

Installation Guide for the application on the server

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## (GUIDE 2)

Lucid Exact Version 1.7-N and later

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## 1. Pre-installation notes

At this stage of the installation process for Lucid Exact for Networks, it is assumed that you already have an instance of Microsoft SQL Server available to host the database used by Lucid Exact.

#### About the LUCID database

The database is built from a SQL script create\_database.sql which, by default, is found in the folder \data\ off the application folder (\Lucid Exact Network\). When you first launch the Lucid Exact executable [ExactAdmin.exe], a database installer tool is launched and this will either build the EXACT database from the script file or create a file containing a 'connection string' if the database exists.

Normally, Lucid Exact expects the EXACT database to be on the same server as itself. Therefore the database files would be located in a sub-folder called 'Data' from: C:\Program Files\Microsoft SQL Server\ or C:\Program Files (x86)\Microsoft SQL Server\. The EXACT database is composed of the two files EXACT.mdf and EXACT log.ldf.

#### What if I want to house the EXACT database on a different server?

In this situation you need to build the database yourself using the script we provide. Find the script file called create\_database.sql which should be found in this location or similar:

C:\Program Files (x86) \LucidResearch \Lucid Exact Network \data \ Launch SQL Server Management Studio on the server where you want the EXACT database to be housed. Now load in the script file and execute it in the Studio.

When the Lucid Exact executable [ExactAdmin.exe] launches the database installer tool, the SQL Server instance where the EXACT database is located should be listed: You will be able to select it so that the tool can create a 'connection string' to the database.

#### Remember..

This is a thin client application, so you only install the Lucid Exact application once, onto a server, usually the same one where the SQL Server database engine is.

Multiple workstations (clients) will run the Lucid Exact application using a shortcut to the tests module on a share on the server. You need to create both the shortcut and the share.

There are either one or two small msi installations required on each client, missing these out will result in problems running the Lucid Exact software. Please see the next guide (GUIDE 3) which tells you how to set up each client machine to run Lucid Exact.

#### THE FILE POINTED TO BY THE SHORTCUTS

The Lucid Exact main executable is called [ExactAdmin.exe].

Although there is also an executable called **ExactTests.exe**, this file should NOT be launched from a shortcut as it is designed to run only from within the main executable.

# 2. Installing Lucid Exact application software on the server

#### **IMPORTANT!**

Please install Lucid Exact software on a locally attached disk (such as C:) and avoid using networked drives. The SQL Server database will not work on a networked drive.

- 1. Before you start deploying the software you should log on to the server with the *Administrator* account.
- 2. From the Lucid Exact CD's Start-up menu select the option 'Software Deployment Menu' and then select "*Install Lucid Exact application on your server*".

Ducid Exact Network - CD Startup Menu	×
Lucid <b>EXACT</b> Software Deploy	vment Menu
STEP 1 - Installing SQL Server 2008	SQL Server Native Client ADO Drivers
Install Microsoft SQL Server 2008 R2 Express Edition	Install 32 bit SQL Server Native Client 10.0
Weblink to SQL 2008 installation guide	Install 64 bit SQL Server Native Client 10.0
STEP 2 - Install Lucid Exact on server         Install Lucid Exact application on your server         Weblink to software installation guide (Guide 2)	Select to return to the Main Menu.
STEP 3 - Install Lucid Exact clients	
Install the Lucid Exact thin client software	
Weblink to client installation guide (Guide 3)	Back

3. Simply follow the installation instructions in the setup program which will be launched.

You will be asked where you wish to install the application - the default path is part of C:\Program Files\ or C:\Program Files (x86)\, but you can change this in the installer. Remember that the database needs to be housed on a fixed drive such as C: because SQL Server will not host databases on a network drive.

4. Once the installation has finished, the next step will be to attach the database.

## 3. Installing the database (server)

NOTE: Before you can proceed with installing the database please ensure you have already installed the SQL Server database engine with its SQL Server Management Studio Express tool) and configured it for use (see GUIDE 1).

Begin by launching the Lucid Exact main executable:

#### ExactAdmin.exe

The file is will be found in the Lucid Exact Network application folder, which you chose during installation (see Chapter 2).

After launching the executable you should be presented with the *Lucid Database Installer Tool* (below).

