



# **SCS**chat\_ALE

## **User's Manual**

**Software Version 1.40.00\_RC**

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## 1. Introduction

**SCSchat\_ALE** is a chat and file transfer application software for P4dragon modems from **SCS**. Compared to the non-ALE version, it provides additional support for the ALE option. It allows ALE configuration of the modems as well as calls in standalone ALE mode and combined ALE / PACTOR mode.

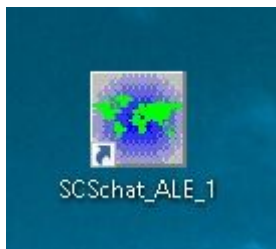
## 2. Installing the Software

The software is distributed as a single ZIP file containing the **SCSchat\_ALE.exe** executable and the sub-folder “sound”. For “installing” the software, just generate a new folder on your computer, e.g. “SCSchat\_ALE” and copy the entire contents of this ZIP file to that new folder,

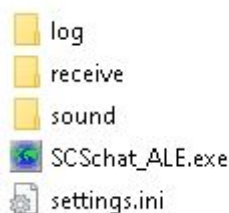


including the “\sound” sub-folder and its contents:

Generate a shortcut to SCSchat\_ALE.exe on your Desktop:



If **SCSchat\_ALE** is started the first time, it automatically generates additional files and sub-folders:

