Dbank HELP

Welcome to Dbank's Help system.   Please select a help topic.

Installing Dbank Files on a Network

A Dbank data bank can be installed on a shared network drive (i.e., a drive that can be accessed by more than one user at the same time); however, it must be converted to read-only before it is copied to the network drive.

IMPORTANT: This version of Dbank does not support write-enabled data banks in a multi-user network environment.   Please do not install write-enabled data banks to a shared network drive.

Read-only data banks are created by Dbank's "Make Read-Only" command (Alt+F+Y).   Every Dbank data bank has two files associated with it:

> <databank_name>.MDB, and
> <databank_name>.FDB

where "<databank_name>" should be replaced with the actual name of the data bank.   The ".MDB" file contains the index records of the series, while the ".FDB" file contains your data (saved in binary format).

Copy the two files to the network drive.   After you have done so, make sure you set the file attribute of <databank_name>.mdb and <databank_name>.fdb to "+r " (i.e., read-only) using the DOS ATTRIB command.   This will permit multi-user access to the data bank.

The four *.bat files distributed with Dbank give an example of the installation of Dbank on a network.

Exporting Data to Other Programs

An important feature of Dbank is its ability to transfer your data to files that can be processed immediately by other programs.   Dbank's EXPORT command implements this feature.

You must select (i.e., tag) the series you wish to copy before invoking the EXPORT form.   You can tag series using the TAG command in the GROUP and SERIES menus.   You can also tag series using the mouse; simply double-click on a group or a series name.

The Tagged EXPORT command loads Dbank's EXPORT form which allows you to specify:

> (a) the sample period for the copy.   The sample period determines which part of the tagged series to copy;

> (b) the output format (i.e., the structure of the output file);

> (c) the conversion method Dbank should use when it needs to convert a series to a lower frequency (e.g., from quarterly to annual); and,

> (d) the name of the output file (i.e., the destination of the copied series).

Dbank will not allow you to export any series until all of the following parameters have been set:

> (a) the sample period;
> (b) the output format; and
> (c) the name of the output file.

If you find the above confusing (many do),   try tagging a few series and then calling up the EXPORT form.   It is programmed to step you through the EXPORT process.

Dbank Quick Guide

Do you have a lot of data on your hard disk but have little or no idea which files have what data?   Do you find it difficult to extract a subset of those data for use with other programs?   Would you like to organize the data on your hard disk so that they are easy to locate?

Dbank is a tree-structured filing system for time series and cross-sectional data that runs under Microsoft Windows.   In addition to providing numerous commands for managing, manipulating, viewing and plotting such data,   Dbank allows you to export the data to many statistical packages and spreadsheet programs.   Dbank also has built-in multiple regression and ACE modules that provide p-values if you also have Microsoft Excel on your hard disk.

If you would like to experiment with Dbank, double-click on EXAMPLE.MDB (a data bank) in Dbank's file list box.   This will allow you to play with Dbank's Group, Series, and Tagged Menus. For starters, click on the group called FIRST.   Then, from the Group Menu, select Mosaic Time Plot (Alt+G+L).   Dbank will plot all the series in FIRST (and its sub-groups) against time.   To view the data in the series called BPASPV, click on BPASPV in the series list box, and then from the SERIES menu select View (Alt+R+W).

If you have a rectangular dataset saved in an ASCII file (i.e., the data is organized as a matrix, with each row in the file representing an observation and each column representing all the observations on a particular series), you can import it into Dbank using the Add Data... command in Dbank's File Menu. The Add Data... command will create a data bank with the same name as the input file; double-click on the new data bank to open it.   You can manipulate the series in the data bank using Dbank's Series and Group Menu.   If you tag any of the series (double-click on the group or series name to do so),   Dbank will enable the Tagged Menu (which affects the series in the tagged list box).

If you don't have a rectangular dataset handy, use EXAMPLE.MAT.   Dbank's SETUP program copies EXAMPLE.MAT to the same directory in which you installed Dbank.

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DISCLAIMER

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Every attempt has been made to free Dbank of bugs and ensure that the program operates as documented.   However, the author disclaims all warranties as to this software, whether expressed or implied, including without limitation any implied warranties of merchantability, fitness for a particular purpose, functionality or data integrity or protection.   In particular,   in no event shall the author be liable for consequential, incidental or indirect damages of any kind arising out of the delivery, performance or use of Dbank.

In other (less legalistic) words, use this program as if you wrote it yourself, and be just as understanding if you run into a bug!

File Menu

Dbank's File Menu contains all the commands Dbank provides for manipulating data banks.   The data bank commands supported are:

Open Command
Close Command
Query Command
Copy Command
Delete Command
Dump Command
Tree Command
Make Command
Move Command
Rename Command
Repair Command
Update Command
Squeeze Command
Make Read-Only Command
Remove Write-Protection Command
Add data...
Add data from DOS-DBANK
Shell Command
Calculator Command
Excel Command
Exit Command

Group Menu

Dbank's Group Menu contains all the commands that Dbank provides to manipulate groups within a data bank.   The commands available under the Group Menu are:

Browse Command
Copy Command
Delete Command
Label Command
Make Command
Move Command
Query Command
Rename Command
Sort Command
Tag Command
UnTag Command
View Command
Xdelete Command
Peek Command
Print Command
Print Index Command
Mosaic Time Plot Command
Summary Statistics Command

Tagged Menu

Dbank's Tagged Menu allows you to execute commands on ALL or a subset of the series that you have placed in the tagged list box.   The commands available under the Tagged Menu are:

Browse Command
Copy Command
Delete Command
Edit Command
Move Command
Rename Command
Sort Command
UnTag Command
View Command
Peek Command
Print Command
Print Index Command
ACE Command
Export Command
Mosaic Single Y vs Xs Plot Command
Mosaic (X,Y) Pairs Plot Command
Mosaic Time Plot Command
Time Plot Command
OLS-IV-2SLS Regression Command
Scatter Plot Command
Summary Statistics Command

Series Menu

Dbank's Series Menu allows you to execute commands on series within a group.   The following commands are available in the Series Menu:

Add Data Command
Browse Command
Copy Command
Delete Command
Edit Command
Input Command
Make Command
Move Command
Rename Command
Sort Command
Tag Command
UnTag Command
View Command
Peek Command
Print Command
Print Index Command
Probability Density Estimate
Scatter Plot Command
Summary Statistics Command
Time Plot Command

Dbank Quick Help

1.   *How do I start Dbank?*
      From the Program Manager, double-click on the Dbank icon.

      If you have Windows 3.1 or greater, you can also start Dbank by typing Dbank at the DOS prompt, provided Windows is not already running and win.com is on the current path.

2.   *How do I start Dbank with a given data bank opened?*

      Dbank accepts a single argument (a data bank name) on the command line.   Thus, to automatically open the data bank EXAMPLE.MDB whenever Dbank is started, type

      Dbank C:\DB\EXAMPLE.MDB

3.   *How do I create an empty data bank?*

      From the File Menu, choose Make (Alt+F+K).

4.   *How do I open an existing data bank?*

      From the file list box,   double-click on the data bank you wish to open.   For example, double-clicking on EXAMPLE.MDB opens the data bank.   The distributed version of EXAMPLE.MDB has two groups: FIRST and SECOND.   These groups will appear in the Group list box when you open the data bank for the first time.   Note that FIRST has a sub-group called BP.   If you double click on FIRST, Dbank will set the default group to FIRST and fill the group list box with all the groups that belong to FIRST (i.e., BP).

5.   *How do I delete a data bank?*

      Select the data bank you wish to delete using the mouse; i.e., click on a data bank in the file list box. To actually delete the file, click on the File Menu and choose Delete (Alt+F+D)

6.   *Suppose I have data in a file called EXAMPLE.MAT; the data are organized as a matrix (i.e., in rows and columns).   How do I read the data into Dbank?*

      From the File menu, select Add Data... (Alt+F+A).   This invokes the File Open dialog box.   Type EXAMPLE.MAT and then click on the OK button of the File Open dialog box.

      Provided EXAMPLE.MAT exists, Dbank will create a data bank called EXAMPLE.MDB (assuming one does not exist already) with a group called EXAMPLE.   The series in EXAMPLE.MAT   will be saved in EXAMPLE and the series in EXAMPLE will be called C1, C2, C3, .., CN   where N is   the number of columns (i.e., series) in EXAMPLE.MAT.

7.   *How do I create a group called THIRD with a sub-group GNP   in EXAMPLE.MDB?*

      (a)   If necessary, open the data bank by double-clicking on EXAMPLE.MDB in the file list box.

      (b)   From the Group Menu, select Make (Alt+G+M) and then type THIRD.GNP.

