

AFO 133 - Input /output profiles

Use this AFO to create and maintain profiles for importing records into Cataloguing databases, and exporting records from Cataloguing databases.

133.1 File formats

The import/export module can handle multiple digital file formats. Below are descriptions of several varieties of raw data.

1. "Delimited"

A delimited file contains data separated by specific characters. Usually more than one separator is used, at least one for separating data fields and one for separating records.

	A	B	C	D	E	F	
	1	ID	Code	Author	Title	Additional data	Publication info
	2	2	aa02	Mickley, H.S. / Sherwood, T.K. / Reed,	Applied mathematics-		New York, McGraw-Hill,
	3	3	aa03	University of Delaware	The application of dif-		Newark, 1957
	4	4	aa04	Wylie, C.R.	Advanced engineeri	eerste editie 1951	New York, McGraw-Hill,
In t	5	5	aa05	Rodguin, N.M. / Rodguina, E.N.	Consecutive chemice	Oorspronkelijk in t	New York, Nostrand, 196
rela	6	6	aa06	Dermijn, J.F./Bock, G.A. de/Gelder, T.	Wiskunde in de proce	Uitgave ten dienst	Culemborg, Stam, 1968
	7	8	aa08	Blij, F.van der/ Tiel, J. van	Infinitesimaalrekenin		Utrecht, Spectrum, 1969
	8	9	aa09	Linden, C. van der	Wiskundig vademeci-		Utrecht, Spectrum, 1969
	9	10	aa10	Lehmann, H.	De rekenliniaal.	Oorspronkelijke tit	Utrecht, Spectrum, 1969
Ex	10	11	aa11	Graham Flegg, H.	Schakelalgebra.	Oorspronkelijke tit	Utrecht, Sprettrum, 1969
	11	13	aa14	Ahten, H./Bruhn J.	Elektronisch rekenen	Oorspronkelijke tit	Deventer, Kluwer, 1975.
	12	15	aa16	Dence, J.B.	Mathematical technic-		New York, Wiley, 1975.
	13	17	aa18	Russel, T.W.F./Denn, M.M.	Introduction to chemic-		New York, Wiley, 1972.
A f	14	18	aa19	Teller, O	Vademecum van de	achtste druk.	Utrecht, Het Spectrum. 19
	15	19	ad01	Imperial Chemical Industries	Statistical methods in	4th revised edition	London, Longman, 1972
	16	21	ad03	Wijvekatte, M.L.	Verklarende statistiel-		Utrecht, Het spectrum, 19
	17	22	ad04	Hemelrijk, J.	Statistiek, te pas en te-		Deventer, Kluwer, 1972
Titl	18	23	ad05	Sachs, L.	Statistische Methode	zweite neubearbei	Berlin, Springer, 1972.
	19	24	ad06	Grinten, P.M.E.M. van der/Lenoir J.M.N	Statistische procesbe-		Utrecht, Spectrum, 1973.
	20	25	ad07	American Society for Testing and Mat	Manual on statistical	Manul on statistica	Philadelphia, 1975
	21	26	ad08	International Organization for Standar	Statistical methods; h	Texts for ISO stand	Geneva, 1979
The	22	27	ad10	Spiegel, M.R.	Theory and problem		New York, McGraw-Hill,
wh	23	28	ad11	Boon, K.L.	Practische Statistiek		Leiden, Spruyt, Mantege
	24	29	ad12	Henke, R.	How to tell the liars fro-		New York, Marrel Dekke

The only restriction the import module has is that each column is a field. You cannot spread data from one column over multiple fields. In practice you often see all authors of a title in one column. For a successful import the primary author and all subsequent authors should be put in separate columns.

2. "Tagged"

A tagged format implies each data field is preceded by a label that allows the import module to determine what type of data is in it.

An example of a pure tagged format is:

```
IT 94 D 0001|Diaserie|OWP 94 D 0001, thema: kunst, kast 41
$
DN ABC97LM06577
TY LM
LA Dutch
MT Slides
SD BASISONDERWIJS BOVENBOUW
SD BASISONDERWIJS MIDDENBOUW
TI HET GALANTE LEVEN
CT 9 p. : + tekstboek
SI OWP 94 D 0110, thema: kunst, kast 41
DE SCHILDERKUNST 18DE EEUW
DE PORTRET
DE KUNSTBESCHOUWING
IT 94 D 0110|Diaserie|OWP 94 D 0110, thema: kunst, kast 41
$
DN ABC97AV06773
TY AV
LA Dutch
MT Slides|
SD BASISONDERWIJS BOVENBOUW
TI NATUURLIJKE GRONDSTOFFEN 2 (o.a. metalen-zout)
CT 20 p. : + 1 tekstboek
SI OWP 83 D 0600, thema: industrie, kast 41
DE GRONDSTOFFEN
DE IJZERERTS
DE METALEN
DE ERTSEN
DE GOUD
DE ZILVER
DE ZOUT
IT 83 D 0600|Diaserie|OWP 83 D 0600, thema: industrie, kast 41
```