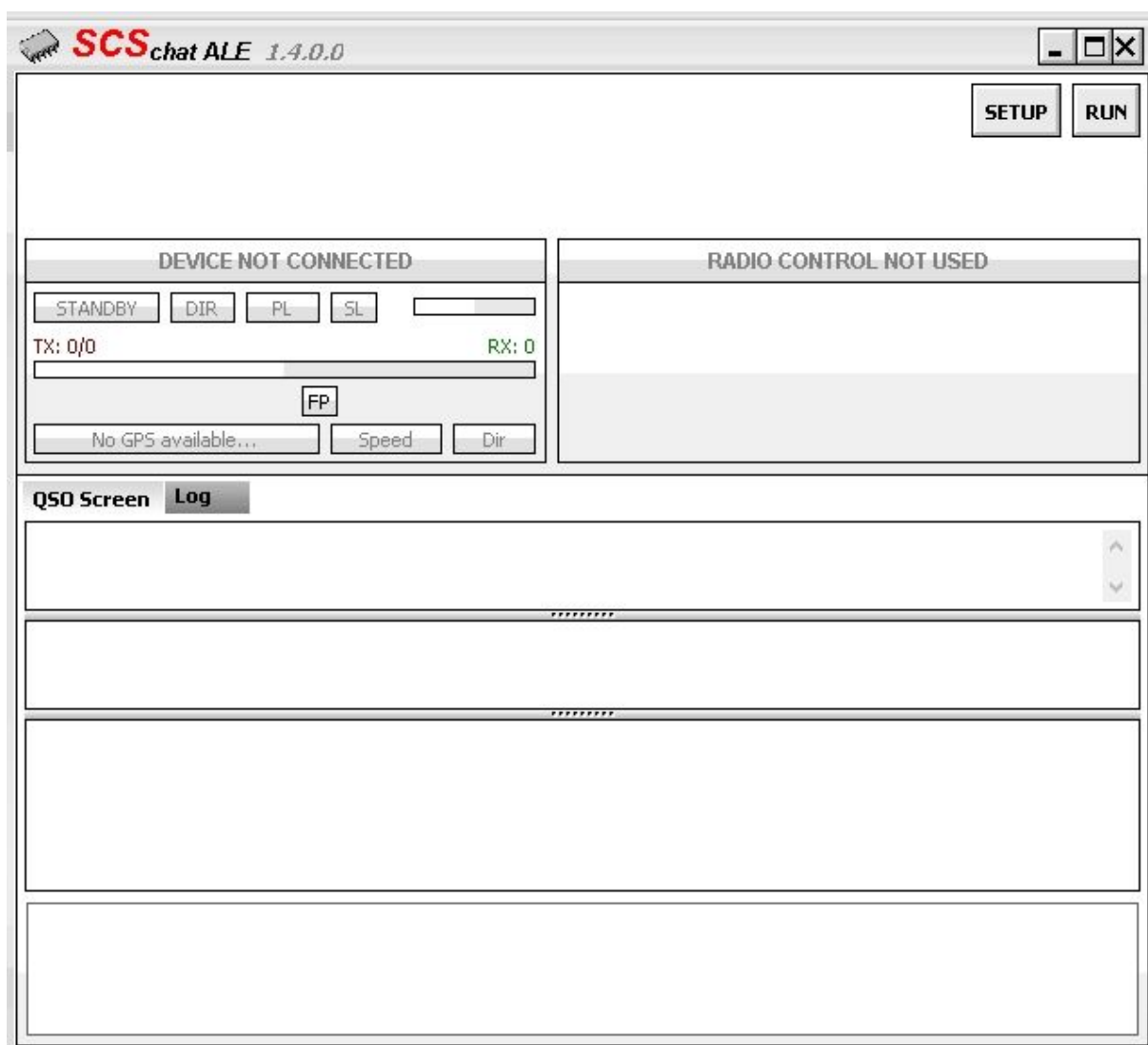


### 3. Configuration / Setup

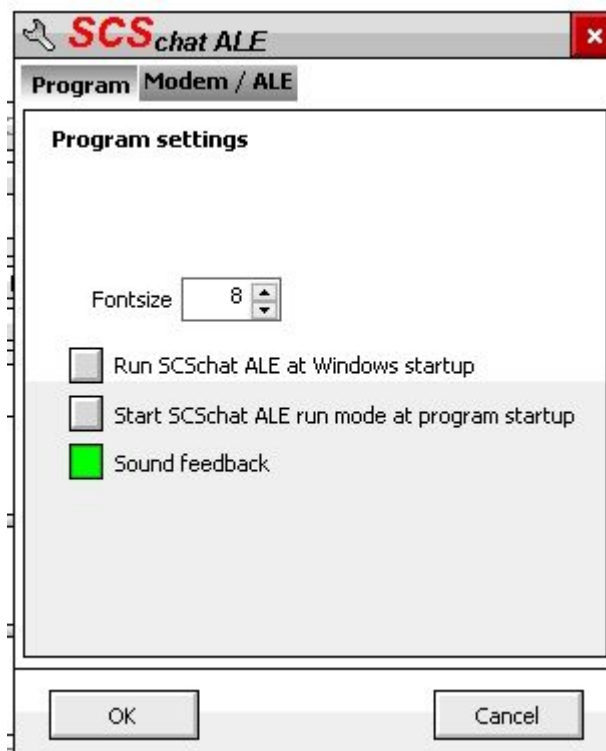
For using **SCSchat\_ALE** permanently you need a valid feature license (FLICENSE) for your **SCS** modem including “**ALE option**” as well as “**SCSchat\_ALE support**”.

If your modem does not contain an ALE FLICENSE but is still within the ALE trial period (100 free ALE links), the **SCSchat\_ALE** software will still work without SCSchat\_ALE license during that trial period.

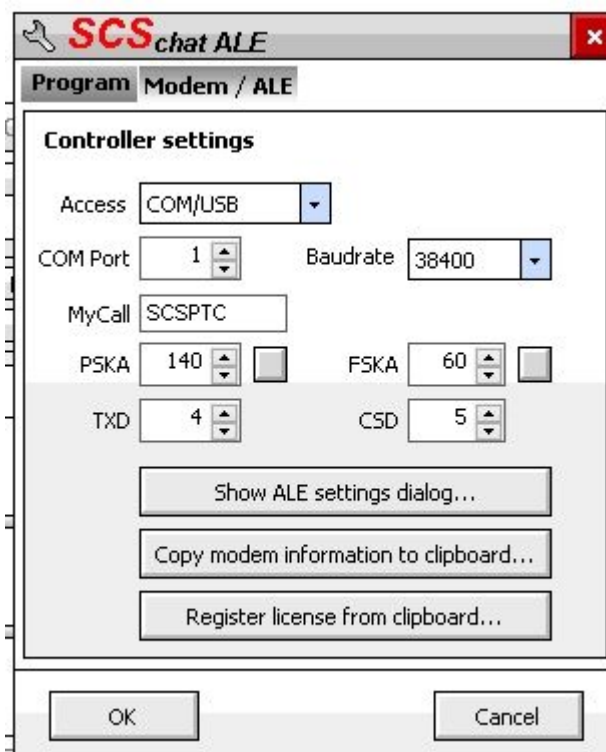
After starting **SCSchat\_ALE** the first time, the following GUI appears:



You have to click the **SETUP** button first. The main configuration screen appears:



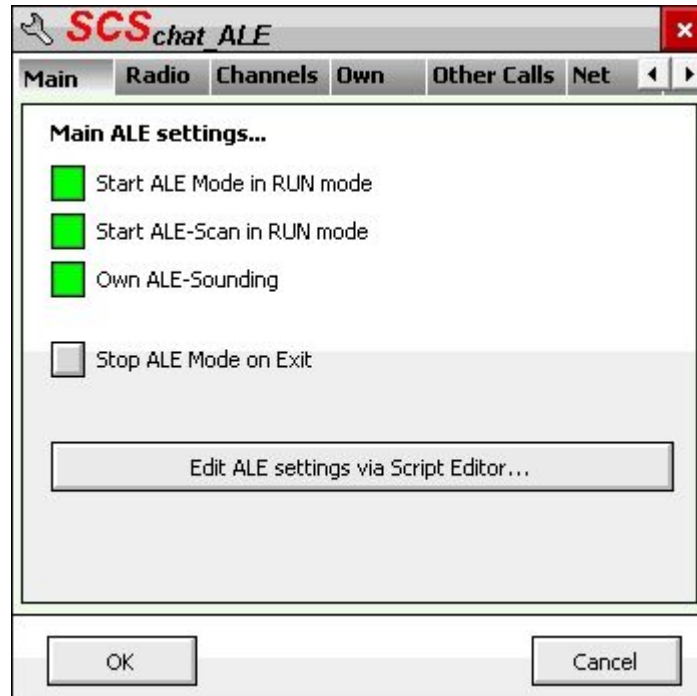
Choose the desired options and then click **Modem / ALE**. The **Controller settings** will appear:



