ABC ANALYZER HELP FILE:

How to create a data file

ABC Analyzer supports a wide range of different data formats. This document will help you organize your data, so the data integration becomes as smooth as possible.

Getting started

This help file contains five easy steps helping you to import data files:

1. Determining the format of the data file
2. Data field types
3. Data content
4. Data period
5. Re-categorization interval
6.

This document has been written to support both the technician who extracts the data, as well as the decision-maker in deciding which data and in which format he/she wants it.

1. Data file format

The ABC Analyzer supports the following file formats:

Format	Extension
Microsoft Excel 97-2003	.xls
Microsoft Excel 2007	.xlsx
XML	.xml
Semicolon separated	.csv
Tab, comma or space separated	.txt

Please note: that if using a file format other than Microsoft Excel or XML, you must enclose your field values with either single (‘) or double (“) quotes. Furthermore line breaks must be avoided within all fields.

Empty rows in all formats should be avoided.

XML files must have only exactly one root element where corresponding child-nodes refer to each row in the data.

2. Data field types

The ABC Analyzer supports the following field types:

Field type	Format	Examples
ID	Alphanumerical	0000149
Text	Alphanumerical	2 seconds glue
Number	Numerical	1,000.45 1.000,45
Date	*See below*	1980-12-29
Old ABC	Alphabetical	A AB CA

Date formats supported by ABC Analyzer:

29-12-1980	29121980	29/12/1980	29.12.1980
29-12-80	291280	29/12/80	29.12.80
1980-12-29	19801229	1980/12/29	1980.12.29
80-12-29	801229	80/12/29	80.12.29
12-29-1980	12291980	12/29/1980	12.29.1980
12-29-80	122980	12/29/80	12.29.80
1980-29-12	19802912	1980/29/12	1980.29.12
80-29-12	802912	80/29/12	80.29.12

Example date is the 29th of December in the year 1980

It is recommended, but not required, that the first row of your data file, contain the *column headlines.*

2.1 Detailed description of field types

ID

Columns with this type should be unique. This is not required, but highly recommended to avoid aggregation of the data.

If you're using Excel as your file format, you should add a single quote (') to these values. This will prevent Excel to interpret these values as numerical.

Text

If you are using a data file format other than Excel or XML, values in this column should not contain the chosen field delimiter (e.g. tabulator or semicolon). Furthermore line breaks must be removed.

Some Text field might resemble a Number (e.g. a Barcode or ID). Obviously it is context based whether or not the field is a Text or a Number. But a rule of thumb is if the field refers to a unique entity (e.g. Supplier ID or Purchaser ID), it should be treated as Text.

Number

Columns with this type must be numerical. Negative values must be denoted with a dash (-). It is recommended, but not required, that all fields contain a numerical value. Values may not contain currency symbols and alphabetical characters.

All columns of this type must have the exact same thousand and decimal separator.

Upon error in a field value of this type, ABC Analyzer defaults to zero (0).

Date

All columns of this type must have the exact same date format.

It is recommended, but not required, that all fields contain a valid date.

Upon error in a field value of this type, ABC Analyzer defaults to 1st of January in the year 1901.

Old ABC

Columns of this type should contain only the letters A, B and C to function properly in ABC Analyzer.

2.2 Minimum required fields

ABC Analyzer requires minimum one **ID** column and at least one **Number** column.

3. Data content

The input data can ultimately be subdivided into 3 data types:

Data type	Explanation	Example
Master	No computation needed	Supplier name
Accumulated	Sum over a period of time	Annual sales value
Ultimo	Value at the time of data extraction	Units in stock

The actual content of the data import file depends on what you wish to analyze. The following subsections give examples of data suitable for analysis within ABC Analyzer. The lists are not complete, but should serve as a guideline for establishing your first interesting analyses.

3.1 Product Analysis – Ex. 1

Example of *product data* supporting business analysis with a *sales perspective*.

A natural choice of double ABC parameters would be accumulated Sales Value and Sales order lines.

