

Title (en)  
ULTRASONIC TRANSDUCER FOR GENERATING ASYMMETRIC SOUND FIELDS

Title (de)  
ULTRASCHALLWANDLER ZUR ERZEUGUNG ASYMMETRISCHER SCHALLFELDER

Title (fr)  
TRANSDUCTEUR ULTRASONORE PERMETTANT LA RÉALISATION DE CHAMPS ACOUSTIQUES ASYMÉTRIQUES

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Application  
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Abstract (en)  
[origin: WO2009086805A1] The invention relates to an ultrasonic transducer for generating asymmetric sound fields. Said ultrasonic transducer comprises a housing (1) that encompasses an elongate diaphragm (2) and a plate-shaped transducer element (3) which is arranged on one side of a main surface of the diaphragm (2), is made of an electrostrictive material, and allows the diaphragm (2) to be excited to generate oscillations in the ultrasonic range. A gap is formed between the diaphragm (2) and the transducer element (3), the diaphragm (2) being coupled to the transducer element (3) exclusively along the edge thereof. Such an ultrasonic transducer makes it possible to generate asymmetric sound fields which have an aperture ratio of 1:3 or more.

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