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Future of work for **TEA SMALLHOLDERS** in **SRI LANKA**

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in **SRI LANKA**

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Foreword

The tea sector of Sri Lanka has a long history as a vital part of the country's socio-economic fabric. It has employed hundreds of thousands, particularly women, and generated millions in foreign exchange earnings. Rising cost of production, declining productivity, acute shortage of labour due to out migration, accelerating effects of climate change, rising consumer demands on food safety, and growing competition from the global market are some of the challenges the industry is facing, among several others. The sustainability of the tea industry in Sri Lanka is at a critical juncture.

Smallholders and their production systems play a significant role on the future of Sri Lanka's tea industry. Smallholdings today account for over 70% of the country's tea production, the remaining production still out of plantations. It is a well-known fact that women play a crucial role in the tea industry of Sri Lanka. The vast majority of tea pluckers and wage workers, both on plantations and smallholdings, are female. As such, the future of the tea industry will greatly depend on how adequately the multifaceted challenges women workers face are addressed.

This rapid assessment study has been carried out to shed light on the role that smallholdings and small holders play in the tea value chain, the current state of decent work in these value chains, and to identify a vision for the future of decent work in the sector. The study is a product of a multi-donor funded ILO Project "Promoting Decent Work in the Plantation Sector in Sri Lanka," and contributes to the achievement of Outcome 1 of the ILO Sri Lanka Decent Work Country Programme (2018-2022) which prioritises "the creation of sustainable, inclusive and decent employment."

This study presents an analysis through the various inter-connected lenses identified in the Sustainable Development Goals (SDGs) of decent work and economic growth, gender equality, climate resilience, environmental sustainability, and an end to poverty to name a few. It is my hope that it will indeed be useful to workers, employers, the Government of Sri Lanka, and tea sector stakeholders to attain the SDGs.

Simrin C. Singh

Country Director

ILO Office for Sri Lanka and the Maldives

Acknowledgements

This study presents the findings of a mapping exercise commissioned by the ILO Country Office for Sri Lanka and the Maldives to assess the current state of decent work among tea smallholders in Sri Lanka and its implications on the future of work in the plantation industry.

This study was undertaken by Professor Mohamed Esham¹ (Team Leader), Dr. H. S. R. Rosairo², Dr. A. W. Wijeratne³ and their research team. Their considerable effort and enthusiasm in conducting this rapid assessment within a short period and in adverse weather conditions, to inform government, employers' organisations and workers' organisations amongst others on the future of work in the tea sector is greatly appreciated.

We are very grateful to the ILO's tripartite constituents in Sri Lanka from the Ministry of Labour and Trade Union Relations, the Employers' Federation of Ceylon, and trade unions, and other stakeholders especially tea smallholders and their associations, whose experience and knowledge greatly enriched this study.

The study was reviewed and edited by Elvis Beytullayev, Specialist, Rural Economy & Related Sectors at ILO Headquarters in Geneva, Switzerland. The valuable technical contributions and encouragement received from Alette van Leur, Director, Sectoral Policies Department and Mariangels Fortuny, Unit Head, Forestry, Agriculture, Construction and Tourism at ILO Headquarters in Geneva, Switzerland is appreciated.

The inception and successful completion of the rapid assessment including the stakeholder consultation and its preparation for publication would not have been possible without the efforts of Tharanga Gunasinghe, National Coordinator of the 'Promoting Decent Work in the Plantation Sector in Sri Lanka' project; Asanthi Waas; Gayani Siriwardena; Chamila Weerathunghe, Balasingham Skanthakumar and Farzan Abdul Razzak, under the overall supervision of Country Director, Simrin Singh.

The responsibility for opinions expressed in this study rests solely with the researchers and not their institution of affiliation, and publication does not constitute an endorsement by the International Labour Office.

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Executive Summary

This study was undertaken as a mapping exercise with the general objective of understanding the role and dynamics of smallholders in the tea supply chain, the current state of decent work among smallholders in this sector, and its implications on the future of work in the plantation industry. The specific objectives of this rapid assessment were as follows:

- Identifying the role and operations of smallholders in the tea supply chain in terms of their contribution to the supply of green leaves; their relationship with regional plantation companies; access to business development services (BDS) and the capacity of BDS providers; business operation models (cooperatives/smallholder societies); access to agricultural extension services, markets, land, skills and financial services; the role of collectors/middlemen; and, the division of labour along gender lines.
- Assessing the current state of decent work among smallholders in the tea sector with a special focus on social protection mechanisms available for them and their workers, occupational safety and health, determination of wages, resilience to natural disasters, indebtedness, the occurrence of child labour and social security networks.
- Identifying how smallholders in this sector are likely to evolve in the coming years in relation to the four thematic areas, namely, work and society; decent jobs for all; organization of work and production; and governance of work.

The findings and recommendations of the study are intended for the use of government authorities at both national and regional levels, the regional plantation companies (RPCs) and the smallholders and their organizations for improving competitiveness and growth in the tea smallholdings sector.

Smallholders' role in the tea supply chain

The collection of tea green leaves for the factories varies according to the growing region. In the mid-grown region, majority of green leaves were supplied by leaf collectors⁴. In the high-grown region, licensed leaf collectors and factory agents bring in the leaves required for processing. In the low-grown region, different methods of collection are found such as through factory agents, smallholder societies, licensed collectors and direct supply of green leaves to the factories by smallholders.

⁴ Private traders who capitalize on the business opportunity of transporting green leaves from the smallholder growers to the factories.

Despite not having formal supply contracts, the relationship between the private green leaf collectors and the smallholders is quite strong due to economic as well as social bonds. Furthermore, this research demonstrates that the leaf collectors do not add value to the supply chain. There is an exception in Ratnapura district, where selected smallholders and factories of RPCs were part of a certification system with the Rainforest Alliance (RA) for sustainable tea cultivation.

A majority of smallholders own their land holdings and all these smallholders are eligible for membership of the tea smallholders' society. They have free access to the extension services provided by the Tea Inspectorate (TI) of the Tea Smallholdings Development Authority (TSHDA), who identify workers' extension needs through field visits. The TSHDA is the only organization that offers business development training and advice to smallholders. Other than that, there are no training programmes for the smallholders in the sector; and, they rely on the existing knowledge and skills of their workers.

There are two key sources of funds that smallholders can access: cash or cash loans and credit-in-kind⁵. Cash credit was available for the tea smallholders in two forms; formal credit from financial institutions and informal credit (also called microcredit) by private money lenders. Cash credit was available at commercial banks such as Regional Development Bank, Hatton National Bank, Bank of Ceylon, DFCC Bank, National Savings Bank and the Peoples' Bank.

Decent work

The majority of employment in the tea smallholder sector comes from the informal economy, since smallholder farms are neither registered with the Employees' Provident Fund nor the Inland Revenue Department. There are basically three categories of workers in the tea smallholdings:

1. Own-account workers that work on their own smallholdings and do not engage any employee to work for them on a continuous basis
2. Contributing family workers who engage in farming without any payment, and
3. Casual labourers who are hired by the smallholder on an irregular basis for a basic remuneration which does not directly affect the earnings of the smallholding.

This rapid assessment considered the decent work indicators developed by the International Labour Organization (ILO) and the definitions used by the Food and Agriculture Organization of the United Nations (FAO). The dimensions considered included employment opportunities,

⁵ This is a common type of credit given by private leaf collectors where they provide the fertilizer and agrochemicals; provide starting materials such as plantlets and even groceries and dry rations to the smallholders as and when necessary. The price and a certain interest component will be deducted from the final payment for green leaf on monthly basis.

adequate earnings and productive work, decent working time, child labour, forced labour, stability and security of work, equal opportunity and treatment in employment, safe work environment, social security, social dialogue and access to technical and vocational training.

It was observed that agriculture-based employment opportunities were common in all regions, while in rural areas, non-agriculture-based employment opportunities were scarce. Even though the earnings of casual workers in the smallholder sub-sector were above the national poverty line, their earnings were not sufficient for a decent living. There was a clear regional variation in earnings with smallholders with workers in the low grown region being better off than those in the other two regions in terms of their earning capacity. This was mainly attributed to higher crop production, higher price for green leaf and fewer interruptions from adverse weather conditions. The statutory definition of work day is nine hours which includes one hour for meals. However, the working hours in the tea smallholder sector depend on the nature of the task. The tea pluckers have to complete their work before 2.30 pm in order to enable delivery of tea leaves to the collectors. Other tasks such as pruning and planting, which are mainly assigned to male workers, are performed until 4.30 pm. The study also did not reveal any instances of child labour and forced labour on any of the plantation sites visited.

The study found that in the low-grown region, the workers could easily find jobs as casual workers in the tea smallholdings due to labour shortage. At the same time, workers in the high- and mid-grown regions, despite the overall shortage of labour, could not find steady work as a result of the rainy season preventing the harvesting of green leaves and also due to loss of leaves from leaf blight.

There was evidence of discrimination in terms of ownership of smallholdings, as the majority of owners were males. Females engaged in the tea smallholdings mostly worked as unpaid family workers. The study also revealed that there was a difference in wages for casual workers where males received a higher wage than the females.

Safety at work is a serious concern, as the majority of the smallholders neither use nor provide personal protective equipment for their workers. For example, it was observed that when carrying out tasks such as applying agrochemicals or mechanical weeding, workers did not use masks, goggles and special protective clothing.

As far as social security is concerned, the study revealed that there is no statutory pension, insurance or health schemes in operation in the tea smallholder sector, although such schemes are available through private establishments.

There is also no dialogue on employee rights as the workers are not associated with worker collectives or trade unions. Access to vocational training opportunities related to the tea industry is also lacking.

Future of work

Based on the findings of the field study, it was possible to identify some key drivers likely to influence the future of work in the tea smallholder subsector. These drivers include demographic change and labour shortage, youth for succession, climate change and extreme weather conditions, land fragmentation and shortage, sustainable farming and certification, food safety and quality standards, value addition, and technological advancement and mechanization. Interventions are also being proposed to address challenges and to tap into opportunities arising from these developments.

Business models

Based on the findings of this rapid assessment, three business models are proposed to overcome the challenges and prepare the subsector for the future. These business models are built on existing best practices identified during the field study. The salient features of the models are as follows:

- **Supply chain model**

The sector is characterized by lack of organization within the supply chain of green leaves, lack of capital for expansion, smallholder indebtedness (to leaf collectors), poor cash flow situation within the supply of green leaves and uncertainty for workers were present in the tea smallholder sector. As a remedy for this situation, a supply chain model that can highlight contractual relationships between farmers and their farmer company, value addition for the products and services and state support are proposed. This could bring about an improved bargaining position, enhanced profitability and access to capital, elimination of smallholder indebtedness to leaf collectors, better creditworthiness of smallholders and training and skills development of youth.

- **Contract farming based model**

It will comprise of four stakeholder groups, namely: agribusiness firms, farmer collectives, para-state organizations and the financial institutions. The main purpose of the arrangement is to formalize the relationships among the key stakeholders and develop a strong para-state body with the participation of key stakeholders to strengthen links between stakeholders and to build a regional skilled labour pool.

- **Best farmer cluster model**

This model is meant to strengthen and replicate best practices among a selected group of farmers using the best practice farmer as a “change agent”. The expected outcomes of

this model are enhanced productivity of the farmer group and the resulting income boost for the smallholders and their workers.

Recommendations

The following recommendations are made to improve the sustainability and productivity of the tea smallholder subsector while creating and sustainably maintaining decent work in the context of transformational changes taking place in the world of work.

- Empower women
- Building resilience and climate mitigation
- Develop a skilled labour pool at regional level
- Pilot test the proposed business models
- Promote tea smallholders clustering around lead farmers for on-farm training as a future good practice
- Use information and communication technology to streamline the supply chain operations.
- Promote rural business incubators
- Promote tea tourism

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List of acronyms and abbreviations

BDS	- Business Development Services
CBA	- Colombo Brokers Association
CTTA	- Colombo Tea Traders Association
EPF	- Employees Provident Fund
ETF	- Employees Trust Fund
FAO	- Food and Agriculture Organization
FGD	- Focus Group Discussion
FTSHS	- Federation of Tea Smallholder Societies
ILO	- International Labour Organization
KII	- Key Informant Interviews
KPI	- Key Performance Indicator
KTDA	- Kenya Tea Development Authority
MPI	- Ministry of Plantation Industries
NVQ	- National Vocational Qualification
PA	- Planters' Association
RA	- Rainforest Alliance
RPCs	- Regional Plantation Companies
STARR	- Smallholder Tea and Rubber Rehabilitation Project
TASL	- Tea Association of Sri Lanka
TRI	- Tea Research Institute
TSHDA	- Tea Smallholdings Development Authority

CHAPTER 1

INTRODUCTION

Background

Tea is one of the most consumed and cheapest beverages in the world. Tea plant (*Camellia sinensis*) was first found to be grown in the Yunnan Province in South China which is considered as the motherland of the tea plant. The significant feature of the tea plant is its adaptability to grow under various climatic conditions. Hence, there are no specific climatic conditions recommended for the optimum growth of the plant. However, the monsoonal climate existing in Northeast India and the high elevation in China, India, and Sri Lanka provide suitable conditions for ideal cultivation and the production of tea. In spite of the variety of climatic conditions where it is grown, tea requires optimal temperatures and a well distributed rainfall to ensure favourable production (Marx *et al.*, 2017).

Depending on the elevation, the tea produced in Sri Lanka is classified into three (03) different groups. Tea grown mainly in Badulla and Nuwara Eliya districts, at an elevation above 1200m above mean sea level, is classified as “high-grown tea” or “upcountry tea”. Galle, Matara, Ratnapura, Kegalle, Kalutara and Hambantota are the main producing districts of “low-grown tea” or “low country tea”, which is the classification for the tea cultivated below 600m elevation. Tea grown in an elevation between 600m and 1200m is called “mid-grown” or “mid country tea” and is produced mainly in Kandy and Matale districts. Thus, three tea growing regions have been identified in the country and the tea produced differs in flavour according to the production zones (Sandika, 2018). Figure 1 depicts the tea growing areas in Sri Lanka.

In Sri Lanka, the tea sector is the largest employer, with a workforce of over 2.5 million (Paul, 2017). Of this, smallholders, often following a multi-crop model on landholdings of less than ten acres, cultivate about 60 per cent of the total tea land and account for more than 70 per cent of the total production. The smallholdings of tea are individual privately owned tea estates. While the majority of the large-scale plantations are managed by the private sector, a few are state-owned. The large-scale tea plantation sector occupies 40.4 per cent (202,700 ac) of the total land area and contributes approximately 29 per cent to total tea production.⁶ This proves that there is a significant disparity between the land area and the production of these two sectors. The smallholder subsector is better off than the corporate plantation sector in terms of productivity. Therefore, the future of the tea industry in Sri Lanka will largely depend on the

⁶ Statistical Information on Plantation Crops - 2012, Ministry of Plantation Industries, Colombo.

smallholders and their production systems. In the context of increasing importance of the tea smallholders, it is important to understand their role as stakeholders in the tea supply chain, the current state of decent work in the tea smallholder sector and the feasible pathways to adapt to global changes. Hence, a rapid assessment was carried out to explore these dynamics in the tea smallholder subsector.

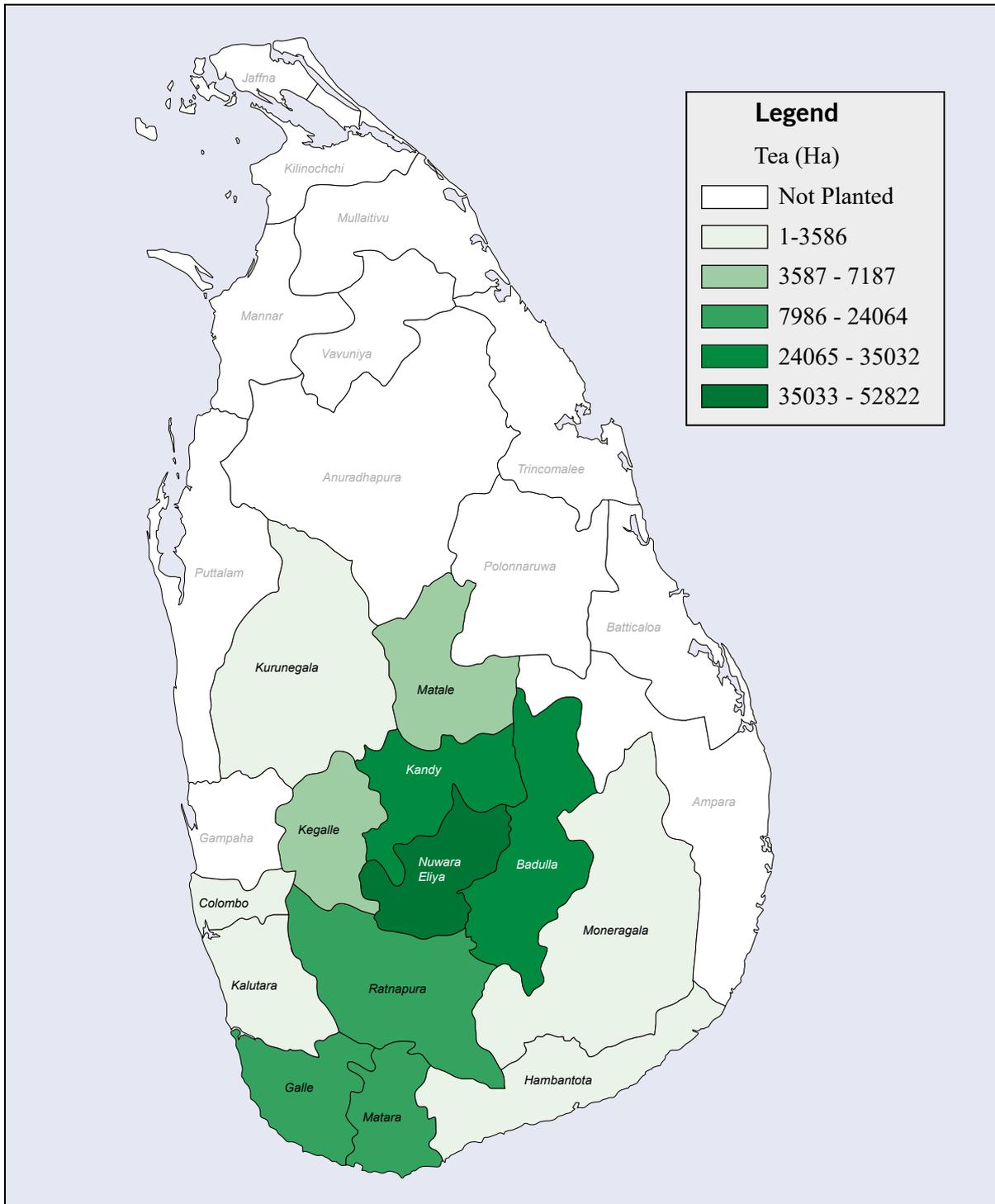


Figure 1 :Tea growing districts in Sri Lanka

Source: Jayarathne, 2011

Objectives of the rapid assessment

This study was conducted as a mapping exercise with the general objectives of understanding the role and dynamics of smallholders in the tea supply chain, the current state of decent work among the tea smallholders and its implications on the future of work in the plantation industry. The specific objectives of this rapid assessment as per the terms of references are as follows:

- Identifying the role and operations of smallholders in the tea supply chain in terms of their contribution to the supply of green leaves; their relationship with RPCs; access to BDSs and the capacity of BDS providers; business operation models (cooperatives/smallholder societies); access to agricultural extension services, markets, land, skills and financial services; the role of collectors/middlemen; and, the division of labour along gender lines.
- Assessing the current state of decent work among smallholders in the tea sector with a special focus on social protection mechanisms available for them and their workers, occupational safety and health, determination of wages, resilience to natural disasters, indebtedness, the occurrence of child labour and social security networks.
- Identifying how smallholders in this sector are likely to evolve in the coming years in relation to the four thematic areas, namely, work and society; decent jobs for all; organization of work and production; and governance of work.