Set the correct **COM Port** and the **Baudrate** (can always be set to 115200 for P4dragons) for the virtual COM port the modem is connected to, your **MYCALL** (also used as default for

ALE!), **PSKA** as well as the **FSKA** transmit levels and then click on **Show ALE settings dialog**:

The **Main** ALE configuration dialog appears:



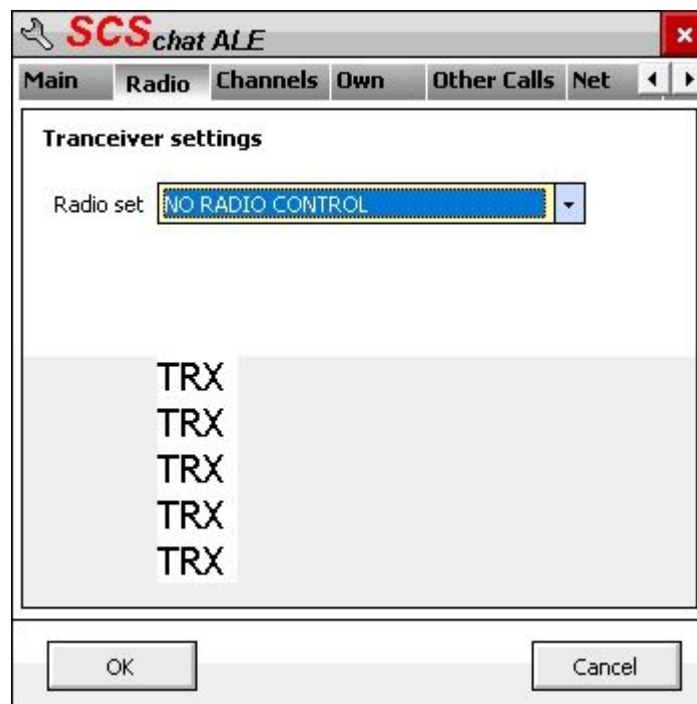
For ALE operation you at least have to choose the option “**Start ALE Mode in RUN mode**”

**There are two different options for performing the setup, either graphically via input masks or in text form via the SCSchat\_ALE-internal editor.**

Both options are complementary, i.e. the inputs are also adopted and displayed by the other input option. In principle, you can also change the setup variant during setup, but we do not recommend this.

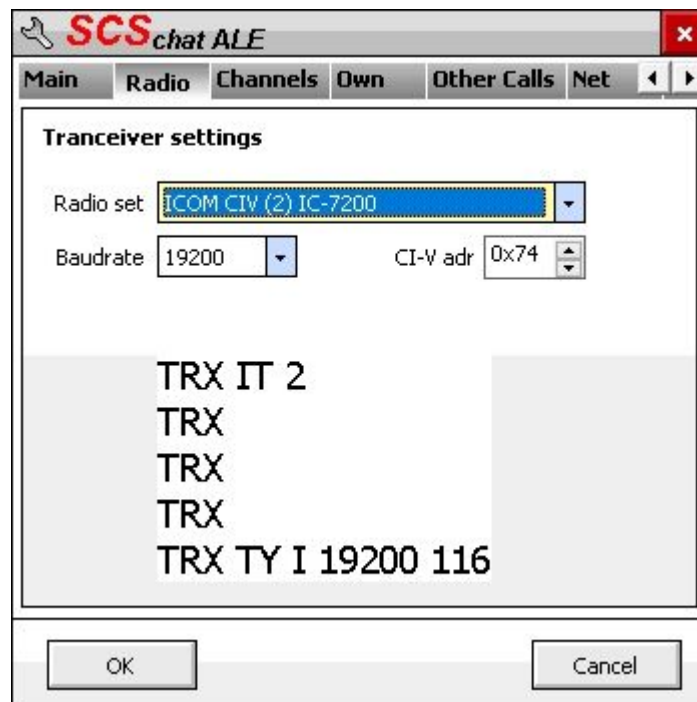
## Graphical Setup

Then click on the **Radio** tab:



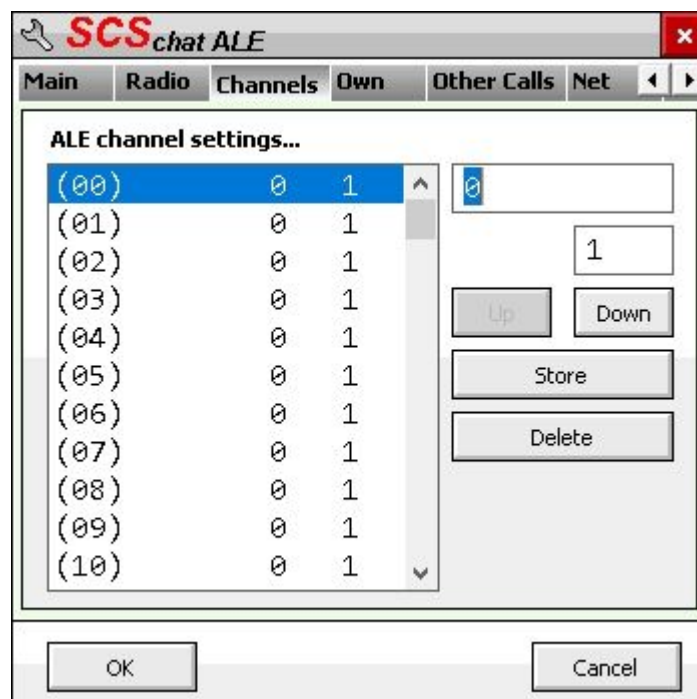
Scroll down and choose the appropriate "Radio set", set the desired Baudrate as well as further settings, like CI-V address for ICOM.