You need to choose the SQL Server Name (including instance name after the backslash if appropriate) and the ODBC driver.

If using SQL Server 2012 choose the driver: SQL Server Native Client 11.0 If using SQL Server 2008 choose the driver: SQL Server Native Client 10.0 If using SQL Server 2005 choose the driver: SQL Native Client

If you wish to use Windows Authentication for SQL Server, choose that option.

	Lucid Database Installer - Lucid Exact		
Please select your database, ODBC driver and authentication type from the lists below.			
Click I	Next to proceed or Cancel to Exit.		
Server Name:	GIMLI\LUCIDSQL12	¥	
ODBC Driver:	SQL Server Native Client 11.0	¥	
Authentication:	Windows Authentication	~	
SA Password:			
	Install		

If using SQL Server (Mixed Mode) Authentication please have the 'sa' administrator account password available as you need to enter it. Then click *Install* to proceed.

	Lucid Database Installer - Lucid Exact		
Please select your database, ODBC driver and authentication type from the lists below.			
Click	Next to proceed or Cancel to Exit.		
Server Name:	GIMLI\LUCIDSQL12	¥	
ODBC Driver:	SQL Server Native Client 11.0	¥	
Authentication:	SQL Server Authentication	~	
SA Password:	• • • • • • • •		
	Install Cancel		

Any feedback during installation will be shown in the text window. If the database has been installed already, the tool will detect this and leave it alone, simply creating the connection string file if necessary.

Click *Finish* and then re-launch the Lucid Exact application **ExactAdmin.exe**.

Lucid Database Installer - I	Lucid Exact		
Installing database. Please wait			
Saving connection_settings.dat file created. Database installation completed successfully.			
Click Finish to exit.		*	
<		>	
	Install	Finish	

If you think you may have incorrectly configured the *Database Installer Tool*, for instance, you get long error messages when running the Lucid Rapid Admin module, you can start again by manually deleting the file server\_configuration.dat in the folder called \Data off the application folder. This file contains an encrypted connection string used by the software to connect to the EXACT database. Then run Lucid Exact application ExactAdmin.exe and this will relaunch the database tool.

## 4. Registering Lucid Exact

When you have completed the steps in the previous chapter to attach the database, you can now register the software through the Administration Module. Launch it from a shortcut if you've already created one or by launching the executable file **ExactAdmin.exe** on the server.

First enter the Lucid Exact 'administrator login' password and select **Login**. The default administrator's password is always printed on the software CD face. It is usually: **lucid** 



You will then see the Registration panel as shown below.

Lucid EXACT for Networks - Adm	inistrator
Option Menu	
System Housekeeping Manual Exit Administrator	Please enter your registration details and click Register to active Lucid Exact.
Help and Tips	Administrator: Institution: Serial Number: Register
Ready	08 October 2009 13:52:50

Enter the administrator or teacher's name, the institution or school name and the serial number supplied, which is usually found in the DVD case in which the software arrived. Then click on 'Register' to complete the process.

Note that the serial number includes codes that determine how many workstations *Lucid EXACT* is allowed to run on simultaneously.

Please see also the *Lucid Exact Administrator's Manual* for further information about the software and how to use it.

## **5**.Troubleshooting

## 5.1 Database connectivity problems

There are several kinds of issues you may encounter if your Lucid application is not able to connect to its database.

Here are some things to check:

1. Try restarting the SQL Browser Service using SQL Server Configuration Manager.

a Sql Server Configuration Manager						. 🗆 🗙
File Action View Help						
SQL Server Configuration Manager (Local)	Name	State	Start Mode	Log On As	Process ID	Service Type
및 SQL Server Stewnces 및 SQL Server Network Configuration (32bit) ▷ 및 SQL Native Client 10.0 Configuration (32bit) ▲ 및 SQL Server Network Configuration 및 Protocols for SQLEXPRESS ▷ 및 SQL Native Client 10.0 Configuration	SQL Server (SQLEXPRESS) SQL Server Agent (SQLEXPRESS)	Running Stopped Running	Automatic Other (Boot, Syste Automatic	NT AUTHORITY\NETWORKSERVICE NT AUTHORITY\NETWORKSERVICE NT AUTHORITY\LOCALSERVICE	1440 0 1532	SQL Server SQL Agent
	•			1		- •

Right mouse click over the service and choose restart from the menu. (see example below).



