

Method for transferring a membrane**ABSTRACT**

The invention relates to a method for producing a device (10) comprising a membrane (14) of piezoelectric nature above at least one cavity (11), the method comprising:

- a) providing a carrier substrate (1) provided with a cavity (11) opening out onto its front face (12), the cavity (11) having a lateral dimension larger than 30 μm ,
- b) providing a donor substrate (2) provided with a buried weakened plane (20) delimiting a surface layer (22),
- c) depositing, on the front face (21) of the donor substrate (2), a stiffening layer (13) made of piezoelectric material having a thickness (e) greater than 500 nm,
- d) joining the carrier (1) and donor (2) substrates,
- e) splitting the donor substrate (2) at the buried weakened plane (20) so as to transfer the membrane (14) comprising the surface layer (22) and the stiffening layer (13) to the carrier substrate (1).

Fig. 5