CDXA 2015 REPEATER OVERHAUL IS COMPLETE !!!

If you’ve noticed a better signal from the CDXA repeater over the last few months, our Cluster Manager, Joe Simpkins, talks about all the hard work and effort that went into making that possible.

Here is the keeper of the keys, Gary Dixon, K4MQG! Thanks to him for housing W4DXA for a long time and being so hospitable and cooperative!! On October 20, 2015, we put the final touches on the project after months of work focused on reviving our local two-meter repeater. After noticing the decline in equipment performance and a similar decline in the use of our repeater, I purposed to reverse the decline by analyzing each component of the current and improved installation with technical assistance from Pete Manfre, WA2ODO, and Gary Greene, W2ZV. Planning for the upgrade was followed by numerous bids and problem solving as we progressed through the brainstorming sessions. Initial measurements were taken and a plan devised. We learned the current repeater (ICOM) was only putting out 2 watts, the 100-watt amplifier was inop, the Astron Power Supply was dead, the duplexer was not well tuned, the feedline was rife with water ingress problems, and the antenna connectors were green, but not from envy. All in all, we had a very poor signal compared to the robust sound of the past. Paul Sturpe, W3GQ, gave new life to the Astron Power Supply. Gary Greene, W2ZV, worked on the amplifier. About that point in time, roughly November 2014, we learned about the Yaesu company offering a new Digital/Analog repeater from our very own Yaesu contact, Lou Dietrich, N2TU. The repeater was offered for a very attractive price to Repeater Clubs around the world. The new repeater is known as the DR-1X. The old ICOM had served us well, but ICOM no longer offered service or support on it due to its age. So the new repeater was ordered, and arrived in the spring of this year. During the wait, the old duplexer composed of four 6” canisters was reworked by Pete Manfre and Gary Greene, the amp and its power supply removed for repair, and the old ICOM pressed back into service at 20-25 watts. ICOM recurring problems continued to appear, refreshing our desire to quickly get its replacement on the air. Antenna and feedline problems would just have to rock along until we had all the parts on hand to engage Don Daso, K4ZA of Tower Works, to install the hardware. The new antenna was selected and purchased. It is a new Super Stationmaster, and now resides at the 100’ level on K4MQG’s tower. New Andrew 7/8” hardline and connectors were purchased/acquired from WA2ODO.
A new antenna mount was designed and constructed by WA2ODO and myself (as the welder trainee), weatherproofed, and transported to the tower site. Did I mention the failure to function on the part of my 1998 SUV about this time? Life goes on! Well, all that is now in the rearview mirror of progress. Thanks also to Thomas Wright, N4HN, for contributing low loss interconnect cabling for the installation, and the constant quality feedback and hands on assistance of Ric Porter, AA4SC! What a great bunch of men to work with!!!
Antenna just to the right near top

Frequency is still **147.180MHz** +600 Say “Hey” as you can and enjoy!!

73 de Joe Simpkins, K4MD