#### 2. Add additional protocols

#### SQL Server 2012 Express



As an example, you may decide to enable 'Named Pipes' if this was previously disabled.

#### 3. Try manually adding a System DSN

If you cannot manually link to the database from a suitable remote workstation then that suggests a problem with a firewall or services not running. Here's how to attempt to create a System DSN.

#### Vista

Using Control Panel > Administrative Tools > Data Sources (ODBC)

#### Windows 7 & 8

Control Panel > search for ODBC > Set up ODBC data sources

- 1. Select System DSN and then Add
- 2. Choose the most suitable ADO driver

For SQL Server 2005 this will be **SQL Native Client** For SQL Server 2008 this will be **SQL Server Native client 10.0** For SQL Server 2012 this will be **SQL Server Native client 11.0** 

Create New Data Source			
Select a driver for which you want to set up a data source			
	Name	Version	Com
	SQL Server	6.03.9600.16384	Micro
011 0	SQL Server Native Client 10.0	2009.100.4000.00	Micro
	SQL Server Native Client 11.0	2011.110.3000.00	Micro
	<		>
	< Back	Finish Ca	ncel

3. Give the DSN a name, optional description and choose the Server\Instance.

	Create a New Data Source to SQL Server	×		
This wizard will help you create an ODBC data source that you can use to connect to SQL Server. What name do you want to use to refer to the data source?				
	Name: TEST			
	How do you want to describe the data source?			
	Description: test only	]		
	Which SQL Server do you want to connect to?			
	Server: GIMLI\LUCIDSQL12			
		_		
	Finish         Next >         Cancel         Help			

4. Choose the SQL Server authentication and enter the account name and password. By default these are **ExactUser** and **ZX\_123\_abZ** respectively.

	Create a New Data So	urce to SQL Server
1 Alexandre	How should SQL Server verify the	ne authenticity of the login ID?
SQL Server 2012	<b>With Integrated Windows</b> SPN (Optional):	authentication.
	With SQL Server authent user.	ication using a login ID and password entered by the
	Login ID:	ExactUser
	Password:	•••••
	< Back	Next > Cancel Help

5. Move on and ensure default database is 'Exact'

	Create a New Data Source to SQL Server	×
8	Change the default database to:	
Monada	EXACT	~
SQL Server 2012	Mirror server:	_
	SPN for mirror server (Optional):	
	Attach database filename:	
	Use ANSI quoted identifiers.	
	Application intent:	
Personal Contractor	READWRITE	~
	Multi-subnet failover.	
	< Back Next > Cancel Help	

6. At the next screen select Finish.

	Create a New Data Source to SQL Server	×
	Change the language of SQL Server system messages to: (Default)	~
5925617612012	Use strong encryption for data <ul> <li>Perform translation for character data</li> </ul>	
	Use regional settings when outputting currency, numbers, dates and times.	
	Save long running queries to the log file:	
	C:\Users\rik\AppData\Local\Temp\QUERY.LOG Browse	
	Long query time (milliseconds): 30000	
	Log ODBC driver statistics to the log file:	
	C:\Users\rik\AppData\Local\Temp\STATS.LOG Browse	
	< Back Finish Cancel Help	

7. You should finally see the Test Data Source screen which should give a 'Test Successful' message upon clicking on the large button if the SQL database is visible to the network and the Login is working.

A new ODBC data source will be created with the following con	figuration:
Microsoft SQL Server Native Client Version 11.00.3000	^
Data Source Name: TEST Data Source Description: test only Server: GIMLI\LUCIDSQL12 Use Integrated Security: No Database: EXACT Language: (Default) Data Encryption: No Trust Server Certificate: No Multiple Active Result Sets(MARS): No Mimor Server: Translate Character Data: Yes Log Long Running Queries: No Log Driver Statistics: No Use Regional Settings: No Use ANSI Quoted Identifiers: Yes Use ANSI Null, Paddings and Warnings: Yes	
Test Data Surger	Consul

### 5.2 Firewalls

Please check for firewalls on the client machines and server. Check for ports being blocked by the firewall or a router (e.g. TCP Port 1433). See the link below:

http://technet.microsoft.com/en-us/library/cc646023.aspx