CLUSTER SOLUTION PROJECTS

1. High Pressure Processing Technology (HPP)

Traditionally, thermal methods are used, or preservatives are added, to ensure shelf stability in ready-to-eat (RTE) products. Such food preservation methods carry huge drawbacks such as nutrient destruction and flavour changes to achieve long shelf life of more than a year.

The increase in disposable income and consumer preferences for healthy and convenient food are expected to further boost the demand for RTE food products.

Application of HPP

HPP is a non-thermal pasteurisation process that employs ultra-high pressure to kill foodborne pathogens. With the introduction of the HPP, the shelf life of RTE food products will be extended for up to three months without using additives or preservatives. Food manufacturers will be able to overcome challenges of high market entry costs and short product shelf life and be well-placed to pursue their internationalisation efforts.

In an LED project announced in May 2017, eleven food manufacturing SMEs collaborated to share equipment, resources and expertise at The Soup Spoon's High Pressure Processing (HPP) facility. The HPP technology helps food products stay fresh longer, opening up export opportunities for food companies. Food manufacturing companies using HPP technology see improvements in productivity, manpower savings and food wastage reduction in their manufacturing process.

<u>Company</u> Juicy Folks	Juicy Folks is Singapore's first HPP contract manufacturer for cold pressed juices, cold brew coffee, artisanal teas and other food products.
Solution HPP	Fresh juices typically have a very short shelf life of between three to four days, which makes production efforts laborious and costs high.
Spokesperson Mr Alvin Tam, Director	With the HPP facility, Juicy Folks can now produce in bulk and leave the products at the outlets or retailers for a much longer time period without the need to rush for daily production of products that will perish in three to four days. There is less wastage and with better sales vis-à-vis production forecasting. With time savings from production, workers can also be redeployed to perform other value-added job functions.

2. Lean Hotel Initiative (LHI)

The LHI is a collaboration between Workforce Singapore (WSG) and McKinsey & Company, and is supported by the Singapore Tourism Board (STB). It is a part of WSG's Transform and Grow Initiative and also supports the implementation of the Hotel Industry Transformation Map, which was launched by the Ministry of Trade and Industry in November 2016.

The LHI is the first Field-and-Forum programme to be conducted by McKinsey & Company in Asia and for the hotel industry. It is a four -month programme which aims to help hotels build capabilities in identifying and implementing lean transformation initiatives towards manpower lean operations.

Participation by 16 hotels

Launched in March 2017, LHI programme saw 16 participating hotels coming together to identify sustainable improvements to their workforce productivity, adopting lean practices before moving on to test-proof their concepts through pilot projects.

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Mandarin Oriental Hotel

Solution

LHI

Spokesperson

Mr Terence Evitt, Assistant Front Office Manager, Mandarin Oriental Singapore Mandarin Oriental is an owner and operator of luxurious hotels, resorts and residences with operations in Singapore. Like many other hotels, Mandarin Oriental has had to cope with rising business costs and manpower challenges. Since 2012, the hotel has been operating with a 10 percent labour shortage.

Through the LHI, Mandarin Oriental Hotel improved their front office operations by re-designing their front-office processes so that they free up more time to attend to customer needs and shorten check-out duration. This also helped them in their shift scheduling and free up staff for training, a key component in maintaining quality service. With key findings from the LHI pilot projects, Mandarin Oriental also revamped and saved time in their housekeeping operations.

"Based on what we have learnt and how we saw improvements, I will definitely recommend other hotels to consider implementing the Lean Hotel Initiative.

We are not attracting sufficient manpower, so we have to come up with productivity initiatives and this is one

of them looking at how to shorten processes,"

Mr Terence Evitt, Assistant Front Office Manager of Mandarin Oriental Singapore