



The

Broadcasters' Desktop Resource

www.theBDR.net

... edited by Barry Mishkind – the Eclectic Engineer

The Maintenance Shift A Possible Way to Find Elusive Parts



By Dave Dybas

[October 2021 – In the old days, it was not unusual for stations to stock two or three copies of each part for their transmitters. More often today, finding parts for older transmitters has become the proverbial hunt for the needle in a haystack.

Dave Dybas has a possible solution.

Several years back, when I was doing contract engineering, I was called to repair a dead 5 kW transmitter.

DIAGNOSIS

After a bit of troubleshooting I determined the PDM Driver was bad. It sure would have been nice to have a substitute PDM Driver board, but none were around. A call to the manufacturer was fruitless, they did not have many parts for this 30-year-old transmitter.

So, I dug in and did a little troubleshooting of the driver board, and I found a bad transistor. It took a day or two for me to be able to replace that part – but still the transmitter was dead.

At that point, I was left wondering if I had uncovered all of the damaged parts on that board.

SOLUTION

It took another day of troubleshooting, this time with an old retired engineer from the manufacturer's company, for us to finally find the cause of the transmitter failure.

It was the fiber optic cable. The cable had gotten pinched and was not sending any PDM audio.

Fortunately, the manufacturer did have a retrofit fiber optic cable – one that required some McGuyvering to install – but I got it to work and the problem was solved.

Prevent headphone abuse!
The Headphone Disconnecter.



AngryAudio.com 

Overall the repair took nearly a week, all because replacement parts were hard to find.

A COMMON ISSUE

I am finding that old AM Tube transmitters are still on the air in many places, yet parts to keep them running are as rare as chicken lips.

This set me to wondering: “What’s an engineer to do when he needs an obsolete part?”

Well, he can get on the phone and call around to other stations and hope to find a retired, dust collecting, too-big-for-the-dumpster, old rig to scrap parts from. Unfortunately, this is a time consuming and often inconvenient task for an engineer who may be off the air and getting pressure from the station owner.

A HELPING HAND

With that in mind, to help locate these obsolete parts, I have been toying with the idea of putting together a listing of “Scrap Heap” transmitters.

EXAMPLE LISTING

Transmitter Model	Location/State	Location/City	Engineer Name	Phone Number
BC-1 T	Illinois	Chicago	Dave	224-456-4953
MW-1	Illinois	Rockford	Bob	123-456-7891
SX-5	Indiana	Gary	Floyd	219-999-9999

WE CAN DO IT TOGETHER

Now some of you may be thinking, “it is the owner’s fault for not having a new solid state rig,” or one of the many other opinions that we engineers often expressed regarding stations that do not stock important parts.

But the fact is that some AM station in the boonies of Bumblefudge are barely breaking even and cannot afford a new rig. Heck they can barely afford the cost of the contract engineer.

On the other hand, having a list available such I have described could help a contract engineer

Occasionally there are ads, [like those on the BDR](#), offering various older transmitters for sale – whole or for parts. I even have seen sites with retired 50 kW Ampliphase transmitters, just sitting there with tons of capacitors, coils, tubes, etc. While these rigs are too big and old for anyone to purchase, they sure are loaded with parts. Heck you could build several AM ATU’s with their parts.

Hence, my idea of building a list of old, disused, partially parted-out transmitters, so we could share this with engineers around the country.

Maybe the various local SBE Chapters could assist with this by asking members if they have or know of any “Scrap Heap” transmitters they might like to add to the list.

Companies with larger numbers of older/obsolete transmitters might also contribute to the knowledge base.

Then the list could be compiled by state and/or transmitter model for easy searching.

make a quicker repair and give a little comfort and peace of mind.

What do you think I would love to hear your thoughts on this issue, does it sound feasible or is it too troublesome? Please let us know.

Dave Dybas is the owner of Sparks Broadcast Service, based in Chicago.

Dave’s email is:
dave@amdetuning.com

His website is at: www.amdetuning.com

Would you like to see more articles like this one? If so, please sign up for the one-time-a-week BDR Newsletter. [Click here](#), it only takes 30 seconds.

- - -

Return to The BDR Menu