The findings and recommendations of the study are intended for the use of government authorities at both national and regional levels, the regional plantation companies (RPCs) and smallholders to improve competitiveness and growth in the tea smallholdings sector.

Organization of the report

The report is structured into six chapters: introduction, literature review, study method, the role of tea smallholders in the supply chain, decent work and the future of work in this sector, and conclusions and recommendations. The background and the objectives of the rapid assessment are presented in this chapter (Chapter 1). A literature review with emphasis on the tea industry in general and smallholders more specifically is presented in Chapter 2. The study method is presented in Chapter 3, whereas Chapter 4 focuses on the role of smallholders in the tea supply chain. Decent work and the future of work in the tea sector are presented in Chapter 5. The last two Chapters – Chapter 6 and Chapter 7 – contain conclusions and recommendations respectively.

CHAPTER 2

REVIEW OF LITERATURE

The tea industry in Sri Lanka

Historical background of the tea sector in Sri Lanka

Tea is one of the most important agricultural commodities in Sri Lanka that brings a significant amount of export earning while generating employment opportunities for people in many districts (Perera, 2014). Tea or *Camellia sinensis* was introduced to Sri Lanka in the 19th century during the British era. It was introduced as an alternative to coffee after the Coffee Leaf Rust disease devastated the coffee fields in Sri Lanka. A Scottish planter, James Taylor was the pioneer to establish the first commercial tea plantation at *Loolkandura* Estate in Kandy district in 1867. Encouraged by the success of the tea planting in Sri Lanka, other English planters started to establish more tea plantations by replacing the existing coffee fields.

According to the literature, the first tea broking firm was John Brothers & Company, which was established in 1876. It was reported that the first public tea auction took place in Colombo in 1883 under the guidance of the Ceylon Chamber of Commerce. The Colombo Tea Traders' Association was established in 1894 and the Colombo Brokers' Association was formed in 1896. In 1893, one million Sri Lankan tea packets were successfully sold (Sandika, 2018). The Tea Research Institute (TRI) was opened in 1925 to support efforts aimed to enhance the production and export of tea further. TRI is the only national body in the country to deal with new technologies related to tea cultivation and processing. The tea estates owned and enjoyed by the British were nationalized by the government of Sri Lanka in 1971 and in 1976 the Sri Lanka Tea Board was established. In February 1977, the Tea Small Holdings Development Authority (TSHDA) was established in order to develop effective coordination of support services and promote individual entrepreneurship among tea smallholders of Sri Lanka.

The past and current trends

Today, tea export has become the mainstay of Sri Lanka's economy. The country's gaining of independence in 1948 opened avenues for new markets and thereby increased production. Following independence, tea, rubber and coconut generated more than 90 per cent of the country's total export earnings. In 1965, Sri Lanka (then known as Ceylon) become the largest exporter of tea in the world. Since the British started cultivating tea in Sri Lanka, Sri Lankan tea

has had the reputation of being the finest tea in the world, and was popularly known as “Ceylon Tea” among consumers around the world. Ceylon tea has become a powerful brand name which has persuaded the government to allow using it to market the tea the country produced, even though its name was changed to Sri Lanka in 1972 (Ganewatta and Edward, 2000).

Tea produced in Dimbula and Nuwara Eliya is in greater demand among the blenders in tea importing countries. Nevertheless, tea grown in the mid-elevation, which provides a thick colour, is in high demand in Australia, Japan, North America and European countries. Furthermore, teas grown in the Uva region are particularly popular in Germany and Japan. According to Van der Wal (2008), Western Asian, Middle Eastern and Eastern European countries have a high demand for teas produced in low- grown elevation.

The world’s tea production is summarized in Table 1. According to FAO (2015), the world tea production had increased by 6 per cent in 2013, which was about 5.07 million tons. China was the largest tea producing country in the world, with an output of 1.9 million tons (38 per cent of the world’s total). India was the second highest tea producer with 1.2 million tons in 2013 while Kenya and Sri Lanka secured the third and fourth places with a production of 436,300 tons and 343,100 tons respectively in 2013. In 2007, Sri Lanka held the position of the second largest exporter of tea to the world market. However, with the competitive advantage of the lower cost of production and the support received from the Government, Kenya was able to overtake Sri Lanka (FAO, 2015).

Table 1: World tea production (in 000 metric tons)

WORLD	3891.2	4040.0	4364.7	4627.0	47845.0	5063.9
Bangladesh	56.8	60.0	60.0	59.6	625.0	66.2
China (Mainland)	1150.5	1344.4	1475.1	1623.2	1789.8	19245.0
India	986.4	982.1	970.3	1119.7	1129.0	1200.4
Indonesia	150.3	156.9	156.6	150.8	150.9	152.7
Sri Lanka	311.3	291.2	331.4	327.5	328.4	343.1
Vietnam	15110.0	177.3	192.0	202.1	200.0	185.0
Others	78.9	77.8	94.8	96.2	92.7	93.8
Africa	535.9	520.5	616.1	591.7	580.2	649.5
Burundi	6.6	6.7	6.9	7.0	8.7	8.8
Kenya	345.2	318.3	403.3	383.1	373.1	436.3
Malawi	44.9	52.6	51.6	47.1	42.5	46.5
Rwanda	19.1	20.5	22.2	24.1	24.7	25.2
South Africa	3.5	2.0	2.1	2.2	2.2	23.0
Tanzania United Rep	32.6	32.1	31.6	33.0	32.3	32.4
Uganda	42.4	51.0	59.4	563.0	57.9	58.3
Zimbabwe	12.4	7.3	8.6	8.4	8.5	8.5
Others	29.0	30.0	30.2	30.6	30.4	30.9
Latin America and Caribbean	97.7	89.8	107.4	107.8	911.3	95.0

Argentina	79.6	73.4	90.7	91.2	81.3	78.9
Brazil	8.5	7.6	7.7	7.7	7.8	7.0
Others	9.7	8.8	8.9	8.8	9.2	9.1
Near East	255.2	238.2	262.0	251.1	251.5	253.5
Iran. Islamic Rep. of	41.4	39.6	27.0	29.5	26.5	26.5
Turkey	213.7	198.6	235.0	221.6	225.0	227.0
Oceania	7.1	7.2	7.2	6.6	6.4	6.5
Japan	94.7	86.0	83.0	82.1	85.9	81.7
Commonwealth of Independent States	8.3	8.4	8.1	8.5	8.6	8.9
Developed	113.7	103.8	101.0	99.5	103.3	102.9
Developing	37773.0	3936.2	1263.6	15273.0	1681.2	1961.0

Source: FAO, 2015

When the extent of tea cultivation is considered, there is no significant increment in the recent past in Sri Lanka (Figure 2). The production of tea was not stable during the last few years due to many reasons, including, most importantly, adverse weather conditions. Sri Lankan tea cultivation should be prepared to face the changes in the climate to have a stable production. The current tea production in Sri Lanka recorded a positive growth of 5.2 per cent in the year 2017, resulting in 307.7 million kilograms (CBR, 2017).

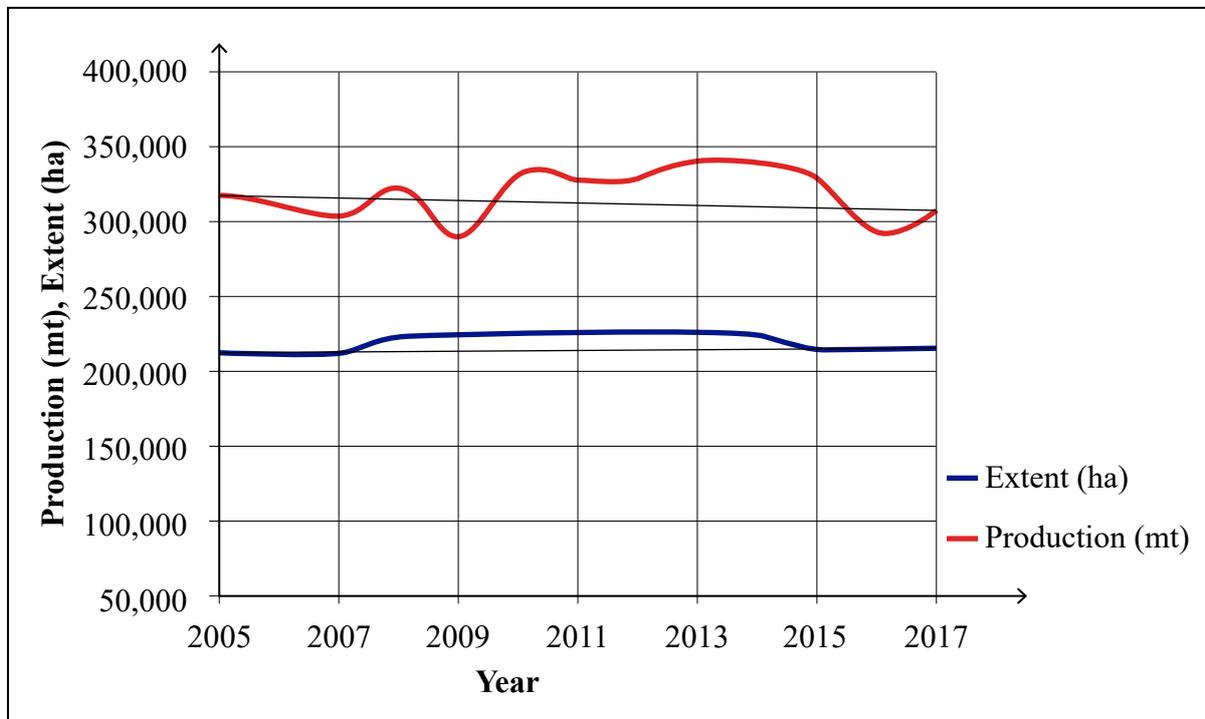


Figure 2: Extent of tea (Hectares) and production (mt) of tea

Source: (1) Sri Lanka Tea Board, (2) Department of Census and Statistics

Jayarathne (2011) highlighted that the land and labour productivity of tea in Sri Lanka was considerably lower than in other main tea growing countries (India, Kenya and Japan). With the low productivity, Sri Lanka's tea industry suffers higher production cost. Furthermore, the production cost mainly depends on land and labour productivity and the cost of other inputs. Figure 3 depicts the cost of production per kilogram of Sri Lankan tea from 2006 to 2016. The increasing trend of production cost makes the entire industry vulnerable in the competitive international tea markets. Therefore, finding measures for high productivity so that the industry can cope with the increasing production cost is a timely and much needed intervention.

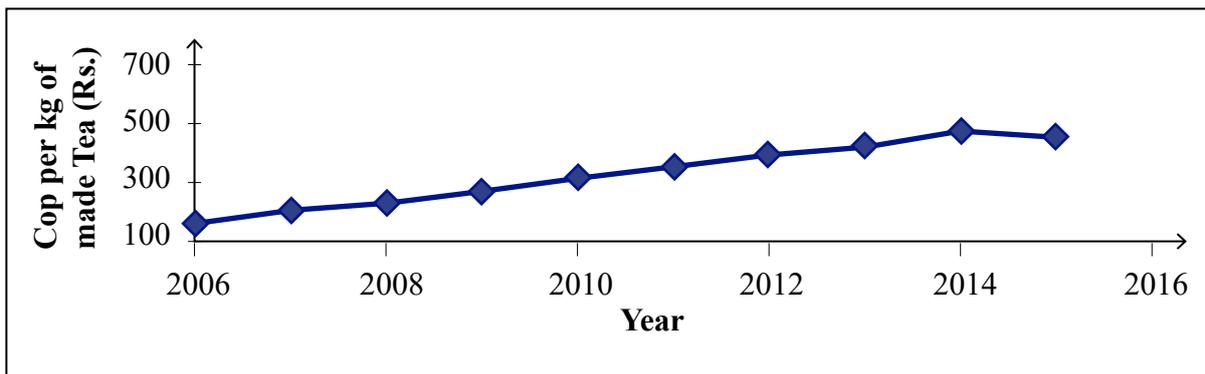


Figure 3: Cost of production of tea

Source: Department of Census and Statistics

Figure 4 shows how trends and fluctuations of wage and price of tea in Sri Lanka during the recent years. It is clear that the gap between wages and tea price is widening.

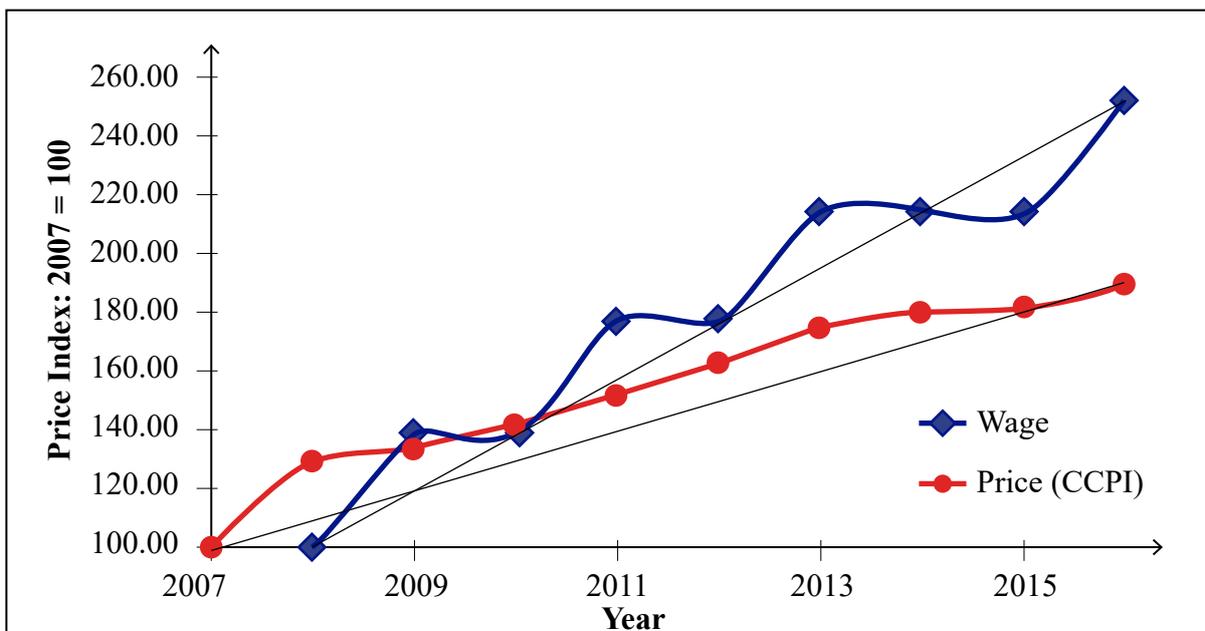


Figure 4: Trends in wage and price (CCPI: 2007=100)

Source: Department of Census and Statistics, Central Bank of Sri Lanka

However, when considering the economic benefits to the country from tea cultivation, it is evident that tea has always contributed positively to strengthen the economy of Sri Lanka. Figure 5 illustrates the contribution of the tea industry to the Gross National Product, where it has significantly increased from Rs. 10,332 million in 1996 to Rs. 74,065 million in 2012. An exponential growth was observed after 2005 (Sandika, 2018).

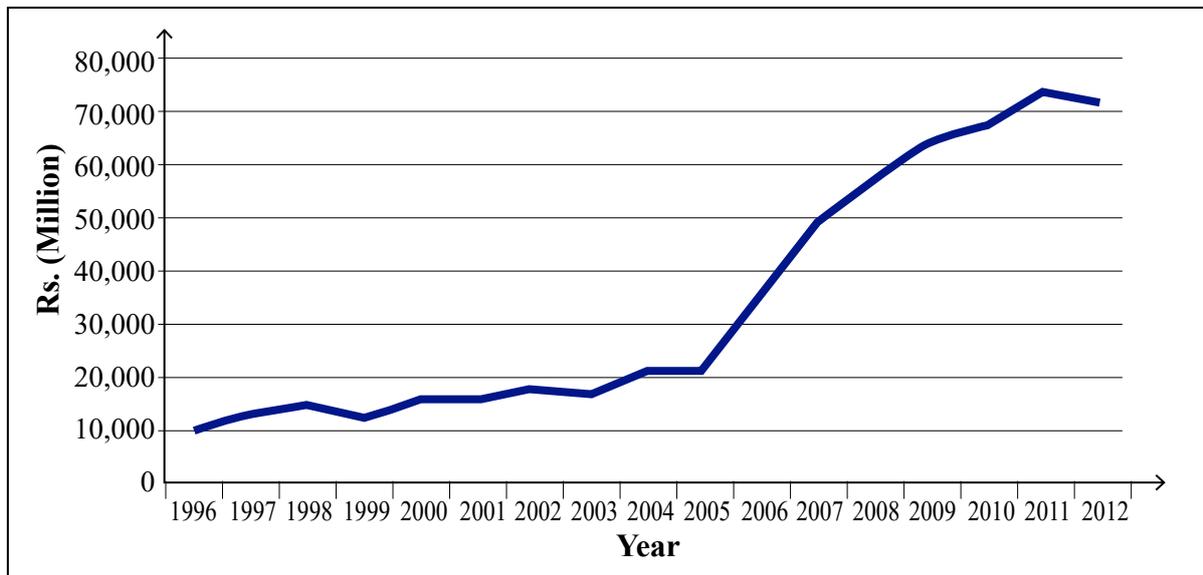


Figure 5: Contribution of tea for country GNP from 1996 to 2012

Source: Sandika, 2018

As illustrated in Table 2, the average land extent of a tea smallholder is about 0.85 acres. Table 3 shows how land fragmentation affected the size of a land of tea smallholdings. By year 2017, it has dropped to about 0.69 ac. The percentage workforce in tea smallholdings is nearly 70 per cent that operates in about 63 per cent of total land under tea cultivation.

Table 2: Status of tea sector of Sri Lanka

Sector	Extent (ha)	Estates	Workers	% Workers	People	% Land	% Production
RPC	72000	405	165000	28.75	1000000	32.73	36
State	9100	27	9000	1.57	40000	4.14	2
TSH	138900		400000	69.69*	1160000	63.14	62
Total	220000		574000	100.00	2200000		
<i>Land fragment (ha) per tea smallholding</i>				<i>0.347</i>			
<i>Land fragment (ac) per tea smallholdings</i>				<i>0.858</i>			

Source: TSHDA annual report various years * Tea smallholding operators

Year	No. of tea smallholders	Extents (ac)	Average extent (ac) of tea smallholdings
1983	159865	187229	1.17
1994	206652	204894.5	0.99
2005	397223	287857.6	0.72
2015	420000	300825.6	0.72
2017	475000	326991.6	0.69

Table 3: Land fragmentation of tea smallholdings

Source: TSHDA annual report various years

The role and operations of the tea smallholders in the supply chain

The tea industry is composed of two main subsectors; the corporate subsector or the large plantation companies and tea smallholdings. Smallholder farmers produce and supply over 70 per cent of green leaf requirement that is processed in a tea factory to be converted into “made tea”.

