Perceptual Spectrum Waterfall of Pattern Shape Recognition Algorithm

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***Abstract*— This article presents a novel recognizable spectrum sensing algorithm. This algorithm is the perception spectrum waterfall features for image pattern recognition algorithm, it referred to the pattern shape recognition algorithm. This algorithms has occurred band spectrum waterfall uncertain state of the spectrum width and the length of time by machine self-learning, and to establish the pattern shape recognition library. The experiments showed that is algorithms has higher recognition rate of the primary user than the image pattern recognition algorithm, and more applicable spectrum sensing.**

***Keywords*— Spectrum Waterfall; Pattern Recognition; Spectrum Division, Spectrum Fracture Reconnection, Spectrum Deletion Completion**

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