**ABSTRACT**

With the advent of new-generation depth sensors, the use of three-dimensional (3-D) data is becoming increasingly popular. As these sensors are commodity hardware and sold at low cost, a rapidly growing group of people can acquire 3- D data cheaply and in real time. With the massively increased usage of 3-D data for perception tasks, it is desirable that powerful processing tools and algorithms as well as standards are available for the growing community.

Our project aims at identifying different objects in home environment. For this we use 3D data instead of plain 2D images. There are systems that do this same task in 2D domain using various image processing techniques. But there are inherent limitations in processing 2D images. We have to process images with only the color information and it can give misleading results in occluded environments. The processing of such systems really comes down to pixel-by-pixel comparison. Also the information present in the geometry of different objects cannot be used in 2D processing.

**ACKNOWLEDGEMENT**

A matter of great pleasure and proud privilege to able to present the project on it is indeed, Object identification using 3D Data.

The moment we are representing this project, we are happy and satisfied. This was not only due to efforts made by us but also due to proper guidance and requisite facilities provided by our guide Prof. Akshay Loke.

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