Subject: Semi out of place question.
Posted by Zene Gillette on Sat, 06 Jan 2007 22:14:05 GMT
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Hi ... Part array, part HT.I am here because I doubt if most HT guys are that familiar with arrays.I have 34 each (17 pair) of 6 1/2" 4 ohm paper duo cone car speakers that sound really good. Pioneer TS-163P, 92 SPL. Box says "40-20,000hz", tee hee. In reality a horn tweeter may be needed.What would be the optimum way to split them up for a 5.1 system? Not sure how music videos and movies affect choice(s). ASSume save 2 for spares. I believe they are discontinued. Impedance (4-8) should not be a problem as draw will be low. Almost forgot, want them OB. Zene
Ebay pic, not me.

Subject: Re: Semi out of place question.
Posted by Eric J on Mon, 08 Jan 2007 20:50:21 GMT
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In a line array you can't use them.The problem is something called comb filtering due to the tweeter elements being too far apart. You won't like the sound of anything above 3000 hz. It will sound awful.Read Jim Griffin's white paper on line array design: How comb filtering soundsComb filtering will dull the highs and will be most noticeable in the lack of air (dull highs) especially as you move off axis. Essentially, the high frequencies are rolled off as the ensemble of the tweeter outputs don't add up but start to cancel. Now the ear is less sensitive in the upper octave (10-20 kHz) you may not observe the full impact of this effect. But if you compare to an array that is properly designed, then there is no comparison as the proper array will yield a more airy (and accurate) sound.Jim Griffin on PE(Parts Express Forum) 11-21-06

Subject: Re: Semi out of place question.
Posted by Zene Gillette on Mon, 08 Jan 2007 21:26:37 GMT
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Thanks, I had forgotten about comb effects as I have been experimenting with curved arrays, but is not practical for HT. I'll just cross low with tweeter to compensate, then I can remove those damned flimsy wizzer cones.This design by committee is working well this time. Much obliged, Zene