FAO (2011) emphasized that the definition of the smallholder varies from country to country. According to the FAO (2011), in Kenya smallholders are defined as “*growers cultivating tea in a small piece or pieces of land who does not possess his own tea processing factory*”. In India, a smallholder is “*a small-grower is one who cultivates 10.12 hectares or less and not possessing his own tea processing factory*”, whereas in Indonesia, they are defined as “*those who grow tea on land size between 0.8 to 2 hectares and sell tea without processing.*” The tea smallholdings in Sri Lanka are defined as land extents with less than 10 acres or 4 hectares (Wekumbura *et al.*, 2017).

The smallholder sector has recorded 1.5 million dependents and over 400 factory owners have emerged as the major force in the tea production and trade. Kalutara, Galle, Matara, Ratnapura, Kegalle, Kandy, Nuwara Eliya and Badulla districts and parts of Matale, Kurunegala Moneragala and Hambantota districts are considered to be the regions where most of the smallholders are prominently distributed. It is noted that 84 per cent of the smallholders own less than one acre of tea land and 95 per cent own less than two acres of tea land. Around 0.5 per cent of smallholders own lands from around 10 to 50 acres (Jayarathne, 2011).

Figure 6 depicts the supply chain of the tea industry with the links between the smallholders to the final customer. The producer and the customer are linked with many intermediaries such as the exporters, brokers, blenders, packers (Van der Wal, 2008). The Sri Lankan tea supply chain comprises of different organizations both state-owned and non-governmental, all of which play valuable part in the Sri Lankan tea supply chain. The state institutions are: the Ministry of Plantation Industries (MPI), which deals with policy issues affecting the tea industry; the

TRI that does the research activities in all aspects of tea cultivation, processing and product development; and, the TSHDA, which carries out the operations of the smallholder sector in the country. The non-governmental organizations are: the Tea Association of Sri Lanka (TASL), the Planters Association of Ceylon (PA), the Federation of Tea Smallholder Societies (FTSHS), the Colombo Brokers Association (CBA), the Colombo Tea Traders Association (CTTA), trade unions and civil society organizations (Van der Wal, 2008).

Figure 7 depicts the overall organizational structure of the tea industry in Kenya which is relatively similar to the Sri Lankan tea industry. The tea sector in Kenya comprises a web of actors ranging from regulators and agencies to producers, collectors, traders/brokers and packers. The Kenyan tea sector is handled mainly by the Ministry of Agriculture, which is the decision-making body for the whole sector. The Tea Board of Kenya is playing a very important role in regulating the tea industry in the areas of cultivation, research and development, processing, trading and promotion of tea in local and global markets. Kenya Tea Development Authority Ltd (KTDA) was first initiated as a Special Crops Development Authority in 1963; however, in 2000, the KTDA was registered as a private company and it is now the management agency of the smallholder sector farmers (Kagira et al., 2011). Thus, the smallholder tea sector in Kenya is managed by the KTDA and it owns over 80 per cent land under tea producing over 60 per cent made tea in Kenya (Owuor et al., 2007).

In addition, the research conducted by the ILO (2015) highlighted that the supply chains in chemical, logistics, tourism and tea sectors are owned by a small number of multinational enterprises in the world. Nevertheless, this has created entry points for the developing countries to enter into the global supply chain where the employment opportunities said to have increased in tea, tourism and logistic sectors. As per this observation, it indicates the potential to combine all these sectors to function in a mutually beneficial mode for value addition while widening further employment opportunities in the domestic tea sector in Sri Lanka.

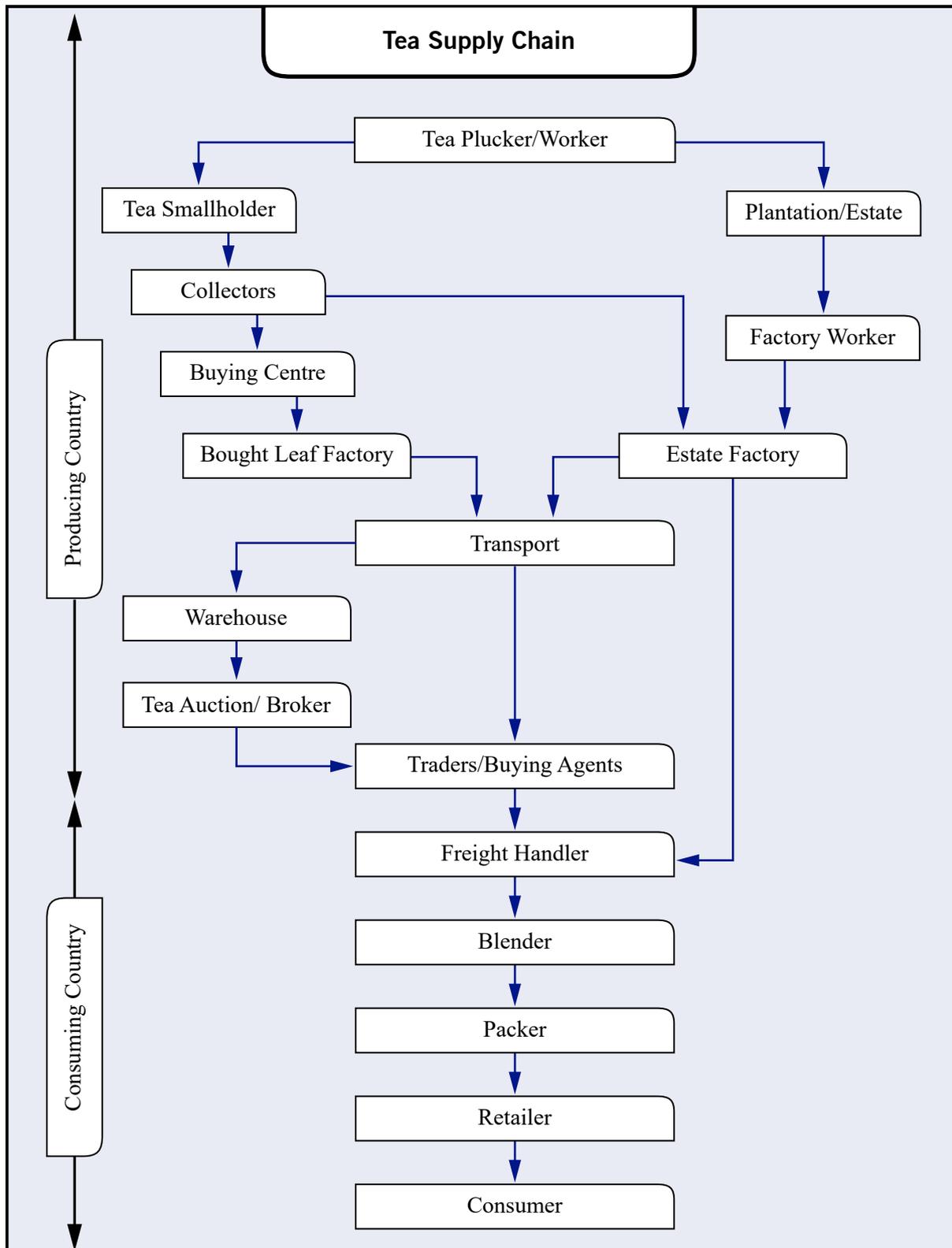


Figure 6: Supply chain of tea in Sri Lanka

Source: Van der Wal (2008)

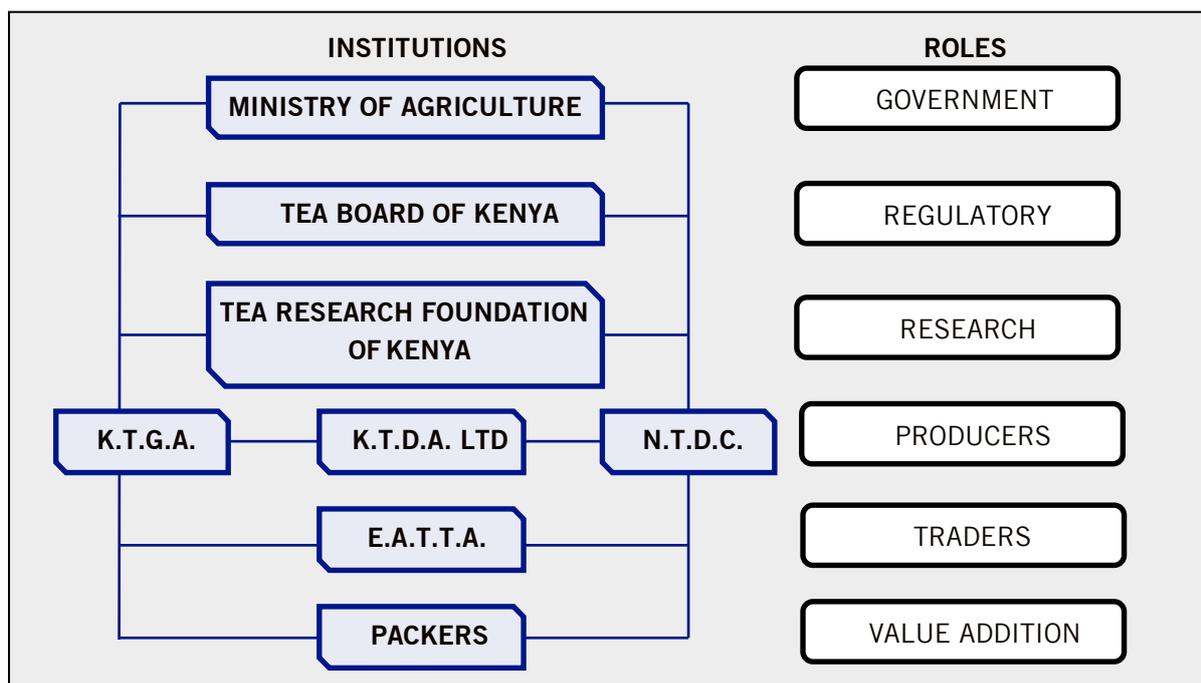


Figure 7: Organisational structure of the tea sector in Kenya

The opportunities and constraints in the tea smallholder subsector

The tea smallholder subsector has not always run smoothly and has often faced serious challenges. For example, the challenges which the smallholders in the tea sector confronted some three to four decades ago were: inadequate outreach extension facilities, lack of ready credit facilities for the various important agricultural inputs, non-availability of essential inputs (fertilizer, chemicals, equipment, etc.), lack of adequate good planting material, exploitation by private leaf collectors (middlemen), difficulties of leaf transport, inadequate manufacturing facilities, minimum link with the manufacturers (factory) and uncertainties of a guaranteed price (Jayasinghe, 1984).

The challenges faced by the smallholders in the recent years can be summarized as lack of awareness and training on tea cultivation techniques or poor extension services, low farm-gate prices, poor business practices, low productivity, and lack of access to services and weak perception of sustainable agriculture (Perera, 2014; Gakarai, 2015).

Lack of trainings and inadequate outreach extension facilities have always been a major constraint throughout all these years. Perera (2014) noted that majority of the farmers had either received little or no direct training. These smallholders have mainly relied on the knowledge which has been passed down the generations or the advice that they have received from the village level tea societies, fertilizer companies or such agents in village level or other fellow farmers.

Van der Wal, 2008 has identified that lack of ownership of lands had become the main hindrance faced by the smallholders in India and Indonesia.

The unorganized imperfect market for green leaves can be observed when the smallholders do not have a collective ownership of factories. This has risen due to the minimum interventions by the regulatory bodies and institutions (Gakaria, 2015).

Table 4 depicts the cost of cultivation of tea per acre in smallholder sector. It is evident that the cost of production (COP) of a commodity plays an important role in the economy as it helps to regulate the growth of an industry and thereby, provide a platform for the policymakers to make decisions. The figures show that the total fixed cost was Rs. 15, 816 (9.5 percent of total COP) whereas the total variable cost was Rs. 1, 35,756 (89.5 per cent of total COP). The total cost of cultivation per kg of green leaves was Rs. 38.33 (Shyamalie, 2011).

Table 4: Cost of cultivation in small holdings sector (Rs/ac/yr)

Operation	Worker requirement (Man days)	Worker cost	Material cost	Total cost	Cost/kg green leaves
Fixed cost	---	---	---	15.8	4.0
Variable cost	280.0			135756.0	34.3
Plucking	207.0	82753.0		82.8	20.9
Fertilizer application	1 Liter	4211.0	10508.0	14.7	3.7
Other field cultivation	62.0	26.7	4.4	38284.0	9.7
Total COP	280.0	113687.0	14952.0	151572.0	38.3

Source: Shyamalie (2011)

According to Gakaria (2015), the cost for producing green leaves at the smallholder level is lower than in traditional plantations because of concealed family costs and unaccounted social costs. Smallholder farmers use family labour in most of the operations until green leaves are delivered to the collection centres or factories. Gakaria (2015) has also noted that Kenya and Sri Lanka have achieved higher productivity because of the significant contribution from smallholder green leaf production. Nevertheless, the same author argued that the activities of smallholder farmers are often less environmentally friendly and this may negatively impact their ability to access export market supply chains requiring adherence to higher quality, social and environmental standards. Van der Wal, (2008), suggests that the growth of smallholder tea production has given rise to a sustainability challenge due to the lenient regulation in this subsector, less environmentally friendly farming practices, lower traceability, quality and continuity of supply. Certification by international organizations such as RA (Figure 10) can be seen as a good practice in the tea sector as they can contribute to sustainability while providing an opportunity for the smallholders engaged in the tea sector to enter a novel market. Considering the contribution of certified tea to the global market was about 12 per cent in 2012, there is a vast potential to capture this niche market (ILO, 2015).

Decent work in the tea smallholders' subsector

The research conducted by the ILO in 2015 described the decent work challenges that characterize the tea sector globally, including in Sri Lanka, and highlighted the importance of adequately addressing both social and economic challenges to promote the sustainability of the sector. The tea smallholders too are confronted with serious decent work deficits which have often been overlooked by most of the studies analysing challenges in this sector.

ILO research on working conditions in the agri-food sector demonstrated that, in spite of the economic gains of the plantation sector, in many countries, it faced serious decent work challenges. Low incomes, excessive working hours, widespread casualization, poor working and living conditions, harassment and low productivity were a reality on many plantations around the world (ILO, 2010). For example, the low incomes of the smallholders are prominently seen in Malawi's tea sector, where they claim that the price they have to sell their tea, is very low and does not compensate the cost of production. Thus, most of the farmers grow other crops in order to stabilize the total farm income (Van der Wal, 2008).

Decent work sums up the aspirations of people in their working lives. It involves opportunities for work that is productive and delivers a fair income, security in the workplace and social protection for families, better prospects for personal development and social integration, freedom for people to express their concerns, organize and participate in the decisions that affect their lives and equality of opportunity and treatment for all women and men.

Lack of labour is also becoming one of the major constraints in the plantation sector. The smallholder tea sector was established with the ray of hope that family units would manage their farms and thereby, counteract the effects of labour shortage. The main demand for labour in tea production is for harvesting. However, the smallholder sector has grown to an extent that family alone cannot always meet the labour demand and the smallholders often need to hire additional labour (Owuor et al., 2007).

Gender issues in the sector deserve attention. Owuor et al. (2007) underscored the significant contribution of women to the labour force in the smallholder tea sector. It is therefore vital to consider the gender aspect when providing extension services, transfer of skills and choice of technology. Women also face challenges related to occupational safety and health and in terms of access to maternity care and other social protection programmes. In terms of land ownership too, men (with 63 per cent land ownership) outnumber women, in spite of women taking a lead role in all farm activities related to actual maintenance and cultivation. This has negative implications with regard to training and access to other resources which are expected to go to landowners and heads of households (i.e. mostly men), while the actual significant work is carried out by women (Perera, 2014). Women's empowerment can be made a reality by mainstreaming gender equality into national policies, in particular with regard to employment and rural development, better access to training and development for professional involvement and to social protection.

According to Auchter et al. (2014), the engagement of children below the age of 14 in the tea smallholder sector is a serious concern, as stated by the Labour Department of Sri Lanka. Sri Lanka ratified the ILO Minimum Age Convention, 1973 (No. 138), which makes provisions for national laws and regulations that permit employment to persons aged 13-15 on light work on the conditions that their employment would likely not harm their health or development, hinder their school attendance or their participation in vocational training. The national law also prohibits employment of persons below 18 years of age for activities that can be harmful to their health, safety or morals.

The smallholder sector does not incur overhead labour costs. It is characterized by the prevalence of temporary or casual labour and lack of organization. The cost of family labour is also not accounted for in the total cost of green leaf production. At the same time, however, according to a study conducted by the FAO (2011) in different tea growing countries, except for Vietnam, all workers in the smallholder sector have lower wages and fewer benefits than those in large estates.

Lack of social security is another issue that characterizes the tea supply chain and has become more prominent due to the increasing casualization of labour. The fact that hired workers do not need to be guaranteed on-job security or other benefits which the permanent workers have further contributes to casualization (IDH, 2016).

CHAPTER 3

THE STUDY METHOD

The rapid assessment was carried out using a broad qualitative analysis through focus group discussions (FGDs) and key informant interviews (KIIs) as data collection approaches.

Focus group discussions

FGDs are a data collection tool that can be used to gather a wide range of data from a group. These data are essentially of a qualitative nature. These open and relaxed discussions with a protocol can generate experiences, views and ideas and can be converted into a wealth of information for a study. In order to collect qualitative data, rural studies often use FGDs, which can assist in explaining rural situations. In deciding on the size of the group for a FGD, the objective has been to get as many different ideas and perspectives as possible. In this study, the size of the groups was around 5 to 8 participants that were selected based on their familiarity with the topic being discussed. Multiple FGDs were conducted to ensure a good coverage of topics and to yield a good mix of perspectives and ideas relevant to the topic.

The following stakeholders were selected for FGDs in this assessment:

- Tea smallholders groups
- Workers of tea smallholdings
- Leaf collectors
- Factory officers

Key informant interviews

KIIs are semi-structured and conversational and, for this purpose, semi-structured questionnaire schedules were developed. KIIs along with FGDs assisted the rapid assessment in understanding and explaining the current status of decent work among the tea smallholders in Sri Lanka and its future implications on the tea industry.

Following stakeholders were selected for KIIs in this assessment:

- RPC management

- TSHDA officials
- SH Societies office bearers
- TU representatives
- Factory Owners' Association representatives
- Labour officers
- Officers of financial institutions

Data collection approach

Purposive sampling approach was used to select participants for the FGDs and KIIs. Purposive sampling ensured that adequate diversity is captured in a homogeneous group of people who would be participating in FGDs. The study was conducted in the 10 districts, where significant numbers (over 1,000) of tea smallholders and smallholdings were available. The districts were Kalutara, Kandy, Matale, Nuwara Eliya, Galle, Matara, Hambantota, Badulla, Ratnapura, and Kegalle.

Protocols for FGDs and a semi-structured questionnaire for KIIs were designed mainly based on the key domains derived from the four strategic pillars of the ILO's Decent Work Agenda (full and productive employment, rights at work, social protection and social dialogue). The key domains were employment opportunities, adequate earnings and productive work, decent working time, combining work with family and personal life, work that should be abolished, stability and security of work, equal opportunity and treatment in employment, safe work environment, social security and social dialogue between employers and workers' representation⁷ (ILO, 2013). Particular emphasis was given to key elements related to social protection pillar of the Decent Work Agenda. Questions were included to capture the transformation that is likely to take place in the smallholder farmer work settings in the context of the mega trends such as globalisation, technology, demography and climate change.

Special emphasis was also placed on such topics as the role of tea smallholders in the supply chain of green leaves, their relationships with regional plantation companies located in the above districts, business operation models and land ownership patterns of tea smallholders, access to finance, gender division of labour. In addition, the FGDs with smallholder farmers focused on understanding how they would evolve in the future in terms of work and society, decent jobs for all, organization of work and production and governance of work.

