

Abstract

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Development of a computer vision system for metrological applications

The computer vision systems applications are widely spreading in modern industries especially in metrology. This is because these systems are flexible, non-contact; less restricted by the workpiece geometric configuration. The present work introduces a computer vision system, which is able to recognize different shapes and extract their dimensions. Two calibration methods for system are investigated; evaluated. For more generalization, the system calibration methods consider the height of the camera from the workpiece. Finally, the system is tested; assessed by using real workpieces.