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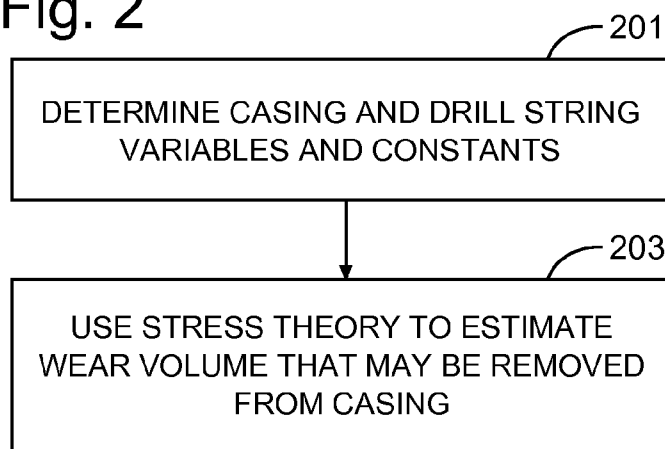
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(54) **Title:** METHOD AND APPARATUS FOR CASING THICKNESS ESTIMATION

Fig. 2



(57) **Abstract:** Various embodiments include apparatus and methods to provide an estimation of casing wear. One method determines values of casing and drill string variables and constants. These constants and variables are used to dynamically generate an estimate of casing wear, based on a stress theory. The drilling operation can be halted when the estimate of casing wear reaches a pre-determined value.