Subject: Heat Exchanger Prototypes
Posted by Leland Crooks on Thu, 27 Oct 2005 16:40:39 GMT
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These are the prototypes for hls. Pictured here is the unfinished (no vent) for the a's.In the pic link the small round one was made 1st for the c's. As you can see, my moto tool skills in the slots leave something to be desired. It's not clear in the pic, but the venturi mouth is sweet.I ordered the exchangers for the a's after I'd already picked up the c's. He said he had some 1-1/2 hex stock and would that work. I said sure. They kick ass. Big enough I can machine the slots with a router. I'm going to have the c's remade with it. If I had the bucks I'd just have him machine the flats in a v leaving a 6 pointed star, and then I wouldn't need the old heatsinks I robbed from a bunch of old stereos and tvs I'm going to mount on them. He's pretty excited about it too, and may just do that anyway on the new ones for the c's.Testing starts this weekend. Probably with the a's as they're already out of the cabinets. I may not do anything with the c's until the new tubes are ready.
Leland
http://www.terraworld.net/rentman/Heatsinks

Subject: Re: Heat Exchanger Prototypes
Posted by Wayne Parham on Thu, 27 Oct 2005 22:45:50 GMT
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That's excellent, Leland. Thanks for writing and please keep us posted on your progress.

Subject: Re: Heat Exchanger Prototypes
Posted by Leland Crooks on Sat, 29 Oct 2005 01:24:37 GMT
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Pics of the finished sinks for the HL10A's to fit in tuba spkrs. Started testing and discovered that my trusty old dvm isn't sensitive enough for this. Pretty much an electrician's meter. When I bumped the voltage (10v)enough for it to read I got no change with or without the sink in the parameters. I'm going to borrow a real meter tomorrow and try again Sunday. I have the HL10c sinks ready to test, but new ones from the bigger stock will be done by Tues. I scrapped the slot idea and just drilled 1/2 holes in the flats, polished a venturi and the interior. There's so much surface area to work with that slots were unnecessary. I have more exit volume than the original opening. You can feel the air pumping out at low frequencies.

Subject: Re: Heat Exchanger Prototypes
Posted by Wayne Parham on Sat, 29 Oct 2005 11:48:35 GMT
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That's cool, Leland. Should work great. And the truth is, you don't want the electro-mechanical parameters to shift, so if they don't, that's great. Use the T/S measurement technique shown in the post at the link. If you don't notice much of a shift at moderate and higher power levels, all the better. Put the system together, and measure the response curve and output at high power levels and see how it works out. You should have a linear response, less parameter shift, lower compression and higher power handling, so the system will just generally be more robust.

Subject: Re: Heat Exchanger Prototypes
Posted by Leland Crooks on Sat, 29 Oct 2005 12:06:18 GMT
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I am using a piece of software called true rta as a signal generator from my pc. I just have the freebie version, which is pretty limited. I'm just using it as a generator. If you've got another suggested piece of software (free or trial please ) I'll get it. There's a possiblility I might be in Tulsa around the 11th. If so could we use your gear?

Subject: Re: Heat Exchanger Prototypes
Posted by Wayne Parham on Sat, 29 Oct 2005 15:16:15 GMT
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It would be great to see you the weekend of the 11th, so let me know when you're headed this way.There are lots of signal generators for PC sound cards. Do a search on the internet and you'll find a bunch of them. Anything that makes a sine and lets you set frequency will work.