

Changes in the model for meta database 2.1 -> 2.2

Changes are listed in the same order as the proposal in "Remaining proposals for changes in the data model" and, after each change, there is a number relating to the corresponding proposal.

In order for a change in the data model to be fully successful within the database field, many of the changes must also be carried out in *PC-Axis format*, so that the metadata in the SQL database can be transferred to the PC Axis family and affect treatment there.

All tables and columns described below are included in the universal model. If a column is described as optional, this means it does not have to be filled in with any values and can be NULL.

The list is broken down into the following sections:

- A. General
- B. Subject area - main table
- C. Contents, sub table, variable
- D. Value pool, value set, value, point in time, group
- E. Footnotes and links to further information
- F. Persons and organisation
- G. Administrative tables

A. General

"NULL, point, missing" (NPM) (A7)

Decision: To introduce the possibility to use different special symbols in different languages, some of the properties in MetaAdm (DataSymbolNil, DataNoteSum, DataSymbolSum, DataNotAvailable and DefaultCodeMissingLine) should refer to the SpecialCharacter table. That is to say that in MetaAdm.Value a code will be given which corresponds to a row with the same code in SpecialCharacter.CharacterType. The text or code which earlier could be found in MetaAdm.Value will now be entered in the column PresCharacter.

Changes in the data model:
No changes.

PC-Axis format is affected: No.

B. Subject area - main table

2) Link between tables (B1)

Decision: The Link table should be expanded with two new columns so that it also can be used to describe the links between different tables.

Changes in the data model:

In the *Link* table, two new columns are added, LinkType and LinkFormat. The new columns will be added after the column Link.

LinkType	varchar(10)	mand.
LinkFormat	char(1)	mand.

LinkType can be nine different types, see below. LinkFormat can be either U (=URL) or M (=Main table). The two columns are combined as follows:

Description	LinkType	LinkFormat
Table forwards in same database	TableF	M
Table backwards in same database	TableB	M
Related table in same database	TableRel	M
Table for percentage calculation	TableProc	M
Documentation (internal or external)	Dok	U
Related table in other countries	TableRelEx	U
Related website	Website	U
Website with special theme	Temasite	U
Analysis	Analys	U

The codes are input in ColumnCode. The same codes are used in all languages but with different descriptive texts.

PC-Axis format is affected: No.

3) Sorting of time intervals on selection (B7)

Decision: Today time intervals are sorted in falling order on selection. This is not optimal for the forecast tables where it should be in rising order. It should be possible to sort all variables. As it does not seem important to be able to state this for every table, it is instead done in the interface.

Changes in the data model:

No changes.

PC-Axis format is affected: No.

4) Forcing users to select several contents (B8)

Decision: There are tables in which users will be forced to choose several contents. For example, if the table has a contents column with a confidence interval. As there can be disadvantages with forced input, it has instead been decided that information on the suitability of choosing certain contents, if necessary, should be added as an obligatory FootnoteContents. This is to be shown when the user is choosing contents.

Changes in the data model:
No changes.

PC-Axis format is affected: No.

5) Sorting of point in time when presenting (B9)

Decision: It should be possible for the user to choose between rising and falling sorting of point in time when presenting tables. Since it does not seem necessary to indicate this for each individual table, it will be carried out in the interface.

Changes in the data model:
No changes.

PC-Axis format is affected: No.

6) Longer fields in MenuSelection (B10)

Decision: As there is a need for longer presentation texts when choosing in the menu system, especially when there are a larger number of levels, the columns Menu and MenuSelection will be lengthened from varchar(20) to varchar(80).

Note however that the level containing codes for subject area cannot be more than varchar(20), compare SubjectCode in MainTable.

Changes in the data model:
The columns Menu and MenuSelection are lengthened to varchar(80).
Affects the tables *MenuSelection*, *MenuSelection_Eng*,
LinkMenuSelection and *FootnoteMenuSelection*.

PC-Axis format is affected: No.

D. Value pool, value set, value, point in time, group

7) Groupings (D6) och hierarchical variables (D5)

Decision:

The implementation of a new solution for groupings and the introduction of the possibility to describe hierarchical variables. The solution is described in more detail in the document *Groups and hierarchies in the statistical database, the px-file and the pxs file.*

Changes in the data model:

a) The table **Grouping** has a new appearance with an amended primary key, a new column, one column that has moved to another tables and a different column order.

