



○ **Researchers:**  
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▶ **INTELLECTUAL PROPERTY:**  
TRADE SECRET

# Tissue Cultured Fig Plants



## Introduction

- The fig (*Ficus carica*) is known for its high nutritional qualities and its religious significance.
- The fig fruit contains elevated levels of calcium, phenolic compounds, antioxidants, minerals, vitamins and dietary fiber with its leaves possessing effective anti-diabetic properties.



## Problem Statement

- Current propagation measures in producing plant stocks via cuttings, grafting and air layering produces lower rates of success
- Plant stocks propagated via these methods are slow growing and produce lower number of fruits.



## Inventiveness and Novelty

- Malaysia's first successful tissue cultured fig plant stocks made available for the community and industry



## Intellectual Property Status

- IP is owned 100% by Universiti Sains Malaysia (filed under trade secret)



## Usefulness and Application

- Plants can be grown in the local fields where fruits and leaves can be harvested for fresh produce or processed for the food and pharmaceutical industry.

## Status of Invention

- Product is ready for commercialization.

## Commercial Potential

- Great demand in Malaysia and the ASEAN region for high quality fig plant stocks for the establishment of farms.
- This indirectly increases the demand of fresh fig fruits from the supermarkets and various industries (Sunnah and pharmaceutical product development proudly made in Malaysia)

## Potential Partners

- Fig Direct Sdn. Bhd.

## Knowledge Management ( Grant/Publication/etc)

- USM Innovation Seed Fund and USM Research University Top Down Grant.
- Publications in manuscripts and proceedings

## Impact of the Product

- Assist the establishment of fig farms in Malaysia through the supply of high quality plant stocks
- Create new job opportunities, increase income generation of local growers and encourage local entrepreneurs in the industry of fresh and processed Sunnah produce, cosmetics, wellness and pharmaceutical products

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