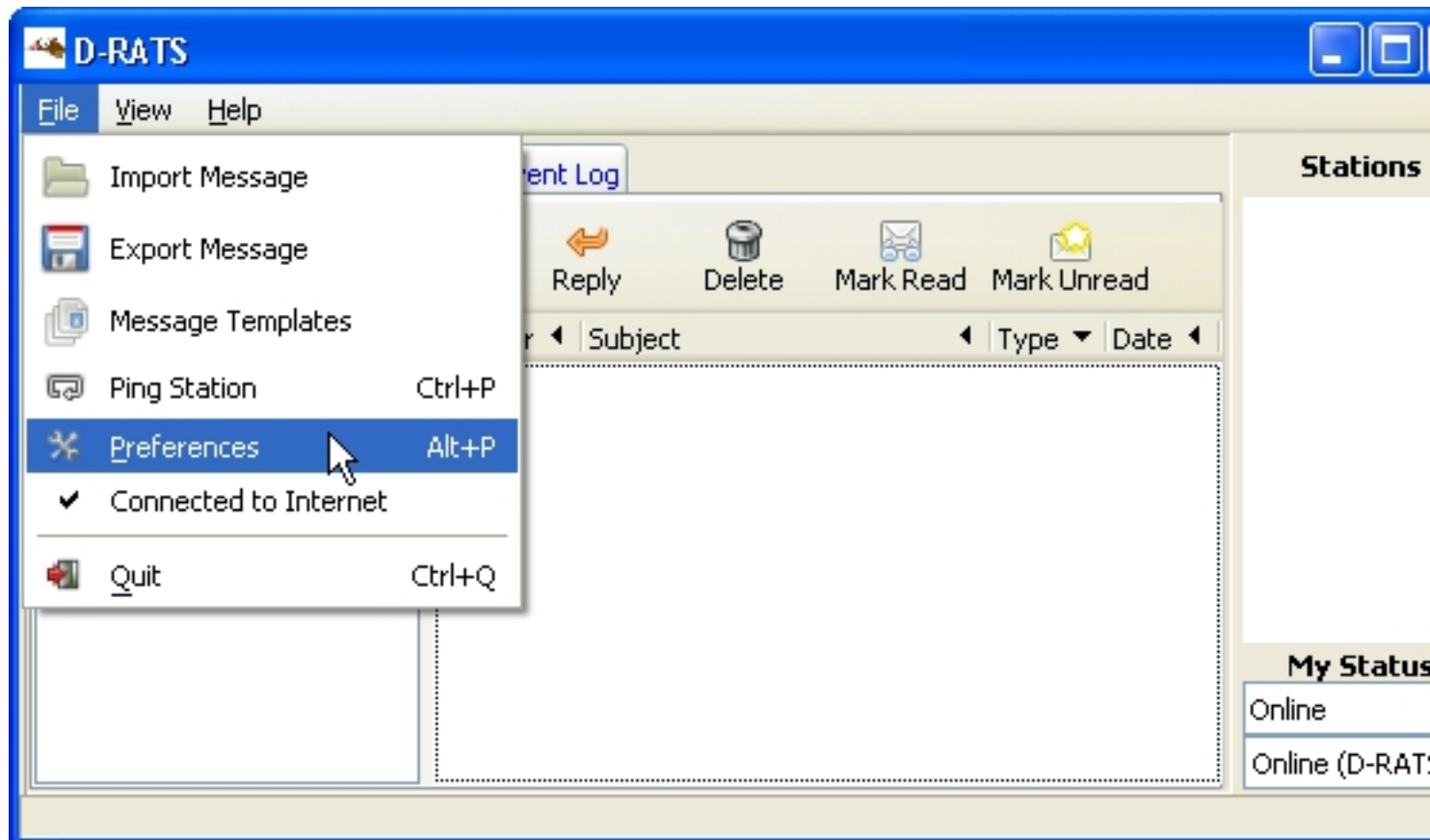


3. Configuration

3.1. Application Settings

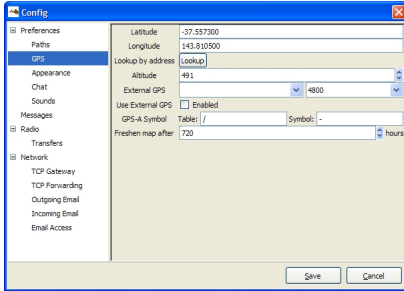
Prior to using D-RATS there are a number of preferences that must be configured. These can be accessed by selecting File > Preferences:



A list of configurable item groups will appear in the left hand column. The following subsections describe the options contained in each group.