KIIs were conducted with the management of the RPCs, tea smallholders, officials of the TSHDA at regional, sub-regional and tea inspector range, office bearers of tea smallholder societies and of the tea factory owners association, representatives of the trade unions and

⁷ International Labour Organization (ILO) (2013) decent work indicators: guidelines for producers and users of statistical and legal framework indicators. ILO manual, second version. ILO, Geneva.

labour officers. The number of FGDs and KIIs conducted with each of these stakeholder categories are presented in Table 5.

Although sampling was done district-wise, special attention was given to the elevation factor when subjects were selected because most districts except Galle, Hambantota and Kalutara have tea cultivations in more than one elevation (high, mid and low grown).

Table 5: Number of focus group discussions and key informant interviews at each district by stakeholder category

District	Number of TSHs	Focus Group Discussions					Key Informant Interviews							
		Tea Smallholders groups	Workers of tea smallholdings	Leaf collectors	Factory officers	Total FGDs	RPC management	TSHDA officials	SH Societies office bearers	TU representatives	Factory owners association reps.	Labour officers	Officers of financial institutions	Total KIIs
Kalutara	35,908	1	1	1	1	4	1	1	1	1	1	1	1	7
Kandy	29,224	1	1	1	1	4	1	1	1	1	1	1	1	7
Matale	1,387	1	1	--	--	2	-	-	1	-	1	1	--	3
Nuwara-Eliya	16,875	1	1	1	1	4	1	1	1	1	1	1	--	6
Galle	81,491	1	1	1	1	4	1	1	1	1	1	1	1	7
Matara	63,273	1	1	1	1	4	1	1	1	1	1	1	1	7
Hambantota	2,386	1	1	--	--	2	1	-	1	-	1	1	--	4
Badulla	28,101	1	1	1	1	4	1	1	1	1	1	1	1	7
Ratnapura	92,038	1	1	1	1	4	1	1	1	1	1	1	1	7
Kegalle	18,893	1	1	--	--	2	1	1	1	--	1	1	--	5
Total	369,576	10	10	7	7	34	9	8	10	7	10	10	6	60

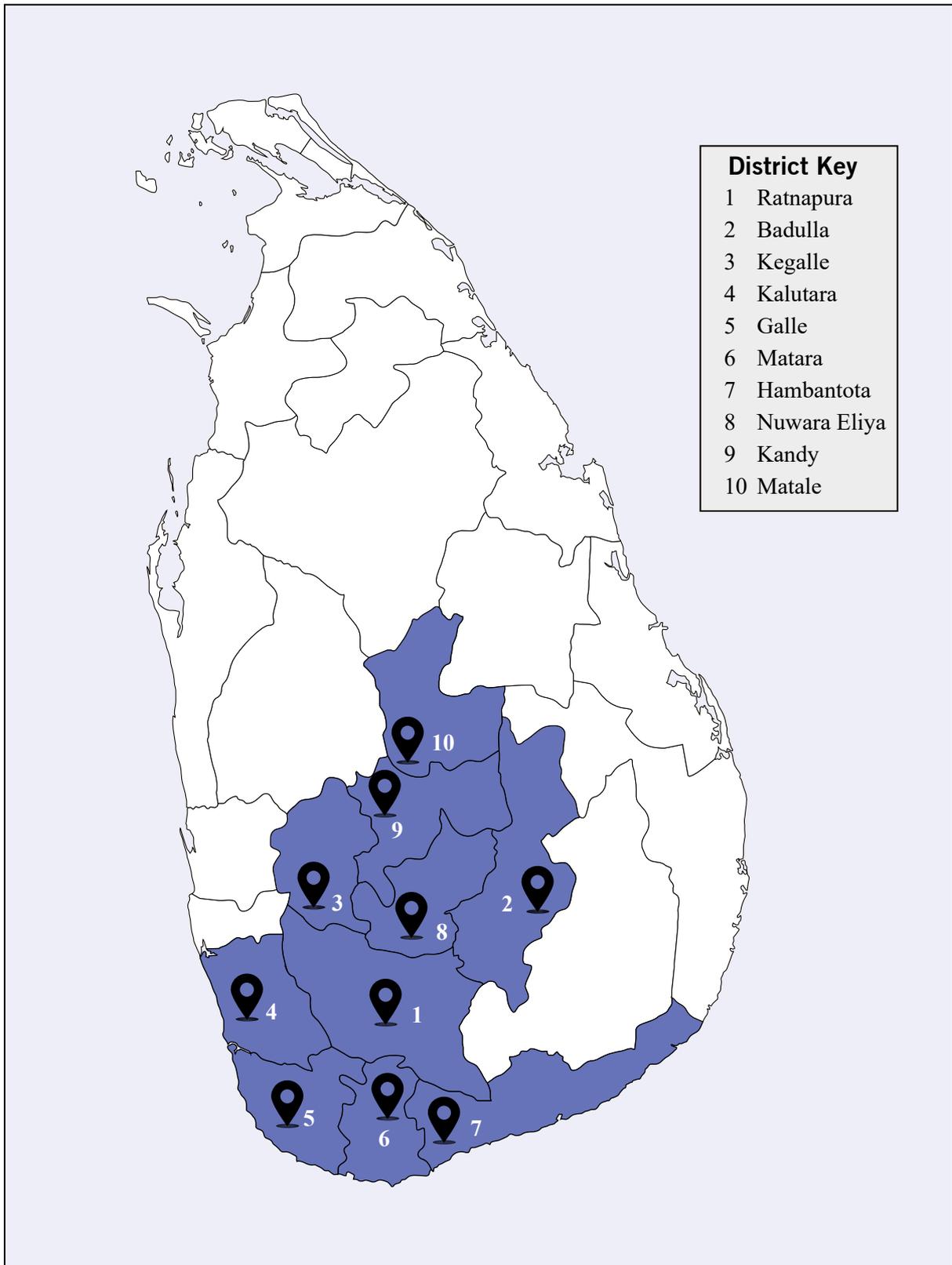


Figure 8: Field study locations

Data analysis

This study was based on mainly qualitative data gathered through FGDs and KIIs. Complimentary secondary data was collected to meet the overall objectives. The overall analysis followed a mixed method approach. Data triangulation was employed through qualitative and relevant secondary data. Qualitative analyses were accomplished by combining the key thematic areas. The following figure depicts the procedure applied for data analysis.

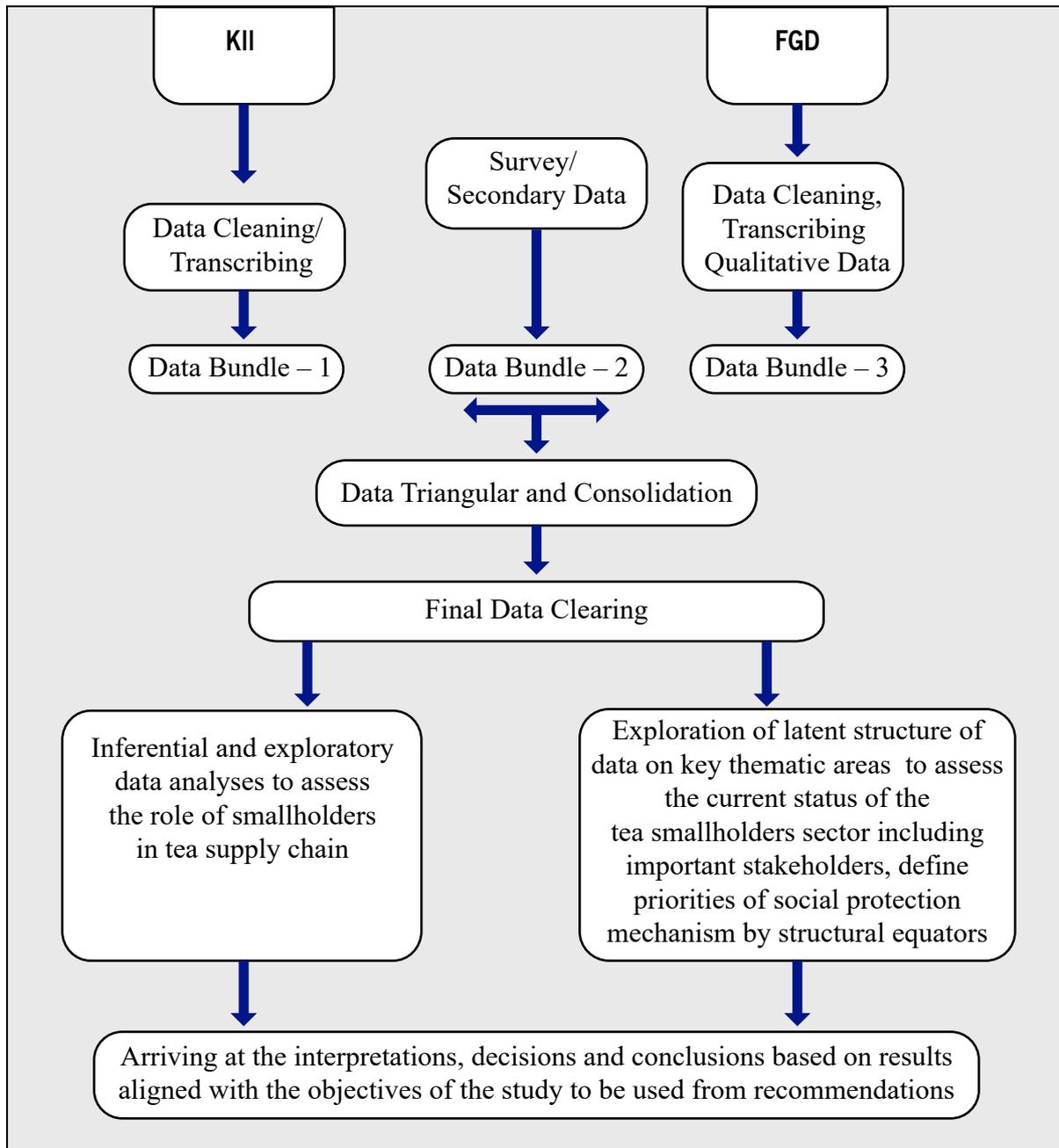


Figure 9: Data analysis process

CHAPTER 4

ROLE OF TEA SMALLHOLDERS IN THE SUPPLY CHAIN

Introduction

This section will discuss the role of smallholders in the supply chain of green leaves with particular reference to the collection systems; smallholders' access to extension services, business development services, finance and skill development opportunities; farmers' societies; and business models that can be identified within this very important sector. Qualitative data gathered through FGDs with smallholder farmers, leaf collectors and factory officers and KIIs with RPC managers, TSHDA officials, office bearers of tea smallholder societies, factory owners association and managers at banks that were offering credit facilities were used to discuss the present scenario under each of the above aspects.

Collection systems for green leaves

Collection systems of green leaves included all the parties/institutions from the producers up to the users (Figure 10). The producers in this case, were identified as the smallholders while the users were the tea processing factories belonging to either RPCs or private individuals. As a general rule, the holdings of less than 10 acres (4 ha) were classified as smallholders. While there were lands exceeding 10 acres that were still classified as smallholdings, the vast majority of the smallholdings (around 88 per cent) were smaller than half (1/2) ha. The green leaf collectors form the middle part of the supply chain of green leaves.

It was observed that the majority of green leaves were dealt with by leaf collectors. Leaf collectors were the individual dealers who make a revenue by being an intermediary through transferring the green leaf from smallholder to the factory. It was observed that the existence of dealers and the prominent role they played in the supply chain was due to the fact that the smallholder subsector was less organized and its produce was sold in an imperfect market. It was revealed that the leaf collectors collected green leaves from the smallholders in woven poly propylene (WPP) sacks or plastic crates in lorries driving through the villages. This was a very intertwined web of a supply where a lot of smallholders supply to a number of collectors and where every smallholder supplied to more than one collector. These green leaves were then brought to a common facility run by each collector and re-sacked into a lesser number of fully loaded sacks weighing approximately 20kg. It was revealed during the interviews that

there were strong economic and social relationships being developed between the smallholder farmers and leaf collectors. Some leaf collectors revealed that they had few millions of rupees locked up in the transactions with smallholders through advances for the green leaves supplied, the provision of inputs on credit and assistance in cash or in kind during difficult situations faced by the farmers. This, however, places the farmers in a situation of indebtedness.

A fair quantity of green leaves is transported from the smallholdings to factories by farmers themselves and factory transport (collecting) agents (Figure 10). When farmers transport the green leaf, it is mostly to the small-scale factories, and the RPCs receive a small quantity of green leaf through their collecting agents who get paid for the transport function in the supply chain.

The membership of these societies that are localized and confined to tea inspector areas, vary between 400 and 500. Any tea smallholder is eligible to become a member of the smallholder society. The office bearers of the smallholder societies revealed that they hired lorries and personnel to collect the green leaves from their members and deliver them to the factory. In addition, non-members could also supply to the society at the same price, thereby taking undue advantage of the society’s service. However, at present, this has not created a major issue.

The quality of the green leaf is a very important factor impacting the overall quality of the tea. Despite having wealth of knowledge and understanding on issues related to the quality of green leaves, the smallholders have not been able to create high quality tea. The push towards high quality was limited to tea factories, and did not come from all stakeholders. The factory officers interviewed revealed that the factories were in a severe competition to receive green leaves in order to run the working shifts and ensure continuous production of made tea. Discussions with leaf collectors revealed that their function in the supply chain is also very competitive and that the quality of green leaf is compromised frequently in order to have a continuous supply of green leaves from the smallholders.

It was revealed that no value addition took place in the supply chain involving leaf collectors. An exception to this was recorded in the Ratnapura district, where some selected smallholders and factories of the RPCs were part of a certification system with the RA for sustainable tea cultivations. It was reported that premium prices for made tea for the RPC and for green leaf for the certified smallholders were on offer.

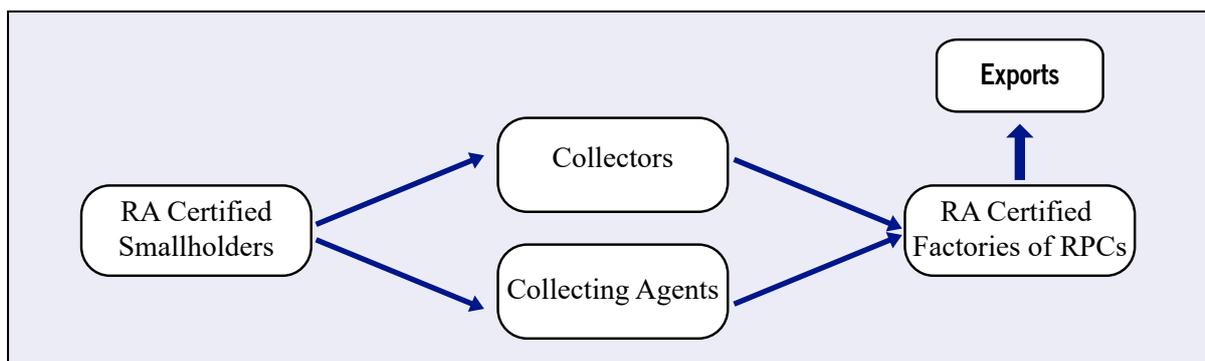


Figure 10: Supply chain of Rainforest Alliance certified green tea leaves

During visits to collectors' facilities, it was observed that most of the collectors were running a successful operation. Many of them had good recording systems, some were even computerized. Many of the collectors got their next generations already involved with their business. It was observed that many of them were having lucrative livelihoods earned through this business.

Access to extension services and skill development opportunities

Smallholders revealed that the majority of them owned their tea smallholdings. Anyone who owned tea land could become a member of the tea smallholdings development society. All the members of the society had free access to the extension service, which was considered a great service to the smallholders. The tea inspector of the TSHDA, who identified the extension needs through field visits, was the key person administering the tea extension programme. Other programmes introduced to enhance livelihoods of tea smallholders were the subsidy schemes for planting and fertilizer supply. In addition, various companies producing and selling agrochemicals and fertilizers conducted training programmes for the smallholders. These were organized by the private leaf collectors in order to help smallholders and to ensure their existence and dominance within the supply chain. Women in all the districts were keen to access extension services and development opportunities.

There were no training programmes available for the workers hired by the smallholders. This indicated a lack of access to extension services and opportunities for skills development, training and vocational education. There was also a lack of access to specialized skills and training on modern crop management and plantation techniques, which has aggravated the tendency of youth to seek employment outside the sector.

Access to finance and BDS

There were two key sources of credit; cash or cash loans and credit-in-kind, available for the tea smallholders. Cash credit was available for the tea smallholders in two forms; formal credit by financial institutions and informal credit (also called micro credit) by private money lenders. Cash credit was available at the commercial banks such as Regional Development Bank, Hatton National Bank, etc. The data collection mission had key informant interviews with managers of these banks. This revealed that any smallholder with an account in the particular bank and a membership of the tea smallholder society could apply for a tea development loan. A loan up to Rs. 300,000 (small loans) from banks can be obtained from the local branch within a week provided that all documents are complete. Loans of higher amounts needed to be approved by the regional or district office of the respective bank and would take a longer time to process. Two other members of the society as guarantors or proving to have a continuous supply of green leaves⁸ were necessary for small loans. Larger loans needed formal collateral such as tea lands. All the banks have the condition that the loan recipient smallholder agrees to receive

⁸ All the payments from the factory or the society for the supply of green leaves needed to be credited to the borrower's bank account is a necessity for all loans.

the payments for the green leaves to the account maintained at the respective branch. Usually the banks have rigorous monitoring processes to ensure employment of funds for the intended purpose of borrowing and the repayments. It was revealed that long process with complicated application forms, unavailability of proper identification, National Identification Card (NIC) and non-provision of required information were constraints in the loan releasing process. It was reported that the supply of informal credit for tea smallholders by private money lenders largely depend on social ties. A detailed study is needed to unearth the finer details of this sector of finance.

New planting, replanting and nursery development were some of the activities for which tea development loans were used. According to the key informants, these loans were attractive as they have a grace period of six months at the beginning, during which time no payment of instalments was necessary. The TSHDA and the Smallholder Tea and Rubber Revitalization Project (STARR) were largely responsible for disbursement of finance in this sector.

It was observed that the TSHDA was the only organization that offered business development training and advice to the smallholders. Such training was offered to groups of smallholders which may be considered as a diluted approach. Both men and women were given equal opportunity to participate at these programmes. A number of universities and institutions offered business development services. However, these avenues and opportunities were not explored as there was no person or organization directly responsible for promoting such activities among the smallholders. As a result, knowledge about business was rather rudimentary among smallholders. Women in all studied districts were keen to access development opportunities and finance through formal credit. Gender equality can be made a reality by opening up these avenues for women.

Farmer societies

As mentioned above, the TSHDA was instrumental in establishing smallholder societies. It was reported that the membership of these societies varied between 80 and 900 members. These were governed by the TSHDA Act. Collecting green leaves was the key function of the smallholder societies. Other functions of the societies included supplying green leaves to the factories that offered the best price, provisioning micro credit and distributing fertilizers. There was also a crop insurance programme facilitated by the societies which was launched by the TSHDA in collaboration with Ceylinco Insurance Ltd. However, there were no supply contracts between smallholders and their society. As a result, smallholders were not obliged to supply green leaves to their society.

There were no formal supply contracts between the smallholders and leaf collectors either. It was observed that the relationship between the private green leaf collectors and the smallholders was quite strong with economic as well as social ties. There were many instances where members of the societies supplied their harvest to the private traders due to the strong connection between them. Also, the key informants from societies reported that there were a number of non-member smallholders who supplied their harvest to the societies at the same

prices. This reflected the unorganized nature of the membership and operations of these societies and highlighted the importance of this kind of relationships in a rural setting.