The software will generate all the required modem commands automatically and display them as “TRX” commands. Continue the setup by clicking the tab **Channels** or save everything defined up to now by clicking OK.

The **Channels** dialog allows to define up to 100 channels. The **SCSchat\_ALE** GUI allows to set the frequencies and the “Group” flags, see ALE Manual. By default, the scan group is set to 1 (single standard scan group).



Click a channel entry and then define the corresponding frequency in Hertz as well as the Groups flags at the input field below of the frequency mask, finally press the **Store** button. Repeat this for all the channels you want to define.

The screenshot shows the 'Channels' tab of the 'SCS chat ALE' window. The title bar includes a home icon, the text 'SCS chat ALE', and a close button. The tab bar has 'Main', 'Radio', 'Channels' (selected), 'Own', 'Other Calls', and 'Net'. The main area is titled 'ALE channel settings...'. It contains a list of 11 channels (00-10) with their frequencies and a 'Groups' column. Channel (00) is selected, showing a frequency of 3600500 and a group of 1. To the right of the list are input fields for the selected channel's frequency (3600500) and group (1), along with 'Up', 'Down', 'Store', and 'Delete' buttons. At the bottom are 'OK' and 'Cancel' buttons.

Channel	Frequency	Groups
(00)	3600500	1
(01)	3603000	1
(02)	3606000	1
(03)	3609000	1
(04)	3612000	1
(05)	3615000	1
(06)	0	1
(07)	0	1
(08)	0	1
(09)	0	1
(10)	0	1

Now go to the **Own** tab. This allows to define the possible ALE own commands. Per default there is only one entry which is set to your PACTOR MYcall (defined in the **Modem/ALE** tab above). The own table defines the possible ALE MY addresses. Choose one of these addresses in the lower input mask as the current **ALE MY** address as well as the **Scan Group** you currently want to use, see ALE Manual.

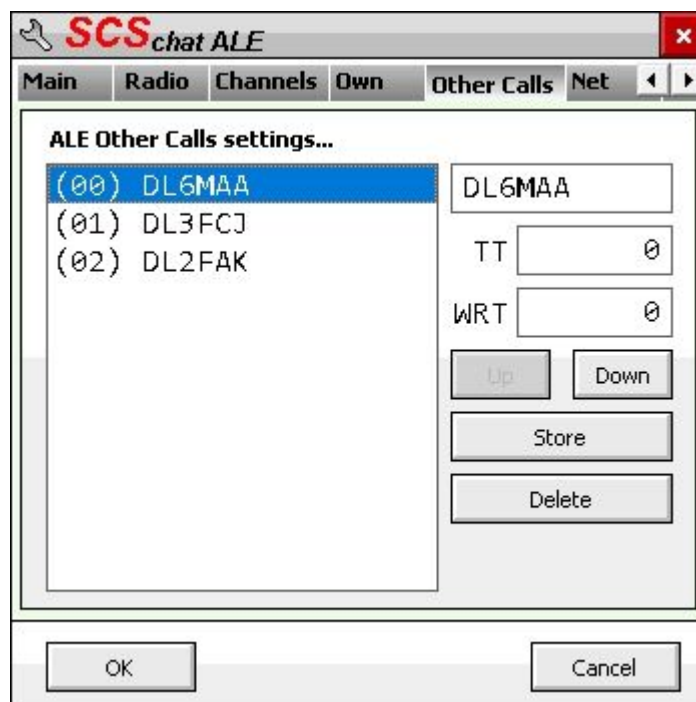
The screenshot shows the 'Own' tab of the 'SCS chat ALE' window. The title bar is the same. The tab bar has 'Channels', 'Own' (selected), 'Other Calls', 'Net', and 'Advanced'. The main area is titled 'ALE - Own Call settings...'. It contains a list of 8 entries (00-07). Entry (00) is selected, showing 'DL6MAA'. To the right are input fields for the selected entry's value (DL6MAA) and group ID (1), along with 'Up', 'Down', 'Store', and 'Delete' buttons. Below this list are two more sections: 'ALE - My Call settings...' with a dropdown menu showing 'DL6MAA', and 'Group ID setting...' with an input field showing '1'. At the bottom are 'OK' and 'Cancel' buttons.