The new appearance of Grouping:

Grouping	varchar(30)	mand.	primary key
ValuePool	varchar(20)	mand.	
PresText	varchar(100)	mand.	
Hierarchy	char(1)	mand.	
SortCode	varchar(20)	not mand.	
GroupPres	char(1)	mand.	
Description	varchar(200)	not mand.	
KDBid	varchar(20)	not mand.	
UserId	varchar(20)	mand.	
LogDate	smalldatetime	mand.	

The column GroupPres has the same codes as previously. The column Hierarchy has the codes:

N = No

B = Balanced

U = Unbalanced

In the table **Grouping_Eng** the order for Grouping and Valuepool are changed to be the same as the order in Grouping and only Grouping is primary key. Otherwise the table is unchanged.

b) **Two** new tables are created to describe the grouping levels:

GroupingLevel.

Grouping	varchar(30)	mand.	primary key
Level	numeric(2,0)	mand.	primary key

LevelText	varchar(250)	not mand.
GeoAreaNo	numeric(2,0)	not mand.
UserId	varchar(20)	mand.
LogDate	smalldatetime	mand.

GroupingLevel_Eng.

Grouping	varchar(30)	mand.	primary key
Level	numeric(2,0)	mand.	primary key
LevelText	varchar(250)	not mand.	
Userid	varchar(20)	mand.	
LogDate	smalldatetime	mand.	

c) **Two** new tables are created for linking values to a grouping. They replace the tables VSGroup and VSGroup_Eng.

ValueGroup.

Grouping	varchar(30)	mand.	primary key
GroupCode	varchar(20)	mand.	primary key
ValueCode	varchar(20)	mand.	primary key
ValuePool	varchar(20)	mand.	
GroupLevel	numeric(2,0)	mand.	
ValueLevel	numeric(2,0)	mand.	
SortCode	varchar(20)	not mand.	
UserId	varchar(20)	mand.	
LogDate	smalldatetime	mand.	

ValueGroup_Eng.

Grouping	varchar(30)	mand.	primary key
GroupCode	varchar(20)	mand.	primary key
ValueCode	varchar(20)	mand.	primary key
ValuePool	varchar(20)	mand.	
SortCode	varchar(20)	not mand.	
UserId	varchar(20)	mand.	
LogDate	smalldatetime	mand.	

d) A new table is created for linking value set to a non hierarchical grouping:
ValueSetGrouping.

ValueSet	varchar(30)	mand.	primary key
Grouping	varchar(30)	mand.	primary key
UserId	varchar(20)	mand.	

LogDate smalldatetime mand.

e) A new table is created for linking a hierarchical grouping to a complete main table instead of only linking to a value set:

MainTableVariableHierarchy.

MainTable	varchar(20)	mand.	primary key
Variable	varchar(20)	mand.	primary key
Grouping	varchar(30)	mand.	primary key
ShowLevels	numeric(2,0)	mand.	
AllLevelsStored	char(1)	mand.	
UserId	varchar(20)	mand.	
LogDate	smalldatetime	mand.	

The column ShowLevels gives the number of open levels that are to be shown when choosing for the first time as the tree shows (0=all levels, 1-). AllLevelsStored had the codes Y and N.

PC-Axis format is affected: Yes. New keywords are already implemented in i PC-Axis 2006.

8) Changed name of the column ValuePoolEng in the table ValuePool_Eng (D10)

Decision:

The column ValuePoolEng in the table ValuePool_Eng contains the name of the valuepool in another language, which does not need to be English. It therefore changes name to ValuePoolAlias.

Changes in the data model:

The column ValuePoolEng in the table ValuePool_Eng changes name to ValuePoolAlias.

PC-Axis format is affected: No.

E. Footnotes and links to more information

9) Footnote for table and value (E6)

Decision:

The column FootnoteValue in the table Contents should not be used for footnotes of the type 9 (footnote to value + main table) but only for footnotes

of type 4 (footnote to value/time + contents column). Means a small adjustment of the decision for data model 2.1.

Changes in the data model:
No changes.

PC-Axis format is affected: No.

10) Footnote to grouping (E7)

Decision:

A new table to link footnotes to groupings to be implemented. These footnotes should have FootNoteType = Q in the table Footnote.

Changes in the data model:

A new table, **FootnoteGrouping**, is created as below.

Grouping	varchar(30)	mand.	primary key
FootnoteNo	numeric(6,0)	mand.	primary key
UserId	varchar(20)	mand.	
LogDate	smalldatetime	mand.	

PC-Axis format is affected: No.