The first two letters on each line determine the type of field. So: LA = language, MT = material type, TI = title, DE = descriptor, IT = item details, etc. After the space you have the contents of the field. The dollar sign means 'end of record'. This must be an ASCII text file which will look like the above example when opened with Notepad.

A tagged file can also contain tekst of variable lenght. Like:

```
shelfmark|CD114
category code|C
category description|CD
division code|ALG
division description|Algemeen
sequence number|011466
author|
title|Commercials Centraal Beheer Achmea [DVD]
series title|
publisher|Centraal Beheer Achmea
place of publication|Apeldoorn
year of publication|2004
extra division1|C
descriptor1|AUDIOVISUELE MEDIA
descriptor2|RECLAME
descriptor3|PLAATS DELICT
descriptor4|
descriptor5|
descriptor6|
descriptor7|
descriptor8|
descriptor9|
descriptor10|
descriptor11|
descriptor12|
annotation|distr. Centraal Beheer Achmea (36 min.)
```

In this case you need a special character to mark the end of the tag and the beginning of the data. IN the example this is a pipe, "|". A space would not be sufficient, because the data (field content) can also contain spaces.

For both delimited and tagged formats you must determine what the separator characters are going to be for fields and records. The import module needs to know the ASCII value of those characters.

3. "XML"

Exporting and importing records in XML format is incorporated in the standard facilities for data export (AFO 132) and import (AFO 131). It applies to both bibliographic documents and authority records. Both export and import use the profiles created and modified through AFO 133, which in its turn optionally use conversion profiles defined through AFO 134. All this implies that XML records are imported in exactly the same manner as ISO2709, delimited or tagged records.

If you have a Vubis Smart database using one of the three most common formats used within Vubis Smart (MARC21, UNIMARC and Smart), you have the following possibilities:

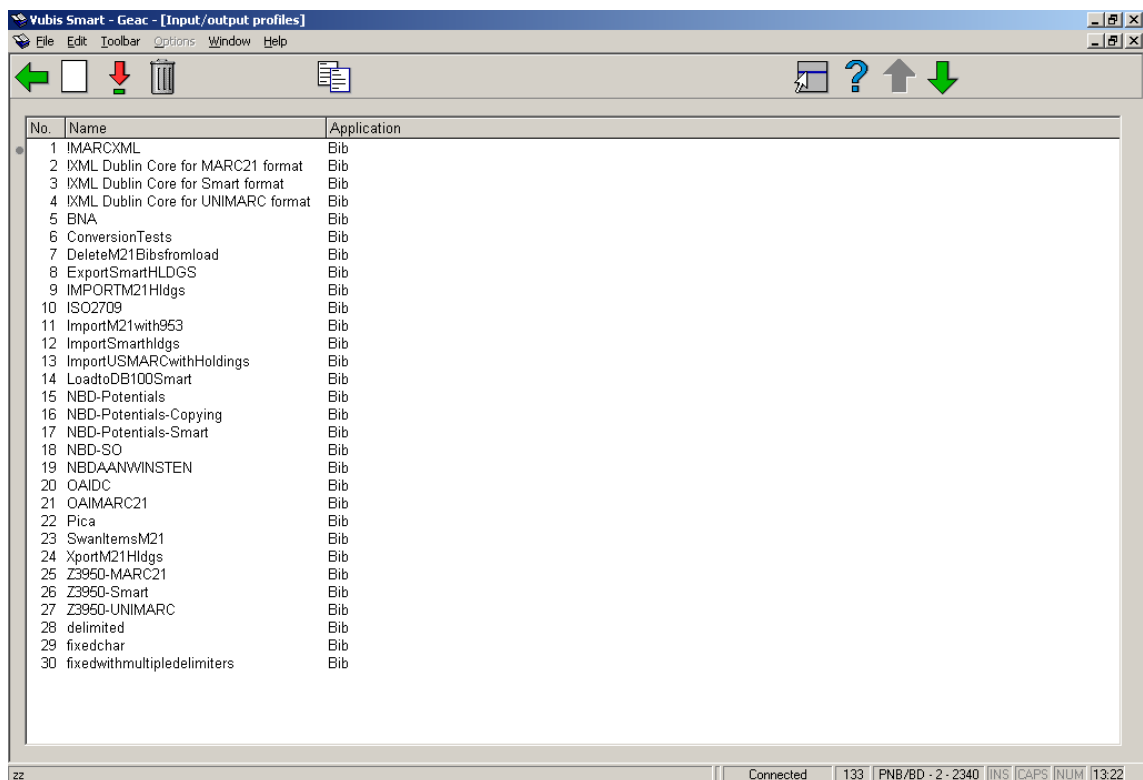
- Export and import of MARCXML records.
- Use an import/export profile that uses the file format MARCXML.
- Export and import of Dublin Core in XML format.
- Use an import/export profile that uses the file format XML Dublin Core and use as a conversion profile one of the predefined XML Dublin Core conversion profiles.
- Export and import of other XML formats.
- There are multiple possibilities here:
 - Create your own conversion profile in AFO 134 and create an import/export profile in AFO 133 that uses "XML Generic" as file format. Under "record delimiter", fill in the name of the element that indicates the start of a new record.
 - Import/export ISO 2709 records and use a conversion tool outside of Vubis Smart.
 - Use techniques outside of Vubis Smart to convert MARCXML or DC-XML to or from the desired format. Standard techniques such as XSLT can be used to create such conversions.