Entry	Value
(00)	DL6MAA
(01)	
(02)	
(03)	
(04)	
(05)	
(06)	
(07)	



**Remark: Please note that the automatic ALE / PACTOR no longer works if PACTOR-MyCall and ALE MY differ.**

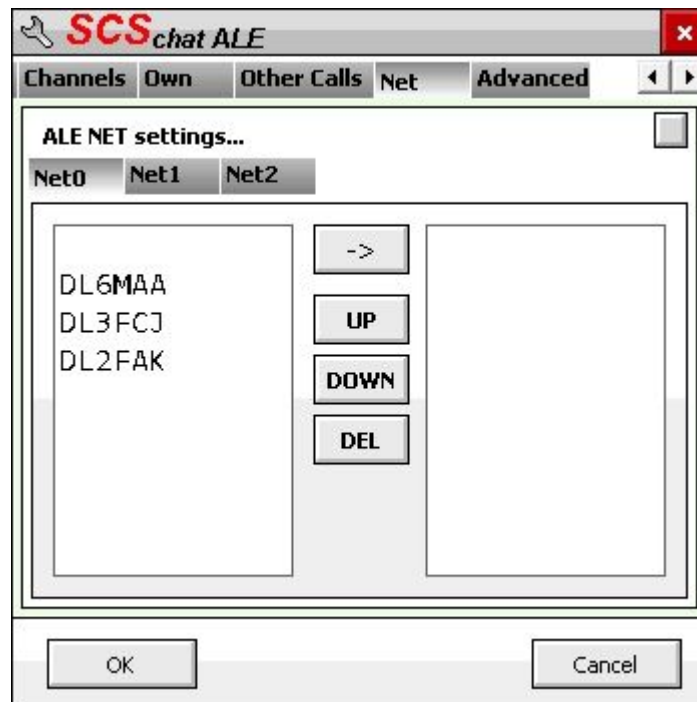
If you want to continue the setup and define **ALE Other** calls, finally press **Other Calls** and enter all the static ALE callsigns of your ALE environment:



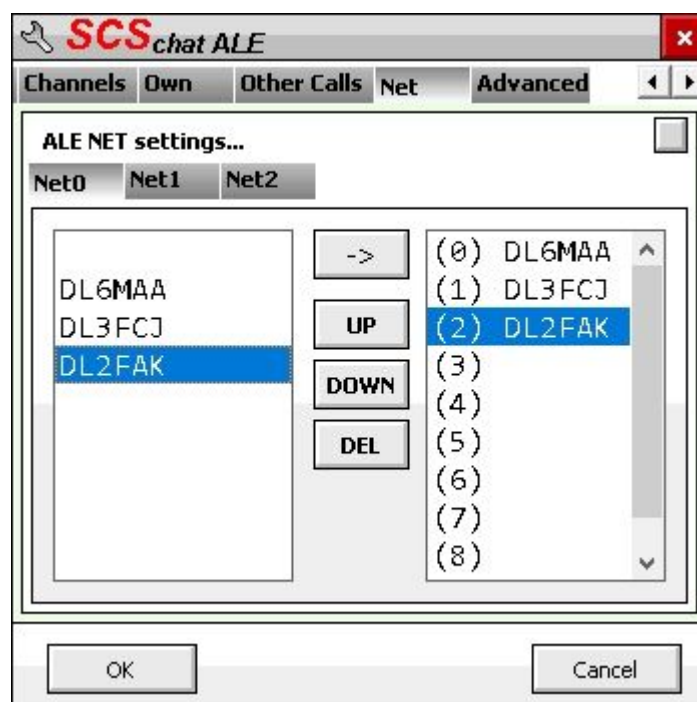
For each Other Call you may enter a TT (tune time) and WRT (wait response time) value, see ALE manual. The value 0 means that the modem uses the defaults for these settings.

For continuing the setup, go to the **Net** tab in order to define ALE networks or click to OK for finishing the ALE setup.

The **Net** configuration screen allows to define up to 3 ALE networks. These networks have fixed names (Net0 through Net2).



All **ALE other** calls as well as the previously defined **MYCALL** can be selected as members of an ALE net. Please be aware of the fact that the order of callsigns also assigns the so-called network slot time and thus is very important for proper network protocol processing. The order must be identical at all net locations.

