Subject: Geat info guys, Thanks!
Posted by Norris Wilson on Tue, 04 Dec 2007 22:14:37 GMT
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Duke,Thanks for clearing up the bipolar mounted woofers and their cabinet loading effect. For some reason I thought if they were closely coupled. That they would load the cabinet like an isobaric design. At least I thought they would only need a cabinet the size as required by one woofer, duuhh. I really should study more.I see from your statement about woofers mounted is a bipolar configuration. That there is an issue of increased upper bass and lower midrange energy over a similar monpole design due to the lack of the baffle step effect.What would be the best technique in reducing this energy to equalize these dominant frequencies for a more balanced sound without removing to much of its ambient effect, fullness?Also, would the lower bass frequencies have a similar effect of increased output that would need to balanced as well?Does this reverberant energy from both sound fields, from the front and rear firing woofers that effects imaging, mostly dominate the upper midrange and treble region? I think this region is where most of the precise imaging occurs, please correct me if wrong there?Thanks real_one for the link clearing up the push pull and isobaric cabinet loading effects. From what I got from the article, the isobaric is only usable in the bass region, not for fullrange. So, that techniques would be out in trying to build a compact efficient fullrange two-way.I have learned that there are more compromises in audio than I could have ever imagined.And that in order to obtain a simple efficient two-way speaker that has an in room frequency response of 30Hz to 20khz, it will require some cabinet realestate. Realistically this would require at least a 9 cubic feet, or so, cabinet to obtain an in room 30Hz, ugh.Maybe I should go with an OB three-way with some horse power to drive the bass speaker with, and settle for an in room 35Hz or above.You can't fool mother nature. But, you sure as heck can get dizzy trying.We are all a work in the progress.Norris