Field Name	Description	Data type	Field type	Example
Item number	A unique identification code per item	**M**aster	ID	004525478336A
Item description	Description of the item	**M**aster	Text	2 seconds glue
Product group	Product group of which item is subordinated to	**M**aster	Text	Glue
Purchaser	Initials of dedicated purchaser	**M**aster	Text	AJ
Supplier	Name of primary supplier	**M**aster	Text	04789-US
Standard cost price	Cost price per unit	**M**aster	Number	2,1200
Usage	Number of units used	**A**ccumulated	Number	5423
Sales value	Usage × Sales price	**A**ccumulated	Number	27115
Gross margin	(Sales price - Standard cost price) × Usage	**A**ccumulated	Number	15618,24
Sales order lines	Number of Sales order lines	**A**ccumulated	Number	244
Stock units	Units kept in stock	**U**ltimo	Number	1450
Stock value	Stock units × Standard cost price	**U**ltimo	Number	3074

3.2 Products Analysis – Ex. 2

Example of product data supporting business analysis with a logistic perspective. A natural choice of double ABC parameters would be accumulated Cost Value and Usage order lines.

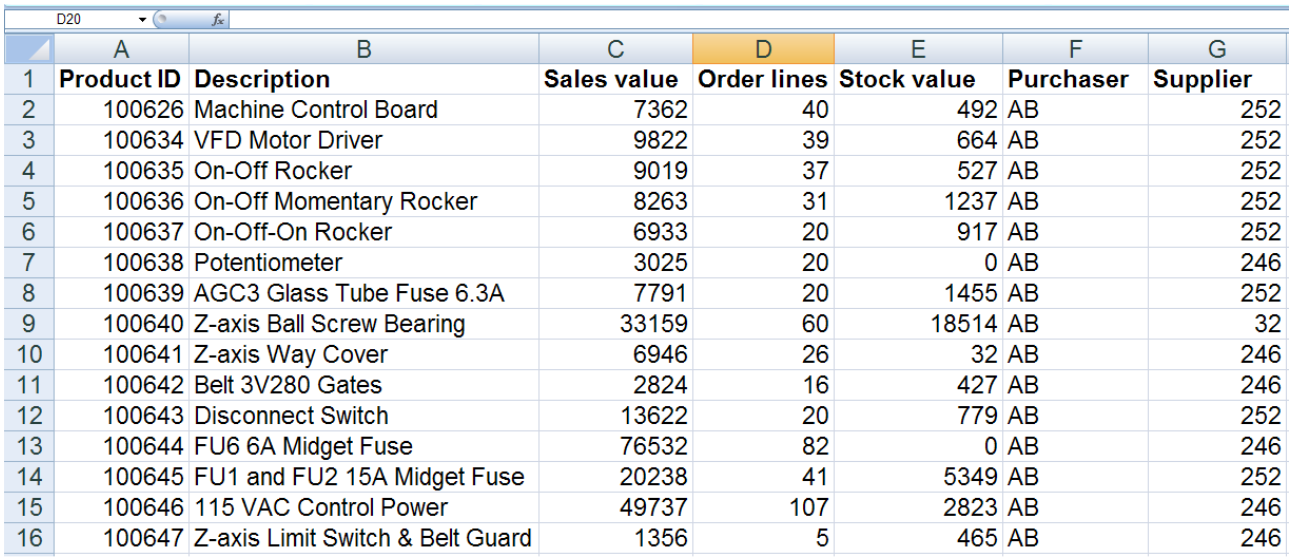
Field Name	Description	Data type	Field type	Example
Item number	A unique identification code per item	**M**aster	ID	00452547833A
Item description	Description of the item	**M**aster	Text	2 seconds glue
Product group	Product group of which item is subordinated to	**M**aster	Text	Glue
Purchaser	Initials of dedicated purchaser	**M**aster	Text	AJ
Supplier	Name of primary supplier	**M**aster	Text	04789-US
Standard cost price	Cost price per unit	**M**aster	Number	2,1200
Usage	Number of units used	**A**ccumulated	Number	5423
Usage order lines	Total numbers of pick order lines(!!?)	**A**ccumulated	Number	120
Cost value	Usage × Standard cost price	**A**ccumulated	Number	11496,76
Purchase order lines	Number of purchase order lines	**A**ccumulated	Number	8
Stock units	Units kept in stock	**U**ltimo	Number	1450
Stock value	Stock units × Standard cost price	**U**ltimo	Number	3074

3.3 Customer Analysis – Ex. 1

Example of customer data. A natural choice of double ABC parameters would be accumulated Sales value and Sales order lines.