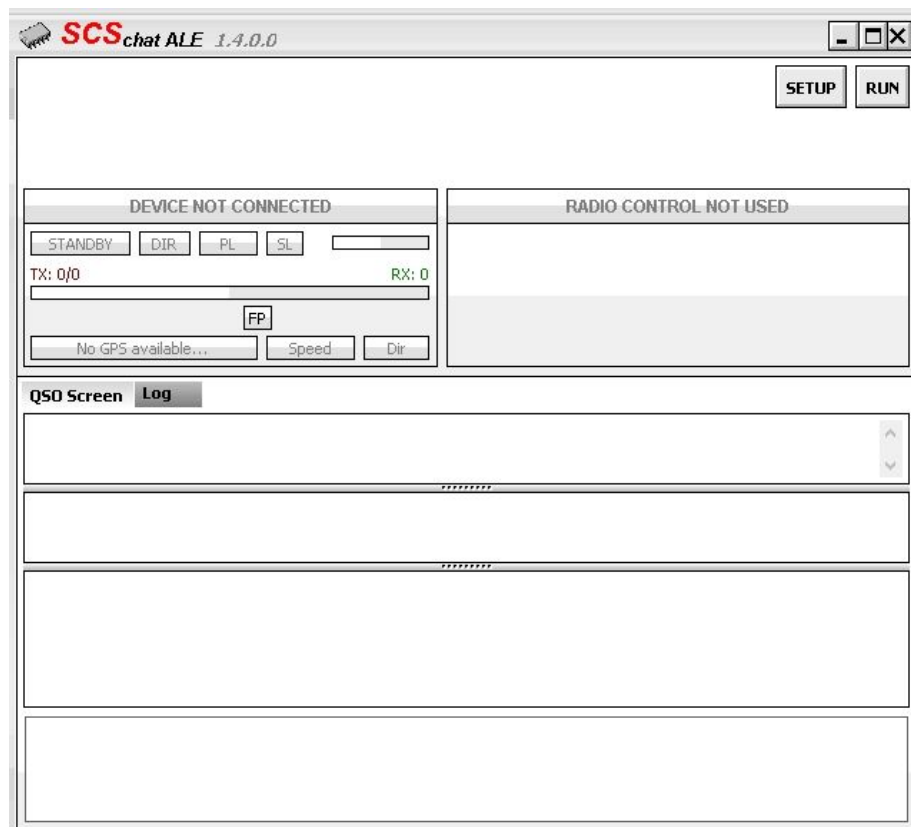


If you want to add extra ALE modem commands (for advanced ALE configuration) to the configuration, you have to go on to the **Advanced** tab, otherwise press OK. You should not place “ALE channel” or “ALE other” commands in this additional command list.



Then press OK for finishing the ALE setup. Also click OK on the (still open) **Modem / ALE** dialogue to finally **store the new configuration**.

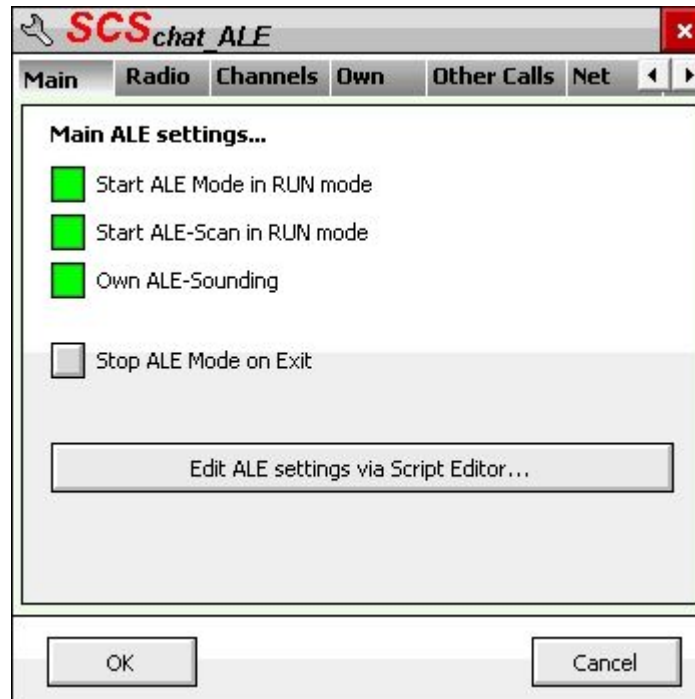
The GUI returns to the initial main screen:



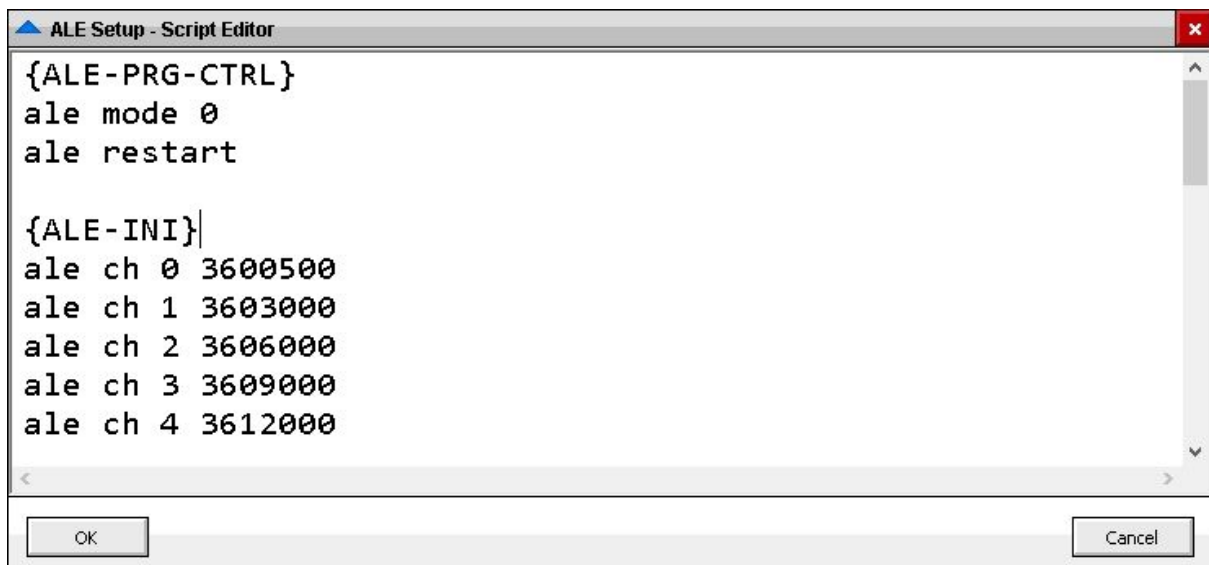
## Text-Based Setup

Now let's go through the alternate configuration process using the configuration editor provided by SCSchat\_ALE...

