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(54) Title PROCESS-WINDOW AWARE DETECTION AND CORRECTION OF LITHOGRAPHIC PRINTING ISSUES AT MASK LEVEL

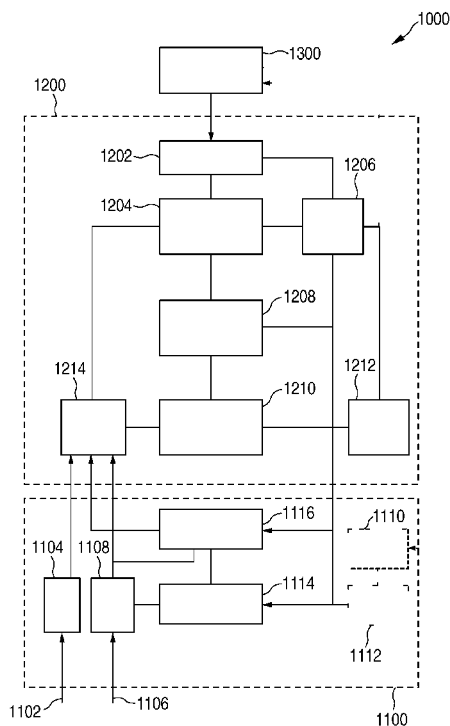

FIG. 10

(57) Abstract In one aspect of the invention, a method provides a calibrated critical- failure model for a printing process of a critical feature by virtue of a classification of an optical parameter space according to at least two prmt-cnticality levels Print failure of a respective critical feature is judged on the basis of a print- failure criterion for the critical feature The respective print- criticality level is ascertained from test-print-simulation data at a sampling point of a process window for a given point in an optical-parameter space, and from a failure rule An advantage achieved with the method is that it comprises ascertaining the predefined optical- parameter set from the test-prmt-simulation data at only one sampling point of the process window, which sampling point is identical for all test patterns This saves processing time and processing complexity by reducing the number of ascertained optical-parameter sets and their processing in the subsequent scanning and classifying steps

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