3.1.1. User Settings

3.1.3. GPS Settings



The options are:

-

Latitude: This should be the latitude coordinates of your station. It should be in decimal degrees or Degrees-Minutes-Seconds format (use the space bar to substitute for the degree, minute, and second symbols). Use (-) for latitudes south of the equator.

-

Longitude: This should be the longitude coordinates of your station. It must be in decimal degrees or Degrees-Minutes-Seconds.

-

Lookup by address: This option allows you to determine your approximate coordinates from your street address if the computer is connected to the internet.

-

Altitude: This should be your station's altitude above sea level.

-

External GPS: If an external GPS is to be used instead of static coordinates, select the serial port and speed of an externally connected NMEA-compliant GPS. (*NOTE:* Most all NMEA GPS devices use 4800 baud).

-

Use External GPS: If enabled, instructs D-RATS to use coordinates provided by an external GPS.

-

Table: Table sent as part of a GPS-A message.

-

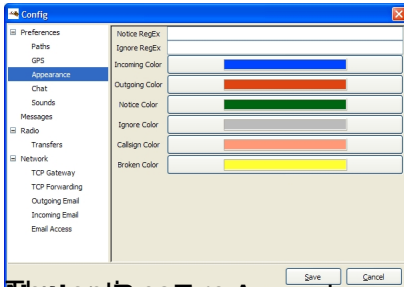
Symbol: Symbol sent as part of a GPS-A message.

-

Freshen Map After: Determines how frequently D-RATS should check the internet for updated maps (default = 720 hours).

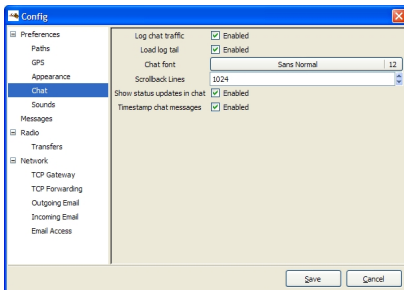
Note: The position shown in the User Manual is in Australia and has negative latitudes and positive longitudes. Positions in the U.S. have positive latitudes and negative longitudes. For example, the center of the U.S. is 37.7500 latitude and -99.5000 longitude.

3.1.4. Appearance Settings



Notice RegEx: A regular expression describing strings to highlight (See [Regex](#) explanation) **Ignore RegEx:** A regular expression describing strings to ignore. **Incoming Color:** The color used to highlight incoming messages. **Outgoing Color:** The color used to highlight outgoing messages. **Notice Color:** The color used to highlight notices. **Ignore Color:** The color used to highlight ignored messages. **Callign Color:** The color used to highlight callign messages. **Broken Color:** The color used to highlight broken messages.

3.1.5. Chat Settings



The options are:

-

Log chat traffic: If enabled, D-RATS will log all chat traffic (accessible from the View menu)

-

Chat font: The font for the main window chat display.

-

Scrollback lines: Defines the number of lines available for scrollback in the chat display (default = 1024).

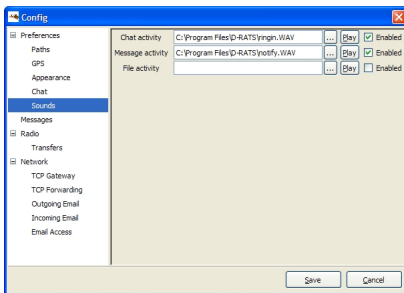
-

Show status updates in chat: If enabled, displays any status updates in the chat display.

-

Timestamp chat messages: When enabled, includes a timestamp on chat messages sent and received.

3.1.6. Sounds Settings



The options are:

-

Chat activity: If enabled, the location and filename of sound to play if any chat messages are received.

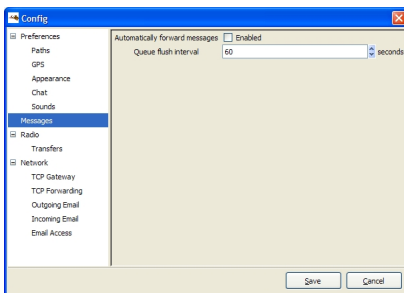
-

Message activity: If enabled, the location and filename of sound to play if any messages are received.

