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(54) Title: LASER PROCESSING APPARATUS, METHODS OF OPERATING THE SAME, AND METHODS OF PROCESSING WORKPIECES USING THE SAME

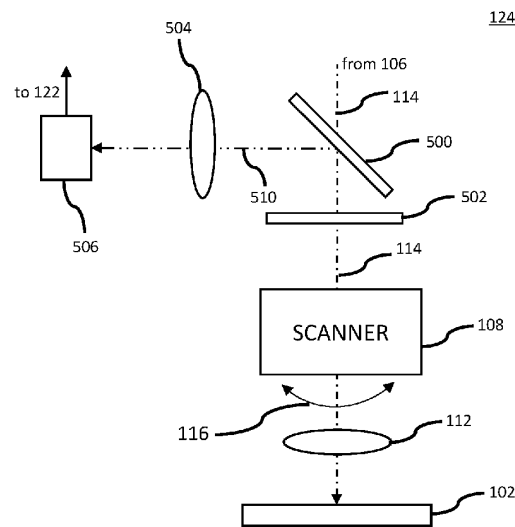


FIG. 5

(57) Abstract: A laser-processing apparatus can carry out a process to form a via in a workpiece, having a first material formed on a second material, by directing laser energy onto the workpiece such that the laser energy is incident upon the first material, wherein the laser energy has a wavelength to which the first material is more reflective than the second material. The apparatus can include a back-reflection sensing system operative to capture a back-reflection signal corresponding to a portion of laser energy directed to the workpiece and reflected by the first material and generate a sensor signal based on the captured back-reflection signal; and a controller communicatively coupled to an output of the back-reflection sensing system, wherein the controller is operative to control a remainder of the process by which the via is formed based on the sensor signal.

[Continued on next page]

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