

# Using Connection Keep-Alive

Databases can be configured to terminate sessions that have been idle for some time, and networks often does the same with TCP/IP connection. The **Connection Keep-Alive** feature helps preventing connections to be closed due to time-outs of this kind by periodically executing a simple SELECT statement.

Network connections may be terminated for other reasons than a time-out in the database or at the network layer, e.g due to a restart of the database or a network element. The Connection Keep-Alive feature does not help in those cases. Also note that connections that are busy, e.g. actively used to run a script, are not "pinged". If a SELECT statement or stored procedure takes a very long time to complete, it is therefore possible that a time-out happens at the network level. In this case, the network configuration must be tuned to handle long running statements without timing out.

To enable Keep-Alive for a connection:

1. Open the **Object View** tab for the connection,
2. Open its **Properties** tab,
3. Select the **Physical Connection** category,
4. Modify or enter a simple SQL statement in the **Validation and Keep-Alive SQL** field, if needed (see note below),
5. Enable **Connection Keep-Alive** and optionally change the idle time interval,
6. Click the **Apply** button.

The SELECT statement used for Connection Keep-Alive can also be specified in the properties pane. For supported databases, it is set to a SELECT statement that has been verified to work for the database type but for connections that use the Generic profile, you must specify a valid SELECT statement in order for this feature to work. For many databases, `SELECT 1` or `SELECT 1 FROM aSmallTable WHERE 1 = 0` should work.