Press "Edit ALE settings via Script Editor..."



This opens the ALE Script Editor:



After the configuration that we have just carried out in the graphical user interface, the editor contains the following setup:

**{ALE-PRG-CTRL}**

```
ale mode 0
ale restart
```

**{ALE-INI}**

```
ale ch 0 3600500
ale ch 1 3603000
ale ch 2 3606000
ale ch 3 3609000
ale ch 4 3612000
ale ch 5 3615000
ale own 0 DL6MAA
ale my DL6MAA
ale other + DL6MAA
ale other + DL3FCJ 1000 1000
ale other + DL2FAK
ale net Net0 DL6MAA DL3FCJ DL2FAK
```

**{ALE-INI-TRX}**

```
trx it 3
trx ty i 19200 116
```

**{ALE-INI-ADV}**

```
ALE MCPT 15
ALE TWA 1
ALE STATPORT 3
```

**{ALE-INI}**

```
ale sound 1
ale scan 1
ale mode 1
```

**{ALE-DEINI}**

You may edit (add or delete) ALE modem commands or normal modem commands in the respective areas. The content of the editor window can therefore be freely edited - and if the commands are valid and known, they are immediately transferred to the graphical user interface. You may also copy and paste contents from other editors.

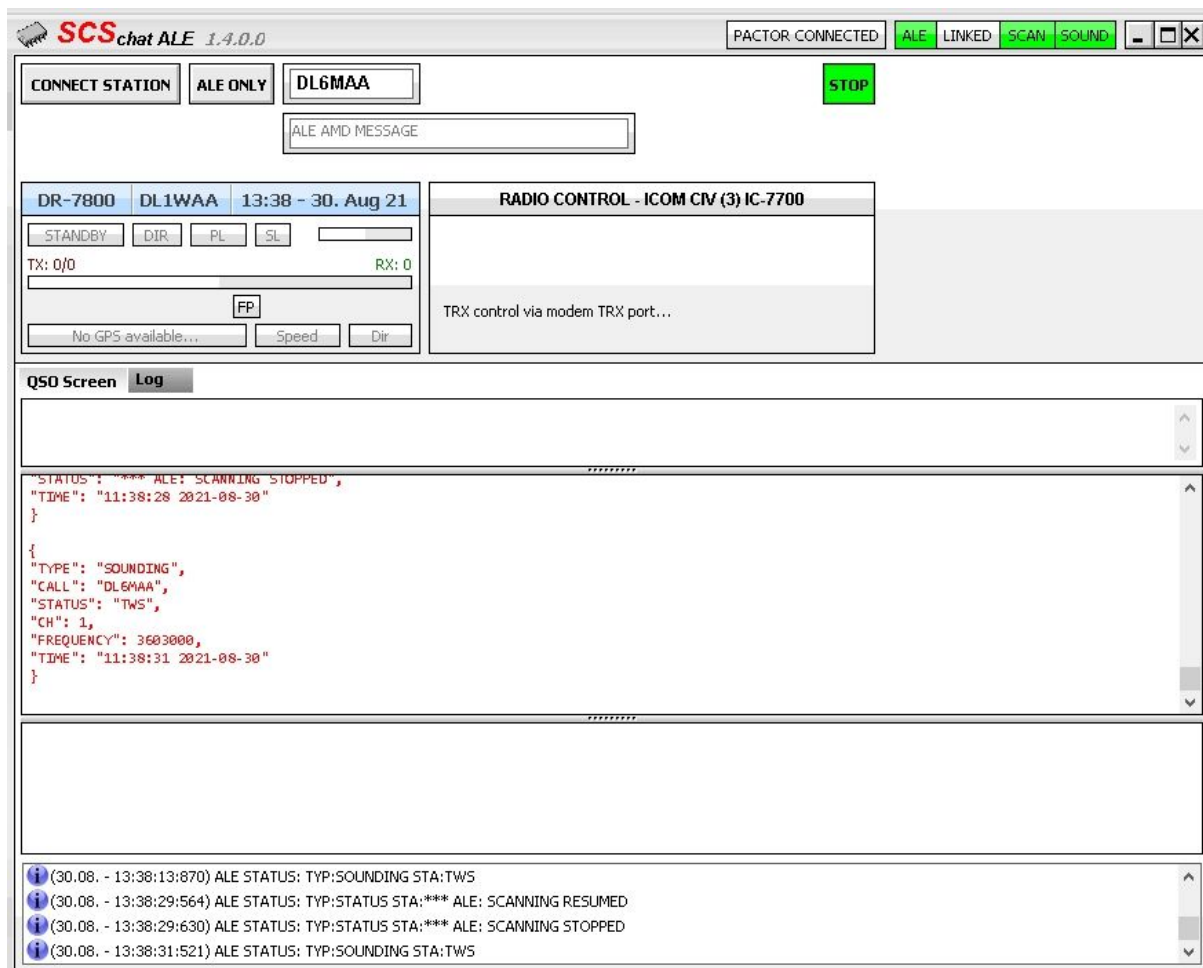
**Please don't edit the braced header lines (marked red) for each section!**

Press **OK** for saving your edits and close the editor.