8.   *How do I print all the series in the group called SECOND in EXAMPLE.MDB?*

      (a)   If necessary, open the data bank by double-clicking on EXAMPLE.MDB in the file list box.

      (b)   Click on the group called SECOND in the group list box.

(c)   From the Group Menu, select Print (Alt+G+P).

9.   *How do I export ALL the series in the group called FIRST and its sub-groups to an EXCEL spreadsheet using Windows' Dynamic Data Exchange facility?*

(Follow these steps only if you have a copy of EXCEL on your hard disk, and the location of EXCEL.EXE is on the active DOS Path.)

(a)   Open the data bank by double-clicking on EXAMPLE.MDB in the file list box.

(b)   Click on the group called FIRST in the group list box.

(c)   Tag all the series in FIRST by selecting Tag from the Group Menu (Alt+G+T).

(d)   From the Tagged Menu, select Export... (Alt+T+X).   This will invoke Dbank's EXPORT form.

(e)   From the Format Menu of the EXPORT form, select DDE to EXCEL to indicate Dynamic Data Exchange to an Excel spreadsheet.

(f)   Indicate the range of observations to export by clicking on the Bounds button of the EXPORT form.

(g)   From the File Menu, declare an output file (i.e., spreadsheet) for the tagged series by selecting Open... (Alt+F+O)

(h)   Click on the Do it! button of the EXPORT form.   Dbank will start copying the tagged series to an Excel spreadsheet.

10.   *How do I run ACE on a set of series?*

(a)   The first step is to tag all the series you wish to run ACE on.   To tag all the series in a group, from the Group Menu, select Tag (Alt+G+T) or simply click on the group and then click on the RIGHT mouse button.   To tag a particular series within a group, from the Series Menu, select Tag (Alt+R+T) or double-click on the series name.

(b)   Invoke ACE.   To do so, from the Tagged Menu,   select ACE.

11.   *How do I rename a series in EXAMPLE.MDB?*

Select the series you wish to rename using the mouse.   Then invoke the Series Menu, and select Rename (Alt+R+R).

12.   *How do I rename a group in EXAMPLE.MDB?*

Indicate the group you wish to rename by clicking on a particular group in the group list box. Then invoke the Group Menu, and select Rename (Alt+G+R).

13.   *How do I delete ALL the series in a particular group and its sub-groups; for example, all the   series in the group called FIRST and its sub-groups?*

Click on the group called FIRST in the group list box.   From the file menu,   select XDELETE. (Alt+G+X).

14.   *How do I get a mosaic plot of ALL the series in a group and its sub-groups?*

The first step is to tag the group.   The easiest way to do this is to double-click on the group name in the group list box.   To plot the series, from the Tagged Menu, select Mosaic Time Plot (Alt+T+T).

15.   ***How do I get a plot of a single series against time?***

Click on the series you wish to plot using the mouse.   From the Series Menu, select Time Plot. (Alt+R+L)

16.   ***How do I inspect the data in a particular series?***

Click on the series you wish to inspect.   From the Series Menu, select View (Alt+R+V).

17.   ***How do I edit the data in a particular series?***

Click on the series you wish to edit.   From the Edit Menu, select Edit (Alt+R+E).

18.   ***How do I compute the growth rate of a series using Dbank's Series Make facility?***

Suppose you need to compute the growth rate of BPB, a series in the group called FIRST, and you want to store the result in a series called GBPB in a group called GROWTH.USA

(a) Double click on the group called FIRST and then click on the sub-group called BP.

(b) From the Series Menu, select Make and enter:

[growth.usa]gbpb = ((bpb-lag(bpb))/lag(bpb))*100.

Dbank will create a series called GBPB in the group GROWTH.USA containing the (quarterly) growth rate of BPB.

19*.*   ***Is it possible to select more than one item in the group, series, and tagged list boxes?***

The group, series and tagged list boxes allow you to select multiple items.   To do so using the mouse, hold the left mouse button down and drag the cursor over the items you wish to select.
Shift+click or Shift+arrow key extends the selection from the previously selected item to the current item. Ctrl+click selects or de-selects an item in the list.

Introduction

Dbank is a filing system for time series and cross-sectional data that runs under Microsoft Windows. In addition to providing commands which allow you to create data banks and manipulate the data stored inside them, Dbank allows you to easily export the data to many statistical packages and spreadsheet programs. Dbank also provides basic statistical tools for analyzing data.

Dbank files are typically organized into groups of series. A series is simply a collection of data. For example, data on the Gross National Product of the USA for 1949-1991 (a total of 43 observations) could be regarded as a series. A "group" within Dbank is simply a collection of (possibily) related series. For example, all the series used in a research paper could be called a group. Dbank's filing system for groups of series is similiar to the PC-DOS filing system. Every data bank has a main group (or root directory) which is the point of growth for all other groups in the data bank. Every group except the main group has a parent group, and any group can have one or more sub-groups (or children).

Dbank's data management commands can be applied either to a single series within a group or to all the series in a particular group. You can also define a temporary group using Dbank's TAG facility. The tagged series can then be manipulated as a single group.

Dbank provides a number of commands for managing your data. You can ADD series to the data bank, EDIT the data stored in a series, INPUT data into Dbank, MOVE a series from one group to another, and COPY a series to a new series, another group or even to a different data bank. There is also a command to DELETE a series, one to VIEW the data stored in a series, a RENAME command, and a PRINT command. Many of these commands operate on a group of series, and on the series you place in the tagged group.

Dbank also helps you manage your data bank files. There are functions to create, delete, copy, move, rename and squeeze data banks. READ-ONLY data banks, which are particularly useful in network environments, may also be created.

After you have saved your data in a Dbank data bank, you can easily export your data to any of the following statistical/spreadsheet packages:

1)	AREMOS
2)	TSP
3)	Micro TSP
4)	GAUSS
5)	LIMDEP
6)	LOTUS, QUATTRO, EXCEL
7)	SAS
8)	SST
9)	MINITAB,
10)	RATS
11)	BMDP
12)	SPSS.

Dbank also has its own "FREE", "MATRIX" and "SERIES" file formats. These formats can be read by most programming languages (e.g., FORTRAN).

If you have a copy of Microsoft's EXCEL program,   Dbank can import and export data directly from/to EXCEL spreadsheets using Window's Dynamic Data Exchange (DDE) facility.

Dbank can manage data with ANNUAL, HALF-YEARLY, QUARTERLY, MONTHLY, WEEKLY and DAILY frequency (which allows you to specify a 5, 6, or 7 day cycle).   Dbank also has a NULL frequency which is particularly useful for cross-sectional data.

If necessary,   Dbank will convert your data to a lower frequency during the export process (i.e., copying your data to a file that can be read by another program).   For example, it will convert daily data to monthly data, and monthly data to annual data.

Lastly, Dbank can mask a series during the export process.   It has a filter function which allows you to copy an observation in a series depending on the value taken by another series.   The filter function is useful for cross-sectional data.

DBANK form
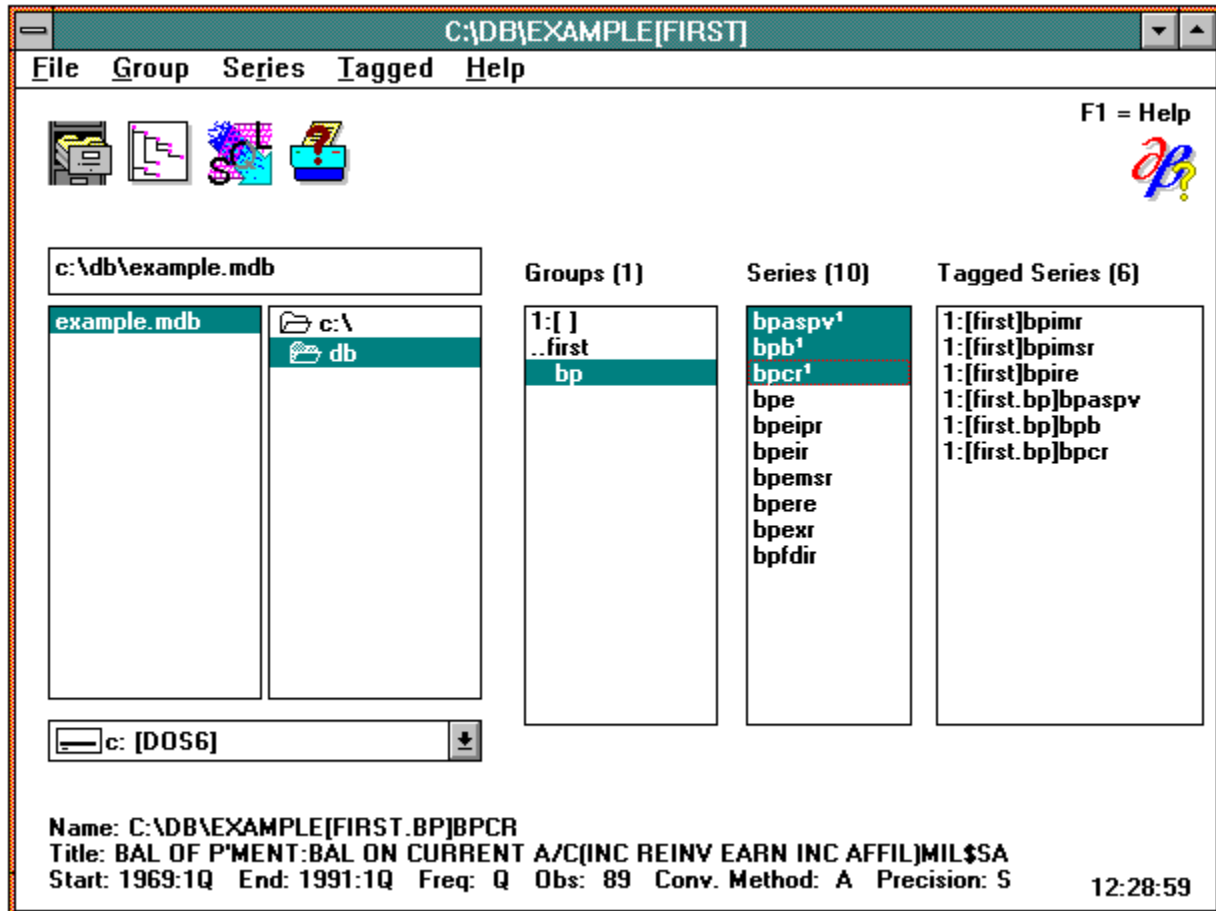
Dbank's startup form is shown above.   The important areas of this form are:

