
Subject: What kind of tweeterhorn does the 7pi use?
Posted by [Kim Schultz](#) on Wed, 27 Apr 2005 01:02:48 GMT
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I'm trying to put a 7pi together using drivers I already have. But I doesn't have any tweeter horns. What horn does the 7pi use. Regards Kim

Subject: Re: What kind of tweeterhorn does the 7pi use?
Posted by [Wayne Parham](#) on Wed, 27 Apr 2005 06:56:53 GMT
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It uses a 1" compression driver on a 90x40 horn. Specific models are the Eminence PSD2002 or the JBL 2426 mounted on an Eminence H290 horn flare.

Subject: Thx Wayne.
Posted by [Kim Schultz](#) on Wed, 27 Apr 2005 12:32:13 GMT
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I'll see if I can find a driver and horn flare that will work. Already have the 10" and 15" driver.

Subject: Re: Thx Wayne.
Posted by [Wayne Parham](#) on Wed, 27 Apr 2005 13:29:30 GMT
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Sounds good. What midrange driver do you have? Just to make sure you noticed - The crossover is different depending on the driver chosen.

Subject: Re: Thx Wayne.
Posted by [Kim Schultz](#) on Wed, 27 Apr 2005 22:53:09 GMT
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I have a cheap driver from Monacor, but it models very closely to the Delta 10 when simulated in

65HzMax. frequency range f3-5,000HzMusic power 200WMAXPower rating (P) 100WRMSSPL (1W/1m) 98dBSuspension compl. (Cms) 0.18mm/NMoving mass (Mms) 31gMech. Q factor (Qms) 4.10Electr. Q factor (Qes) 0.42Total Q factor (Qts) 0.38Equivalent volume (Vas) 32 IDC

50mmVoice coil former KaptonLinear excursion (XMAX) ±2.5mmEff. cone area (Sd) 350cm²Magnet weight 50oz.Weight 4.1kg I'm having problems with your program, trying to figure out the pi alignment for the 15" driver.SP-15/300PAHigh-quality PA speakers for universal stage and professional DJ applications. Excellent manufacture and optimum specifications for

bass applications, max. bass pressure in the medium bass range in astonishingly small cabinets.

f3-4,500HzMusic power 600WMAXPower rating (P) 300WRMSSPL (1W/1m) 101dBSuspension compl. (Cms) 0.23mm/NMoving mass (Mms) 88gMech. Q factor (Qms) 5.44Electr. Q factor (Qes)

(BxL) 22.2TmVoice coil induct. (Le) 1.3mHVoice coil diameter 78mmVoice coil former KaptonLinear excursion (XMAX) ±3mmEff. cone area (Sd) 855cm²Magnet weight 65oz.Weight 7.5kg

Subject: Re: Thx Wayne.

Posted by [Wayne Parham](#) on Wed, 27 Apr 2005 23:09:04 GMT

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I'm not as concerned with the bottom end, which Hornresp does a good job of modeling because cone motion is pistonic. I'm more concerned with the behavior of the driver at the upper end of its response curve. That's more determined by cone shape, including the dust cap.If you have anything to make measurements with, you might verify the mid/tweeter crossover point. If not, then look at the manufacturer's spec sheet. If the speaker has a lot of energy above 2kHz, you probably want the midrange coil and if not, then probably not. Look at the crossover schematic and the notes about different drivers for some examples.Your woofer models very much like JBL

bass bin. I think your speakers will work out very well if you build them exactly like the plans show, but maybe verify the midrange/tweeter crossover and choose the midrange circuit that suits your drivers best.

Subject: I will build the midrange horn and measure it.

Posted by [Kim Schultz](#) on Wed, 27 Apr 2005 23:38:28 GMT

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Thx again Wayne.I have a DLSA measuring system, and will take some measurements after the mid horn is complete.
