## It's All in the Cards

By Gary Wilson, K2GW

TRENTON 10, NEW JERSEY 128 NORTH WARREN STREET	
Official Station	AQ ARRL OO AEC ORS OBS
Delaware Valley Radio Association	Operator
Station	
Transmitter Receiver	
• Remarks	

This month's card is the first one using the W2ZQ callsign. Because of the new 2 area callsign with a Trenton address, we know this is after World War II. We also made sure folks know that we used to be W3AQ with the little "ex3AQ" since W2AQ was already

taken. The "W" was implied in this as there were no other US ham prefixes in the 48 states at the time. "K" was only used in US territories back then.

The front of the card shows the new abbreviations coming into vogue. We were members of the ARRL, an Official Observer, an Assistant Emergency Coordinator, an Official Relay Station and an Official Bulletin Station.

The back is fairly plain, but the familiar RST is now used. Frequency is still megacycles and time is still Eastern Standard Time.

The new address of 128 North Warren Street indicates that this is after the pre war Trenton Yacht Club location and before the move to the Airport in the early fifties. Trenton 10 indicates the delivery zone in the days before Zip codes

Sid Deitz, W2FDE, fills us in on the location and activities:

Club Shack

The North Warren Street location came into being around September 1946. The DVRA had opened membership to non hams and several of them operated radio repair shops. One was Mr. Isador Marks ("Issie") whose brother had been a ham but had moved from the area.

Issie operated an automobile radio repair shop. He also sold car radios that used customized dashboard dial heads. These used mechanical cables to tune the radio and adjust the volume on the actual radio receiver mounted on the "firewall" of the vehicle!

Issie's shop was in the back of the building on North Warren Street. It had a driveway and garage door to permit cars into his shop areas. He also leased excess parking spaces to people who worked in town. They could park their cars on the ground floor and the 2nd floor of the building. An open elevator lifted the cars to the 2nd floor.

The building was very old. The floors were made of heavy timbers, but the floors squeaked and groaned as cars were driven over the boards. The 2nd floor had a small partitioned room, with an oven, anvil and other tools and equipment once used to shoe horses and repair wagon wheels. Issie didn't use this area and offered it to the club.

DVRA members formed work details. The old buggy wheel and horse shoeing equipment was removed. Linoleum was put over the floor boards in the partitioned area. The rough brick walls were covered by wall board and new windows put in. Electricity and lighting were installed resulting in a nice size club shack.

## Activities

The station was on one end and along the side wall was a long table with about 12 seating areas for code practice. Each person could plug in their 2,000 Ohm impedance

headphones to copy practice Morse code from an "Instructograph". This utilized paper tapes with dots and dash shaped holes in the tape. The tape was pulled between two contacts and produced the letters, numerals and punctuation characters on an oscillator.



Classes in radio theory and Morse code were offered several nights of the week beginning in the fall of 1946. In those years you had to take the tests either the Philadelphia or New York City FCC offices. Since the written exam hadn't changed in 5-6 years, you just memorized the circuits and other answers from an ARRL study guide. Most applicants passed that part, but many failed the code test several times before copying 65 consecutive letters to qualify for the 13 word per minute requirement.

Club meetings were still held at the Trenton Chamber of Commerce Room in the Stacy Trent Hotel at the corner of West State Street and Willow Street (now called Barracks Street) on the 2nd Wednesday. Dues were \$5.00 a year if you paid it in one payment or \$6.00 per year if you chose monthly dues of \$0.50.

Transmitter and Receiver

The club transmitter had been stored in several members' homes during the imposed radio silence of the war years. The receiver was upgraded to a Hammarlund SP-400 SuperPro Receiver after the war.



The transmitter power supplies had to be improved. Former electric company telephone pole transformers were obtained and removed from their oil filled housings. These transformers were then used in reverse, with the secondary windings on the transformers used to input 120 or 240 volts into the secondary winding and in turn producing 1,200 or 2,400 volts out of the original primary of the transformers.

The rebuilt high voltage power supplies utilized type 866 Mercury Vapor Rectifier tubes to produce 1,000 or 2000 volts DC at 500 Milliamps load to power the RF amplifier stage as well as the Class B Modulator chassis. The final amplifier utilized a "Push Pull Amplifier" circuit in both the RF amplifier as well as in the modulation circuitry. The tubes used were Eimac 250TH tubes that were affectionately called "bottles". They were the size of inverted milk bottles, as milk was still delivered to homes in the early morning hours to be there for breakfast, etc.

## Antenna

An antenna construction and erection work party was organized for a Saturday morning. The club obtained permission to run a full wavelength 80 meter horizontal dipole from the chimney of the three story BPOE Elks building on North Warren Street to the chimney of the three story furniture store on North Broad Street. This is across Academy Street from where the Trenton Free Public is still located.

Number 10 gauge Copper Clad Steel wire was used for the flat top portion of the antenna and more flexible # 12 gauge wire was used for the open wire "ladder type" transmission line connected to the antenna tuner. This was about 60 to 75 feet of tuned feeders, which was a popular way of feeding the antenna. If the length was not resonant on the frequencies you were using, tuning the feeders was like adjusting the SWR (Standing Wave Ratio) so that more power was drawn from the Final RF Amplifier by the feedline and in turned radiated by the horizontal dipole antenna.

## Other hazards

The parking garage holding the club shack was closed for the night each at 12:30PM. Several times Sid found himself locked in the building, for not paying attention to the time. All power to the room was switched OFF when leaving, so the shack only had a wind up clock! If you didn't wear a wrist watch to use in setting the mechanical clock, you could set the clock with the chimes from the several nearby churches.

Thanks Sid, for the details! That's it for this time. Next time we will look at things in the fifties.

73

Gary, K2GW