1.   **File List Box:**   lists all the data banks (i.e., files with extension: .MDB) in the default or current directory.   The data bank you are currently using is indicated by the black control bar (currently **EXAMPLE.MDB**).

2.   Directory List Box: shows the default directory (currently **C:\DB**) and all of the sub-directories beneath the default directory.   You can change the default directory using the keyboard or mouse.   The contents of the file list box are updated whenever you do so.

3.   Disk List Box: lists all the drives that your PC can access (including network drives).   The current drive and its label are shown in the body of the drive list box.   In the above form, the current drive is   **C**   with a label of   **MS_DOS_6**

4.   **Group List Box:** This list box appears only after you have opened a data bank.   It contains all the groups in the active data bank. The active group is indicated by the black control bar (currently **BP**, which belongs to the group called **FIRST**) in the group list box. Data bank operations (such as COPY, MOVE,   RENAME,   DELETE, and XDELETE) on a group can be executed from the GROUP menu. Dbank data banks possess a hierachical tree structure similiar to the PC-DOS file system.   Double-

clicking on a group fills the group list box with the names of the groups that belong to that group (and so on to any number of levels).   Double-clicking on the parent (**..FIRST** above) moves you up one level in the tree.   Double-clicking on the main group (**1:[]**   above)   moves you to the main or root group in the data bank.

5.   **Series List box:**   this list box appears after you open a data bank.   It contains all the series in the default group.   The active series (i.e., the series that will be affected by the next series menu command) is indicated by the black control bar (currently **BPASPV**).   Individual series are managed using the SERIES menu.

6.   Tag List Box: this list box appears only after you tag a series.   You can tag a group of series using the TAG command in the GROUP menu, or a single series using the TAG command in the SERIES menu.   You can also tag series/groups using the mouse; simply double-click on the object you wish to tag.   In the above form, some of the series in the FIRST group   have been tagged.   Note that tagged series have a superscript 1 appended to their name.   The superscript flags their tagged status.

7.   File Menu: contains all the commands Dbank provides to create and manipulate data bank files. Click on the File menu to invoke one of these commands, or type **Alt+F**.

8.   Group Menu: contains all the commands Dbank provides to create and manipulate the groups (and the associated sub-groups) in a data bank.   Click on the group menu to invoke one of these commands, or type **Alt+G**.

9.   Series Menu: contains all the commands Dbank provides to create and manipulate the series in the series list box.   Click on the series menu to invoke one of these commands, or type **Alt+R**.

10.   Tagged Menu: contains all the commands Dbank provides to manipulate the series in the tagged list box. Click on the tagged menu to invoke one of theses commands, or type **Alt+T.**

11.   Filing Cabinet Icon: when the cabinet is closed, double clicking the icon opens the highlighted data bank.   If the cabinet is open, double-clicking on the icon closes the active data bank.

12.   Tree Icon: double-click on this icon to invoke Dbank's "File Tree" command which provides a visual representation of a data bank's structure.

13.   SQL Icon: double-click on this icon to invoke Dbank's "File SQL Query" command which allows your to execute SQL queries on Dbank data banks.

14.   Printer Icon: double-click on this icon to invoke Dbank's "Printer Setup" command which allows your to permanently change your printer settings.

File List Box

Dbank's file list box contains all the data banks (i.e., all the *.mdb   files) in the current directory.   The active data bank is indicated by the highlighted control bar

The file list box allows you to make single and multiple selections.   To select a single file, click on a file using the mouse.   Shift+click or Shift+arrow key extends the selection from the previously selected item to the current item. Ctrl+click selects or de-selects an item in the list.

Directory List Box

The directory list box contains all the directories on the current drive.   You can select a directory using the keyboard or mouse.   Dbank updates the file list box whenever you change the default directory.

Drive List Box

The drive list box contains all the drives that your PC can access (including network drives).   The default drive is shown in the body of the list box.   You can change to another drive by clicking on the drive list box using the mouse.   Dbank updates the file and directory list boxes whenever you change the default drive.

Group List Box

The group list box contains all the groups in the current data bank.   You can select a group using the keyboard or mouse.   Dbank updates the series list box whenever you select another group.   Data bank operations on the group (and thus the series within the group) can be carried out using the Group Menu.

Dbank data banks possess a hierachical tree structure similiar to the PC-DOS file system.   Double-clicking on a group fills the group list box with the names of the groups that belong to that group (and so on to any number of levels).   Double-clicking on the parent group moves you up one level in the tree. Double-clicking on the main group moves you to the main or root group in the data bank.

The group list box allows you to make single or multiple selections.   To select a single group, click on a group using the mouse.   Shift+click or Shift+arrow key extends the selection from the previously selected group to the current group. Ctrl+click selects or de-selects a group in the list.

Series List Box

The series list box contains all the series in the current group.   You can select a series using the keyboard or mouse.   Data bank operations on the series can be carried out via the SERIES menu.

The series list box allows you to make single or multiple selections.   To select a single series, click on the series using the mouse.   Shift+click or Shift+arrow key extends the selection from the previously selected series to the current series.   Ctrl+click selects or de-selects a series in the list.

Tagged List Box

The tagged list box contains all the series in the data bank which you have tagged .   You can tag all the series in a particular group using the TAG command available in the GROUP menu, or you can tag a subset of the series in the current group using the TAG command in the SERIES menu.

The set of tagged series is basically a temporary group.   You can manipulate the series in the tagged group using Dbank's TAGGED menu.

The tagged list box allows you to make single or multiple selections.   To select a single series, click on the tagged series using the mouse.   Shift+click or Shift+arrow key extends the selection from the previously selected series to the current series. Ctrl+click selects or de-selects a series in the list.

By default, Tagged Menu commands operate on all the series in the tagged list box.   However, if you select any item(s) in the tagged list box, theTagged Menu commands affect only the selected series.

File Open Command

The File Open command opens a data bank.   All the data banks (i.e., *.mdb files) in the current directory are contained in the file list box.   You can select a data bank to open using the keyboard or mouse.   If the data bank can be opened successfully, Dbank will enable the Group and Series list boxes.   The Group list box contains all the groups in the current data bank, while the series list box contains all the series in the current group.

NOTE: you do not need to close the active data bank in to open another data bank.   Simply double-click on the data bank you wish to open to change to that data bank.

Shortcut Key: Ctrl+O, Enter; Spacebar.

Mouse Shortcut: Double-click the file you wish to open.

File Close Command

Closes the active data bank and removes the Group, Series and Tagged list boxes.   Note that moving to another data bank does not alter the contents of the tagged list box.   However, explicity closing the active data bank destroys the Tagged list box.

Shortcut Key: Ctrl+L.

File Query Command

Finds all the series in the selected data banks that satisfy your query.   The matched series are displayed in Dbank's BROWSE form, which allows you to COPY, DELETE, TAG, UNTAG, RENAME, EDIT, PLOT, and VIEW the series.   You can construct queries on the series titles ([Title]), the series names ([Name]), the frequency of the series ([Frequency]), and the "long-name" of the series ([Long Name]).