-

File activity: If enabled, the location and filename of sound to play if any files are received.

3.1.7. Message Settings



The options are:

-

Automatically forward messages: If enabled, messages in the *Outbox* will be automatically sent to the prescribed recipient on the last port where the station was heard, or according to the static message-routing rules

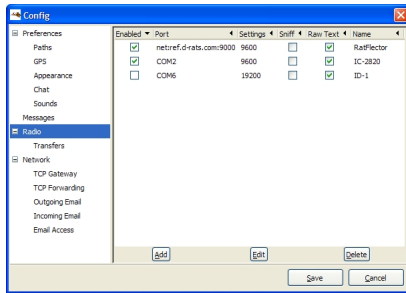
-

Queue flush interval: The number of seconds between scans of the *Outbox* to initiate automatic message transfers

3.1.8. Radio Settings

Configuration

Last Updated Saturday, 07 November 2009 14:17



D-RATS can be configured to operate simultaneously across multiple communication links, eg: 2m, 70cm, 23cm and the internet.

The options are:

-

Enabled: If enabled, this port is active and available for use with D-RATS.

-

Port: The device to open. Enter the desired port to operate across (i.e. "COM14", "/dev/cua0", or "net:ref.d-rats.com:9000").

-

Rate: The data speed used to connect D-RATS to your radio. This must match your radio (see *table below*).

), but has no bearing on "net:" type connections such as the Ratflector.

Radio

Rate

Radio settings required for D-RATS to function

IC-80AD

9600

DATATX = AUTO, GPS-TX = OFF, GPS.ATX = OFF

IC-U82

9600

ATX = ATXON, SPD = SPD96

IC-V82

9600

ATX = ATXON, SPD = SPD96

Configuration

Last Updated Saturday, 07 November 2009 14:17

IC-91AD

38400

DV DATA TX = AUTO, GPS TX = DISABLED, GPS AUTO TX = OFF

IC-92AD

38400

DV DATA TX = AUTO, GPS TX = DISABLED, GPS AUTO TX = OFF

IC-2200

9600

ATX = ATXON, SPD = SPD96

IC-2820

9600

Configuration

Last Updated Saturday, 07 November 2009 14:17

DV DATA TX = AUTO, GPS TX = DISABLED, GPS AUTO TX = OFF, UT123 must be installed

ID-800H

9600

DVT = DVTAT, SPD = SPD96

ID-880H

9600

DATATX = AUTO, GPS-TX = OFF, GPS.ATX = OFF

ID-1

19200

DV DATA TX = AUTO, Cannot use PC application

Ratreflector

not used

Not applicable

-

Ratreflector password: Optional password to send if required to access a Ratreflector (default = no password).

-

Sniff packets: If enabled, log some information about packets seen that are destined for other stations.

-

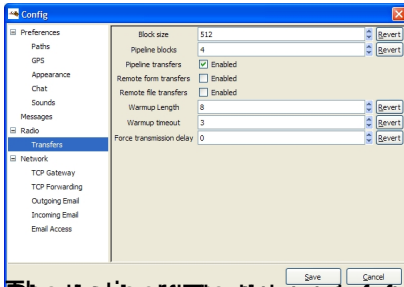
Receive raw text: If enabled, displays all text received in the chat window.

-

Name: A descriptive name for this entry. It will be displayed in other parts of the program.

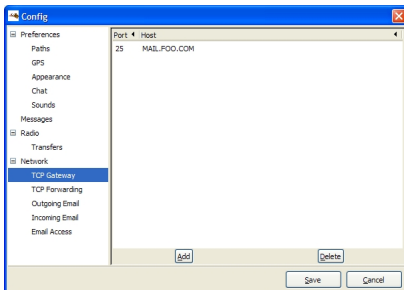
3.1.9. Transfers Settings

Be aware that with TCP or Email settings you may be sending account names and passwords over the radio.



3.1.10. TCP Gateway Settings

The TCP gateway function of D-RATS provides a mechanism to forward TCP traffic over the radio. This could be used to bridge SMTP or POP3 traffic over the radio channel between two locations that need to use something like a regular email client accessing a special server. It is an advanced feature recommended for users who need this functionality and for whom the regular email forwarding function does not suffice.

