Abstract

The ease of distributing digital media, specially using Internet, apparently brings the negative impact for the effort of copyright protection on digital media. Digital watermarking as one of solution to overcome these problems, facing the question of robustness against the distortion that could be happens along the distribution process.

In this final research, it will be implemented and analysed digital image watermarking with *homogeneity in image*, This scheme works on spatial domain with a block-based technique for inserting a copyright mark (invisible logo) into an image and proposed a watermarking scheme to get *imperceptibility* and *robustness*. In this proposed method original image devided into bloks, a block of 8x8 pixel or 4x4 pixel, an then one bit binary watermark embedded into one selected blok. A block is selected with having small variance of intensities and it is called Homogenous block. In this research, the result of watermarking also tested with manipulate watermarked image using image smoothing, jpeg compression and image cutting and then each result compared with blockbased method.

Keywords: *homogeneity in image*, *watermarking, invisible logo, spatial domain, robustness, block-based.*