An example of Dublin Core XML:

```
<?xml version="1.0" ?>
- <dc xmlns="http://purl.org/dc/elements/1.1/">
  <title>Arithmetic </title>
  <creator>Sandburg, Carl, 1878-1967.</creator>
  <creator>Rand, Ted, ill.</creator>
  <type />
  <publisher>San Diego :Harcourt Brace Jovanovich,</publisher>
  <date>1993.</date>
  <language>eng</language>
  <description>A poem about numbers and their characteristics. Features
  anamorphic, or distorted, drawings which can be restored to normal by
  viewing from a particular angle or by viewing the image's reflection in
  the provided Mylar cone.</description>
  <description>one Mylar sheet included in pocket.</description>
  <subject>Arithmetic</subject>
  <subject>Children's poetry, American.</subject>
  <subject>Arithmetic</subject>
  <subject>American poetry.</subject>
  <subject>visual perception.</subject>
</dc>
```

133.2 Definitions in AFO 133

After you have chosen this AFO an overview screen with existing profiles will be presented. You can edit existing profiles on this screen or create new ones.



Options on the screen

New item: click this icon to create a new profile. You will first be presented with an input form where you must enter the profile name and select an application (bibliographic or authority).

View/modify item properties: select an existing profile and click on this icon to modify the profile.

Delete item: select an existing profile and click on this icon to delete the profile.

Copy: select an existing profile and click on this icon to create a new profile by copying the existing one.

After selecting an existing profile or creating a new one, you are presented with an input form with 5 tabs. All tabs must be filled out. They are described in more detail below.

133.2.1 Tab 'General'

The screenshot shows a dialog box titled "Input/Output profile" with a close button (X) in the top right corner. The dialog has five tabs: "General", "Format", "Input", "Save lists", and "Items". The "General" tab is selected and contains the following settings:

Character set of external data	Ala
Language for language-dependant fields	English
Code of field with record-id	1
Code of subfield with record-id	
Record format conversion	MARC21-Smart
Character for start of non-filing part	0
Character for end of non-filing part	0
Maximum program errors for conversion	10

At the bottom left of the dialog is a checkbox labeled "Save settings" which is currently unchecked. At the bottom right are three buttons: "OK", "Cancel", and "Help".

The first tab contains the general characteristics of the input/output file.

Fields on the screen

Character set of external data: Select a standard character set from the dropdown list. If you are not sure, just choose one and look at the result in a test load. If the result is incorrect (for example strange characters appear) you can adjust by choosing another character set.

Language for language-dependant fields: Select a language form the dropdown list. Usually this is set to <all languages>.

Code of field with record ID: In the example this is 1. This means the loader will assume the first field will contain a record number. In MARC21 tag 001 contains the control number. This can then be used to store separately. Because Vubis Smart has its own record ID numbers, the external record ID is not used as such. But it can be useful to retain the information in the record

Code of subfield with record ID: Here you can specify the specific subfield that contains a record ID (optional).

