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## Smart 2Be (SMART BIN)

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## **1.0 Executive Summary**

Smart 2Be Company has a new product to be introduced to the consumers which is the smart bin. Our company is planning to supply the smart bin to make it easy for our customer to handle their waste or trash. Smart 2Be smart bin is an automatic, simple, unique with modern design aiming to busy customers managing their waste management. As we know the cost of living in a developing country is increasing, so many people take up more than one job to live comfortably. This is the reason why people are getting too busy and they sometimes forget to throw their waste or trash properly. As for the marketing strategy of the product will be included the pricing, place or distribution and promotion strategy using many mediums that could be easily reached the target market. Our product's target market will be Malaysian citizens since our company is based in Malaysia. Our company also has set the potential customers for the product according to the type of customer groups that are interested in purchasing the product. The target buyer of the products are people age 15-64 years old and already have a job. Another target customer is people with family which is because they probably having a hard time cleaning their house with a child in the house. The product is designed to accommodate people in managing their waste properly and minimize the time need to handle the trash for busy people. The price of the product is affordable and has many benefits. Our company targets can provide needs for people and also compete with other companies to produce better technology. The management team in the company contains few sections and is led by an experienced worker to ensure the company run efficiently.

## **2.0 PRODUCT DESCRIPTION**

### **2.1 Detail of the product produced/sold**

The product to be produced is Smart 2Be. Smart 2Be is a smart bin product that is automatic, simple, unique with modern design. The function of this Bin is to make it easy for the active user to manage their waste management in their house or office. Sometimes the busy user would often forget to remember to throw away their bin that was already full or over its limit. As we know 5G technology is progressing in our country, so our house waste management also needs to further its effectiveness.

### **2.2 Primary and secondary applications**

One of the applications of the product for this automated smart bin is more sensitivity of infrared sensors. Infrared sensors with more sensitivity will detect movement that approach the bin. The infrared sensor is located on the surface of the lid. It will be sensing any movement that comes nearing the bin from the distance that up to 40 cm. The lid of the bin will open automatically for the user to throw the trash. The lid will open automatically when there is movement from above the bin. This will avoid unnecessary opening if a person is moving around the bin a lot. The improvement that we make is the bin can be placed under a table, cabinet or sink. This enhancement gives better understanding for people with narrow rooms so they can have more space for other things to put or to walk. So, the sensor will not give a signal to open the lid when the object remains at rest or no movement.

Another application is alarm to indicate that the bin overload. The alarm will beep for 3 minutes for the user to respond. If no action is taken after the alarm stops, the bin will automatically self-sealing and self-replacing the plastic bag. The alarm sound also can be replaced with any sound that the user wants. This bin also doesn't need to use only plastic with a retainer ring that needs to buy from the manufacturer. Users can use any plastic and attach it to the recycle retainer ring. So this will help users to spend less money on plastic with a retainer ring.

There are a few secondary applications in which the smart bin has LED light on the body of the bin, thus it will automatically open when the room becomes dark but the lights on when people walk in front of it or in the same room with the bin. This will become a good solution if users do not want to open the light to save electricity and still can see when walking into the room.

Other than that, a smart bin could also be one of the decorations in the room. It is because the design of the bin looks modern and it will blend well with other decorations.

### **2.3 Unique features**

Unique features of the smart bin product are antibacterial or disinfectant spray located inside of the bin and under the lid. These additional features are to free or get rid maggots in the bin and also from going outside the bin. Sometimes people forget or neglect to throw away the trash from the house and this usually happens when they are going for holiday. Another feature of the smart bin is the bin can take it out the trash bag after self-sealing. With this new feature, it will not prevent the bin from self-replacing another trash bag and for the bin to run smoothly.

The most unique feature is the smart bin can be connected to Wi-Fi or an app in the user smartphone. From the app, the user is able to check the battery level of the bin. So the user would know when to recharge the bin when the battery level is low. Besides that, it also has a button to stop any feature that the user thinks are not needed at the moment. But it also can be activated back when it is needed by the user. Examples of features that can be turned off are LED light or the alarm feature that indicate overload.

What makes the smart bin more brilliant than other bins in the market is the bin can be placed under objects such as under the sink, table or cabinet without it continuously open when the sensor senses anything above it. Furthermore, the smart bin is accompanied with antibacterial or disinfectant spray compared to a bin in the market where it only protects odor from going outside the surrounding. Most important is that the Smart 2Be bin can be connected to Wi-Fi or to an app on smartphone. This feature is not yet built up on any bin in the market. This smart feature could be the reason to penetrate the market. Nowadays, it is all about smartphones and their ability to do anything. With this additional feature, it sure could become a selling point in the market.