



**UNIVERSITI TEKNOLOGI MARA CAWANGAN
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MEC299

FABRICATION OF MINIATURE SUNFLOWER SEEDS

PEELER

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ABSTRACT

A sunflower peeler is one tool that is increasingly used in human life. The purpose of its peeler is to reduce time to peel the "kuaci" and to help distinguish good seeds from bad ones. The issue constantly encountered is that removing the shells from sunflower seeds is very difficult and time-consuming. Individuals who love to eat "kuaci" and make it their everyday snack will have a problem if the peeler is not used. The hull of the sunflower seeds will not be cluttered with this peeler because it has a mini drawer. The objective of this project is to produce a "kuaci" peeler that can be taken around everywhere, also known as a miniature "kuaci" peeler. To assure the project's success, several methods use have been implemented. Among them is cutting, drilling, welding (MIG) and threading with a lathe machine. This project start with conduct a research on sunflower peelers, search literature about this project, make a market survey and from the market survey, it can find five designs that fit this project's requirements. Then, select the design from pugh chart, choose the best, and then complete the fabrication process. Simply put, this project can benefit kuaci's lover and meet the goal purpose.

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CHAPTER 1

INRODUCTION

1.0 Introduction

The goal of this final year project (FYP) is to design and analyze a sunflower seed peeler. In Malaysia, sunflower seeds are a popular snack. Also referred to as "kuaci". The sunflower seed is the seed of the sunflower (*Helianthus annuus*). There are three types of commonly used sunflower seeds: linoeic (most common), high oleic and sunflower oil seeds. Striped sunflower seeds are primarily eaten as a snack food. The goal of the project is to create a tiny machine for peeling kuaci. This project will cut peeling time and make it easier for users to eat kuaci. The first stage in designing a sunflower peeler is to choose an appropriate material that will not damage the hulled kernel. As a result, the primary goal is to create an environmentally sustainable design.

1.1 Background of Study

Kuaci is one of the most popular snacks and has always been the choice of the people of this country as a daily snacks at home, workplace or anywhere. Demand and sales of kuaci increase sharply every year. From my research, Australia imports sunflower seeds from Malaysia and at the same time make it the most important supplier. Because of its high nutrition, people make kuaci as a daily snack and indirectly increase the production of kuaci in Malaysia. One of the problems that people face on a regular basis is figuring out how to eat sunflower seeds in a simple manner. To address this problem, a simple peeler should be designed for the user's convenience.

There are numerous distinctions between early "kuaci" peelers and the contemporary market design. We must enhance and improve the project's performance so that there are no doubts regarding the design and concept. This style is more portable since it is easier to handle while peeling the "kuaci." This project necessitates a wide range of abilities and information, as well