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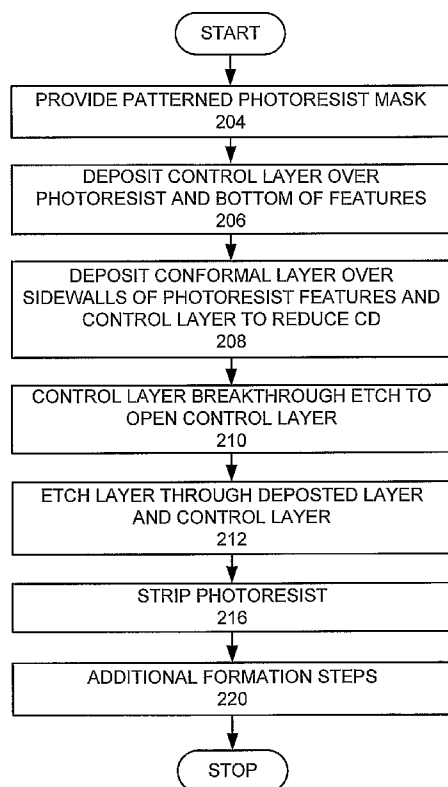
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(54) Title: CRITICAL DIMENSION REDUCTION AND ROUGHNESS CONTROL



(57) Abstract: A method for forming a feature in an etch layer is provided. A photoresist layer is formed over the etch layer. The photoresist layer is patterned to form photoresist features with photoresist sidewalls. A control layer is formed over the photoresist layer and bottoms of the photoresist features. A conformal layer is deposited over the sidewalls of the photoresist features and control layer to reduce the critical dimensions of the photoresist features. Openings in the control layer are opened with a control layer breakthrough chemistry. Features are etched into the etch layer with an etch chemistry, which is different from the control layer breakthrough chemistry, wherein the control layer is more etch resistant to the etch with the etch chemistry than the conformal layer.

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