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(54) Title: EDGE RINGS FOR ELECTROSTATIC CHUCKS

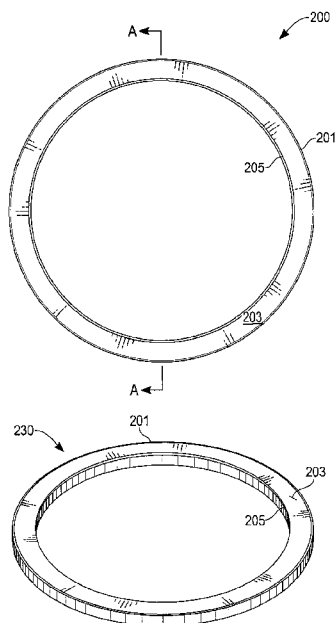


Fig. 2A

(57) Abstract: A disclosed device for use with an electrostatic chuck configured to hold a substrate in a plasma environment comprises an edge ring configured to be placed either in contact with portions of only a ceramic top piece, a base plate, or coupled to the base plate through a plurality of pins and pin slots. The edge ring is further configured to be concentric with the ceramic top piece. In one embodiment, the edge ring includes an inner edge having an edge step arranged to provide mechanical coupling between the edge ring and the outer periphery of the ceramic top piece. The edge ring further includes an outer edge and a flat portion located between the inner edge and the outer edge. The flat portion is arranged to be both horizontal when the edge ring is placed around the outer periphery of the ceramic top piece and parallel to the substrate.



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