Any of these items can be combined into a single SQL query using the File Query SQL statement command.   For example, the SQL statement

      [Title] LIKE "*BALANCE*" and [Frequency] = "Q"

finds all the quarterly series in the selected data banks with the string "BALANCE" in their title.

File Copy Command

Copies a data bank.   The name of the new data bank cannot be the same as the source.   You may select more than one data bank before invoking the the File Copy command.

Shortcut Key: Ctrl+C.

File Delete Command

Deletes a data bank(.mdb), its index file(.px), and the data file(.fdb).   You may select more than one data bank before invoking the File Delete command.

Shortcut Key: Ctrl+D.

File Dump Command

Dumps the contents of a data bank (i.e., all the series and data) to an ASCII file structured in Dbank's FREE format.

Shortcut Key: Ctrl+P.

File Tree Command

Provides a visual outline of the data banks' current tree-structure.

Shortcut Key: Ctrl+E.

File Make Command

Creates a data bank(.mdb), its index file (.px), and its data file(.fdb).

Shortcut Key: Ctrl+K.

File Move Command

Moves a data bank to another directory/disk.   This command can be used to rename a data bank.   You can select more than one data bank before invoking the File Move command.

Shortcut Key: Ctrl+V.

File Squeeze Command

Removes unused bytes from a data bank (caused by prior deletion of series).   Dbank creates a new data bank containing the squeezed contents of the original.   You can select more than one data bank before invoking the File Squeeze command.

Shortcut Key: Ctrl+Z.

File Rename Command

Renames the data bank(.mdb), its index file (.px), and the data file(.fdb).   This command can be used to move a data bank to another directory/hard disk.   The File Rename command allows you to select more than one data bank.

Shortcut Key: Ctrl+R.

File Repair Command

Repairs a data bank.   You can select more than one data bank before invoking the File Repair command.

Shortcut Key: Ctrl+I.

File Upgrade Command

Updates an exisiting data bank to the latest Dbank format.   This command does nothing if the data bank's structure is current.

Shortcut Key: Ctrl+U.

File Make Read-Only Command

Makes the selected data bank read-only.

Shortcut Key: Ctrl+Y.

File Remove Write-Protection Command

Removes write protection from the selected data bank.

Shortcut Key: Ctrl+W.

File Add Command

This command reads data saved in an ASCII file into Dbank.   The data is added to the data bank with the same filename as the ASCII file.   The data bank will be created if it does not exist.   The ASCII input file can be organized in any one of Dbank's FREE, SERIES, or MATRIX formats.

If you have a copy of Microsoft's EXCEL,   the File Add command allows you read data in a EXCEL spreadsheet.   Dbank will prompt you for the name of the spreadsheet to read.   You will need to indicate the spreadsheet cells you want to copy.   For technical reasons,   spreadsheet data is always written to a data bank called "ADD_DATA".

Shortcut key: Ctrl+A.

File Add Data from DOS-DBANK Command

This command converts a DOS-Dbank file to the WINDOWS-Dbank format. The data is added to a data bank (which need not exist) with the same filename as the DOS-Dbank file.

This command is provided for downward compatibility with the character-based version of Dbank.

Shortcut key: Ctrl+N.

File Shell Command

Creates a character mode DOS session.   Type EXIT to destory the DOS session and return to Dbank.
Type CTRL-ESC to return to Dbank without destroying the DOS session.

Shortcut key: Ctrl+X.

File Calculator Command

This command calls up Windows' CALCULATOR program.   CALC.EXE must be on the active path for this command to work.

Shortcut Key: Ctrl+T.

File Excel Command

This command invokes Microsoft's EXCEL spreadsheet program.   EXCEL.EXE must be on the active path for this command to work.

Shortcut Key: Ctrl+M.

File Exit Command

Ends a Dbank session and closes all disk files.

Shortcut key: Ctrl+X.

Group Browse Command

Loads Dbank's BROWSE form with the all series in the selected groups.   The BROWSE form provides a tabular representation of a series' index record.   It also allows you to COPY, DELETE, TAG, UNTAG, RENAME, EDIT, PLOT and VIEW series.

Shortcut key: (if the group list box has the focus) 'B' or 'b'.

Group Copy Command

The group copy command copies all the series in the selected groups (and their sub-groups) to another group or data bank.   The destination group and data bank need not exist.

To copy a series to another data bank, you must provide a fully qualified series name to the copy command prompt --   i.e., use the syntax Drive:\Path\Data bank[GroupName].   For example, to copy all the series in the group [FIRST] to another data bank, say EXTRACT, in a group called [PAPER.WHITE], you type EXTRACT[PAPER.WHITE].   To copy the current group to another group within the same data bank,   specify the destination group only -- e.g., [PAPER.WHITE]

Shortcut key: (if the group list box has the focus) 'C' or 'c'.

Group Delete Command

Deletes the selected groups from the data bank.   The groups must be empty (i.e., they cannot contain any series).

Shortcut key: (if the group list box has the focus) 'D' or 'd'.

Group Label Command

Allows you to attach a label/description (< 80 characters) to a group.   You can edit existing group labels using this command.

Shortcut Key: (if the group list box has the focus) 'A' or 'a'.

Group Make Command

Creates a new group in the current data bank that belongs to the current group.

Shortcut Key: (if the group list box has the focus) 'K' or 'k'.

Group Move Command

Moves all the series in the selected groups (and their sub-groups) to another group or data bank.   The destination group need not exist.

Shortcut key: (if the group list box has the focus) 'V' or 'v'.

Group Query Command

Finds all the series in the selected groups (and their sub-groups) that satisfy your query.   The matched series are displayed in Dbank's BROWSE form, which allows you to COPY, DELETE, TAG, UNTAG, RENAME, EDIT, PLOT, and VIEW the series.   You can construct queries on the series titles ([Title]), the series names ([Name]), the frequency of the series ([Frequency]), and the "long-name" of the series ([Long Name]).

Group Sort Command

Sorts the entries in the group list box by name.

Shortcut Key: F2.

Group Rename Command

Renames (one at a time) the selected groups .

Shortcut Key: (if the group list box has the focus) 'R' or 'r'.

Group Tag Command

Tags all the series in the selected groups (and their sub-groups).   Dbank places the series in the Tagged List box.   You can manipulate the tagged series using the Tagged menu.

Shortcut Key: (if the group list box has the focus) 'T' or 't'.

Mouse short cut: select the group you wish to tag and then click on the RIGHT mouse button.

Group UnTag Command

UnTags all the series in the tagged list box that belong to the selected groups.

Shortcut Key: (if the group list box has the focus) 'U' or 'u'.

Group View Command

Loads the VIEW form with all the series in the selected groups (and their sub-groups). The VIEW form allows you to inspect the data stored in a series.

Shortcut Key: (if the group list box has the focus) 'W' or 'w'.

Group Peek Command

Loads the PEEK form with all the series in the selected groups (and their sub-groups). The PEEK form allows you to inspect a subset of the data stored in the series.   It is particularly useful for inspecting series which have too many observations for Dbank's VIEW form.

Shortcut Key: None.

Group Xdelete Command

Deletes all of the series in the selected groups and their sub-groups and (optionally) the groups themselves.

Shortcut Key: (if the group list box has the focus) 'X' or 'x'.

Group Print Command

Prints all the series in the selected groups and their sub-groups (including the data).

Shortcut Key: (if the group list box has the focus) 'P' or 'p'.

Group Print Index Command

Prints the index record for all the series in the selected groups and their sub-groups.

Shortcut Key: {if the group list box has the focus} 'I' or 'i'.

Group Mosaic Time Plot Command

Produces a mosaic time plot of all the series in the selected groups and their sub-groups.

Shortcut Key: (if the group list box has the focus) 'L' or 'l'.

Group Summary Statistics Command

Computes various summary statistics (e.g., mean, variance) for all the series in the selected groups and their sub-groups.

Shortcut Key: (if the group list box has the focus) 'M' or 'm'.

Series Add Data Command

Reads series data stored in a file and adds the data to the current data bank.   The data can be organized in Dbank's "FREE" (*.FRE), "MATRIX" (*.MAT) or "SERIES" format; or it can be read directly from a Microsoft Excel spreadsheet (*.XLS).   The filetype of the input file implies the structure of the input file. You need a copy of EXCEL in order to read *.XLS files.

Shortcut Key: (if the series list box has the focus) 'A' or 'a'.

Series Browse Command

Loads Dbank's BROWSE form, which provides a tabular representations of the index records of the selected series.   The BROWSE form allows you to perform various data bank operations on individual series, including COPY, DELETE, TAG, UNTAG, RENAME, EDIT, PLOT, and VIEW.

Shortcut Key: (if the series list box has the focus) 'B' or 'b'.

