Perseus – Alternate Frequency Control (AFC)
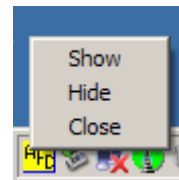## Version 3.00
17. Feb. 2011

A small utility to enter the receiver frequency quickly without using the mouse. The commands are sent to Perseus.exe over Vcom. Perseus.exe should be runnning when starting AFC.

It is realized as a background process.
After launching the programm you see an icon ⟶
in the system tray:

Right click on that icon brings up the popup menu:
From here you can show the application, hide it or close it.

To bring the application quickly into the foreground there is defined a system-wide hotkey, initially it is the Numpad-Subtract-key ("-").
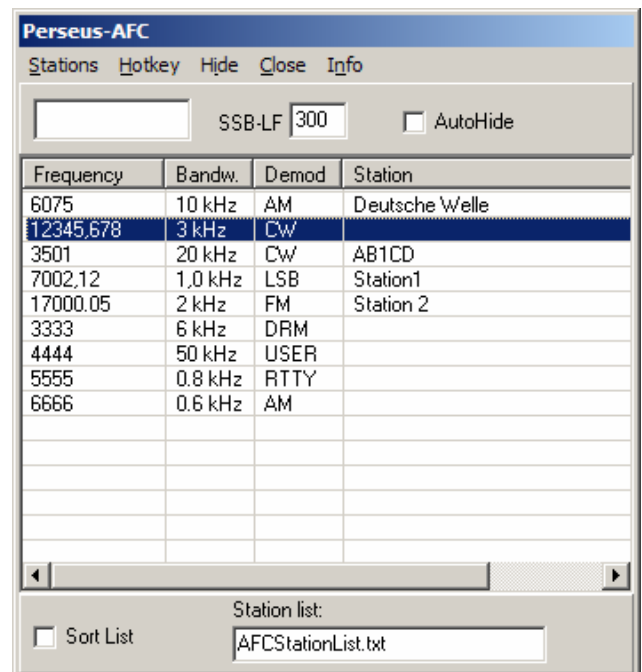
Press the hotkey - regardless what other application is active, the main window will popup:

Now you can enter a frequency in the
Edit-field. After pressing the Enter-key
the Perseus is set to that frequency

You can enter frequencies without or
with decimal places, the separator
can be a comma or a dot.

The "AutoHide" checkbox determines if AFC
hides itself after pressing Enter.

"SSB-LF" is the lower nf bandpass frequency
in Hz when using SSB. To change the value
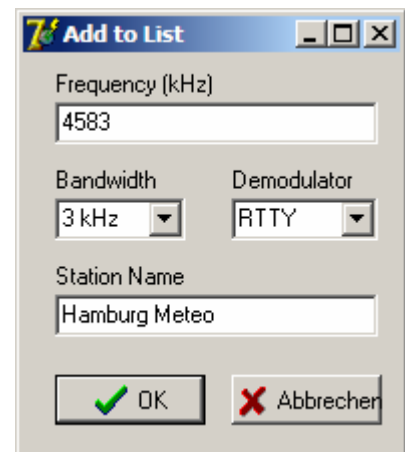click it, enter the value and hit Return finally.

Setup Station-List:

Double-clicking the Edit-field opens the Station-Entry-Mask:
Enter the values and click "OK" to add an entry to the list.

Clicking or scrolling these items sets the Perseus to this
Values.

Entries can be saved to "AFCStationList.txt"
before closing the application. This file can
easily be edited manually (see below).

You can enter or delete an entry too by
right clicking into the list.

Installation:

No installation necessary, copy the Exe-File, the Ini-File and the stationlist to any directory.
No other files needed.

AFC and Perseus-Software:

AFC must know what Version of Perseus-Software is running. This is defined in the Ini-File
"AFC.ini" (see below for details). If AFC is started without Ini-File the default is V2.1f.
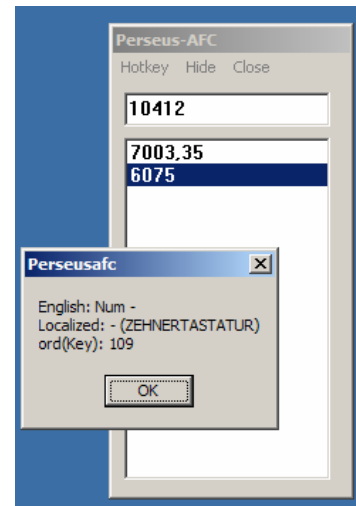
Keep in mind that the CI-V-Interface allows to set the nf bandwidth from Version 3 or higher.
If you are useing Perseus V2 the bandwidth value is ignored.

It seems that SSB and bandwidth 1.6kHz or 0.8kHz produces a faulty frequency scale in the
nf display.

Menu:

"Hotkey -> Show":

You can see different descriptions for the actual hotkey.

"Hotkey -> Change":

Press the appropriate key, but be careful, the Hotkey is defined system-wide, so if you choose the F1-key, you will never again get help for other applications, as F1 normally launches the Help-function in many other applications.
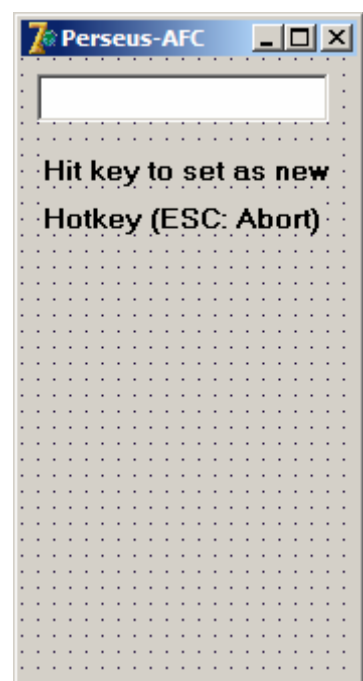
"Escape" aborts changing the Hotkey.

The Hotkey is deleted when "AFC" is closed.

The Hotkey is defined from the File "AFC.ini". If this file can't be found the default-Hotkey is Numpad-Subtract (-).

You can't combine a key with CTRL, Alt or Shift.

As i found out not all keys can be used as hotkey, some keys will not work (e.g. F12).

Ini-File AFC.ini:

Section [Hotkey] – Ident "Key" defines the Hotkey

Section [Perseus] – Ident "Version" defines the Perseus-Program-Version.
Valid values are "V2.1f", "V2.1d", "V30" or "V40".

Section [Autohide] – Ident "Checked" defines the Autohide-Checkbox.

Section [SSB] – Ident LowerCutOffFreq defines the lower bandpass frequency on SSB

Section [VCOM] – Ident Port should be set to that pair of com0com you are using

The Ini-File will be created automatically with default values if it is not present.

Stationlist AFCStationList.txt:

Defines the Frequency-Entries into the list. The value are self explanatory:

```
    6075;  50;   AM; "Station 1"
12345,678;  25;   CW; "Station 2"
    3501;  12;   CW; "Station 3"
 7002,12;   3;  LSB; "Station 4"
17000,05; 0.8;   FM; "Station 6"
    3333;  50;   AM; "Station 7"
    4444;  25;  DRM; "Station 8"
    4444;  25; USER; "Station 8"
    5555; 1.6; RTTY; "Station 9"
```

At closing with saving the list it is formatted in the shown format. If you edit the entries you must can chose an other format and after saving the list it is reformatted.

Important is:

- Values except the station-name contain no blanks
- Values are separated by semicolon
- To enter blanks in the station name it must be double quoted
- No blank line.