possible to view or change the information with a registry editor, such as the REGEDIT.EXE program located in the Windows directory.

The ODBC initialization information is stored as a subkey of the key HKEY_CURRENT_USER. The hierarchy is HKEY_CURRENT_USER, Software, ODBC, ODBC.INI.

Each user has a distinct version of the HKEY_CURRENT_USER database, stored under a unique user key in the registry. Therefore, each user must run the ODBC Administrator to initialize and configure data sources in the registry.

ODBC Initialization Format

An INI file contains a [section] heading that is followed by optional attribute= value pairs, called entries. Both the section name and the attributes are case insensitive. Under Windows, comment lines begin with a semicolon (;).

The ODBC.INI format, as specified by the Microsoft Open Database Connectivity (ODBC) specification, is as follows:

```
[ODBC Data Sources]
source1=driver_desc1
source2=driver_desc2
. . .

[source1]
Driver=path/dll
Description=description
. . .

[source2]
Driver=path/dll
Description=description
. . .
```

Comments are not allowed.

The [ODBC Data Sources] section is mandatory. It provides the driver manager with a list of data sources that are supported for your connection requests. You can change the names in this list, but each entry must match its corresponding [*ds_name*] section in ODBC.INI.

The [*ds_name*] sections contain a **Driver=** specification, which points to the location of the installed driver, as well as a **Description=** specification that describes the driver. If you change the location of a driver, you can change the **Driver=** specification to match the new location. You can also use just the name of the driver, and the driver manager will attempt to locate the driver based on information obtained from your environment.

You might need to assign other entries depending on the data source you are configuring. The section "Using a Connection String" in the "Configuring ConnectEase" chapter lists the attributes that you can set. You should use the ODBC

Administrator program to modify ODBC.INI. This protects the file from becoming corrupted or nonfunctional.

ODBC.INI Example

The following example shows an ODBC.INI file as defined by the ODBC specification:

```
-----  
; WARNING: Do not make changes to this file without  
;          using the ODBC Control panel device or  
;          other utilities provided for maintaining  
;          data sources.  
;  
;          Incorrect changes to this file could  
;          prevent ODBC from operating or operating  
;          correctly.  
-----  
  
[ODBC Data Sources]  
DataEase Database=ConnectEase 16/1 ODBC Driver  
Powersoft Demo DB V5 IM=Sybase SQL Anywhere 5.0  
  
[DataEase Database]  
Driver=C:\WINDOWS\SYSTEM\ceodbc16.dll  
DBQ=N:\DATA\PWRTTOOLS\RDRRNTAAA.DBM  
UID=jj  
  
[Powersoft Demo DB V5 IM]  
Start=c:\winapps\SQLANY50\Win\dbeng50w.exe -d -c512  
Driver=c:\winapps\SQLANY50\Win\WOD50W.DLL  
PWD=sql  
UID=dba  
DatabaseName=PSDEMODB  
DatabaseFile=c:\pwrs\Pb5\Ex\Code\PSDEMODB.DB
```

Release Notes

Appendix 3

Please see <http://www.connectease.com/releasenotes> for the latest notes.

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