

Configure TLS 1.2 (Transport Layer Security)

In line with industry security recommendations the erwin CW products now support Transport Layer Security version 1.2. This security layer is a low level network encryption protocol which can optionally be used between applications and MS SQL Server. Many large organizations have been disabling TLS1.0 and TLS1.1 in favor of the newer TLS1.2, as it has certain improvements that make it less susceptible to security vulnerabilities.

In order to configure erwin EA/BP for TLS1.2 there are some steps required that go beyond a simple install. This document will guide you through these steps.

1. Run the following Microsoft Installer "sqlncli.msi" which can be obtained from here <https://www.microsoft.com/en-us/download/details.aspx?id=50402>



sqlncli.msi

for either x64 (64bit) or x86 (32bit) - as is appropriate to your environment.

2. Set the following Entries in the registry. These can be copied into a file that is given the extension .reg and then run in windows, or downloaded with your erwin software. Most of the entries are to disable TLS 1.0 and TLS1.1, then enable TLS1.2. The final entry is to configure erwin EA/BP to use the correct SQL Server client.



ServerTLS.reg

Windows Registry Editor Version 5.00

```
[HKEY_LOCAL_MACHINE\SYSTEM\CurrentControlSet\Control\SecurityProviders\SCHANNEL\Protocols]
```

```
[HKEY_LOCAL_MACHINE\SYSTEM\CurrentControlSet\Control\SecurityProviders\SCHANNEL\Protocols\SSL 2.0]
```

```
[HKEY_LOCAL_MACHINE\SYSTEM\CurrentControlSet\Control\SecurityProviders\SCHANNEL\Protocols\SSL 2.0\Client]
```

```
"DisabledByDefault"=dword:00000001
```

```
[HKEY_LOCAL_MACHINE\SYSTEM\CurrentControlSet\Control\SecurityProviders\SCHANNEL\Protocols\TLS 1.0]
```

```
[HKEY_LOCAL_MACHINE\SYSTEM\CurrentControlSet\Control\SecurityProviders\SCHANNEL\Protocols\TLS 1.0\Server]
```

```
"Enabled"=dword:00000000
```

```
[HKEY_LOCAL_MACHINE\SYSTEM\CurrentControlSet\Control\SecurityProviders\SCHANNEL\Protocols\TLS 1.1]
```

```
[HKEY_LOCAL_MACHINE\SYSTEM\CurrentControlSet\Control\SecurityProviders\SCHANNEL\Protocols\TLS 1.1\Client]
```

```
"DisabledByDefault"=dword:00000000
```

```
[HKEY_LOCAL_MACHINE\SYSTEM\CurrentControlSet\Control\SecurityProviders\SCHANNEL\Protocols\TLS 1.1\Server]
```

```
"DisabledByDefault"=dword:00000000
```

```
[HKEY_LOCAL_MACHINE\SYSTEM\CurrentControlSet\Control\SecurityProviders\SCHANNEL\Protocols\TLS 1.2]
```

```
[HKEY_LOCAL_MACHINE\SYSTEM\CurrentControlSet\Control\SecurityProviders\SCHANNEL\Protocols\TLS 1.2\Client]
```

```
"DisabledByDefault"=dword:00000000
```

```
"Enabled"=dword:00000001
```

```
[HKEY_LOCAL_MACHINE\SYSTEM\CurrentControlSet\Control\SecurityProviders\SCHANNEL\Protocols\TLS 1.2\Server]
```

```
"DisabledByDefault"=dword:00000000
```

```
"Enabled"=dword:00000001
```

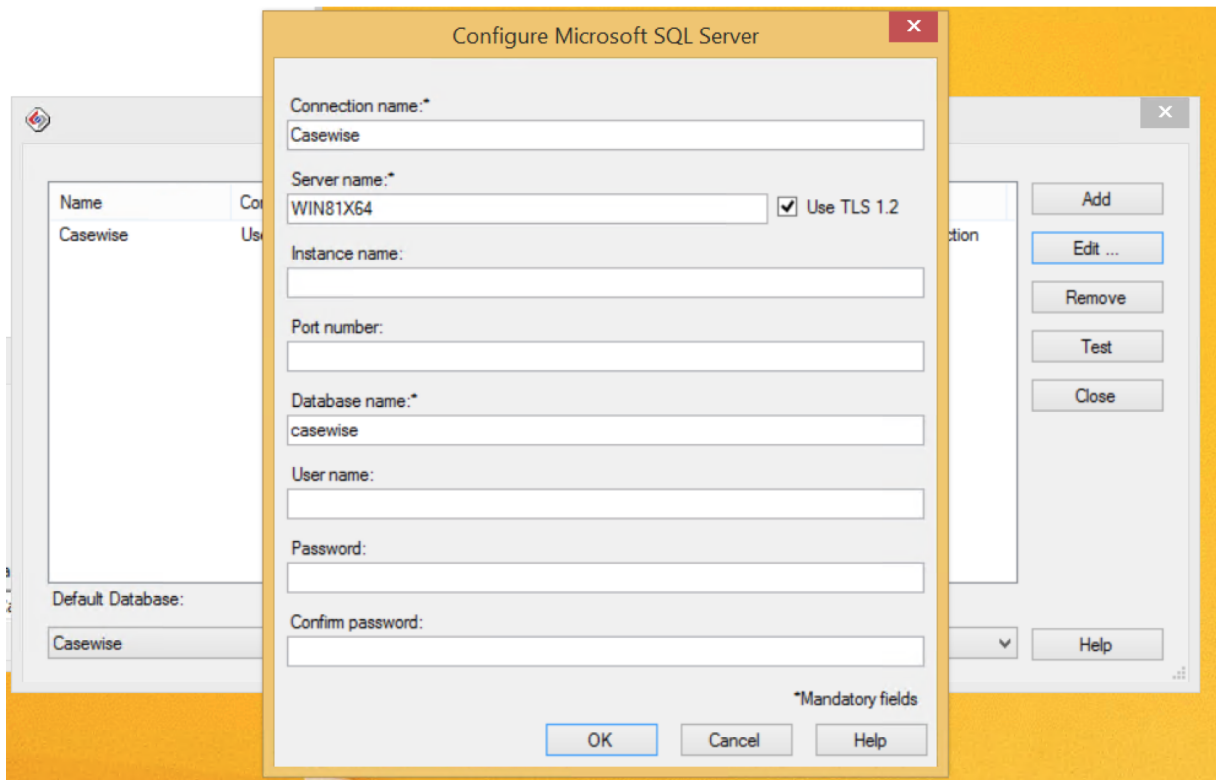
```
[HKEY_LOCAL_MACHINE\SOFTWARE\Wow6432Node\Casewise\CorporateModeler\11\Tuning]
```

```
"UseSQLServerNativeClient"="true"
```



After changing the registry settings, it may be necessary to reboot your machine.

- Once this has completed, start "erwin EA/BP Modeler" and when the logon dialog appears click the "Edit" button.
This will display all the available connections.
- Click on the connection you want to use and "Edit" it.
- Next to the server name there will be a check box to enable the use of TLS1.2.
Check this box and press "OK" to close the dialogs.



- Having made these changes the erwin EA/BP applications should run as normal.

Troubleshooting:

On some operating systems this additional msi file may also be required to get the application to run successfully

Run the following Microsoft Installer "*msoledbsql_18.1.0.0_x64.msi*" which can be obtained from here

<https://www.microsoft.com/en-us/download/details.aspx?id=56730>



msoledbsql_18.1.0.0_
x64.msi