These societies were able to develop healthy links with tea processing factories. Therefore, smallholder societies could play a role in enhancing the bargaining power of smallholders. The existing links between the smallholder societies and factories could be used to develop alternative business models. Further, smallholder societies could be used as a base for developing smallholder cooperatives. Stakeholders such as financial institutions, business service providers and the TSHDA could act as facilitators for the formation of smallholder companies. About half the members in these societies were women. The key challenges faced by these smallholder societies were their competition with private leaf collectors and expansion of the membership.

Business models

The data collection mission was able to identify a business model existing within the supply chain of green leaves (Figure 11). The majority of tea smallholders and their societies did not exhibit the features that successful small businesses possess. Although they served an economic activity, it was mainly for the benefit of the household but not to serve a real business motive. They did not have business goals and objectives, profit motives, capital accumulation, investment growth, formal employees or employee contracts or motive towards customer satisfaction. Therefore, there is a need as well as an opportunity to bring creativity and dynamism into this industry. A more smallholder-friendly business model was proposed with the view to improve the sector and to enhance the job prospects for the workers at the smallholders. This business model was proposed based on the following observations and challenges:

1. **Unorganized supply chain of green leaves:** The present supply chain of green leaves is unorganized. There is a well-organized network of smallholder societies set up by the TSHDA. The major objective of these societies is the husbandry of the crop. It was noticed that only a handful of such societies were able to move in to the area of green leaf supply to the factories.
2. **Lack of capital for expansion:** Tea smallholders are mostly poor farmers who own their plot of land and used it for cultivating tea. They are mostly full-time farmers whose family members also contribute their labour. It was revealed that they were mostly land-locked and lacked capital needed for modernizing their production practices. This indicated a serious limitation for the smallholders to develop further as entrepreneurs or individual proprietors. Therefore, their societies also suffer from lack of capital. As a result, they were inclined to obtain credit facilities from formal and informal sources at high rates of interest.
3. **Smallholder indebtedness to leaf collectors:** As indicated above, a vast majority of the smallholders were indebted to private leaf collectors.

4. **Cash flow within the supply of green leaves:** It was observed that the supply of green leaves to factories was a lucrative business that was mostly in the hands of private traders who dominated the industry. This business can be successfully handled by the smallholders themselves through an organized approach.
5. **Uncertainty for workers hired by the smallholders:** It was observed during the discussions with smallholders and labour officers that the employment within the smallholder sector was temporary and informal. There is a scope for formalization if smallholder operations could become more competitive.

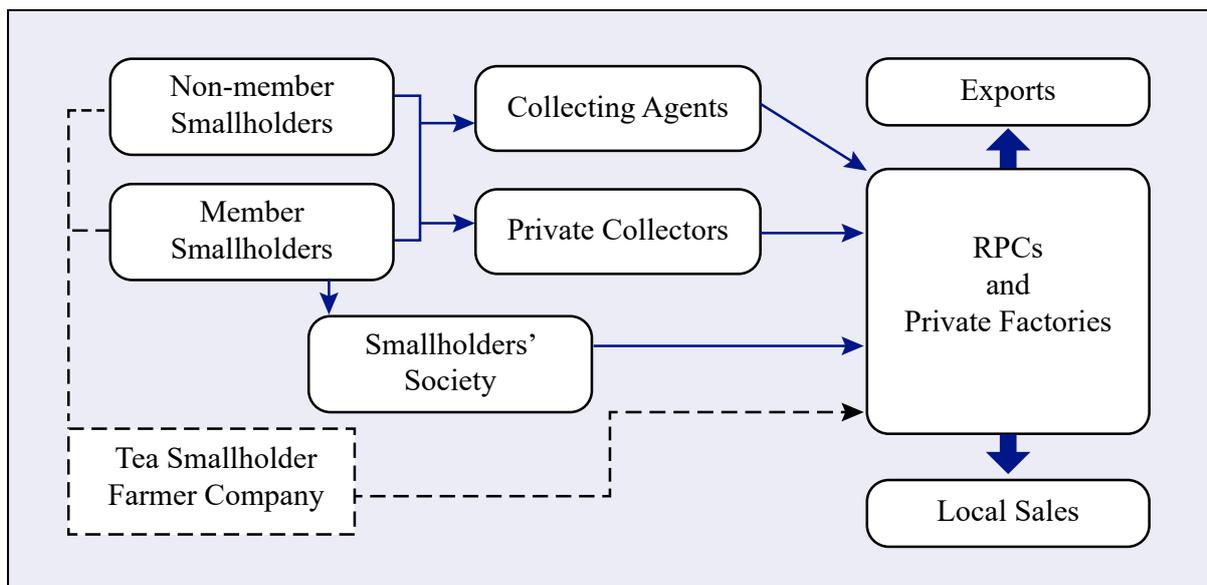


Figure 11: Business model in context of the supply chain of green tea leaves
(Proposed model is indicated with dotted arrows)

The proposed business model needs to address the following requirements.

1. **Contractual relationships:** Data collection mission uncovered that the smallholders did not have business obligations with their societies. In order to be sustainable, the smallholder societies should have supply or service contracts with their membership.
2. **Value addition:** While many companies are dealing with the supply of conventional green leaves, smallholders societies could add value to their operation by adopting sustainable production practices, which could be supported by various certification schemes, and thereby provide better benefits for their membership. These companies can become trend setters in sustainable tea production which is an upcoming global trend. In addition, the respective companies may provide organic material and other inputs for sustainable farming. Since the Tea Board has relaxed regulations allowing companies some flexibility to do direct exports (bypassing the auction), smallholder societies or companies engaged in sustainable production practices could, for example, enter into strategic partnerships with an exporter of organic tea.

3. **Poor business expertise of smallholders:** Tea smallholders and their societies do not have expertise to run businesses. Therefore, the promotion of access to BDS requires particular attention.
4. **Access to markets:** Tea smallholders often lack access to markets for selling their product. Since tea smallholders mainly serve as suppliers of raw material to private factories, their role in the supply chain ends after selling green leaves to leaf collectors or factories. Due to fragmentations in the supply chain design and limited access to market information (although the system is monitored by the Sri Lanka Tea Board), benefits often do not trickle down to smallholders and have a negative impact on the long-term sustainability of the sector. In addition to this, as international markets demand increasingly high social and environmental standards, smallholders are increasingly unable to supply to overseas buyers⁹.
5. **State support:** At present, the leaf collectors dominate the intermediary system in the supply chain. Therefore, the TSHDA or other state organizations should facilitate the formation of tea smallholder farmer companies. However, the transformation should occur with the consent of the smallholder and not by force through regulations.

Some of the benefits of establishing tea smallholder companies are as follows.

1. **Bargaining position:** Smallholder farmers can move to a better bargaining position in the supply chain through the establishment of smallholder companies, which could take over the role of leaf collectors, thus eliminating intermediaries in the supply chain.
2. **Increased profitability:** Smallholders can increase their profitability through a better bargaining process by the company for their inputs. Jayarathne (2012) highlighted that the productivity of tea growing in Sri Lanka was considerably lower than other tea growing countries such as India, Kenya and Japan resulting in a high cost of production. An important determinant of COP is the cost of inputs. Companies may offer services such as input supply at more competitive prices. This may also bring about better work and working conditions for the workers in the smallholdings.
3. **Enhanced access to capital:** The companies may accumulate profits realised through its business operations. This may be formed into the capital for the company.
4. **Improved smallholders' independence from leaf collectors and elimination of indebtedness:** With the smallholder companies taking over the role of leaf collection and the provision of inputs, there will be a serious change in the way the supply chain is organized.

⁹ There was a traditional condition that all the made tea from the country should be sold through the tea auction. Sri Lanka Tea Board recently relaxed the condition and allowed direct exports to foreign buyers who have sales agreements established with local exporters.

5. **Enhanced state support:** Provisions for the formation and continuation of smallholder companies are not strong or consistent. There may be tax reliefs during the first five years of operations of the smallholder company.
6. **Better creditworthiness of smallholders:** The officers of the banks revealed that the creditworthiness of smallholders was not sound as majority of them own a small piece of land which is less than two acres. This weakness may be eliminated by being a member in a reputed smallholder company.
7. **Improved access to training and skill development of youth:** The companies also can be used as a base for training and skill development of youth.

These benefits will increase the profits of the smallholders, thereby enabling them to hire better skilled workers while providing better working conditions to their workers.

Contract farming model for the tea sector in Sri Lanka

Contract farming overview

Contract farming, also known as outgrower schemes, are a form of vertical integration between the producer of an agricultural product and the buyers of that product. Linked vertically to a tea factory or trader, the independent farmers are expected to have access to previously unavailable technology, technical advice, access to credit, a guaranteed market and ultimately increased income. Contract farming has been recognized as a means to modernize small farm based agriculture in developing countries. Research evidence suggests that the contract farming can have a significant positive influence on farm efficiency and the supply chain efficiency (Wang et al 2014). Glover (1984) believes that contract farming has the potential to bring a wide variety of economic benefits to farmers and their communities. Contract farming is seen by some as having the potential to incorporate low income farmers into the modern sector (Key and Runsten 1999).

Most contract farming arrangements fall into one of five categories as follows:

1. The centralized model
2. The nucleus estate model
3. The multipartite model
4. The informal model
5. The intermediary model

The centralized model is vertically coordinated and has a centralized agribusiness processor/firm buying from a large number of small farmers. The agribusiness firm/processor involvement in production varies from minimal input provision to taking control of most production and management aspects.

The nucleus estate model is a variant of the centralized model where the agribusiness firm also manages plantation to guarantee the supply of raw materials in addition to the contract suppliers for whom various inputs and technical support is provided.

In the multipartite model often an intermediary such as a cooperative, bank or other statutory body facilitates the contract farming operation. This helps to overcome the extra contractual marketing.

The informal model where agribusiness firms develop production contracts with farmers on an informal or verbal basis.

The intermediary model involves agribusiness firms subcontracting linkages with farmers to intermediaries such as collectors. Technical support is often provided by government extension agencies.

The present contract farming arrangements in the tea sector in Sri Lanka

The rapid assessment revealed that in the tea sector, various forms of the above-mentioned contract farming models were in operation. The most common models are the intermediary model and the informal model. In the intermediary model, collectors act as intermediaries between the factory (processor) and the smallholder farmers. In the informal model, the factories and smallholders are linked through resource providing informal contracts which are often verbal contracts. To a lesser extent, centralized models are adopted by some RPCs, where marginal tea lands in the plantations are distributed among workers and smallholder farmers in the surrounding villages. This arrangement involves the RPC providing all inputs and the land for cultivation to workers and neighbouring farmers. In turn, the workers and farmers are obliged to supply the green leaves to the RPC's factory. This arrangement either involves a formal written contract or an informal verbal contract. According to the RPCs, this approach is adopted mainly to overcome the labour shortage and to utilize peripheral tea lands. These existing contract forming models can be used as the base to develop effective business models to enhance productivity and supply chain efficiency in the tea sector.

The proposed business model based on contract farming

The proposed business model will have four stakeholder groups with their own functional roles. The four stakeholder groups will comprise of the agribusiness firm, farmer collectives, para-state organization and the financial institutions. The existing contract farming based models described above have variations of the proposed model except for the involvement of the para-state organization. The para-state organization has to play a significant role in terms of developing and sustaining the business model. It will consist of representation from various government agencies such as the Tea Board, the TSHDA, the Ministry of Labour, RPCs, financial institutions, smallholder societies and plantation worker representation. This body will be responsible for establishing the organizational set up and monitoring, providing technical support, capacity building and training skilled labour. Shortage of labour is one of the serious challenges faced by both smallholders and the major plantation companies. The rapid

assessment revealed that youth tended to think that the working in the tea sector had no dignity and was the main reason for them to seek employment elsewhere. An important strategy that can be adopted to attract workers is to give them a sense of recognition by providing them with opportunities to upgrade their skills through training and acquire National Vocational Qualification (NVQ) certifications relevant to the tea industry. Youth can be recruited for training and during their training period, an apprentice allowance, uniforms, tools and safety equipment should be provided. The job titles should also be changed to a dignified title. For instance, pruners can be referred as technical assistants. The para-state organization should be given the responsibility of maintaining a skilled labour pool.

The contribution of the financial institutions will be particularly vital in facilitating the financial transactions and providing credit facilities for farmers and the agribusiness firms. Channelling the payments through the bank will ensure that the agribusiness firm is able to set off the input cost against earnings of farmers as well as provide a means to determine the creditworthiness of the smallholders in order to provide them loan facilities.

Traditional cooperatives, which reward their members on the basis of patronage, are useful to small farmers to strengthen their bargaining power. However, cooperatives have their inherent problems. One of the main problems arises when the benefits are distributed equally among all the members irrespective of the size of their investments. A horizon problem arises when all the members are benefitted equally irrespective of their duration of the membership with the cooperatives. A portfolio problem arises from the tied nature of the equity in the cooperative because shares in a cooperative do not have a market. Consequently, members always tend to underinvest in the cooperative. A control problem arises in traditional cooperatives due to centralized decision making and the absence of equity based management incentive mechanisms. The influence problem arises in a traditional cooperative due to the democratic voting rights (i.e. one vote per member) for members. It is noted that the smallholder farmers' companies, in which investment is proportional to patronage, has a competitive advantage due to absence of above problems.

There is an increasing role of cooperatives and other social economy enterprises, in gradually upgrading smallholder societies into farmers companies. They can play an important role in promoting entrepreneurship and business development, employment creation and provision of social protection, as well as representing smallholders. They can also contribute to the provision of vital services such as health care, education, access to water and sanitation, infrastructure and access to markets in rural settings.

The existing tea smallholder societies can be organized into collectives. The farmer collectives will enhance the bargaining power of smallholder farmers. These farmer collectives can be gradually upgraded to farmer companies. However, the contract farming model should be further studied, to explore the dynamics and identify the pros and cons, before it can be recommended as an economically feasible and sustainable model for the tea smallholder subsector.

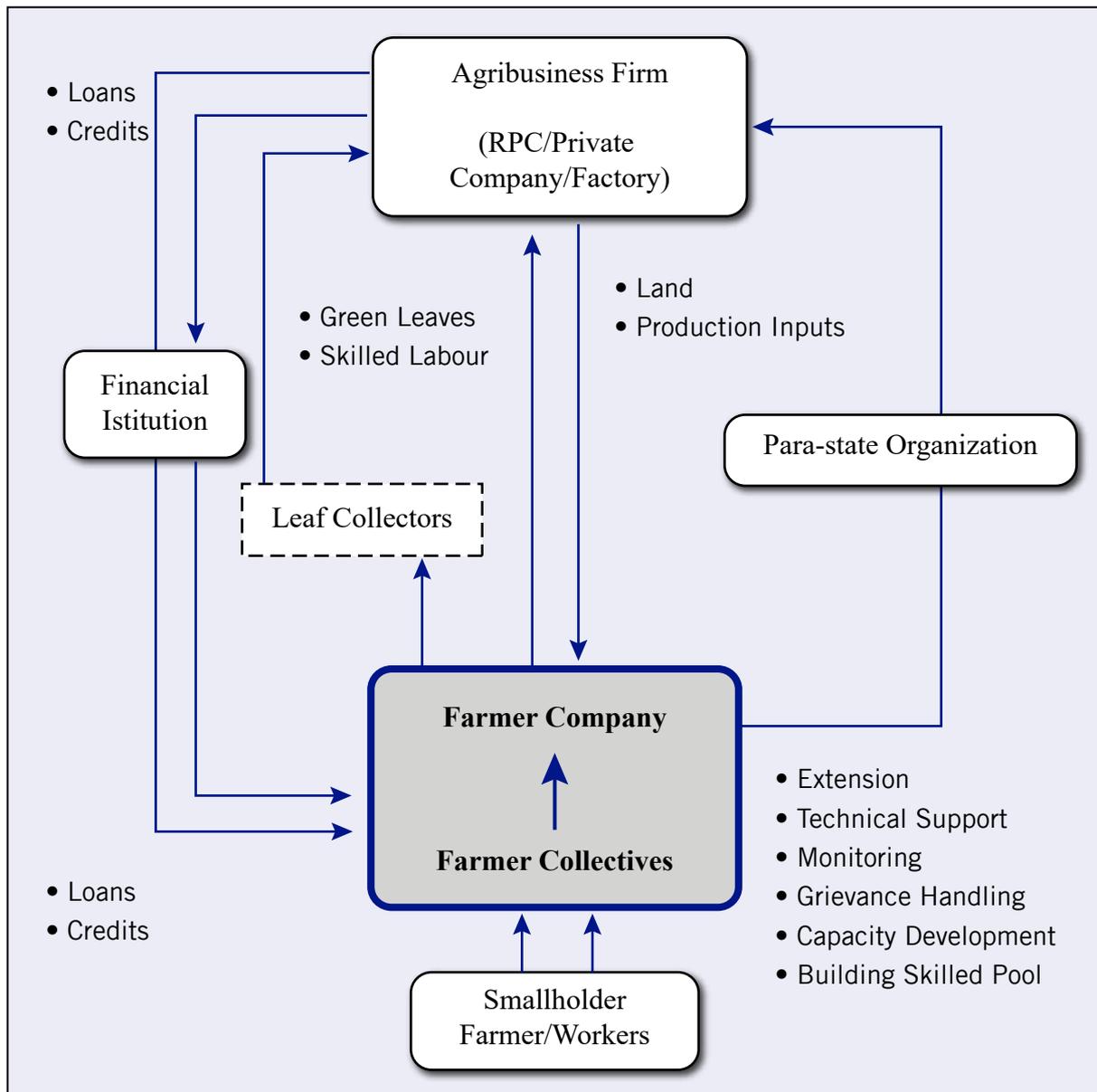


Figure 12: Integrated contract farming model

Farmer clustering for smallholders: farmer trainer on-farm model

Farmer-to-extension officer ratio is very wide in most of the areas. According to the results, one TSHDA officer visits a farmer once in 3 months. Farmers also confirmed that the extension programme was not adequate to meet their needs. This indicates that there is a need for more effective approach for disseminating technological knowhow to assure sustainable production of green leaves. Figure 13 depicts the proposed model.