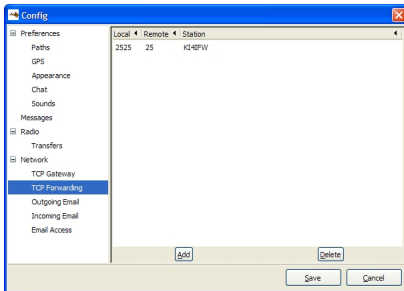


The options are:

Port: Receive traffic on this port from stations over the radio link (i.e: port 25).

Host: Send traffic to the designated port at the host address (i.e: mail.foo.com).

3.1.11. TCP Forwarding Settings



The options are:

-

Local Port: Listen for connections to a designated port on the local machine (i.e: port 2525).

-

Remote Port: Send data received on that port (i.e port 2525) to the designated port on the remote machine (i.e: port 25).

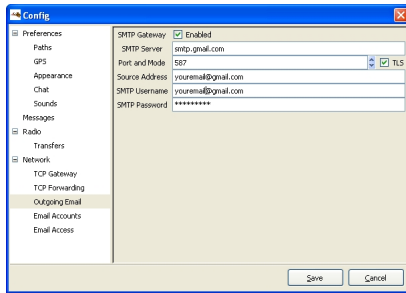
-

Station: Address this data to the callsign entered across the radio link.

3.1.12. Outgoing Email Settings

Configuration

Last Updated Saturday, 07 November 2009 14:17



The options are:

-

SMTP Server: Address of the remote SMTP server to send outgoing email (i.e smtp.gmail.com).

-

Port and Mode: Port that the remote SMTP server expects to receive email on (i.e gmail uses port 587 and TLS enabled).

-

Source address: Default email address to use on outgoing email.

-

SMTP Username: Username to log into the remote SMTP server.

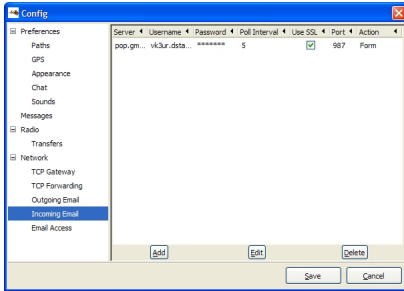
-

SMTP Password: Password to log into the remote SMTP server.

-

Gateway: If enabled, allows email received from D-RATS to be sent to the internet.

3.1.13. Incoming Email Settings



The options are:

-

Server: Address of the remote POP server to receive incoming email (i.e pop.gmail.com).

-

Username: Username to receive incoming email.

-

Password: Password to receive incoming email.

-

Poll Interval: Frequency (in minutes) to see if new email is waiting on the remote POP server.

-

Configuration

Last Updated Saturday, 07 November 2009 14:17

Port: Set to the port that the remote POP server expects to receive email on (i.e 110. pop.gmail.com uses port 995).

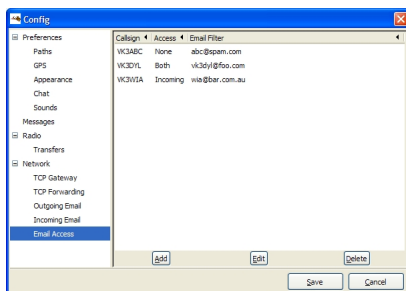
-

Use SSL: If enabled, connect to the remote POP server with SSL.

-

Action: Treat the email as a Form or as a Chat message (default = Form).

3.1.14. Email Access Settings



The options are:

-

Callsign: Enter the callsign of a D-RATS user that you wish to process email for.

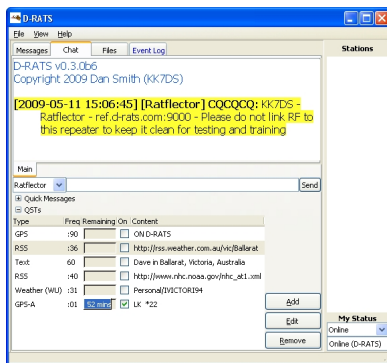
-

Access: Determine how email will be handled for the nominated callsign, eg: None, Both, Incoming, or Outgoing.

Email filter: Looks for a string matching this field in the message, so that it can direct the message to the nominated callsign.

3.2. QST Settings

D-RATS allows an automatic message to be broadcast at a specified interval. The message can be text specified by the user, the output of a program, a text file, or GPS coordinates.



