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# How to Set up a Local Training Database for AI Studio

This tutorial is meant for users learning RapidMiner who want to learn and test the database functionality in AI Studio without having access to an external database.

AI Studio is equipped with a database engine called HyperSQL or HSQLDB. No other software is required, and it is not necessary to change any network settings either.

## Creating a Database Connection Entry

Database connections in AI Studio are entries in the "Connections" top-level folder of a repository or project. To create your first connection, open your Local Repository and right-click on Connections. Select "Create Connection".

A new dialog opens. The Connection Type is Database, the Repository is Local Repository (or the repository or project you selected). Enter a Connection Name, for example TrainingResourcesDB. Click "Create".

In the Setup tab, in the Database system list, select "HSQLDB Server". Enter the user name "SA" and no password.

In some versions of Studio you will only see the "Custom" selection in the Database system list. In this case switch to the Driver page and use the folder navigation button of "JDBC driver jar file". Select your RapidMiner Studio installation folder and find lib/jdbc inside that path. You will find hsqldb-2.3.1.jar or similar there. Then switch back to the Setup page.

Select "Configure URL manually" and find a path where you want to store your database. The file name for the database can be freely specified, e. g. C:\Users\yourname\RMTrainingResourcesDB or ~/RMTrainingResourcesDB with ~ referring to the user's home folder.

Enter the following database connection URL below "Configure URL manually":
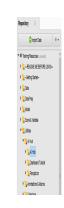
jdbc:hsqldb:file:<filePath>

Instead of <filePath> enter the path and filename you chose.

Test the connection using the "Test connection" button. The test should be successful; if not, check the settings.

## Executing the Training Resources Database Example Processes



Now you can navigate to the Training Resources repository and open Utilities/AI Hub.

You'll probably want to save your changes to the tutorial processes, so it's helpful to save them into the Local Repository. Right-click on the AI Hub folder inside the main Utilities/AI Hub path, select Copy, navigate to Local Repository, right-click on a folder, and select Paste. The AI Hub tutorial processes and data will be copied to your local repository and you can start working with them.

The first step is AI Hub/--READ ME--/Setup database. This process puts some prepared data into the configured database. Click on the Execute SQL (middle column) and Update Database (right column) operators one by one, set "define connection" to "repository" and navigate to the database connection entry created in the first step. Repeat this for the other operators.

Now you will be able to execute the process. It will run for a short while and write the tutorial data into the new database.

After executing "Setup database" you can change to the other examples in the "1 Database" folder. Remember to change the database connection in each operator that accesses the database.

## Outlook

This technique is available beyond the tutorials and training resources. HyperSQL is a useful database system for single users. You might want to store your data centrally in a database instead of keeping them in single CSV files, for example, or decide to learn and experiment with the full power of SQL databases on your own computer – even on the network with your colleagues as described in the documentation. While HyperSQL is not a replacement for enterprise database systems, it can be used for reasonable data sizes

the [documentation](). While HyperSQL is not a replacement for enterprise database systems, it can be used for reasonable data sizes in a small team.