Series Copy Command

Copies the selected series to another series, group, or data bank.   To copy a series to another data bank, use the syntax Drive:\Path\FileName[GroupName]SeriesName.   For example, to copy the series BPASPV in the group [FIRST] to another data bank, say EXTRACT, in a group called [PAPER.WHITE.A4], you type EXTRACT[PAPER.WHITE.A4]BPASPV when the Series Copy command prompts for the destination of the series.   To copy to another group within the same data bank, you specify just the destination group e.g., [PAPER.WHITE.A4].

Shortcut Key: (if the series list box has the focus) 'C' or 'c'.

Series Delete Command

Deletes all the selected series.

Shortcut Key: (if the series list box has the focus) 'D' or 'd'.

Series Edit Command

Invokes the EDIT form, which allows you to change the series' index record and data.

Shortcut Key: (if the series list box has the focus) 'E' or 'e'.

Series Input Command

Invokes the INPUT form, which allows you manually input data into a data bank.

Shortcut Key: (if the series list box has the focus) 'N' or 'n'.

Series Make Command

Creates a new series from existing series in the data bank. Series Make accepts an algebraic expression involving series or numbers and computes the result. Make recognizes the following operators:

^ (power), - (unary negation), ***** (multiplication), **/** (division), \ (integer division), % (Modulo arithmetic), %# (Modulo arithmetic without integer truncation), + (addition), - (subtraction), = (equal to), <> (inequality), **<** (less than), **>** (greater than), <= (less than or equal to), >= (greater than or equal to), ! (Bitwise unary NOT), & (Bitwise AND), | (Bitwise OR), ^| (Bitwise XOR), == (Bitwise EQV), => (Bitwise IMP)

and the following functions:

Abs (Absolute) Log (log to base e), Log10 (log to base 10), Sqr, Fix (towards 0), Int (towards left), Ceil (ceiling), Sgn, Rnd (stochastic random number), Rndfix (deterministic random number), Deg (Degree), Rad (Radian), Exp (exponential), ExpSmooth(exponential smoother), Smooth (Friedman's Super Smoother), Acf (correlogram), Pdf (probability density function), Lead (lead a series one period), Lag (lag a series one period), Ma (centered moving average), Diff (difference), MDiff (multiple difference), SigDigits (significant digits of a number), Round, Reverse (reverse the vector), Csum (cumulative sum), Cprod (cumulative product), Sort, Permute (shuffle the vector), Index, Rank, Period, Ismiss (flags missing values), Pack (remove missing values), Trim (trim a vector), Sin, Cos, Tan, Sec, CoSec, CoTan, Asin, Acos, Atan, Asec, Acosec, Acotan, Sinh, Cosh, Tanh, Sech, Cosech, Cotanh, Asinh, Acosh, Atanh, Asech, Acosech, *and* Acotanh.

With the exception of ACF, LEAD, LAG, ROUND, DIFF, MDIFF, MA, SIGDIGITS and the EXPSMOOTH functions, all of the listed functions accept a single argument. The argument may be a single series or the result of any algebraic operation(s) on any series.

The syntax for the ACF, LEAD, LAG, ROUND, DIFF, MDIFF, MA, SIGDIGITS, and EXPSMOOTH functions is

        fn(arg1, arg2, arg3, arg4...);

that is, they accept two arguments or more rather than one.

In the case of LEAD/LAG, arg2 is the number of periods to LEAD/LAG the series (i.e., arg1). DIFF(x,k) = x(t)-x(t-k), and MDIFF(x,k) applies DIFF(x,1) to x(t) k - 1 times. MA(x,k) computes a kth period (centered) moving average of x. In ROUND, arg2 is the number of decimals to round arg1 to. If k is negative, ROUND rounds arg1 to the (-k+1)st digit to the left of the decimal point. For the EXPSMOOTH function, arg2 can be any real number between 0 and 1 (inclusive). For ACF, arg2 is the maximum auto correlation lag. SIGDIGITS(x,k) returns the number of required (k) significant digits of x. If k is negative, SIGDIGITS(x,k) preserves any integer part of x. For TRIMR(), arg2 is the number of data points to remove from the *beginning* of the vector, and arg3 is the number of data points to delete from the *end* of the vector.

Arg2 can be omitted when using some of these functions. Arg2 defaults to one (1) in the ACF/LEAD/LAG/DIFF/MDIFF functions and to zero (0) in ROUND.

Functions can be nested to any depth (memory permitting). For example, if x and y are series in the current data bank, then the following algebraic expression is allowed:

lead(exp(lag(abs(log(x+y)^4),5)),10)

Note that the result of the operation will be a series of the same frequency as series x and y. The length (or sample period) of the new series will be the maximum sample period over which both x and y exist.

The symbol PI# has been defined to   (the mathematical constant) in Series Make.

Make accepts fully qualified series names (i.e., data_bank[group]ser_name).   However, if fully qualified names appear on the right-hand side of the equation, they MUST be enclosed in double quotes (" "). Note that the data bank on the left-hand side of the equation need not exist.

Lastly, Make accepts more than one algebraic expression at a time.   Separate each expression using a semi-colon (;).   Thus, typing

a1 = ln(bpaspv) ; a2 = exp(bpaspv)

in Make's input box creates two series, a1 and a2.

Operator precedence: arithmetic operators are evaluated first, comparison operators are evaluated next, and logical operators are evaluated last.   Within individual categories, operators are evaluated in the following order of precedence:

Arithmetic	Comparison	Logical
Power (^)	Equality (=)	Not (!)
Negation (-)	Inequality (<>)	And(&)
Multiplication and division (*, /)	Less than (<)	Or(|)
Integer division (\)	Greater than (>)	Xor(^|)
Modulo arithmetic (%, %#)	Less than or Equal to (<=)	Eqv(==)
Addition and subtraction (+, -)	Greater than or Equal to (>=)	Imp(=>)

All comparison operators have equal precedence; thus they are evaluated in the left-to-right order in which they appear in the expression.   Important: **-1** (negative one) is *true* in Dbank, and **0** (zero) is *false*.

When multiplication and division occur together in an expression, each operation is evaluated as it occurs from left to right.   Likewise, when addition and subtraction occur together in an expression, each operation is evaluated in order of appearance from left to right.

You can override the operator precedence table by using parentheses.

Shortcut Key: (if the series list box has the focus) 'K' or 'k'.

Series Move Command

Moves the selected series to another group and/or data bank.   Dbank will prompt you for the name of the new group.   The destination group need not exist.

Shortcut Key: (if the series list box has the focus) 'V' or 'v'.

Series Probability Density Estimate Command

Estimates the probability density of a single series and plots the result using Dbank's XYPLOT form.

Shortcut Key: (if the series list box has the focus) 'Y' or 'y'.

Series Rename Command

Renames (one at a time) the selected series.

Shortcut Key: (if the series list box has the focus) 'R' or 'r'.

Series Scatter Plot Command

Provides an XY plot of the last two selected series in the series list box.

Shortcut Key: (if the series list box has the focus) 'O' or 'o'.

Series Sort Command

Sorts the entries in the series list box.

Shortcut Key: F3.

Series Time Plot Command

Loads the Plot form, which plots the selected series against time.

Shortcut Key: (if the series list box has the focus) 'L' or 'l'.

Series Tag Command

Tags the selected series.   Dbank appends a superscript "1" to the series name in the Series list box. This provides you with an easy way to identify tagged series in the current group.

You can tag a particular series more than once.   When you do so, the tagged series will be moved to the end of the tagged list box.   This feature is provided because Dbank's scatter plot form always uses the last two series in the tagged list box.

Shortcut Key: (if the series list box has the focus): 'T' or 't'.

Mouse short cut: press the RIGHT mouse button, or double-click on the series you wish to tag.

Series View Command

Loads Dbank's View form with the selected series.   Dbank's View form allows you to inspect the data stored in a series.

Shortcut Key: (if the series list box has the focus): 'W' or 'w'.

Series Peek Command

Loads Dbank's PEEK form with the selected series.   Dbank's PEEK form allows you to inspect a subset of the data stored in a series.   It is particularly useful for inspecting series which have too many observations for Dbank's VIEW form.

Shortcut Key: None.

Series UnTag Command

UnTags the selected series, removing their entries from the Tagged list box.

Shortcut Key: (if the series list box has the focus): 'U' or 'u'.

Series Print Command

Prints the selected series (and their data).

Shortcut Key: (if the series list box has the focus) 'P' or 'p'.

Series Print Index Command

Prints the index record for the selected series.

Shortcut Key: (if the series list box has the focus): 'I' or 'i'.

Series Summary Statistics Command

Computes various summary statistics (e.g., mean, variance, etc) for the series you have selected in the series list box.

Shortcut Key: (if the series list box has the focus): 'M' or 'm'.