## Starting SCSchat\_ALE

For starting **SCSchat\_ALE** the first time, click on **RUN** (entering “**Runmode**”).

If the virtual COM port is assigned correctly, the GUI appearance will change to something like that:





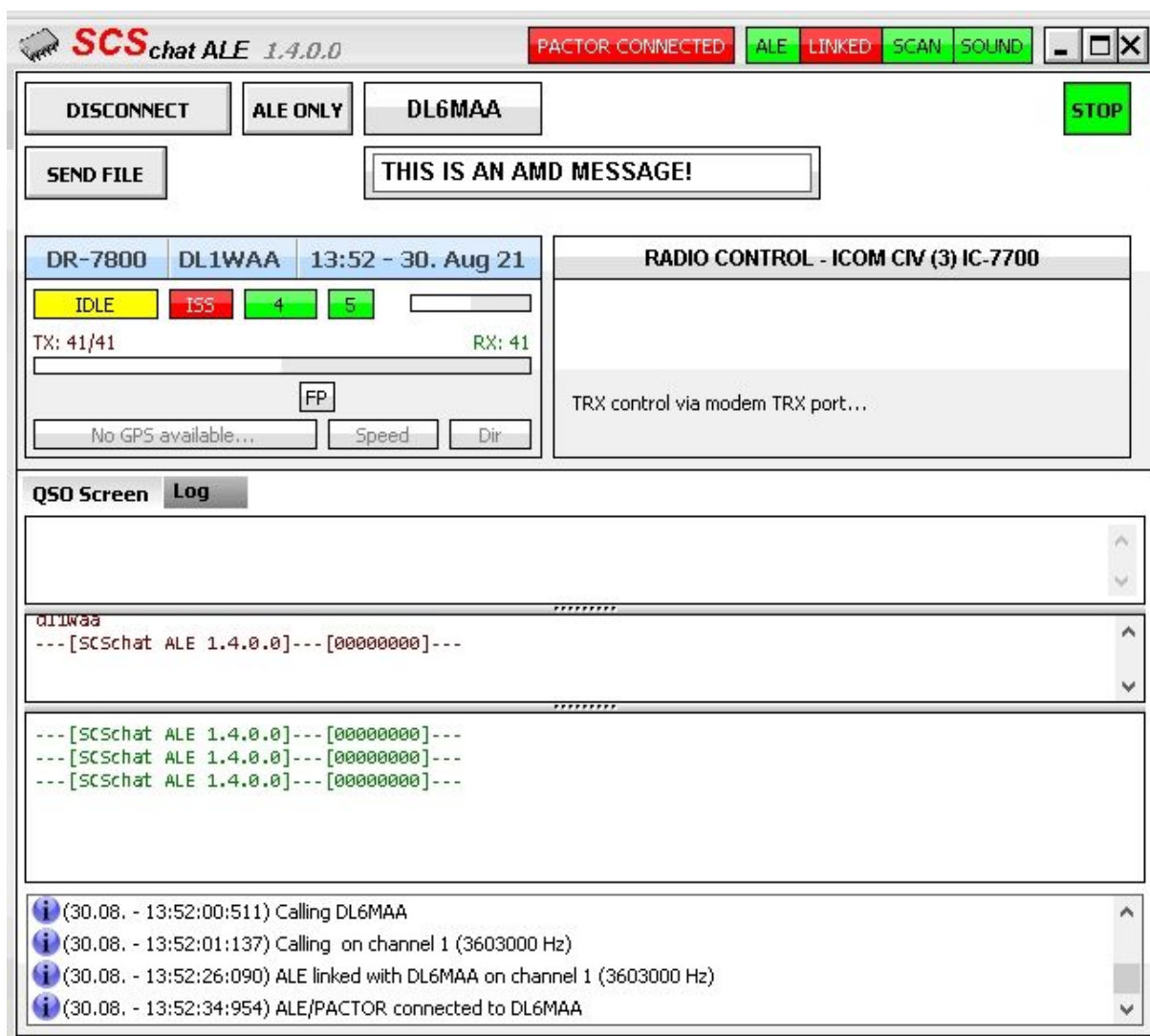
## 4. Operation

During **Runmode** (normal operating mode), you may initiate and receive **ALE/PACTOR** (PACTOR “wrapped” by ALE) as well as **pure ALE** connections/links.

For initiating a call, please enter the call sign of the distant station into the call sign field right hand of the **CONNECT STATION** button. If pure ALE should be sent out without an automatic follow-up PACTOR call, press “ALE ONLY”.

You may also enter an optional **AMD message** that will appear at the distant station’s SCSchat\_ALE status input window as soon as an ALE link has been established.

Then press **CONNECT STATION** in order to initiate the call. If the call is successful, the GUI changes to the **CONNECTED** state:



In the case of PACTOR connections, you may now chat with the operator at the distant station or send files by using the **SEND FILE** button. Files that are sent by the distant station are automatically stored in the \receive sub-folder

In any case, ALE or ALE/PACTOR, you may disconnect the link by using the **DISCONNECT** button.

If configured for ALE SCAN, the modem will then automatically return to the ALE scanning mode.

# SCS

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