Record format conversion: This is one of the most critical steps. Select a profile from the dropdown list. The profiles are defined in AFO 134. You can do that later and then come back to this tab to add it.

Character for start of non-filing part: To denote where the non-filing character must be positioned in Vubis Smart. Within the Smart format you can use this to specify a certain part of the title must not be indexed. Enter the ASCII value of the non-filing character.

Character for end of non-filing part: See above.

Maximum program errors for conversion: When the process reaches the number specified here, the loading will be stopped. The system checks such details as valid fields for the format as specified in AFO 151. When for instance 'language' is a mandatory field for the format, but the incoming records contain no language then this will be seen as an error.

133.2.2 Tab 'Format'

The screenshot shows a dialog box titled 'Input/Output profile' with a close button in the top right corner. The dialog has five tabs: 'General', 'Format', 'Input', 'Save lists', and 'Items'. The 'Format' tab is selected and active. It contains the following fields and controls:

- File format:** A dropdown menu with 'ISO2709' selected.
- Record delimiter:** A text input field containing '29'.
- Field delimiter:** A text input field containing '30'.
- Subfield delimiter:** A text input field containing '31'.
- Tag delimiter:** A text input field containing '0'.
- Tag length:** A text input field containing '0' with up and down arrow buttons on the right.
- Fixed field map:** An empty text input field.
- Number of delimited fields:** A text input field containing '0' with up and down arrow buttons on the right.
- Quotes around data:** A checkbox that is currently unchecked.

At the bottom left of the dialog is a checkbox labeled 'Save settings', which is also unchecked. On the right side, there are three buttons: 'OK', 'Cancel', and 'Help'. In the bottom right corner, there are small icons for a keyboard and a mouse.

The second tab allows for specification of the various delimiters.

Fields on the screen

File format: Select a file format from the dropdown list.

Record delimiter: Enter the ASCII value of the separator character. Say you import an Excel file. When exporting the Excel file to a text file add the delimiters (like comma or semicolon).

Field delimiter: See above.

Subfield delimiter: See above. Subfields are not recognised in delimited files.

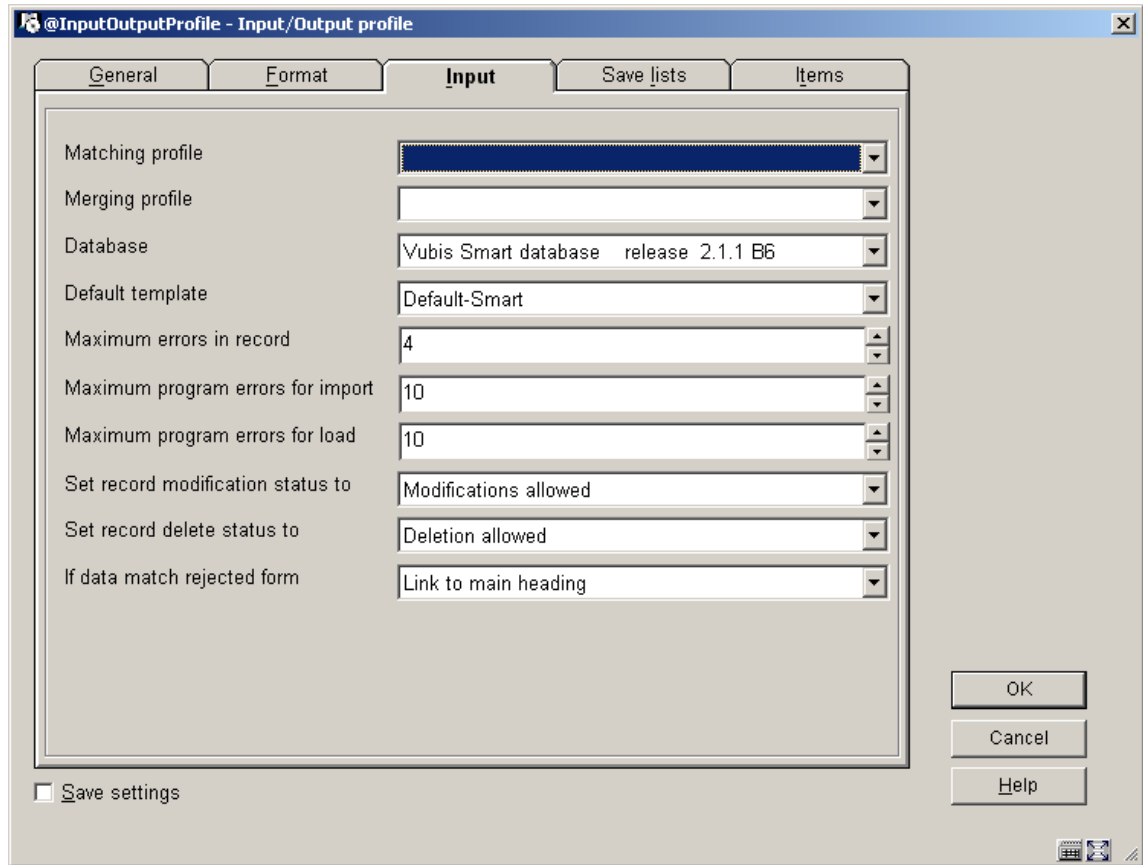
Tag delimiter: See above. This can be the space (ASCII value 32) between tag number and data.

