

MASTER

Unilever's raw tea supply chain analysis at origin : case study of Kenya

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UNILEVER'S RAW TEA SUPPLY CHAIN ANALYSIS AT ORIGIN

CASE STUDY OF KENYA



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ABSTRACT

Unilever's tea buying organisation is responsible for buying tea raw material for Unilever's tea product manufacturing sites. This study presents an investigation of the Kenyan raw tea supply chain, which will function as a model to investigate other tea sourcing regions in the near future. (*summary*)

Any opinions, explicit or implicit are those of the author
and do not necessarily represent those of any Unilever company

EXECUTIVE SUMMARY

The central theme of the research presented is the investigation of Unilever's raw tea supply chain at origin. The Unilever Tea Buying organisation is the largest buyer of raw tea in the world and buys approx 20% of global black tea availability (with an annual purchase value in excess of US\$600M).

At the start of the project, Unilever management in Rotterdam indicated that *raw tea supply chains are expected to be lengthy (costly) and contain probably non-value added activities*. Therefore the objective of this study became to analyse the internal raw tea supply chains, specify the length of these supply chains (lead-times, amount of inventory and working capital in the chain), and provide insight in the operational events, the supply chain cost, and the responsibility for business processes.

The focus of this study was the tea supply chain in Kenya, one of the main exporters of black tea.

The results of this study will be used as a model not only for understanding and acknowledging the current state of the raw tea supply chains but also for areas of improvement.

This study aimed to deliver:

- A complete investigation of the (internal) Kenyan raw tea supply chain
- Recommendations and opportunities to optimise the Kenyan raw tea supply chain: areas where cost-savings can be achieved, suggestions how costs can be avoided, best practice supply chain performance for the supply chain under investigation
- A template that can be used for the analysis of other raw tea supply chains in the near future

The Kenyan raw tea supply chain (case-) study

Traditionally Unilever buys more than 70% of its East African teas in the Mombasa auction (>US\$125M). The remaining volumes are sourced from Unilever's own estates (Brooke Bond East Africa) and from agents who sell tea on behalf of East African producers.

AUCTION

The auction system provides a transparent and structured market and distribution mechanism for producers to market their teas. Investigation of lead-times, comparison of supply chain costs, and review of business processes demonstrates however that the auction system is long and relative expensive (lead-time from manufacture to shipment is 7 weeks, the total supply chain cost to shipment is approx US\$0.21 per kg i.e. 10% of tea purchase price). Several opportunities to improve the auction system have been identified (reduce lead-times, reduce movements, go electronic). The general conclusion for the auction system is that any dramatic changes to current practices in the near future are unlikely. Much as the Unilever buying organisation would like to see several major improvements, changes are mainly restricted by the fact that tea is sold on a sample basis and because any significant change will require industry co-operation and commitment (from producers, auction brokers, other buyers, as well as from government officials).

Acceleration of changes in the desired direction will largely depend on Unilever's effort, commitment, and resources available to realise the move, and priorities assigned to individual projects.

DIRECT PURCHASES

Next to scenarios to improve the auction system, this study has also identified the difference in supply chain cost if tea was bought direct from producers (i.e outside the auction system and without the use of middlemen). Currently Unilever does not take advantage of this difference. In a traditional supply scenario where the producer facilitates the export the buying organisation would save at least 2.5 US-cent/kg up to 5 US-cent/kg of the tea purchase price. Savings can be realised if volumes that are currently sourced from the auctions are "converted" to direct contracts with producers. The savings potential per kg is based on sharing the savings with producers. Government officials need to be convinced/reassured that this is not a device to minimise foreign exchange (sharing the savings with producers will create a win/win situation for producers and buyers).

LOGISTICS

It would appear that the most effective way to supply Unilever's mixing sites is by picking up the tea from tea factories and deliver in containers straight to the final mixing site. Best perspective would be a reduction of the supply chain cost from manufacture to shipment by 50% and a reduction of lead-time from manufacture to shipment by 75% compared to the Mombasa Auction.

Outsourcing logistics activities to integrated logistics providers would make fewer parties responsible for one supply chain (reduces complexity), and reduces Unilever's own dedicated resources to manage logistics operations. Both Maersk Sealand and P&O Nedlloyd have indicated their willingness to realise a seamless supply chain, linked with the development of electronic systems to facilitate the business processes.

Savings have been identified as 1-3% of Kenyan raw tea spend, dependent on resources and effort put in by Unilever and priority assigned to projects

Recommendations have been presented

- ✓ to improve the auction processes systematically within the context of the current practices
- ✓ to challenge the current methods and trading practices
- ✓ to realise the potential savings of direct buying
- ✓ to improve the efficiency of tea buying operations

Templates have been supplied to map the supply chains at other origins.