Tagged Browse Command

Loads Dbank's BROWSE form with the tagged series. The BROWSE form has a SERIES menu, from which you can COPY, DELETE, MOVE, EDIT, RENAME, TAG, UNTAG, PRINT, and VIEW the series in the tagged group.

Shortcut Key: (if the tagged list box has the focus) 'B', or 'b'.

Tagged Copy Command

Copies the tagged series to another data bank/group.   To copy to another data bank, use the syntax Drive:\Path\File[GroupName].   Thus to copy all the series in the tagged series to another data bank, say EXTRACT, in a group called [PAPER], you type EXTRACT[PAPER] when the Tagged Copy command prompts you for the destination of   the series.   To copy to another group within the same data bank, specify just the destination group -- e.g., [PAPER].

Shortcut key: (if the tagged list box has the focus) 'C' or 'c'.

Tagged Delete Command

Deletes the tagged series.

Shortcut key: (if the tagged list box has the focus) 'D' or 'd'.

Tagged Edit Command

Invokes the EDIT form, which allows you to change the tagged series' index record and data.

Shortcut Key: (if the tagged list box has the focus) 'E' or 'e'.

Tagged Move Command

Moves the tagged series to another group.   The destination group need not exist.

Shortcut Key: (if the tagged list box has the focus) 'V' or 'v'.

Tagged Rename Command

Renames (one at a time) the series in the tagged list box.

Shortcut Key: (if the tagged list box has the focus) 'R' or 'r'.

Tagged Sort Command

Sorts the items in the tagged list box.

Shortcut Key: F4.

Tagged UnTag Command

Untags all the series in the Tagged list box , and removes the tagged list box.

Shortcut Key: (if the tagged list box has the focus) 'U' or 'u'.

Mouse short cut: press the RIGHT mouse button.

Tagged View Command

Invokes Dbank's View form with the tagged series. Dbank's View form is used to inspect data stored in the series.

Shortcut Key: (if the tagged list box has the focus) 'W' or 'w'.

Tagged Peek Command

Invokes Dbank's PEEK form with the tagged series.   Dbank's PEEK form is used to inspect a subset of the data stored in the series.   It is particularly useful for inspecting series which have too many observations for Dbank's VIEW form.

Shortcut Key: None.

Tagged Print Command

Prints all the series in the tagged list box (and their data).

Shortcut Key: (if the tagged list box has the focus) 'P' or 'p'.

Tagged Print Index Command

Prints the index record of the series in the tagged list box.

Shortcut Key: (if the tagged list box has the focus) 'I' or 'i'.

Tagged ACE Command

Executes the ACE algorithm on the series in the tagged list box.

ACE was published by Leo Breiman and Jerome Friedman on pp. 580-619 of the September, 1985 issue (Volume 80) of the Journal of the American Statistical Association: *Estimating Optimal Transformations for Multiple Regression and Correlation (with discussion)*.   Tagged ACE implements this procedure for all the series in the tagged list box.

Shortcut Key: (if the tagged list box has the focus) 'A' or 'a'.

Tagged Export Command

Invokes Dbank's DUMP/EXPORT form, which allows you to copy the tagged series to an ASCII file or an Excel spreadsheet.   The output file can be structured in any one of the supported formats (i.e., AREMOS, BMDP, FREE, TSP, GAUSS, LIMDEP, MATRIX, SAS, SERIES, SST, RATS, LOTUS, EXCEL and QUATTRO).

Before you can copy a series, you must indicate the desired format (using the Format menu), the sample period for the copy command (click on the BOUNDS button), and the output file (use the File Open or File Append command).

Shortcut key: (if the tagged list box has the focus) 'X' or 'x'.

Tagged Mosaic Single Y vs Xs Plot Command

Produces a mosaic scatter plot of the first series in the tagged list box against the remaining series in the tagged list box (taken one at a time).

Tagged Mosaic (X,Y) Pairs Plot Command

Produces a mosaic (X,Y) pairs plot of the series in the tagged list box.

Tagged Mosaic Time Plot Command

Produces a mosaic time plot of the series in the tagged list box.

Tagged Time Plot Command

Provides a time plot of the first 14 tagged series in the tagged list box.

Shortcut Key: (if the tagged list box has the focus) 'L' or 'l'.

Tagged Scatter Plot Command

Loads the XY Plot form, which displays an XY plot of the LAST two series in the tagged list box.

Shortcut Key: (if the tagged list box has the focus) 'E' or 'e'.

Tagged OLS-IV-2SLS Regression Command

Loads Dbank's regression module using the selected variables in the tagged list box.   Dbank supports Ordinary Least Squares (OLS) and Instrumental Variable Estimation (IV, 2SLS).

Shortcut Key: (if the tagged list box has the focus) '2'

Loads the XY Plot form, which displays an XY plot of the LAST two series in the tagged list box.

Shortcut Key: (if the tagged list box has the focus) 'E' or 'e'.

Tagged Summary Statistics Command

Computes various summary statistics (e.g., mean, variance) for all the series in the tagged list box.

Shortcut Key: (if the tagged list box has the focus) 'M' or 'm'.

Export File Menu - Open

Use the OPEN command to specify the name of the output file for the tagged series.

You do not need to specify a file extension; Dbank will append an extension to the filename depending on the current output format.

Note: Dbank disables the OPEN command until you specify the output format.

Export File Menu - Close

The CLOSE command closes the current output file.

Export File Menu - Peek

This command allows you to peek at the output file created by the EXPORT form.   Only the first 15K of the file is displayed.

Export File Menu - Missing Value

Use the MISSING VALUE command to alter Dbank's default missing value code.   The missing value code is the number which Dbank places in the output file to flag that an observation is missing.

You do not need to specify a missing value code.   By default,   Dbank uses a period '.' for a missing value (provided the destination program accepts a period as a missing value indicator).   If the destination program does not accept a period,   Dbank uses 'NaN' , which stands for 'Not a Number'

Export File Menu - Verbose

The VERBOSE command allows you to monitor the progress of the copy command.   When VERBOSE is active,   DBANK displays the name of the series it is processing.

Export File Menu - Shell

The SHELL command creates a character mode DOS session.   Type EXIT or CTRL-ESC to return to Dbank.

Export File Menu - Exit

The EXIT command closes the EXPORT form.

Export File Menu

Use the OPEN command to specify the name of the output file to which Dbank will copy the tagged series.   Do not provide a file extension when using the Open command; Dbank will append an appropriate extension to the filename that depends on the current output format.   Note that Dbank disables the OPEN command until you have chosen an output format.

The CLOSE command closes the output file.

Use the MISSING VALUE command to specify the missing value code for output.   This is the number which Dbank uses to flag a missing value in the output file.

You need not specify a missing value code.   By default,   Dbank uses a period   '.'   for the missing value (provided the destination program accepts a period for its missing value indicator).   If the destination program does not accept a period,   Dbank uses   'NaN' , which stands for 'Not a Number'.

The VERBOSE command allows you to monitor the progress of the copy command.   When VERBOSE is active,   DBANK will display the name of the series it is processing.

The SHELL command creates a character mode DOS session.   Type EXIT or CTRL-ESC to return to Dbank.

The EXIT command closes the EXPORT form.

Export Convert Menu

The CONVERT menu controls the manner in which Dbank converts time series to lower frequencies.   By default, Dbank will automatically convert a time series to a lower frequency using the conversion method saved in the series index record.

The OFF command suppresses automatic conversion (automatic conversion is the default).   In this case, Dbank attempts to copy each tagged series as is.   However,   please note that this is possible only if the tagged series have the same frequency as the current global frequency (as specified with the bounds form) and the output format does not require that the data have the same number of observations.

The AUTOMATIC command allows you to override the default conversion method specified in the series' index record.   You may choose any one of the five conversion methods available: (a) FIRST;   (b) LAST; (c) SUM; (d) AVERAGE; and (e) MID-POINT.   The conversion method you select is applied to all the series copied to the output file.

The PROMPT command instructs Dbank to prompt you for a conversion method before copying the series.   It supports two modes:

(a) For all series: In this case, Dbank will prompt you for a conversion method for each of the series to be copied, even if a conversion method has been specified for the index record; and,

(b) Only if necessary.   In this case,   Dbank will prompt you for a conversion method only if a conversion method has NOT been specified in the index record.

Export Convert Menu - OFF

The CONVERT menu controls the manner in which Dbank converts time series to lower frequencies during the copy process.   By default, Dbank automatically converts a time series to a lower frequency using the internal conversion method indicated in the series' index record.

The OFF command suppresses automatic conversion (the default), forcing Dbank to copy the series as is (assuming this is possible).

Export Convert Menu - Automatic

The CONVERT menu controls the manner in which Dbank converts time series to lower frequencies during the copy process.   By default, Dbank automatically converts a time series to a lower frequency using the internal conversion method indicated in the series' index record.