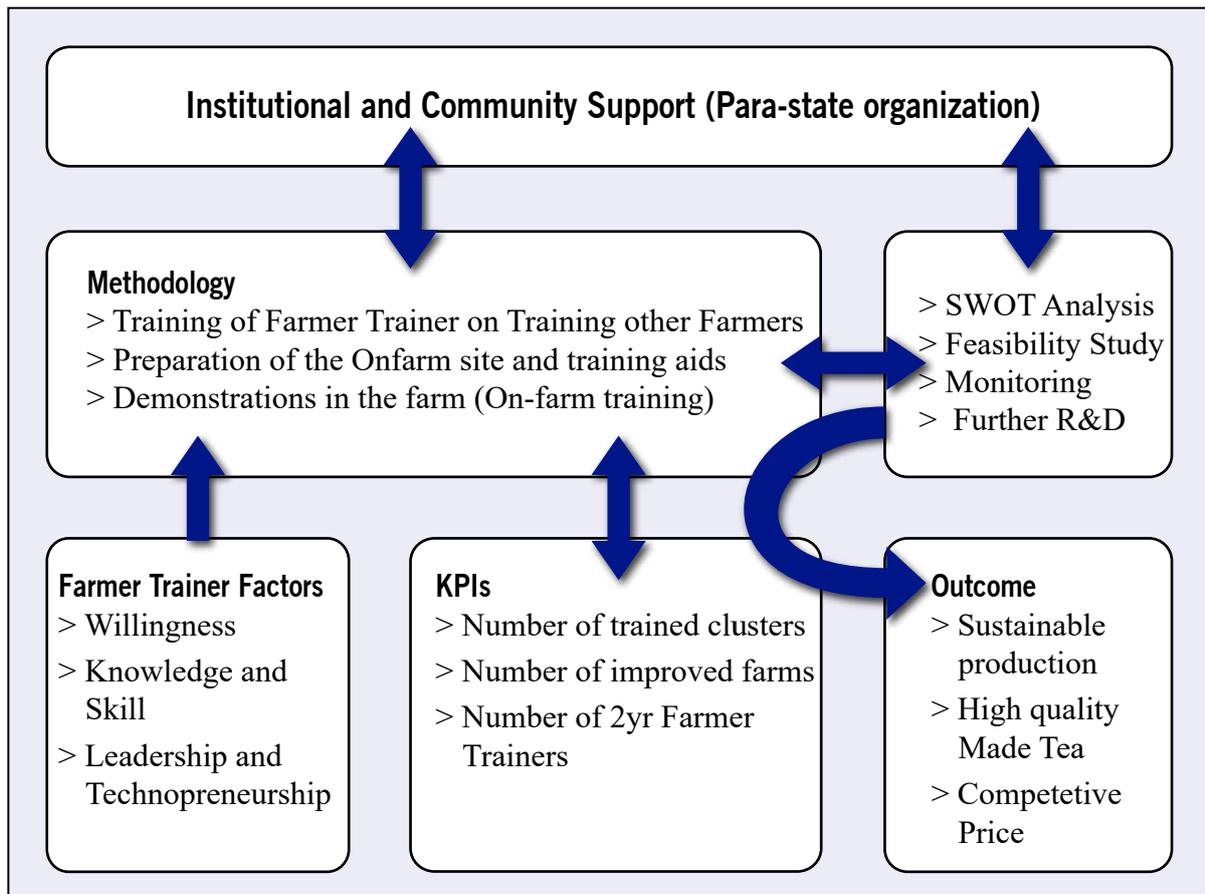


Figure 13: Farmer trainer on-farm model

The para-state organization should play a central role in field testing and implementation of the proposed model. A SWOT analysis should be done including all important stakeholders. This should be field tested for feasibility in different tea growing regions of the country. This mechanism should link the lead farmer (farmer trainer) to the neighbouring cluster of farmers with the support of the community, the TSHDA and any third-party funding agency. Monitoring and further research and development activities should also be carried out under the patronage of para-state organization.

The success of the proposed model would depend on farmer trainer factor as well. The farmer trainer should be willing to play the role of a change agent, who has the required knowledge skills and technopreneurship characteristics. The identified farmer trainers should be given necessary training and skills required to be a change agent. This should be facilitated by the para-state organization. A demonstration field should be prepared for the training a cluster of farmers in the surrounding areas. The effectiveness of the farmer trainer programme should be evaluated using key performance indicators (KPIs) such as number of trained clusters, number of improved farms and number of secondary farmer trainers developed through the model.

This model would be able to create an effective knowledge and technology sharing platform, build capacity of farmer clusters for sustainable production while ensuring the stable livelihood of target farmers.

During the rapid assessment, it was revealed that the smallholders who were following best crop management practices in green leaf production, were willing to play the role of farmer trainers. Figure 14 shows the mulching using straw that resulted in many benefits such as water retention, erosion and weed control in tea field of a farmer that employed best crop management practices.



Figure 14: Mulching with straw

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Mechanized irrigation, shade tree management with field specific conditions are shown in Figures 15 and 16. When special best crop management practices are carried out, such tea fields would be resistant to drought, pest and disease problems and weeds. Tea smallholders with such best crop management practices could be used as role models to educate other farmers on sustainable cultivation.

According to the rapid assessment, they have been following good agricultural practices in tea cultivation and enjoying the benefit of better yield even during dry periods. The average green leaf yields reported by such farmers are 1000-1200 kg per month, which is nearly threefold of the average yield.



Figure 15: Sprinkler irrigation on tea

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Figure 16: Well managed shade

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Further it was noticed that the quality of green leaves of farmers practicing best crop management were better than that of an average smallholder (Figure 17).



Figure 17: Well managed plucking table

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The quality of green leaves supplied by smallholders finally determines the quality of made tea and the proportion of refused tea produced during tea processing. It was noticed that the gap between wages and prices of made tea is widening with time. To fill this gap, a good approach would be to produce quality made tea at competitive prices for export markets.

Tea tourism model for private tea factories and smallholders

Jolliffe and Aslam (2009) examined the benefits, barriers and threats for the development of tea heritage tourism in Sri Lanka. They have investigated potentials of tea accommodations, tea factory access and tea centre operations in high grown tea producing areas of Sri Lanka. The study had mainly focused on tea tourism which is already operating in established avenues at large scale operations. Under the topology, they discussed that no emphasis was given to uplift the socioeconomic status of tea smallholders through tea tourism. However, the field study indicated that there is a vast potential to develop tea tourism in the smallholder sector.

Figure 18 depicts a model that is being proposed for tea tourism focusing on tea smallholders and private tea factories. This model can be packaged as a “Tea Home Stay”. Visitors would be staying in the house of a tea farmer family, which has the basic facilities (bath, toilet, bedroom,

etc.) and share the experience of the life of tea smallholders. The other option is to arrange accommodation facilities in close proximity or facility maintained by the factory. The visitor can take part in activities in the factory such as tea tasting, factory walk and experiencing tea processing.

Tea Home Stay would not require massive investments and vast structural change to the dwelling. Visitors would enjoy the same food cooked for the family members of tea smallholders. Other activities such as cycling and mountain biking, nature walk, photography, filming and bird watching can also be included as part of the Tea Home Stay product. This is a win-win model because tourists would be able to enjoy a wide range of activities at affordable prices, while smallholder families would have an extra source of income. It would also generate other tourism-based employment opportunities in the area.

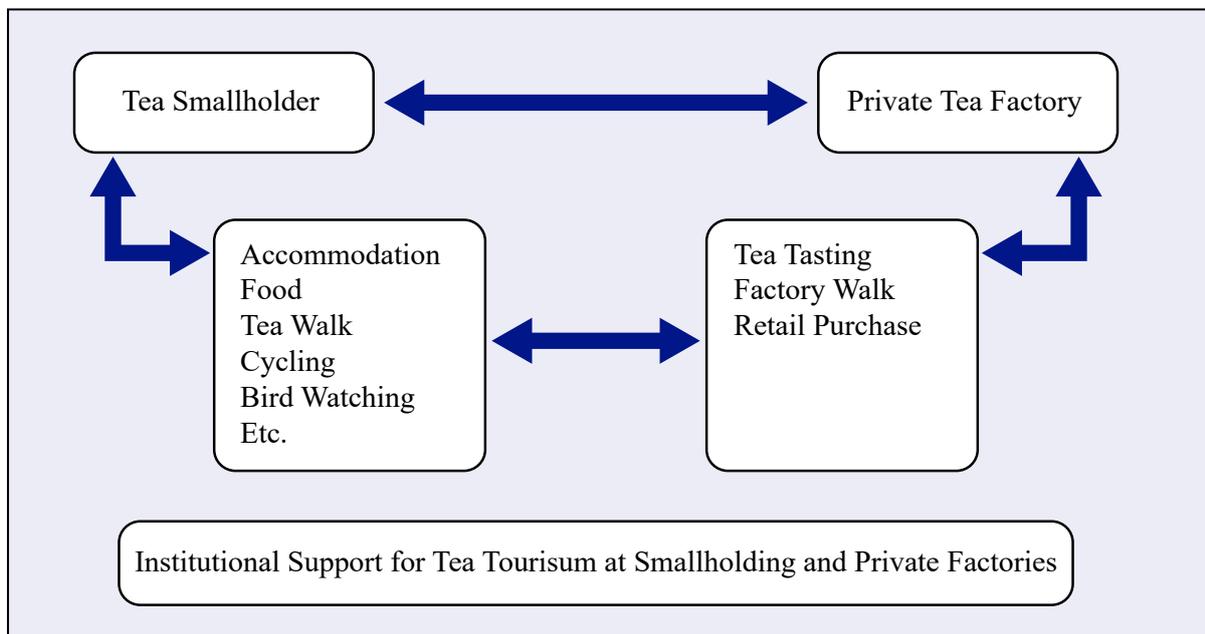


Figure 18: Tea tourism model

The rapid assessment revealed that there are tea smallholders who are willing to start tea tourism at their level if a formal mechanism is established for coordination and institutional support. Hence, it is pertinent to implement the proposed tea tourism model as a pilot project in order to assess the opportunity cost of such diversification in the tea smallholding subsector. Furthermore, a feasibility study must be conducted to evaluate the various aspects of the model, in order to match the practical situations in different elevations.

CHAPTER 5

DECENT WORK AND THE FUTURE OF WORK IN SRI LANKA'S TEA SECTOR

The current state of decent work in the tea smallholder subsector

A majority of jobs in the smallholder sector are informal. In fact, the informal economy constitutes 60 per cent of the country's total employment, and almost 87.5 per cent of Sri Lanka's agriculture sector employment is informal (Department of Census and Statistics, 2017). This creates important challenges for implementing national labour legislation, thereby underlining the significance of understanding the state of decent work in the sector.

Decent work in tea smallholder subsector

The majority of employment in the tea smallholder sector is informal as most of the smallholder farms are not registered with either the Employees' Provident Fund or the Inland Revenue Department. There are three categories of workers in the tea smallholdings. Own-account workers are those workers who work on their own land and do not engage employees on a continuous basis. Contributing family worker are family members who engage in farming without any payment. Casual employees are all those workers hired by a smallholder on an irregular basis for a basic pay.

The ILO Framework on the Measurement of Decent Work covers ten substantive elements which are closely linked to the four strategic pillars of the decent work agenda. It consists of employment opportunities; adequate earnings and productive work; decent working time; combining work, family and personal life; work that should be abolished; stability and security of work; equal opportunity and treatment in employment; safe work environment; social security; social dialogue and employers' and workers' representation. According to the FAO, in addition to these 10 areas, decent jobs should "promote access to adapted technical and vocational training".

This rapid assessment has therefore considered the following aspects.

Employment opportunities

The predominant form of employment available in tea smallholding regions is own-account work and unpaid family work. The majority of tea smallholders are full-time farmers, especially in the high-grown and mid-grown regions. In addition to the cultivation of tea, agriculture related seasonal work in the districts covered by the study includes paddy farming, fruit and vegetable cultivation, pepper and cinnamon cultivation and, to a lesser extent, livestock farming. Among non-agriculture employment opportunities, jobs in garment factories, shops and construction sites are common. In Ratnapura and Badulla districts, gem mining provides an alternative source of employment. The aforesaid traditional unskilled jobs were the main alternatives to agricultural employment found in these areas. There were no evidence of new job opportunities emerging within the tea smallholder subsector. However, discussions with the stakeholders revealed the following potential job opportunities in the tea sector:

- Tea tourism related job opportunities
- Skilled farm machine operators (e.g. pruning machines, shears, harvesters, fertilizing machines, planting machines etc.) to work as employees and also to undertake outsourced farm practices such as pruning, weeding, harvesting etc. on both smallholdings as well as large plantations
- Technical service providers for sustainable farming and certifications (e.g. Rainforest Alliance, organic certifications)
- High-quality nursery plant producers
- Green energy related jobs (solar and wind energy for factory operations and household electricity generation)
- Jobs in undertaking outsourced farm practices such as pruning, weeding, harvesting etc. in both smallholdings as well as plantations.

Young women and men tend to leave rural areas to seek job opportunities in urban centers. The number of youth involved in tea cultivation as own-account workers, unpaid family workers or casual workers is very limited.

Adequate earnings and productive work

People work mainly to sustain their livelihood and ensure the well-being of their families. Therefore, work should be able to provide adequate earnings in terms of wages or farm income. Casual workers engaged in tea smallholdings usually earn a higher daily wage compared to the plantation workers. The statutory wage and dues of plantation worker are currently Rs. 805 per day. The daily wages of smallholder workers vary considerably depending on the type of work, gender and the region (Table 7). Workers in the low grown region receive the highest daily wages. There was a clear relationship between wages paid for casual labour and the tea prices, as the highest wages were paid by smallholders in the low grown region, as they fetched the highest price for their tea.

Although casual workers in the smallholder subsector received a slightly higher take-home daily wage, they do not receive other benefits such as housing, medical care, pension etc. That said, young workers expressed their willingness to contribute to statutory requirements such as the Employees Provident Fund (EPF), insurance and pension schemes and were looking for better social security and other statutory benefits for a peaceful retirement. In the case of own-account workers and unpaid family members, the implicit cost of their labour is not taken into account when calculating the cost of production and profits. The earnings of the three categories of workers are illustrated in Figure 19. It is safe to assume that the highest earning is made by the own-account worker followed by the casual worker. It should be noted that smallholder farmers very rarely maintain farm records especially data on production costs. Assessment on satisfaction of the earnings revealed that majority were not happy with their earnings claiming that it was insufficient to sustain their livelihoods.

There are regional differences in the smallholder operations as the majority of high and mid grown farmers are full-timers. Their incomes are seriously affected due to yield reduction in the rainy season. The majority of low grown smallholder farmers are part-timers and they harvest right around the year. The prices fetched by low grown farmers are considerably higher (Rs. 98) than that of the other two regions (Rs. 72).

There was not much evidence to support efforts to upgrade the skill levels of casual employees as they regard themselves to be highly skilled, having acquired the skills through years of experience working on plantations. As a result, they show some level of resistance to adopt new methods such as the use of sustainable farming practices and machinery. The TSHDA extension arm is involved in providing training to own-account workers and to family members on agronomic and technical aspects of tea cultivation. This has helped them to upgrade the skill levels and increased their productivity. However, these interventions are insufficient as they have limited coverage.

Table 6: Daily wage distribution by region

Type of activity	Daily wages (Rs.)		
	Low grown	Mid grown	High grown
Harvesting*	800-1000 20-25/ kg	600-700 20-22/ kg	600-800 15-20/ kg
Weeding	1000-1200	600-750	1000
Pruning*	1500	1000	1000

* Pay is usually by piece rate

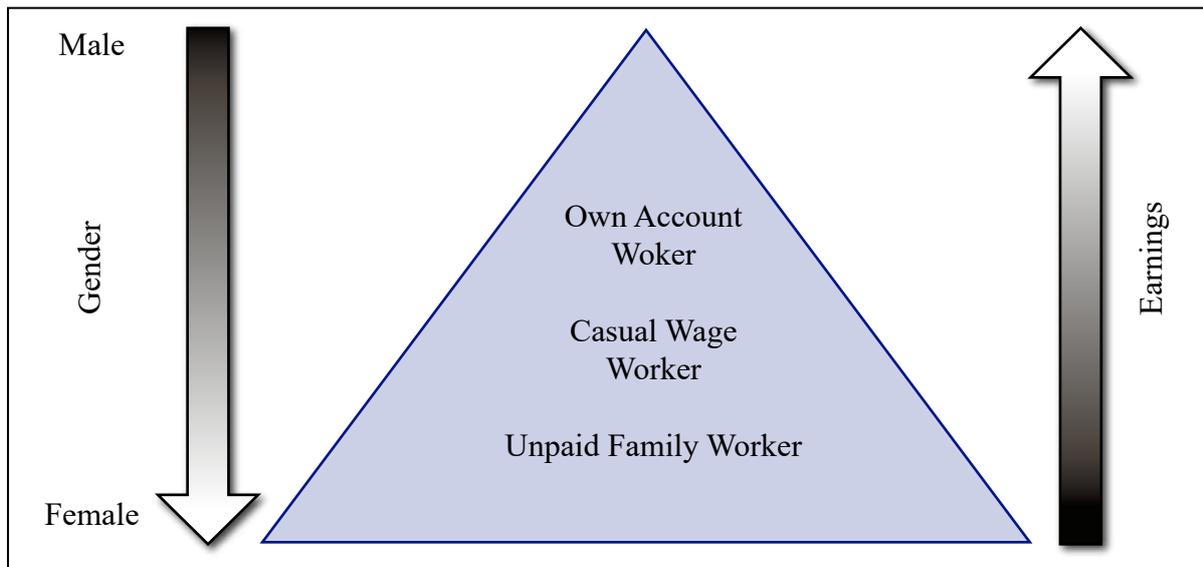


Figure 19: Gender and earnings distribution among worker categories

Source: Authors' compilation based on field work

Decent working time

The statutory definition of working hours is nine hours per day inclusive of one hour for meals (Sri Lanka Labour Gazette, 2016). The working hours in the tea smallholder subsector depend on the nature of the job. The tea pluckers have to conclude their work before 2.30 pm to enable the delivery of tea leaves to the collectors. Other tasks such as weeding, pruning and planting are predominately performed by male workers who work until 4.30 pm. It was suggested by some stakeholders that additional work can be assigned to those who complete their tasks earlier in order to get an extra payment to enhance their daily earnings. The discussions revealed that some casual workers work excessive hours, because they often work on the same day both on large tea plantations as well as on smallholder farms. Some level of flexibility in working hours has emerged due to a shortage of casual labour. Own-account workers and unpaid family workers adopt flexible working hours to match with their daily routines, except harvesting, which has to be done in the morning hours.

Child labour

There was no evidence of the existence of child labour in the smallholder subsector. Discussions revealed that child labour was not a concern as none reported children less than 16 years of age engaging in full-time farming activities as unpaid family workers or casual workers. There were some instances of children below the age of 16 who worked in the sector on a part-time basis, but FGD participants claimed this work did not affect children's health and personal development or interfered with their schooling. They further explained that the participation of children is meant to equip them with skills and experience and enable parents to receive some help outside school hours and during holidays. The FGDs with the smallholders and workers revealed that they were very keen to educate their children. The respondents said there were no

children below the age of 16 years who were not attending school for reasons such as financial hardship or working as casual labourers or unpaid family workers.

Forced labour

The ILO defines forced labour as situations in which persons are coerced to work through the use of violence or intimidation, or by more subtle means such as accumulated debt, retention of identity papers or threats of denunciation to immigration authorities. Interviews with casual workers revealed that there were instances when they were compelled to work for the tea smallholders as they were indebted to their employers. Consequently they had to work extra number of days to compensate for advance payments. However more evidence is required to establish forced labour. An in-depth study is needed to investigate the dynamics of the relationship between the indebted worker and employer.

Stability and security of work

As far as stability and security of work are concerned, the casual workers in low country reported that finding jobs as casual workers in the tea smallholdings is not difficult as there is a huge shortage of casual labour. This gives them greater security as they are unlikely to be without a job. However, in the mid country and up country, despite the plantation sector having a general shortage of labour, there were periods when workers had no work. For instance, the rainy season prevents them from harvesting the green leaves. In the high grown areas, as the climate change have intensified, the job stability and security of workers have been threatened. In addition, natural disasters such as floods and landslides have affected the workers in some districts. Some casual workers reported that they have difficulties when they cannot work during periods of disaster and sickness.

Equal opportunity and treatment in employment

There was evidence of discrimination in terms of ownership of smallholdings where a majority of owners were males. The majority of females working on the smallholdings were unpaid family workers (Figure 19). Discrimination based on sex is a common issue in many tea growing countries (ILO, 2015). As far as the casual workers are concerned, for example, male employees received a higher wage. Wages received by males range from Rs. 600 to 1500, while female wages range from Rs. 600 to 1200. However, it should be noted that the nature of the work differs according to gender. Female workers (more than 75 per cent) are involved in plucking; and, the piece rate payment (i.e. payment per kg of green leaves) is the same for both genders, although it may vary on a regional basis. Table 7 summarises the difference in wages based on gender and region.

