



## MAINTABLE

### SPECIFICATIONS FOR THE USAGE OF MAINTABLE WITH RELATIONAL DATABASES

MainTable is a software for table maintenance especially for mainframe, which can be used in the decentralized world as well.

MainTable can be used with relational databases under the operating systems z/OS, Linux, Windows, Solaris and AIX. It supports the following relational databases as data sources: DB2, Oracle, MySQL, PostgreSQL, Informix, Progress.

The following restrictions have to be considered when using MainTable with relational databases:

#### DATABASE CONNECTION – MAINFRAME

- Under z/OS, there is no ODBC Driver Manager available. On this platform, DB2 can directly be connected to MainTable (by using CAF or DB2-CLI).
- Other relational databases than DB2 are not supported under z/OS.

#### DATABASE CONNECTION – NON-MAINFRAME

##### ODBC Driver Manager

- Only one driver manager can be used which has to support all databases.
- Under Unix and Linux, MainTable currently only supports the open source driver manager unixODBC
- Under Windows, MainTable supports only the driver manager of the Windows system.

## ODBC Driver

MainTable supports only ODBC drivers which may be run in single byte mode (the so-called "ANSI Driver"). For the following databases, such drivers are available or the available driver can be configured accordingly. MainTable has been tested with the ODBC drivers mentioned below.

- Oracle: driver: „Oracle Instant Client“, operating systems: Windows, Linux, Unix, driver manager Linux/Unix: unixODBC
- DB2: driver: „DB2 Connect“, „DB2 Advanced Enterprise Server Edition“, operating systems: Windows, Linux, Unix, operating systems RDB Server: Windows, Linux, Unix, driver manager Linux/Unix: unixODBC
- Informix: driver: „Informix Dynamic Server“, operating systems: Windows, Linux, Unix, driver manager Linux/Unix: unixODBC
- MySQL: driver: component „Connector/ODBC“ of the MySQL Community Edition, operating systems: Windows, Linux, Unix, driver manager Linux/Unix: unixODBC
- PostgreSQL: driver: „psqlodbc“, operating systems: Windows, Linux, Unix, driver manager Linux/Unix: unixODBC
- MSSQL: driver: „SQL Server“ (non Native Client), operating system and driver manager: Windows

Is your combination of database, driver manager and ODBC driver not included in the list? Please contact us!

## DATABASE

- The relational database must not be defined in Unicode.
- The relational database has to use one of the following codepages:
  - ASCII: ISO8859-1, ISO8859-15, Windows-1252
  - EBCDIC: Cp273, Cp1141, Cp037, CP1140
- MainTable does not support case-sensitive schema names.
- In Oracle databases, character fields of tables have to be defined using length semantic CHAR ("Character-Semantic"). The length semantic BYTE is not supported.

## TABLES

- MainTable does not support case-sensitive table or column names.
- The primary key of a table may contain maximally 16 columns.
- Table names with up to 10 characters are supported. Longer table names are mapped internally to shorter names.
- Column names with up to 30 characters are supported. Longer table names are mapped automatically to shorter names. Possible characters are:  
1st character: letter or „\$“ or „#“  
Character 2-30: letter, digit, „\$“, „#“ or „\_“
- Columns must have a maximum length (e.g., „varchar(200)“).
- Table rows must not exceed a maximum length of 32k bytes.
- The following data types are supported:
  - o SQL\_CHAR (DB2: 254, Oracle: 2000, Postgre: 10M; in MainTable, the total row length is limited to 32k)
  - o SQL\_VARCHAR (DB2: 32672, Oracle: 4000, Postgre: 10M; in MainTable, the total row length is limited to 32k)
  - o SQL\_DECIMAL (=SQL\_NUMERIC) (with maximally 31 digits precision in total; Oracle NUMBER only with explicitly specified number of digits <= 31)
  - o SQL\_BIGINT
  - o SQL\_INTEGER
  - o SQL\_SMALLINT
  - o SQL\_TINYINT
  - o SQL\_FLOAT (=SQL\_DOUBLE)
  - o SQL\_REAL
  - o SQL\_TYPE\_DATE (=SQL\_DATE)
  - o SQL\_TYPE\_TIME (=SQL\_TIME)
  - o SQL\_TYPE\_TIMESTAMP (=SQL\_TIMESTAMP): Timestamp fields in tables of relational databases support timestamp(0) to timestamp(12). MainTable processes (0) to (12) as character, except for (6). (6) will be processed as timestamp.

