

**Abstract**

Indonesia is an agrarian country that has vast agricultural land, which every activity about monitoring of crop health still done manually and need a long time. Whereas, application of technological development in activity of land monitoring will shorten time and increase the efficiency the work. One of application technology that can be applied is using a drone. Based on that premise, this final project will use drone's ability with camera for capture a few images of paddy field from a number of areas. Data of those images will processed into RGB's data and HSV's data. Those datas will compared with leaf color chart or called by BWD. BWD has 4 levels consisting of level 2 through 5, where is every level show the different levels of crop health. In this final project, the paddy land will be the object of research material that the age of it is 25 days after planting.

**Keywords:** crop health, RGB, BWD, paddy, drone

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