Table 7: Wage differences based on gender and growing region

Type of activity	Gender	Daily wages (Rs.)		
		Low grown	Mid grown	High grown
Harvesting	Male	800-1000 20-25/ kg	700 20-22/kg	600-800 15-20/kg
	Female	800-1000 20-25/ kg	600 20-22/kg	600-800 15-20/kg
Weeding	Male	1000-1200	600-750	1000
	Female	700	600	700
Pruning	Male	1500	1000	1000
	Female	Not performed	Not performed	Not performed

Safe work environment

Safety at work was a serious concern since the majority of the smallholders neither used nor provided safety gear for their workers. It was quite visible that workers did not have special protective clothing on when carrying out dangerous tasks such as spraying of agrochemicals or mechanical weeding. Except a very few, the majority of smallholders did not have first aid kits readily available in case of emergency. The FGDs with workers revealed that they often suffered occupational injuries during work such as insect and leech bites and cuts from tools and these were usually treated with native medicines found in the tea field or home gardens.

Labour inspections were not usually carried out in the tea smallholder subsector unless complaints were lodged with the labour office. The KIIs with labour officers revealed that it was very rare to receive complaints from workers in the tea smallholder subsector. Shortage of labour inspectors and resources such as vehicles for field inspections were described as a serious challenge. Strengthening inspection services including upgrading labour inspectors' resources, skills and enhancing cooperation with all relevant ministries, social partners and other stakeholders was identified as profoundly important to reinforce compliance with labour laws in the sector. Adopting a strategic approach for labour inspections and consolidating a culture of compliance to labour laws by combining inspection, enforcement and awareness activities is crucial.

Social security

According to the ILO, social security is the protection that a society provides to individuals and households to ensure access to health care and to guarantee income security, particularly in cases of old age, unemployment, sickness, invalidity, work injury, maternity or loss of a breadwinner. The tea smallholder subsector, being predominantly part of the informal economy, does not extend social security coverage to its workers. Hence, there are no statutory pension, insurance

or health schemes in operation. None of the smallholders interviewed were participating in any voluntary pension or insurance schemes, although such schemes were available through private sector establishments. Discussions with tea smallholder society office bearers revealed that some initiatives were being taken to popularize insurance and pension schemes among smallholders in partnership with private sector service providers. It was alarming to notice that a considerable number of casual workers were nearing, or have already passed the retirement age but had no social security.

Social dialogue

ILO defines social dialogue to include all types of negotiation, consultation or simply exchange of information between, or among, representatives of governments, employers and workers on issues of common interest relating to economic and social policy. Union membership was chosen as a proxy for social dialogue. The FGDs and KIIs revealed that among workers, union membership was negligible except those who were employed in the plantations companies and had membership to trade unions. According to the trade unions, neither the smallholders nor their workers were eligible for membership in the established trade union network. The tea smallholder societies in which a majority of smallholders were members, had no involvement in labour related matters except for few societies taking some initiatives on skill development for workers and forming worker pools from within their membership to counter the labour shortage. The casual workers were not eligible to hold membership in tea smallholder societies unless they owned a plot of tea land. The focus group discussion revealed that some workers were keen to join and contribute a subscription to worker collectives if they are assured social security in terms of a pension and a payment during times when they have no work due to climatic extremes and sickness.

Access to technical and vocational training

Skills development is vital for enhancing employment opportunities, productivity and rural livelihood. The rapid assessment revealed that the younger generation in rural areas was reluctant to engage in farming and they were looking for alternative employment opportunities with the backing of their parents. A relatively small number of smallholders and youth were making use of vocational training opportunities available in their locality. There was a lack of opportunities to undergo vocational training in areas related to the tea smallholder subsector such as, sustainable farming, mechanization, value addition, processing, quality assurance, green energy etc. In the context of labour shortage, there was high potential for youth trained in use of labour saving machinery for pruning, land preparation and harvesting, to secure attractive earnings. There were few instances of groups of youth trained in the use of machinery working for smallholders on contract basis. As far as the present casual labour pool was concerned, most of them are aging and have less preference for undergoing training to learn new techniques and the use of machinery. It was the view of the respondents that a proper recognition of the jobs in the tea sector and a good stable payment would help to retain young women and men in the tea sector.

The dynamics of work and the role of women in tea smallholdings sector

FGDs with the workers of tea smallholdings revealed that the work in this sector was mostly informal. Labour record keeping was minimal; therefore, it was mostly recalled data that were available for analysis. The work included plucking, pruning, application of manure and fertilizer, land preparation, including planting and terracing. Pruning was not performed by women workers. Generally, the wages were paid on a daily basis. It was reported that in all the regions, social recognition for almost all these work categories was very poor. Pluckers, often known as ‘plucking women’, complained that their job had a very poor social recognition despite the fact that their function was very important to the industry. They called for an end to their negative stereotyping. As noted earlier, there are three main categories of workers engaged in the sector: own account workers, unpaid family workers and paid casual workers. Children did not seem to be involved in the work at the expense of school education as parents pushed their children hard towards education. It was further revealed that many women were engaged in the sector as part of unpaid family workers, due to their children moving away from tea cultivation. With regard to paid workers, it was factors such as the location, working hours and the efficiency of work that determined the payment rate. Many paid workers in all the three regions reported the existence of social bonds with the families of smallholders they worked for. Many of the paid workers were reported to be indebted to the smallholders as a result of these bonds.

Given the informal nature of the tea smallholdings, working conditions provided in the workplaces in the sector were not satisfactory. Resting rooms, first aid, maternity protection, childcare facilities and other facilities were at a minimum. Smallholders reported that they did not encounter risks in the tea lands and that it was not possible to provide many facilities due to tea not being a profitable business venture. It was revealed that the statutory benefits for workers such as EPF, Employees Trust Fund (ETF) and retirement gratuity were not available within this sector. Introducing laws and regulations defining a qualifying period of paid maternity and paternity leave, as well as nursing and resting breaks, medical and cash benefits, protection against hazardous work during pre- and post-natal periods at the workplace and protection from discrimination due to pregnancy, maternity and family responsibilities remains a challenge in the informal.

Future of work in the smallholder tea subsector

The world of work has constantly evolved over the years with implications for the agriculture sector in developing countries. Today the world of work is undergoing transformation aided by key drivers or megatrends, such as globalization, technology, demography and climate change. These changes are influencing the future of work in new ways. Here, we discuss some key drivers relevant to the tea smallholder subsector, identified based on the findings of the field study (Figure 20). These drivers are likely to influence the shape of work in the years to come. The government has to come up with major policy changes to harness the opportunities and overcome challenges which are likely to intensify in the coming years.

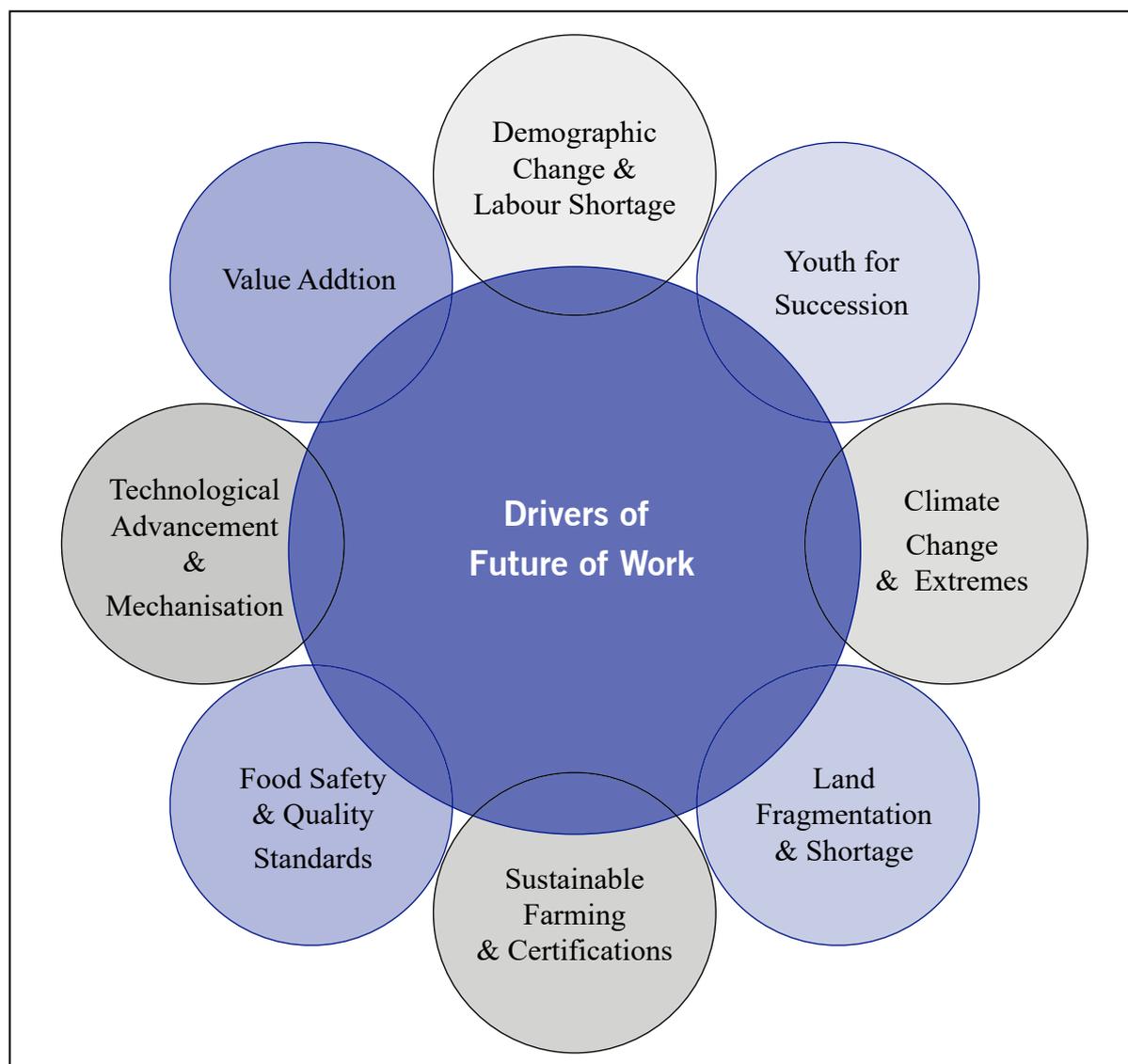


Figure 20: Drivers of future of work in the tea smallholder subsector

Demographic change and labour shortage

Demographic trend of feminization of agriculture was observed in all regions where more and more women were getting involved in the cultivation of tea smallholdings, participating in training and extension programmes, taking up positions in the tea development societies and applying for credit facilities. It was observed that non-agricultural employment and seasonal agricultural employment opportunities were prevalent as alternative employment opportunities within the localities. Rural out-migration, especially among the youth was also a challenge that led to labour shortage. The statistics show that Sri Lanka has an ageing labour force. It is projected that the labour force growth will drop significantly in coming years. The field survey revealed that the majority of workers, as well as smallholders were in their late fifties or beyond, which indicates the problem of the progressively ageing farmer population. Enhancing the productivity in the sector and making it an attractive option for youth will be critical to overcoming this challenge.

Youth for succession

The field survey revealed that hardly any smallholder or worker wanted to see their next generation involved in the tea sector. The reasons cited included lack of earnings and poor income stability, poor recognition of the job, lack of social security and uncertainty regarding the future viability of the tea sector.

Climate change and extremes

Climate change was cited by the majority of respondents as a major factor affecting the sector. The frequency of extreme climate events such as droughts and floods have increased over the past few decades. The impact of climate change and extremes were significant in low grown regions, such as Galle, Matara and Hambantota, where yield losses were reported due to drought stress. In mid and high grown regions, such as Nuwara Eliya and Kandy, yield losses were caused by excessive rainfall. Both droughts and excessive rainfall had also affected the casual labourers as there was no work for them during such times. Climate change adaptation practices were not commonly practiced except by some farmers. Among the practices shade tree management, soil conservation, mulching and spraying of Sulphate of Potash (SOP) or Muriate of Potash (MOP) were reported.

Land fragmentation and shortage

It was evident that most of the smallholder plots have fragmented over time due to the division of land amongst the members of the family. This could lead to uneconomical landholdings constraining the transformation of smallholdings to economically viable sustainable farming units. To keep smallholdings viable, land consolidation through farmer collectives or other means will become crucial in the years to come.

Sustainable farming practices and certifications

Adoption of sustainable farming practices is becoming increasingly important to partner with global value chains as most leading value chain partners and consumers are becoming conscious about environmental sustainability. For instance, Unilever, the world's largest tea company, with its commitment to delivering sustainability in the tea value chain, has partnered with Rainforest Alliance to certify smallholder tea farms to ensure that all the tea sourced by the company was sustainably produced. There is an urgent need to speed up the adoption of sustainable practices in the tea sector. Some RPCs have already taken steps to train and certify their smallholder suppliers on sustainable farming. This training should be extended to other smallholder farmers with the active involvement of the state agencies such as the TSDA and Tea Research Institute.

Food safety and quality standards

Sri Lankan tea which is made for export requires compliance with stringent food safety and quality standards. There are significant changes taking place in the global quality landscape in terms of the widening of the scope of standards and shifts in standards from product to process standards and public to private standards. Moreover, food safety and quality standards are becoming stringent and mandatory. The rapid assessment revealed that the upstream value chain actors, particularly smallholder farmers and collectors, were not geared for adopting and complying with such standards. There were some tea processing factories making good progress with implementing international process standards such as ISO 9001, ISO 22000 and HACCP. It is necessary to ensure compliance across the entire value chain to achieve desirable outcomes. The food safety, quality systems and support infrastructure need to be upgraded to face these emerging challenges. Public funding will be needed to strengthen the physical and human resource capacity of the quality infrastructure in the country.

Technological advancement and mechanization

According to the current information, tea smallholding subsector is at stake mainly due to its informal nature. Higher cost of cultivation, labour shortage and poor quality green leaf production are some of the problems that need immediate attention. There is an opportunity to use technological advancements to ease the severity of these problems. However, according to the rapid assessment, available options for applying technological advances in tea cultivation were lower compared to other subsectors in agriculture. Lack of facilities and knowledge and insufficient funds were among the main factors that limited smallholders' access to technology needed for reducing cost of cultivation while improving the quality of green leaves. According to certain views of participants in rapid assessment, mechanization was identified as one of the practical options for labour shortage while improving the profitability. Hence, it is required to review the options that can be recommended to promote technological advancements in tea cultivation and can help solving key issues.

The level of access to information and communication technology related facilities is comparatively higher in Sri Lankan society. Furthermore, it is generally known that people are switching to smart phones at an increasing rate across the country. It is also obvious that people are becoming familiar with smart phone applications that make day-to-day activities easier. Therefore, it is timely to test the feasibility of introducing smart phone applications in order to facilitate the formalization within the tea smallholding subsector.

Tea app model: mobile platform for smallholders

Given the availability of software and ease of developing mobile applications, it is proposed to develop a smart phone application to improve the supply chain efficiency and access to information. The smallholder farmers could be provided with access to the app to input real-time data. The mobile application could be linked to a master database where the necessary data will be made available on queries. Furthermore, the mobile app would help establish a

formal mechanism to identify tea smallholders with best practices who could play the role of change agent in the tea smallholding subsector. Best farmers could easily be identified through the mobile app in order to make them eligible for awards as well.

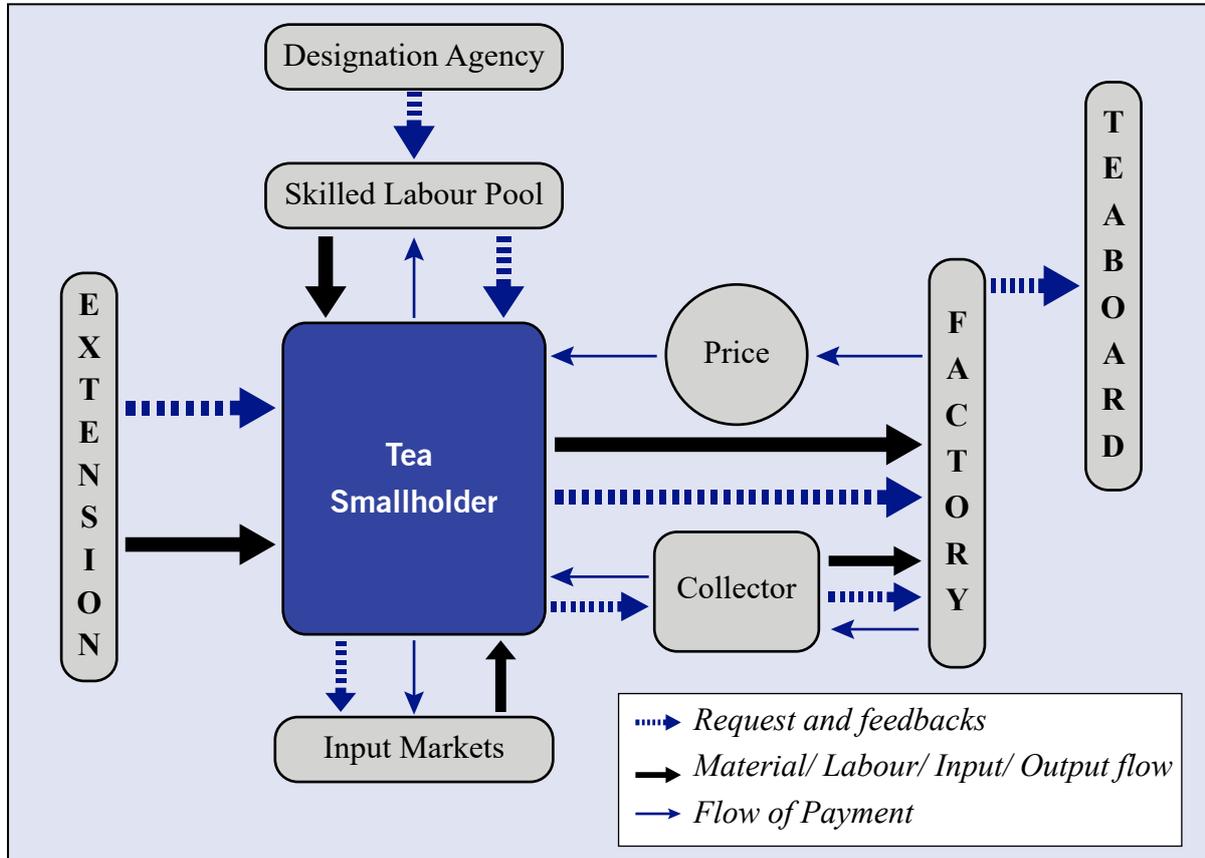


Figure 21: Model of the smart phone application platform

Introducing a mobile platform for tea smallholding sector would help achieve the following results:

- Minimize problems in the supply chain of green leaves
- Facilitate on-demand labour supply
- Achieve competitive prices for better quality green leaves
- Improve coordination with extension services
- Enhance information sharing among smallholders
- Facilitate digitalized payment gateway
- Create and update a database of farmer records (labour, best practices, production, etc.)

