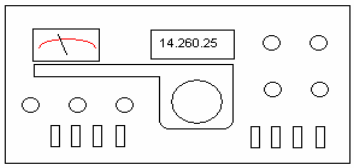
Some Common Controls Found On Amateur Radio Transceivers.



The placement of the controls may vary from manufacturer to manufacturer or on various models from the same manufacturer, however, the basic controls perform the same functions on all radios.

1. **VFO** – This is the main tuning knob used to tune in a station. This tunes your transmit and receive frequency and is shown on the **MAIN DISPLAY.**
2. **METER-** The meter in most radios is a multi function meter and shows a lot of information. Use this like the speedometer in your car; don't stare at it, but glance at it to make sure all things are proper.
    - **"S" or Signal strength –** This indicates the relative strength of a received signal on a scale of 1 through 9.
    - **RF POWER** – This shows how much power the transmitter is putting out. MAX is good
    - **SWR** – This shows the **S**tanding **W**ave **R**atio of the antenna or how much power is being reflected back to the radio. MIN is good.
    - **ALC** – This shows the condition of the **A**utomatic **L**imiting **C**ontrol circuitry. You want to make sure that you are not overdriving your transmitter. A good reading is when the peaks top the scale and stay within the range marked on the meter scale.

3. **AF (**gain) **–** This is the **VOLUME** control for the receiver. **A**udio **F**requency gain

4. **RF GAIN –** This adjust the gain of the receiver amplifier circuits. It allows you to make them less sensitive so that you can dampen really strong signals. When you turn this you will notice the **S METER** rise.

5. **MIC GAIN-** This control the loudness of the microphone in any voice mode. It is best to adjust this for a good "in range" reading on the **ALC** meter.

6. **MODE –** This allows you to choose the mode of operation.
   CW – Continuous Wave (Morse code)
   USB – Upper Sideband
   LSB – Lower Sideband
   RTTY – Radio Teletype

7. **RIT** – This stands for **R**eceive **I**ncremental **T**uning and is used to fine tune a station you are listening to without changing your transmit frequency. It is sometimes called a **Clarifier.**

8. **XIT-** This is the same as RIT but it adjust your transmit frequency. It is Transmit Incremental Tuning.

9. **RF PWR –** Adjust the amount of transmitter power.

10. **IF SHIFT-** This shifts the center of the receiver's pass band. It allows you to avoid a signal that is close to yours by not letting it in the window of the receiver's pass band.

11. **NOTCH –** This is another good filter for reducing nearby interference. Unlike a window, it acts like a cover and blocks the signal that is in your window.

Imagine looking through a Cracker Jack box and looking at street lights. You can only view the lights that are in your window. That's how the receiver's IF works. It can only receive signal it it's window or **PASSBAND**. If you are looking at the lights and there is one to either side that you want to avoid then you can **SHIFT** the window. On the other hand, if there is a light in your viewing window that is distracting and if you shifted your window you would loose the light you want to look at, then you could slide your finger along the front of the viewing window until it just covered the unwanted light. That's how the **NOTCH** works. These two controls will help you pull out signals in a crowded band.