



# CARMEL COLLEGE

*Act justly, love tenderly, walk humbly with your God – Micah 6:8*

S, e, a, s, o, n, a, I

S, e, n, s, a, t, i, o, n, s

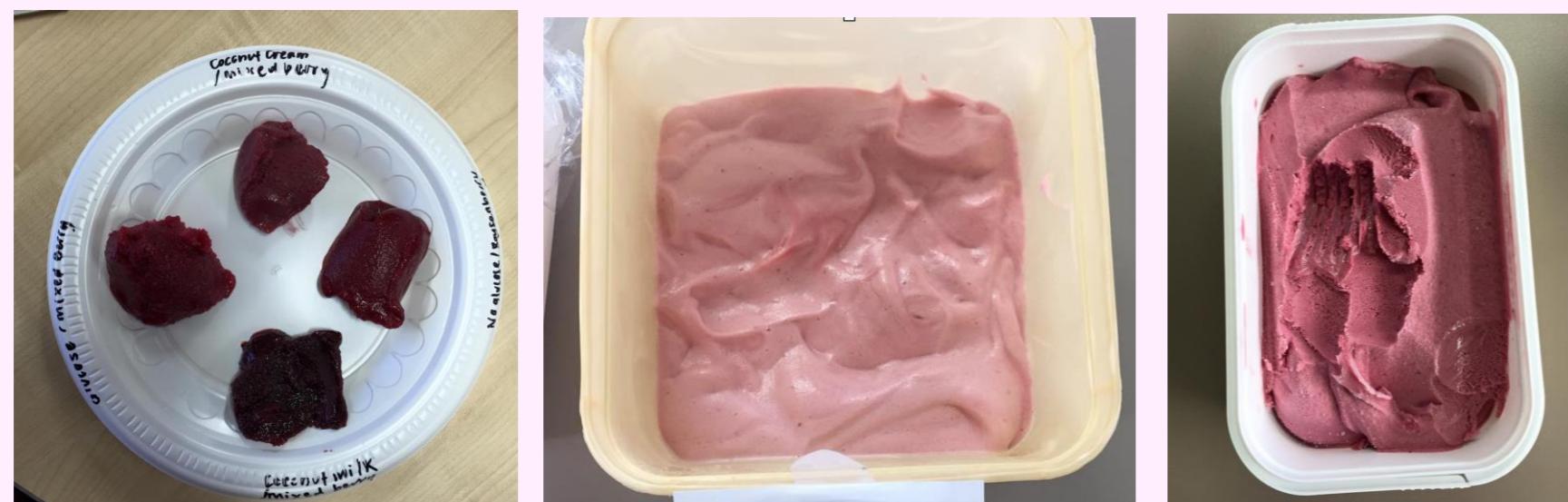
**Vanja Franich**  
**Gabby McIntosh**

**Issue:**

Through our research our team has identified that there is a gap in the market for a mainstream dairy free ice cream product. This is due to the rapidly increasing numbers of consumers becoming dairy free due to allergies or personal choice and the growing trend of veganism.

**Aim:**

To develop a premium dairy free product that would be available to the mainstream market that can be enjoyed by everyone, in particular the older teenage and adult market. It needs to be feasible to be manufactured by Much Moore Ice Cream and complement their existing range of products.



**Desirable Product Attributes**

- Technically feasible for production at Much Moore Ice Cream
- Innovative flavour profiles that aren't common in the current market
- Consistent with market trends
- High quality product
- Low fat alternative to a dairy based ice cream
- Follows dairy allergy or vegan guidelines
- Appealing and attractive packaging that coordinates with Much Moore's branding
- Cost competitive

**Method:**

- Researching and investigating current market products, food trends and gaps in the market for initial ideas.
- Initial technical research to determine attributes needed, discover potential recipe formulations and test ideas.
- Competitor product analysis to compare attributes and current consumer acceptability.
- Conducting surveys and to establish consumer preferences.
- Practical trials to formulate a basic base recipe.
- Investigating different ingredient ratios and processing methods.
- Investigating different fruit flavouring and components – canned, fresh, syrup, puree, concentrate.
- Undertaking further technical trials to perfect formulations in terms of flavour, texture, colour, consistency and shelf life.
- Sensory testing to determine flavour preferences for the target market.
- Production of final product.
- Finalising packaging to meet NZ and Much Moore guidelines.

**Zoe Hannah**  
**Fran Harpur**

**Problems Encountered:**

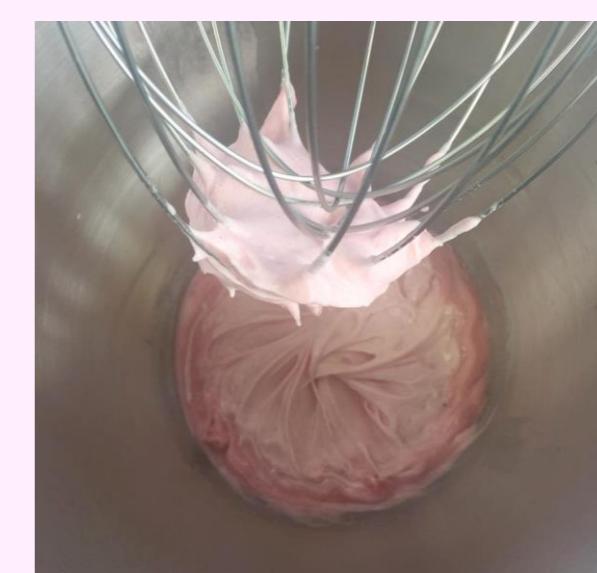
- Defining a product concept from initial ideas and trials.
- Technical feasibility – Much Moore is restricted on what products they can produce due to processing equipment.
- To focus on producing just one flavour or a range of flavours.
- Using commercial ingredients to meet company and specific vegan requirements.
- Time constraints during practical lessons.
- Calculating formulations to meet total sugar content and total solids target.
- Deciding which flavours would be most appealing and suitable for each season.
- Achieving desirable flavour profiles.
- Maintaining optimum quality for as long as possible.
- Perfecting the production process - ensuring accurate measurements, formulation and flavour balance.
- Maintaining quality and consistency.



**Final Outcome: Seasonal Sensations**

A limited edition range of sorbets.

Packed with a flavour punch to remind the consumer of both summer and winter. Smooth, sweet and tangy - enjoy flavours of the two extreme seasons anytime of the year.



**Acknowledgements:**

Many thanks to the following for their support – Steffen Friedrich, Alice Shopland, Mrs. Goonan, Mrs. Pipes, Rod Hare.