Tag length: For MARC21 this should be 3 for instance.

Fixed field map: This is only used when all data can be found on fixed positions in a file.

Quotes around data: denotes whether or not the loader must take quotes into account.

133.2.3 Tab 'Input'



The third tab offers the opportunity to add matching and merging profiles.

Fields on the screen

Matching profile: Select a profile from the dropdown list. These are used to specify what must happen when records are loaded that already exist in the database. You can for instance specify that the incoming record prevails. You need to create the matching and merging profiles in AFO 114 and 115.

Matching profile: See above.

Database: When you have multiple databases, you need to specify in which database the records must be loaded. Select one from the dropdown list.

Default template: Select one from the dropdown list (the templates must be defined in AFO 153, 154).

Maximum errors: these three fields determine fault tolerance.

Record status: Choose the correct statuses from the dropdown list.

If data match rejected form: When records are loaded through AFO 131 with the record loader it may occur that the contents of an authority controlled bibliographic field match with an existing rejected form in the related authority database. Here you can specify what must happen in such a case. Three different options can be chosen if the data match a rejected form:

- **Create new main heading:** The rejected form is removed from the database, and instead a new main heading will be created
- **Discard data:** The data are removed from the import record – this is the current situation
- **Link to main heading:** The field is linked to the main heading of the rejected form

In all three cases a warning message will be added to the loader report.

133.2.4 Tab 'Savelists'

The screenshot shows a dialog box titled "Input/Output profile" with a tabbed interface. The "Save lists" tab is selected. The dialog contains several rows of settings, each with a label and a dropdown menu. The settings are as follows:

Label	Value
User for save lists (* = current user)	*
Savelist for not loaded records	NOTLOADED
- Suffix for save list	Date
- If save list exists	Make new savelist unique
Savelist for loaded records	MARC21UNLOADED
- Suffix for save list	Sequence number
- If save list exists	Make new savelist unique
Savelist for matched records	
- Suffix for save list	None
- If save list exists	Add to savelist
Savelist for records without match	
- Suffix for save list	None
- If save list exists	Add to savelist

At the bottom left, there is a checkbox labeled "Save settings" which is currently unchecked. On the right side, there are three buttons: "OK", "Cancel", and "Help".

This tab allows various settings for creating savelists of not loaded records, loaded records, etc.

Specify whether the savelist must be created for a specific user (* means current user). You can select existing savelist names or type in new names. And you can choose to append the date to the savelist name.

133.2.5 Tab 'Items'

The screenshot shows a dialog box titled "Input/Output profile" with a tabbed interface. The "Items" tab is selected. The dialog contains the following fields and controls:

- Loan period exchange collection:** A text input field containing the number "0".
- Savelist for loaded items:** A dropdown menu.
- Set item-savelist to read-only:** An unchecked checkbox.
- Select institutions for item export (*=all):** A dropdown menu with a checked checkbox. The dropdown list is open, showing "Geac Library Division" as the selected option.
- Save settings:** An unchecked checkbox located at the bottom left of the dialog.
- Buttons:** "OK", "Cancel", and "Help" buttons are located at the bottom right of the dialog.

On this tab you can create savelists for imports that include items. By entering a period and setting the savelist to read-only you can eventually delete these items from the system. These options are only valid for import. The last option is only valid for export, here you determine from which institution(s) you export item data.

Note

Items will be exported with a status (if assigned) as defined in AFO 481 – Loan status codes – Tab General, under 'Circulation status'.

- **Document control - Change History**

Version	Date	Change description	Author
1.0	unknown	creation	
2.0	August 2006	updates for release 2.4.1 build 17	