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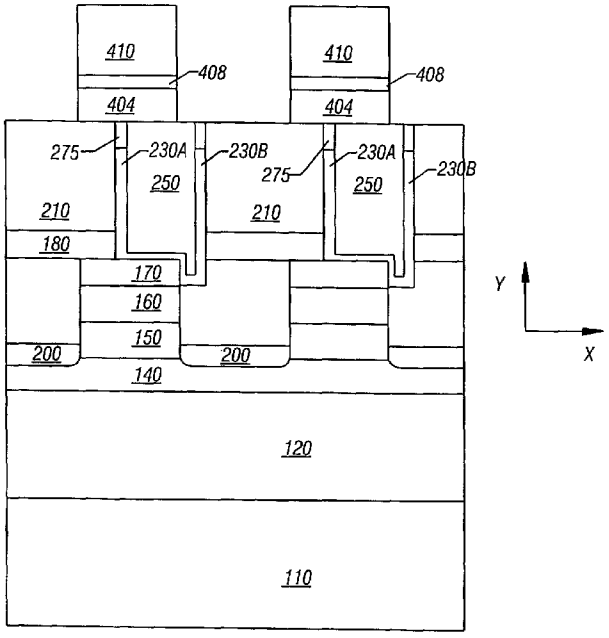
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(54) Title: UTILIZING ATOMIC LAYER DEPOSITION FOR PROGRAMMABLE DEVICE



(57) Abstract: In an aspect, an apparatus is provided that sets and reprograms the state of programmable devices. In an aspect, a method is provided such that an opening (220) is formed through a dielectric (210) exposing a contact (170), the contact (170) formed on a substrate (100). An electrode (230) is conformally deposited on a wall of the dielectric (210), utilizing atomic layer deposition (ALD). A programmable material (404) is formed on the electrode (230) and a conductor (410) is formed to the programmable material (404). In an aspect, a barrier (408) is conformally deposited utilizing ALD, between the electrode (230) and the programmable material (404)

WO 2004/032256 A1