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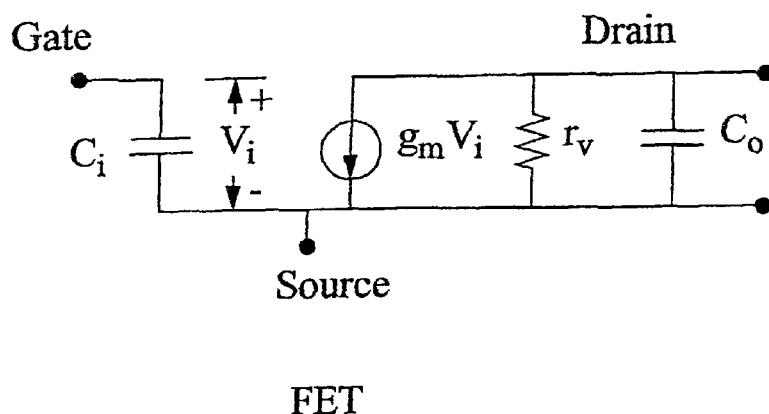
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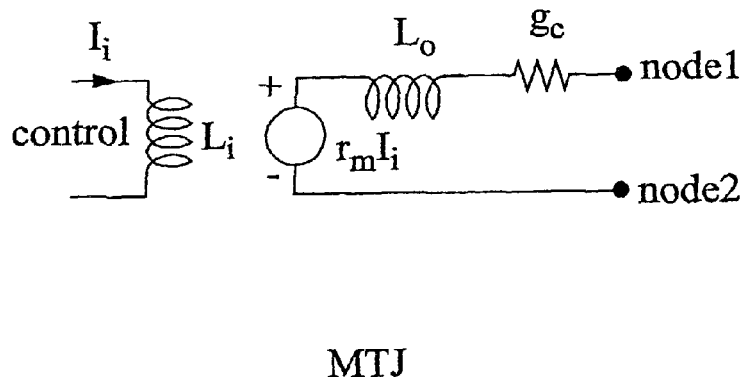
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(54) Title: WIDEBAND DUAL AMPLIFIER CIRCUITS



(57) Abstract: Dual amplifying circuits having a magnetic tunnel junction device and a field effect transistor configured in a complementing set are disclosed herein. In one embodiment, the field effect transistor is operable to control a current level of a current operating signal flowing through the magnetic tunnel junction device. In another embodiment, the magnetic tunnel junction device is operable to control a voltage level of a voltage signal being applied to a gate terminal of the field effect transistor. The gain-bandwidth product of both embodiments is greater than the individual gain-bandwidth products of the individual devices through the elimination of noise contributing resistive type circuit elements.





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