ABSTRACT

TOXIC RESIDUAL GAS REMOVAL BY NON-REACTIVE ION SPUTTERING

A novel method to remove residual toxic gases trapped by a polymerizing process by an inert ion sputter is described. A masking layer is formed overlying a semiconductor substrate. An opening is etched through the masking layer into the semiconductor substrate whereby a polymer forms on sidewalls of the opening and whereby residual toxic gas reactants from gases used in the etching step are adsorbed by the polymer. Thereafter, the polymer is sputtered with non-reactive ions whereby the residual toxic gas reactants are desorbed from the polymer to complete removal of residual toxic gas reactants in the fabrication of an integrated circuit device.

FIGURE 2

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