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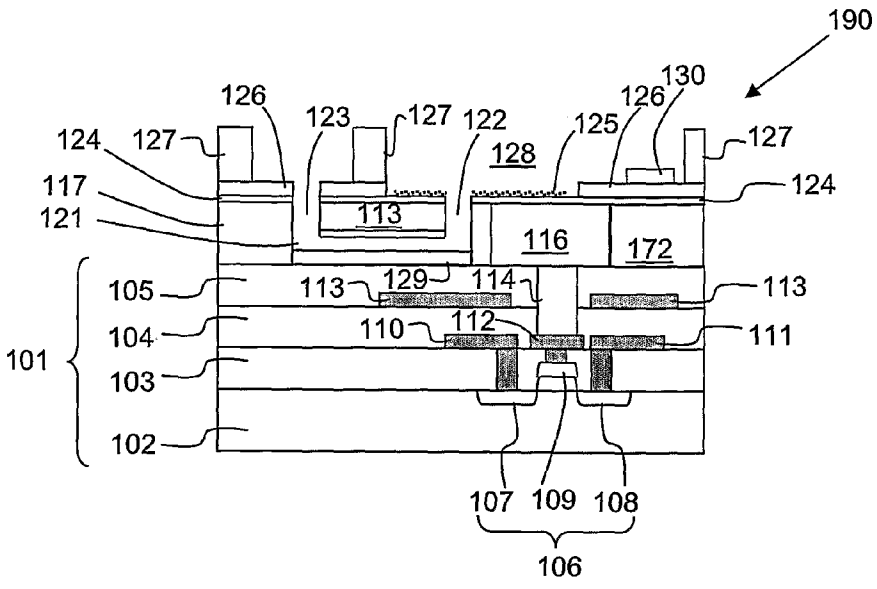
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(54) Title: BIOSENSOR



(57) Abstract: A biosensor which comprises a substrate (101) having a buried electronic sensing element and a substrate surface (124) above the buried electronic sensing element; a structured top layer (125 covering the substrate surface (124), having a top surface above the substrate surface (124), and comprising at least one stimulation and/or sensing electrode (116)and a channel (121) for holding the biomolecule by means of suction through said channel (121) arranged between the top surface (125) and the substrate surface (124), the sensing electrode (116) being electrically coupled to the electronic sensing element; wherein the top surface (125) is provided for placing a biomolecule present in a sample solution thereupon, the sensing electrode (116) is provided for sensing electrical variations in and presence of the biomolecule.

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