3.2.1. Viewing existing QST beacons

1.

Go to the **Chat** tab and select **QST**.

2.

QSTs that are currently being used have the **On** box ticked.

3. The time remaining until the next QST is displayed for each message.

3.2.1.1. Adding / Editing a text QST beacon

1.

Click on the **Add** or **Edit** button as appropriate.

2.

Make sure the message type is set to **Text**.

3.

Set the interval in the drop-down box (the default is 60 minutes). Preset intervals include 1, 5, 10, 20, 30, or 60 minutes, and 15, 30 and 45 minutes past the hour. Use a preset interval, or manually type one in the box (i.e., 15 for every 15 minutes, or :25 for 25 minutes past the hour).

4. Type your message in the bottom box.

5.

Click **OK**.

3.2.1.2. Adding / Editing a QST beacon containing GPS coordinates

Note: Your GPS coordinates must already be configured in D-RATS. See *GPS Tracking*.

1.

Click on the **Add** or **Edit** button as appropriate.

2.

Set the message type to **GPS**.

3. Set the interval in the drop-down box.

4. Type a short message in the bottom box.

5.

Click **OK**.

3.2.1.3. Adding / Editing a QST beacon in GPS-A format

Note: Your GPS coordinates must already be configured in D-RATS. See *GPS Tracking*.

1.

Click on the **Add** or **Edit** button as appropriate.

2.

Set the message type to **GPS-A**.

3. Set the interval in the drop-down box.
4. Type a short message in the bottom box.
- 5.

Click **OK**.

3.2.1.4. Adding / Editing a QST beacon from Weather Underground

1.

Click on the **Add** or **Edit** button as appropriate.

2.

Set the message type to **Weather (WU)** and then browse to the file.

3. Set the interval in the drop-down box.
4. Select whether the WU source is from an airport or a personal weather station.
5. Enter the WU station identification.
- 6.

Click **OK**.

3.2.1.5. Adding / Editing a QST beacon from a RSS feed

1.

Click on the **Add** or **Edit** button as appropriate.

2.

Set the message type to **RSS** and then browse to the file.

3. Set the interval in the drop-down box.
4. Enter the URL of an RSS feed in the bottom box.
- 5.

Click **OK**.

3.2.1.6. Adding / Editing a QST beacon from a CAP feed

1.

Click on the **Add** or **Edit** button as appropriate.

2.

Set the message type to **CAP** and then browse to the file.

3. Set the interval in the drop-down box.
4. Enter the URL of a CAP feed in the bottom box.
- 5.

Click **OK**.

3.2.1.7. Adding / Editing a QST beacon from a text file

1.

Click on the **Add** or **Edit** button as appropriate.

2.

Set the message type to **File** and then browse to the file.

3. Set the interval in the drop-down box.

4.

Click **OK**.

3.2.1.8. Adding / Editing a QST beacon from the output of an executable file

1.

Click on the **Add** or **Edit** button as appropriate.

2.

Set the message type to **Exec** and then browse to the executable.

3. Set the interval in the drop-down box.

4.

Click **OK**.

3.2.2. Deleting a QST beacon

To delete a QST beacon:

1.

Go to the **Chat** tab and select **QST**.

2. Click on the QST that you wish to delete, so that it is highlighted.

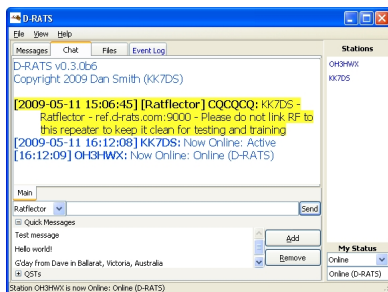
3.

Click the **Remove** button.

4. Confirm whether you really wish to delete the QST.

3.3. Quick Message Settings

Quick messages are pre-canned messages that can be sent with (almost) a single-click.



3.3.1. Setting a Quick Message

1.

Go to the **Chat** tab and select **Quick Messages**.

2. Enter a message in the text box.

3.

Click **OK**.

3.3.2. Deleting a Quick Message

1.

Go to the **Chat** tab and select **Quick Messages**.

2. Click on the Quick Message that you wish to delete, so that it is highlighted.
- 3.

Click the **Remove** button.

4. Confirm whether you really wish to delete the Quick Message.