Tube Of The Month

2E24 & 2E26

During WWII, the use of VHF and UHF equipment became common. After the war, there developed a market for transmitting tubes that would operate in VHF. Early 2-way radio equipment for commercial and police communication was AM. Many AM police departments were on 2 MHz. The use of FM for TV and communication had many benefits and a there was a rush to occupy the available VHF bands. Motorola and General Electric were the main providers of police and commercial FM gear. Competition for contracts was very intense. Getting the contract to provide a radio for every police car in Los Angeles was every salesman's dream.

The need for small, octal based, VHF beam tetrodes was behind RCA's development of the 2E24 and the 2E26 in late 1945 and 1946. These were modernized versions of the 807-type tube and were much smaller. The 2E24 had a fast heating filament for mobile use and the 2E26 had a conventional 6.3-volt heater. The first transceivers were large and took up much of the trunk. With the development of 7 and 9 pin miniature tubes, the newer units were made dash mount. The 2E24 was a commonly used final and driver for the 10 watt transceivers like the Motorola 41V. The 2E26 was used in both mobile and base stations. The tubes would operate at full power at 125 MHz and at reduced power to 175 MHz. As units became obsolete, hams were changing the crystals and moving them into the 2-meter band. The age of repeaters had begun.

Many new hams in the 1950s and 60s would recycle the old gear for parts. In 1959 my first transmitter used the power supply from a 174 MHz base station and the 2E26s from a mobile. A pair of push pull 2E26s with plug in coils made a full power (75 watts) novice transmitter. Makers of ham gear like Clegg and Knight-Kit also used them. In about 1952, RCA introduced a higher power version called the 6146. For some time these tubes were the final of choice for many ham transmitters.

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