The AUTOMATIC command allows you to override the default conversion method.   You may select any one of the five conversion methods available: (a) FIRST;   (b) LAST; (c) SUM; (d) AVERAGE; and (e) MID-POINT.   The conversion method you select is applied to all the series that will be copied to the output file.

Export Convert Menu - Prompt

The CONVERT menu controls the manner in which Dbank converts time series to lower frequencies during the export process.   By default, Dbank automatically converts a time series using the internal conversion method indicated in the series' index record.

The PROMPT command instructs Dbank to prompt you for a conversion method before it copies a series to the output file.   It supports two modes:

(a) For all series: In this case,   Dbank will prompt you for a conversion method, even if an internal conversion method exists in the series' index record; and,

(b) Only if necessary.   In this case,   Dbank will prompt you for a conversion method only if an internal conversion method has not been specified in the index record.

Export Format Menu

This menu controls Dbank's output format.   Select the desired format.   Note that DDE to Excel initiates a "Dynamic Data Exchange" between MicroSoft's Excel speadsheet and Dbank.   You need access to Excel for this feature to work.

Export Filter Menu

Dbank can filter a variable according to the value of another series (called the filter variable). If the filter mode is set to inclusive, Dbank copies the data in a series only if the corresponding observation in the filter variable is EQUAL to the current filter (e.g. '1'). However, when the filter mode is exclusive, Dbank will EXCLUDE the data point if the corresponding observation in the filter variable is equal to the filter value.

The FILTER command is particularly useful for cross-sectional data, where it is often necessary to extract a subset of a series depending on the value of another series.

Use the "Specify Filter Variable..." command is to specify the name of the filter variable. Although filter variable does not have to be in the same data bank, it must have the same frequency as the current global frequency.

The OFF/ON command allows you to temporarily switch the filter variable on/off.

The "Value" command allows you to specify the filter value. For example, if the filter value is set to 1, then Dbank will copy an observation in the tagged series only if the corresponding observation in filter variable is equal to 1. The filter variable may be set to '.' -- i.e., Dbank's missing value code. Note that the VALUE command implies that the same variable can store more than one filter. The same variable can therefore extract different observations depending on the filter value.

Export Filter Menu - Inclusive Mode

Dbank can filter a series according to the value of another series (called the filter variable).   This command is particularly useful for cross-sectional data, where it is often necessary to extract a subset of a series depending on the value of another series.   When the filter mode is inclusive, Dbank copies data in a series only if the corresponding observation in the filter variable is EQUAL to the current filter value (e.g. '1').

Export Filter Menu - Exclusive Mode

Dbank can filter a series according to the value of another series (called the filter variable). This command is particularly useful for cross-sectional data, where it is often necessary to extract a subset of a series depending on the value of another series. When the filter mode is exclusive, Dbank copies data in a series only if the corresponding observation in the filter variable is NOT equal to the current filter value (e.g. '1').

Export Filter Menu - Filter Variable

Dbank can filter a series according to the value of another series (called the filter variable).   This command is particularly useful for cross-sectional data, where it is often necessary to extract a subset of a series depending on the value of another series.

Use the "Specify Filter Variable..." menu item to specify the name of the filter variable.   Although filter variable does not have to be in the same data bank, it must have the same frequency as the current global frequency.

Export Filter Menu - ON/OFF

Dbank can filter a series according to the value of another series (called the filter variable).   This command is particularly useful for cross-sectional data, for which it is often necessary to extract a subset of a series depending on the value of another series.

The OFF/ON command allows you to temporarily switch filter on/off.

Export Filter Menu - Value

Dbank can filter a series according to the value of another series (called the filter variable). This command is particularly useful for cross-sectional data, for which it is often necessary to extract a subset of a series depending on the value of another series.

The VALUE command allows you to specify the filter value. For example, if the filter value is 1, then Dbank will copy an observation in the tagged series only if the corresponding observation in filter variable is equal to 1. The filter variable may be set to '.' -- i.e., Dbank's missing value code. Note that the filter value must be set to a number which exists in the current filter variable.

The VALUE command allows you to have more than one filter value in the same filter variable. The same filter variable can therefore extract different observations depending on the current setting of filter value.

Export "Do It" Button

Press the "Do It!" button of the EXPORT form when you are ready to copy the series to the output file.

Important: Dbank disables the "Do It!" button until all of the following parameters are specified:

(a) the sample period;
(b) the output format; and
(c) the name of the output file.

BOUNDS Button Form

Before you can copy a series to the output file, you must specify the sample period for the copy command.   The BOUNDS button of the EXPORT form allows you to do this.   Pressing the BOUNDS button brings up the BOUNDS form.

The FREQ menu allows you to specify the frequency of the sample period [i.e,   ANNUAL, HALF-YEARLY, QUARTERLY, MONTHLY, WEEKLY, DAILY (5,6,7 day cycle), or NONE].   Fill in the text boxes with the required start date and end date.

For weekly and daily data, you need to specify the first day, month and year, and the last day, month and year.

For half-annual, quarterly, and monthly data you need to specify the first year and the first period (i.e., the first half year for half-yearly data;   the first month for monthly data, and the first quarter for quarterly data), and the last year and period.

For annual data, you need only specify the first and last year.   This is also the case for data stored with no frequency (such as cross-sectional data).   The first observation would have a start date of   '1'.   The last observation would have an end date of 'N', where N is the number of observations in the series.

The CHECK button is for checking your entry before pressing the OK button.   The OK button processes the BOUNDS.

The CANCEL button removes the BOUNDS form without changing the current sample.

Group List Box, Series List Box, Tagged List Box

Group List Box: contains all the groups in the open data bank.
Series List Box: contains all series in the current group.
Tagged List Box: contains all the series that the user has tagged.

You can move through the list boxes using the keyboard or the mouse.

Data Bank Directory

The data bank directory allows you to select a series within the current data bank.   You can select a series using the keyboard or the mouse.   Double click on either the group list box or the series list box to select the series.   Press the escape key to exit without selecting a series.

Export Tagged Menu

The "Tagged" menu of the Export form allows you to change the series in the tagged list box of the Export form.   You can add and delete series from the tagged list box.   Use the "Add Variables..." menu item to add a series to the tagged list box.   The "Remove Variables" menu item deletes series from the tagged list box.   Lastly, the "View" menu item allows you to inspect the data associated with the series in the Export tagged list box.

Export Tagged Menu - Add Variables

The "Tagged" menu allows you to change the series in the tagged list box of the Export form.   Use the "Add Variables..." menu item to add a series to the tagged list box

Export Tagged Menu - Remove Variables

The "Tagged" menu allows you to change the series in the tagged list box of the Export form.   The "Remove Variables" menu item deletes series from the tagged list box.

Export Tagged Menu - View

The "Tagged" menu allows you to change the series in the tagged list box of the Export form.   You can also view the data associated with the series in the tagged list box.   Use the "View" menu item to do so.

Copying your Data to an Output file

Before you can copy the tagged series to an output file, you must:.

(1) Select an output format by clicking on the FORMAT menu.

(2) Specify an output file by clicking on the FILE menu, and then selecting Open File.

(3) Specify the range of observations to copy by clicking on the BOUNDS button.

Once you have completed these steps,   Dbank will enable the "Do It!" button.   Click the "Do It" button to begin exporting the tagged series.

Reading data into DBANK -- General Information

Dbank can process three types of ASCII data files: FREE format,   SERIES format and MATRIX format. The default input format is FREE.   If you have a copy of Microsoft's EXCEL spreadsheet,   Dbank can also read the data stored in an EXCEL spreadsheet using Window's Dynamic Data Exchange facility.

The SETUP program installs examples of each of the ASCII files on your hard disk (they are stored in the same directory that you installed Dbank).   The file called EXAMPLE.FRE is organized in Dbank's FREE format. Two other files, EXAMPLE.SER and EXAMPLE.MAT, are examples of Dbank's SERIES and MATRIX input formats (respectively).   You can use these files to learn how to create data banks and manage data.

Input files are processed by the Add Data... command which appears in both the File and Series menus of Dbank's startup (or main) form.   If you invoke the Add Data...   command from the Series menu, Dbank will add the data stored in the ASCII file to the data bank you have opened.   However, if you invoke the command from the File menu, Dbank adds the data to a data bank with the same filename as the ASCII input file (Dbank will create the data bank if necessary).

