

ABSTRACT

METHOD OF DETECTING SPOT SHAPE OF PULSED LASER BEAM

Disclosed herein is a method of detecting a spot shape of a pulsed laser beam including a laser spot forming step, an imaging step, a calculating step, a properness diagnosing step. The laser spot forming step applies a pulsed laser beam having a wavelength absorbable by an inspection wafer held on a chuck table continuously to the inspection wafer with a focused point on an upper surface of the inspection wafer thereby to form a plurality of laser spots on the upper surface of the inspection wafer. The imaging step captures an image of the laser spots. The calculating step extracts profiles of shapes of the laser spots from the captured image of the laser spots, and calculates a degree of similarity of the extracted profiles to the profile of an ideal laser spot shape stored in a memory. The properness diagnosing step decides the shapes of the laser spots are improper if the calculated degree of similarity is lower than a threshold value.

(Figure 1)