Field Name	Description	Data type	Field type	Example
Customer ID	A unique identification account number per customer	**M**aster	ID	200547
Customer name	Name of customer	**M**aster	Text	Yamane Inc
Country code	Country code of the customer	**M**aster	Text	US
Sales Rep.	Dedicated sales person	**M**aster	Text	AJ
Discount group	Customer discount level	**M**aster	Text	110
Sales value	Net turnover of delivered goods	**A**ccumulated	Number	200225,0000
Cost price	Total Cost price of delivered goods	**A**ccumulated	Number	120135
Gross margin 1	Sales value - Total Cost price	**A**ccumulated	Number	80090,0000
Handling costs	Costs of handling/freight	**A**ccumulated	Number	25000
Gross margin 2	Gross Margin after handling/freight costs	**A**ccumulated	Number	55090,0000
Sales orders	Number of sales orders	**A**ccumulated	Number	25
Sales order lines	Number of sales order lines	**A**ccumulated	Number	145

Example of an Excel file ready to import to ABC Analyzer



	A	B	C	D	E	F	G
1	**Product ID**	**Description**	**Sales value**	**Order lines**	**Stock value**	**Purchaser**	**Supplier**
2	100626	Machine Control Board	7362	40	492	AB	252
3	100634	VFD Motor Driver	9822	39	664	AB	252
4	100635	On-Off Rocker	9019	37	527	AB	252
5	100636	On-Off Momentary Rocker	8263	31	1237	AB	252
6	100637	On-Off-On Rocker	6933	20	917	AB	252
7	100638	Potentiometer	3025	20	0	AB	246
8	100639	AGC3 Glass Tube Fuse 6.3A	7791	20	1455	AB	252
9	100640	Z-axis Ball Screw Bearing	33159	60	18514	AB	32
10	100641	Z-axis Way Cover	6946	26	32	AB	246
11	100642	Belt 3V280 Gates	2824	16	427	AB	246
12	100643	Disconnect Switch	13622	20	779	AB	252
13	100644	FU6 6A Midget Fuse	76532	82	0	AB	246
14	100645	FU1 and FU2 15A Midget Fuse	20238	41	5349	AB	252
15	100646	115 VAC Control Power	49737	107	2823	AB	246
16	100647	Z-axis Limit Switch & Belt Guard	1356	5	465	AB	246

4. Data period

The *data period* determines in which *time window* data are *Accumulated*. The typical recommendation is 12 months. Using less than 12 months will introduce a risk of excluding seasonal differences (e.g. Christmas sales).

The data period should be considered on the basis of the lifecycles of the data in question. If the lifecycles generally are less than 12 months (e.g. fast changes in fashion or technology leaps) you should consider a shorter data period.

The chosen data period should be taken into account when analyzing the data. If you choose a data period which is too short, you might be missing some highly relevant data. If you on the other hand, choose a data period which is too long, part of the data might be obsolete or simply “blank” (lifecycles shorter than data period).

5. Re-categorization intervals

The work of ABC can be subdivided into two main categories:

1. Ad hoc analysis
2. Continual analysis

Ad hoc analysis does not require any re-categorization. This analysis is done once, or from time to time, to get specific insight on a specific subject.

Continual analysis is done multiple times using a fixed interval of re-categorizing the items. The fixed interval could be a month, a quarter, half a year or other custom intervals. This type of analysis is necessary when establishing a *corporate ABC*, e.g. an official ABC of your company’s products or customers. The re-categorization task can be done using ABC Analyzer or by hard-coding the ERP-system.