1. FREE format (default extension: .FRE)

To read your data into Dbank using Dbank's FREE format you need to create an ASCII file that contains, for each series,   the following information:

1. [group name{.sub_group{.sub_group}}...]Name Obs Freq   F_year   F_period   F_day   Con_Code Precision Long_Name
2. Series Titlethis is where you put the title of the series
3. Data Values

where:

1.   **'[group_name{.sub_group{.sub_group}}...]Name'** is the identifier of the series.   For example, [CITY.NY]BPB is a legal Dbank name.   BPB is the name of the series and it belongs to the sub-group NY in the group called CITY.   Note that group, sub-group, and series names cannot be longer than 8 characters.   Also, fully qualified group names must be delimited by left and right brackets (i.e., [ ])

A group (or sub-group) does not need to exist to add data to a data bank; Dbank will automatically create the group during the reading process.

2.   **'Obs'** is the number of observations in the series

3.   **'Freq'** is a one-character code representing the frequency or periodicity of the series.   Data with ANNUAL(A), HALF-YEARLY(H), QUARTERLY(Q), MONTHLY(M), WEEKLY(W), DAILY - 7-day week (D), DAILY - 6-day week (S), DAILY - 5-day week (F),   or a NULL (N) frequency can be saved in a Dbank data bank.   The   NULL   frequency is most appropriate for cross-sectional data.

4.   **'F_year'** is the first year of the data.   Use 1 for data with a NULL frequency.

        'F_period' is the first period of the data.   For HALF-YEARLY data, F-period can be set to 1 or 2; for QUARTERLY use 1, 2, 3 or 4; for MONTHLY, WEEKLY, and DAILY data use any integer in the range from 1 and 12 (inclusive), and for data with NULL frequency, use 0.

'F_day' is the first day of the data (use the appropriate day of the month for WEEKLY and DAILY data; 0 for other frequencies).

5.   **'Con-code'** is the conversion method Dbank should apply to the series when converting the data to a lower frequency (e.g., from WEEKLY to ANNUAL).   Dbank currently supports 5 conversion methods: (a) AVERAGE; (b) SUM; (c) FIRST; (d) LAST; and (e) MID-POINT.   You may also specify   NONE   to prevent conversion.   Only the first letter of the conversion method need be specified in the input file.

6   **'Precision'** is the precision with which Dbank will save the data in the data bank.   Dbank can save data in SINGLE or DOUBLE precision.   Single precision requires four (4) bytes per number; double precision requires eight (8).   Use single precision to minimize the size of your data bank.   Only the first letter of the precision need be specified.

7.   **'Data'** is the actual data of the series. The amount of data Dbank expects to read is determined by the number of observations specified in step 2 above.   Use as many records (or lines) as you need to list all the data.   The input format is free.

8.   **'Long_Name'** (optional) is the long-name of the series (up to 50 characters).   Use this argument to provide a more descriptive name for a series.   Note that Dbank does not allow you to locate a series according by its long-name.

Note that the input file can contain any number of series (of any frequency and precision).

Dbank supports missing values on input.   The missing value code is a period (i.e., '.').   You can change the missing-value code to a numeric value by including the following command in the input file:

    MVAL   'your own missing value (e.g., -999).'

For example,

    MVAL   -999

sets the missing value to -999.

Dbank will not use -999   when it actually saves the data in the file.   Dbank stores missing values using a special missing value code. On output, missing values are indicated by   'NaN'   (i.e., Not a Number)   or a   period ('.'), provided the destination program supports it.

The following lines show the correct input format for a cross-sectional (Freq = N) series with 10 observations:

```
[DEBT]DEBTLXL   10     N     1    0    0  N  S  DEBT_STOCK_RATIO
debt-stock to exports ratio
              0.871850014    .                1.08260000   1.32647002   0.68683999
              0.91070997    1.06666005    1.31024003   1.91513002   1.51312006
```

Dbank will store the series DEBTLXL in the group DEBT using SINGLE precision. Its title will be 'debt-stock to exports ratio'. The series long-name is DEBT_STOCK_RATIO. As DEBTLXL is cross-sectional data, its frequency is set to N (for 'NULL'), the first period is '1', and the conversion method is set to NONE. Note that the second observation is missing in the above example.

This is the correct format for a quarterly series with 58 observations:

```
[FIRST.US.Q]BPASPV      58  Q      1976    1  0  A  D
BAL OF P'MENT:U.S.PRIVATE ASSETS_ NET(MIL$_S.A.)
                -10838.00       -9207.00        -8782.00        -15671.00
                   284.00      -11273.00        -5408.00        -14320.00
                -14397.00       -4597.00        -8424.00        -29784.00
                 -3535.00      -15129.00       -28069.00        -12718.00
                 -8240.00      -24236.00       -17031.00        -23295.00
                -17429.00      -19886.00       -15953.00        -47410.00
                -31658.00      -38825.00       -22784.00        -20129.00
                -23765.00        -297.00        -9278.00        -16562.00
                 -1037.00      -20168.00        15974.00        -17221.00
                 -3119.00        838.00         -3357.00        -15408.00
                -13137.00      -22608.00       -22851.00        -31724.00
                 11459.00      -25815.00       -25581.00        -33156.00
                  4661.00      -19048.00       -36960.00        -31885.00
                -29821.00       11017.00       -38654.00        -45496.00
                 36713.00      -26190.00
```

Dbank will save BPASPV in the sub-group called Q which belongs to the sub-group US with parent FIRST. The series will be saved in double precision. The series starts in the first quarter of 1976. Dbank will convert the series to a lower frequency using the average of the appropriate quarters. The series will not have a long-name.

If the input file contains series that already exist in the destination data bank, Dbank will, by default, overwrite the contents of the series with the data in your input file. If you wish to simply update the data in an existing series without destroying the non-overlapping data in the data bank, switch to Dbank's update mode by inserting the command

        UPDATE ON

in the input file. You can switch off update mode with the command

        UPDATE OFF

The update command is allowed only in FREE format input files

2. SERIES format (default extension: .SER)

Series format is similar to FREE format but much simpler. You do not need to specify anything except

the name of the series.   The name of the series may optionally be preceded by a group specification.

The following lines show the correct format for the BPASPV series using the SERIES format:

[FIRST]BPASPV

-10838.00	-9207.00	-8782.00	-15671.00
284.00	-11273.00	-5408.00	-14320.00
-14397.00	-4597.00	-8424.00	-29784.00
-3535.00	-15129.00	-28069.00	-12718.00
-8240.00	-24236.00	-17031.00	-23295.00
-17429.00	-19886.00	-15953.00	-47410.00
-31658.00	-38825.00	-22784.00	-20129.00
-23765.00	-297.00	-9278.00	-16562.00
-1037.00	-20168.00	15974.00	-17221.00
-3119.00	838.00	-3357.00	-15408.00
-13137.00	-22608.00	-22851.00	-31724.00
11459.00	-25815.00	-25581.00	-33156.00
4661.00	-19048.00	-36960.00	-31885.00
-29821.00	11017.00	-38654.00	-45496.00
36713.00	-26190.00		

Dbank will determine the number of observations in BPASPV.   It will save BPASPV in a group called [FIRST] (which need not exist in the current data bank) using double precision storage and the NULL frequency.

You may include as many series as you wish in a single   .SER   file.

3. Matrix format (default extension: .MAT)

Matrix format is the simplest format supported by Dbank.   To use this format, your data must be organized as a matrix in the input file.   Each column of the matrix is treated as a separate series, while each row is regarded as a separate observation on each of the series.   If there are no labels on the first line of the input file,   the first column will be named C1.   The second column will be named C2, and so on.   You can override this naming convention by providing names for each column on the FIRST line of the input file.

Dbank will save the data in a group with the same name as the input file.   Thus, if EXAMPLE.MAT contains four columns of data, Dbank will automatically create (assuming it does not exist already) a group called [EXAMPLE] with four series named   C1, C2, C3, and C4.   By default, the series are saved in the current data bank using double precision storage and the NULL frequency.

The following is an example of a MATRIX input file, say FIRST.MAT.   Dbank will create four series (each with six observations):

-9345.00	-9207.00	-8782.00	-15671.00
284.00	-11273.00	-5408.00	-14320.00
-14397.00	-4597.00	-8424.00	29784.00

-3535.00	-15129.00	-28069.00	-12718.00
-45256.00	-82949.00	-47575.00	-24242.00
-87484.00	-53245.00	-23455.00	-23423.00

As there are no labels in the input file, Dbank will name the first column 'C1'. The second column will be called 'C2', and so on. Each column will be saved in the current data bank using the NULL frequency and double precision storage. The columns will be saved in the group called [FIRST] (i.e., the name of the input file).

ROUNDING:

Dbank is able to round the input numbers to a given number of decimal places. Insert the following line in your input file:

ROUND n

where n is the number of decimal places to round the input number. If n is negative, ROUND rounds the input number to the (-n+1)st digit to the left of the decimal point. You can insert more than one ROUND statement in the input file. Once activated, rounding can be switched off by the command

ROUND OFF

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