Process of the model

1. Register tea smallholders collectors, factories, skilled labour pool, input markets, extension services
 - Awareness about the mobile platform
 - Involve small holder societies
 - Details of collectors, routes and factories supplied
 - Details of skilled labour pool

- Register factory details
 - Price details
 - Daily demand of green leaves
2. Upload data on the mobile platform by each smallholder
 - Location details (GPS) of the tea farm
 - Labour requirements (daily)
 - Quantity of plucked green leaf (daily)
 - Pictures to represent the quality of green leaf (daily)
 - Expected green leaf production
 - Input requirements (as necessary)
 - Requirements for extension service for special situations (pest and disease, agronomic issues)
 - Upload the details
 3. Processing requests
 - Labour requirement
 - Green leaf collection and supply
 - Input supply
 - Competitive price for quality green leaves
 - Extension and farmer advocacy
 - Payment processing and fund transfers

Mechanization of farm practices

Mechanization of farm practices is one of the feasible options available to overcome the prevalent labour crisis in the tea industry. The advancement in technology has provided a number of opportunities to explore the feasibility of mechanizing farm operations.

Harvesting

Hand plucking the tea leaves is the most labour intensive activity in the industry. It is well-known fact that hand plucked teas contribute to higher quality for made tea over the mechanically plucked teas. However, due to labour scarcity, tea smallholders are unable to maintain proper plucking rounds. This also results in poor quality hand plucked leaves. Figure 22 shows that hand plucking, too, is non-selective.



Figure 22: Nonselective hand plucked green leaves (rapid assessment: Kandy)

The rapid assessment revealed that mechanical plucking is not widely practiced among tea smallholders due to following reasons:

- Hilly terrain (mostly in high and mid grown areas)
- Untrained tea bush for mechanical plucking that results in delayed plucking cycle
- Lack of access to facilities and training
- Lack of capital

Therefore, certain level of mechanical/shear plucking should be introduced after a careful feasibility study under different local situations. As revealed during the rapid assessment, tea bushes could be trained for mechanical plucking with special agronomic practices such as nutrient management in the soil.

Mechanical fertilization

Soil nutrient management is one of the most important aspects to obtain year around green leaf yield. It was obvious that fertilizer application at smallholder level is not up to the recommendations due to many issues, labour shortage being the most common issue. Furthermore, the current method of fertilizer application on soil surface does not bring good results. Therefore, mechanical fertilizer application has high potential at smallholder levels. The advantages of mechanical fertilizer application are:

- Requires less labour
- Fertiliser rate can be adjustable according to stage of the bush and the nutrient requirement
- Application is more efficient as the fertilizer could be applied to each bush with right quantity into subsurface of soil. This would minimize the fertilizer wastage.

There are some issues for employing mechanized fertilization in the smallholding mainly due to the high initial cost and the lack of exposure to that particular technology by tea smallholders.

Irrigation

Rapid assessment revealed those smallholders who were cultivating irrigated tea obtain 300-400 per cent more yield than farmers with usual practice. The irrigated tea cultivation in low elevation is less prone to yield loss during dry periods.

The major problem in mechanical irrigation is the higher initial cost. Rapid assessment in Matale revealed that drip irrigation is already being practiced at the smallholder level. If the initial investment is subsidized, drip irrigation could be popularized among smallholders with measures to harvest rainwater for irrigating tea lands when natural water sources are not available.



Figure 23: Irrigated tea cultivation (rapid assessment: Ratnapura) © D. Abhayasinghe

Weeding

Weeding has been the other most labour intensive activity. Rapid assessment revealed that the smallholders are able to hire workers for weeding by offering higher wages. Feasibility studies should be undertaken to look into the feasibility of using mechanical weeders for better control of weeds in tea cultivations.

Pruning machine

Rapid assessment revealed that pruning machines are generally used at smallholder levels. They need further assistance and training to have full access to mechanical pruning. The following figure (Figure 24) shows the overall impact of mechanisation that contributes for improved income status of tea smallholders.

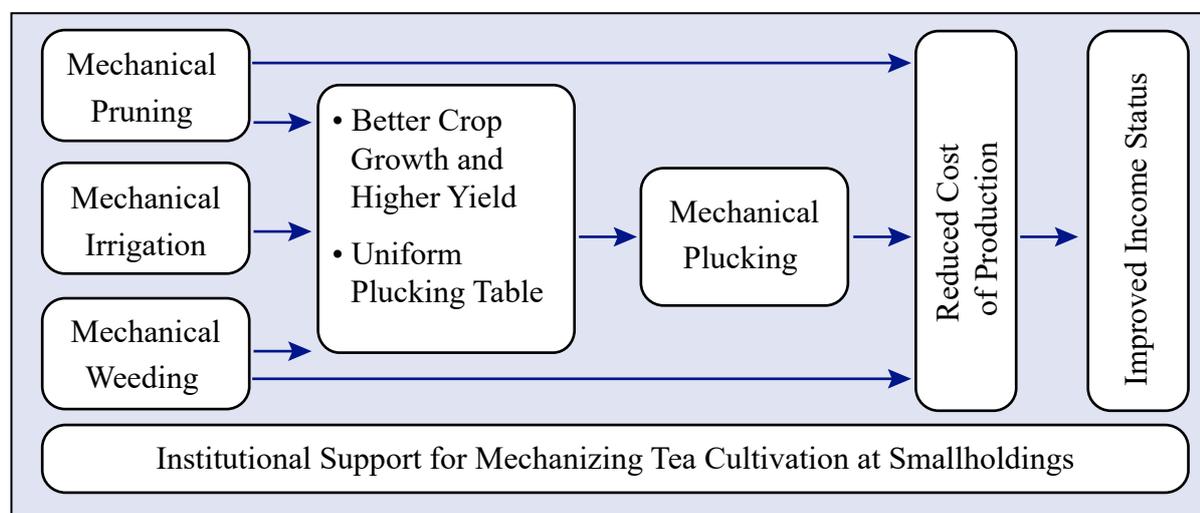


Figure 24: Mechanisation of tea cultivation at smallholder level

Value addition

Sri Lanka is predominately involved in conventional tea production and the value addition remains far below its potential. Value added tea products such as green tea, flavoured tea, organic tea, instant tea, iced tea and ready to drink tea are vitally important to keep Sri Lankan tea competitive and profitable in the international market.. Consumer preferences are changing rapidly towards value added tea products manufactured maintaining stringent food safety and quality standards and due consideration to environmental protection. The rapid assessment revealed that smallholders and tea processing factories were preoccupied in maintaining the status quo rather than trying to improve their systems or add value. The reasons given were lack of premium prices and difficulties accessing the markets for value added products. The failure to increase the percentage of value added products in the international market with Sri Lankan brand names could push the tea sector into a precarious situation in the years to come.

Policy measures

The policy directions to gear for the emerging challenges and to exploit opportunities in light of the transformation taking place in the world of work in the tea smallholder subsector are summarized in Table 8.

Table 8: Policy measures

Drivers	Policy focus
Demographic change and labour shortage	Improve labour productivity, attract unemployed youth and skilled labour pooling
Youth for succession	Improve job attractiveness, earnings and dignity
Climate change and extremes	Take adequate measures to promote climate change adaptation and mitigation.
Land fragmentation and shortage	Promote land consolidation through farmer integration in to tea smallholder companies
Sustainable farming and certifications	Promote sustainable farming practices, through policies and measures to advance organic farming techniques and technologies.
Food safety and quality standards	Ensure compliance among farmers, and encourage capacity building and skills development as well as awareness creation among smallholders and their families.
Value addition	Create incentives for value addition, in terms of premium prices and improved market access.
Technological advancement and mechanization	Invest in farm mechanization (infrastructure and R&D) as well as capacity building.

Skilled labour pool

Poor labour productivity and scarcity of labour were highlighted as issues in the smallholder subsector in the previous sections. It was revealed that the usage of contract labour was common in the tea smallholdings. However, the potential risks of employee unrest by labour outsourcing and contract labour have been emphasised (ILO, 2015). In order to find a practical solution for the labour shortage in the tea sector of Sri Lanka, a new approach should be worked out. It was revealed that the workers were keen to continue using their traditional knowledge and skills. Similarly to smallholders, they were very reluctant to switch to mechanized working environments as they have been working using manual methods for generations.

During discussions, smallholders revealed that alcohol consumption among workers was a serious challenge, resulting in high rates of absenteeism and quarrels. Since there was no recognition for labour jobs, the worker self-esteem was poor. Their job at the smallholders was never considered as 'permanent' and 'formal'. Therefore, it was very difficult for them to apply for formal credit or bank loan schemes. As a result, they took high-interest small loans to meet their household expenses and were in debt with negligible savings and investments. They tended not to work on the dates that the money lender or *seettu* operator (thrift) was due to come to them. They also did not receive any statutory benefits such as EPF, ETF, retiring gratuity, employee insurance, and pension schemes. These factors contributed to poor performance at work and thereby, to a lower quality of green leaves and a subsequent poor quality of made tea. Above reasons have also contributed to the tea industry not being able to attract workers, especially the youth.

Tea industry in competing countries seemed to introduce modern technology at a rapid pace. The mechanization of processes in the smallholdings to enhance the labour productivity was highlighted in this study. It was a common complaint by the tea smallholders that the cost of production, especially the labour cost, was high and escalating further. Therefore, it is not advisable for the tea smallholder plantation industry to rely upon immigrant workers. Enhancement of labour productivity was identified as a viable and a sustainable solution.

In light of above, regional skilled labour pools are proposed to address the issue. Classification of work at smallholder tea lands into common categories, designing of training programmes for workers (as well as smallholder growers) on mechanization and educating them on the benefits of mechanization, the provision of National Vocational Qualifications (NVQ) standardized training in relevant subjects, recognition of trained workers as skilled workers (thereby transferring their status from unskilled to skilled work), registration of trained and skilled workers in the regional skilled labour pools, giving a dignified name for their designation, consideration of their certificate as a recruitment criteria and allocation of workers of different work categories through the regional skilled labour pools were some of the tasks identified and proposed through this study. Improving the image of the jobs in the sector and promoting self-esteem among the tea workers both in the field and also in the factory was identified as crucial to attracting youth into these jobs. This study's recommendations aim at contributing to improving the attractiveness of jobs through better earnings and dignity and making the tea industry an attractive option for unemployed youth living in rural areas.

A stage wise training and a certificate of recognition with NVQ should be provided with a new suitable title. These new labour categories should also be covered under new labour laws to ensure that these workers are provided with statutory benefits. These schemes would need to be addressed carefully and methodically as sending workers to training programmes may pose new challenges by temporarily exacerbating the labour shortage.

Identification of all the state institutions responsible for the trade of tea cultivation, manufacturing and bringing them to a proper coordination was considered as timely requirement. This should be facilitated over an authoritative networking system through ICT solutions.

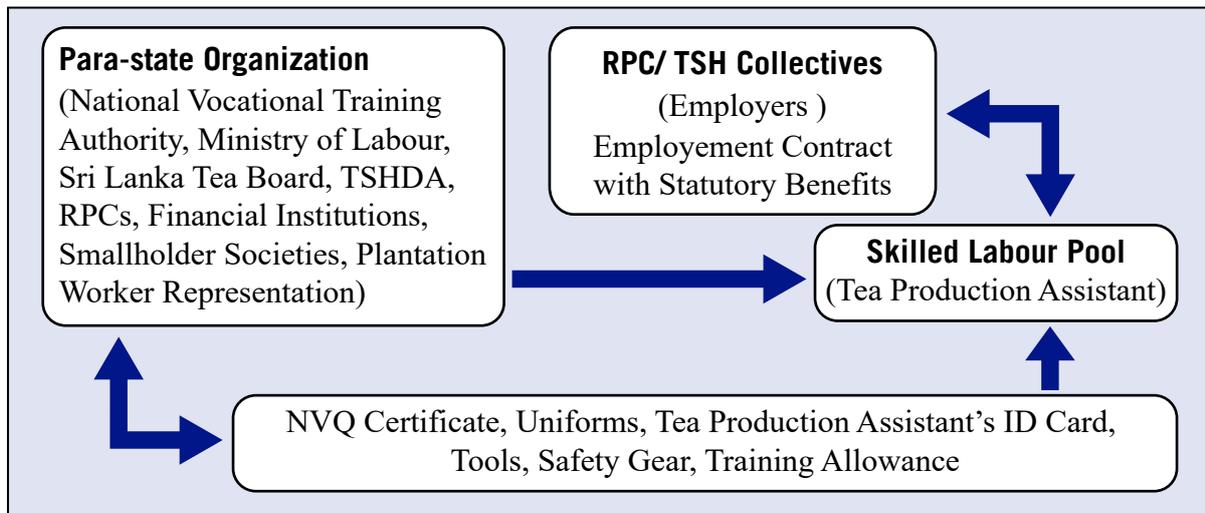


Figure 25: Proposed skilled labour pool

CHAPTER 6

CONCLUSIONS

The tea industry in Sri Lanka is categorized into two main production systems based on the scale of operation namely, the smallholdings sector and the plantations sector. In Sri Lanka, a tea smallholding is defined as a tea land extending up to 10 acres (4 ha). The tea smallholders sector has been playing a significant role in the tea plantation sector as they contribute to 74 per cent of the national production. Therefore, the future of the tea industry largely depends on the smallholder sector and its production systems. This study was undertaken as a rapid assessment with the general objectives of understanding the role and dynamics of smallholders in the supply chain, assessing the current state of decent work among the tea smallholders and its implications on the future of work in the plantation industry. This rapid assessment was carried out using a broad qualitative analysis through FGDs and KIIs as data collection approaches.

Tea smallholders' groups, workers of tea smallholdings, leaf collectors and factory officers were interviewed to collect qualitative data through FGDs. The management of regional plantation companies, TSHDA officials, office bearers of smallholder societies, representatives of trade unions, factory owners association representatives, labour officers and officers of financial institutions were considered as key informants for the KII. Purposive sampling approach, which ensures that adequate diversity was captured in a homogeneous group, was used to select participants for the FGDs and KIIs. Interview protocols for FGDs and a semi-structured questionnaire for KIIs were designed mainly based on the key domains derived from the four strategic pillars of the ILO Decent Work Agenda, full and productive employment, rights at work, social protection and the promotion of social dialogue. The primary data were collected from ten districts in Sri Lanka. KIIs.

It was observed that the majority of green leaves were dealt with by leaf collectors who were prominent intermediaries. Other than that, the factory agents and farmers themselves also transported green leaves to the tea processing factories. The analysis revealed that no value addition took place in the supply chain involving leaf collectors. An exception to this system was in the Ratnapura district, where some selected smallholders and factories of RPCs were part of a certification system with the Rainforest Alliance. It was reported that premium prices for made tea for the RPC and for green leaf for the certified smallholders were on offer.

There were two key sources of credit, cash or cash loans and credit-in-kind, available for the tea smallholders. Cash credit was available for the tea smallholders in two forms, formal credit by financial institutions and informal credit (also called micro credit) by private money lenders.

It was observed that the TSHDA was the only organisation that offers business development training and advice to the smallholders. The TSHDA was instrumental in the setting up of smallholder societies that served the function of supplying green leaves to the factories that offered the best price, provision of micro credit and distribution of fertilisers.

Unorganised supply chain of green leaves, lack of capital for expansion, smallholder indebtedness to leaf collectors, poor cash flow within the supply of green leaves and uncertainty for workers at the smallholders' operations were identified as key issues in the supply chain of green leaves. A more smallholder-friendly business model was proposed with the view to improve the sector and to enhance the job prospects for the workers at the smallholders. Some of the benefits of the smallholder supply chain model are improved bargaining position, enhanced profitability, enhanced access to capital, eliminating smallholder indebtedness to leaf collectors and better creditworthiness of smallholders.

The majority of employment in the tea smallholder sector belongs to the informal employment as the smallholder farms were not registered with either the Employees' Provident Fund or the Inland Revenue Department. There are basically three categories of workers in the tea smallholdings. The own account workers are those who work on their own smallholding and do not engage any employee to work for them on a continuous basis. Contributing family worker is a family member who engages in farming without any payment. Casual employees are all those workers hired by the smallholder on an irregular basis for a basic pay that is not directly dependent upon the earnings of the smallholding.

In applying the decent work concept to the smallholder tea subsector of Sri Lanka, this rapid assessment used the ILO's decent work indicators and the definitions developed by the FAO. The dimensions considered included employment opportunities, adequate earnings and productive work, decent working time, child labour, forced labour, stability and security of work, equal opportunity and treatment in employment, safe work environment, social security, social dialogue and access to technical and vocational training.

In general, agriculture based employment opportunities were common in all regions while within the village non-agriculture-based employment opportunities were scarce. Although earnings of casual workers in the smallholder subsector were above the national poverty line, it was not sufficient for a decent living. There was clear regional variation in earnings as the smallholders and workers in the low-grown region were better off than the other two regions, in terms of their earning capacity, mainly attributed to higher crop productivity, higher green leaf price and lesser interruption from adverse weather conditions. The statutory definition of working hours was nine hours per day inclusive of one hour for meals. However, the working hours in the tea smallholder subsector depends on the nature of the task. The tea pluckers have to conclude their work before 2.30 pm to enable delivery of tea leaves to the collectors. Other tasks such as weeding, pruning and planting which predominately performed by male workers continue till 4.30 pm. The findings revealed that child labour and forced labour were not a concern.

As far as stability and security of work are concerned, the casual workers in the low country reported that finding jobs as casual workers in the tea smallholdings was not difficult, as there was a huge demand for casual labour due to labour shortage in the tea industry. However, in the mid country and up country, despite having a shortage of labour, there were periods in which casual workers, as well as own account workers had no work during rainy season, as rain prevents them from harvesting green leaves. There was evidence of discrimination in terms of ownership of smallholdings, where the majority of own account workers were male while the majority of unpaid family workers were female. In terms of wages, the male workers received a higher wage than the female workers. Safety at work was a serious concern since the majority of the smallholders neither used nor provided safety gear for their workers (e.g. when applying agrochemicals or mechanical weeding do not use masks, goggles, gloves, boots and special clothing). When considering the social security in the smallholder subsector, there were no statutory pension, insurance or health schemes in operation. None of the smallholders were participating in any voluntary pension or insurance schemes, although such schemes were available through private sector establishments. Social dialogue was absent among smallholder workers as they did not have memberships to worker collectives or trade unions. Access to vocational training opportunities related to the tea industry was lacking.

Based on the findings of the field study, it was possible to identify some key drivers likely to influence the shape of work in the years to come in the tea smallholder subsector. These drivers included demographic change and labour shortage, youth for succession, climate change and extremes, land fragmentation and shortage, sustainable farming and certifications, food safety and quality standards, value addition and technological advancement and mechanisation. Interventions were proposed to address challenges and to exploit opportunities arising from these developments.

The recommendations to improve the sustainability and productivity of the tea smallholder subsector while creating and sustainably maintaining decent working the context of transformational changes taking place in the world of work, were to pilot test the proposed business models, developing a skilled labour pool at regional level, using information and communication technology to streamline the supply chain operations, promoting rural business incubators, promoting tea tourism, empowering women with better access to finance and farmer clustering on trainer on-farm model as a best practice.

CHAPTER 7

RECOMMENDATIONS

The following recommendations are made to contribute to the sustainability and productivity of the tea smallholder sector while creating and sustainably promoting access to decent work in the context of transformational changes taking place in the world of work.

Empowering women

Women have displayed their capacity for collective activity in farmer societies, making farming decisions and acquiring technical skills. There are also land owner women who could use potential business opportunities through tea. Empowering them would help elevation of rural economies. In order to achieve real empowerment of women, enhancing their access to financial services, mainstreaming gender equality into national policies and strategies for employment, improving their access to training and skills development opportunities in order to promote women's entrepreneurship and productive employment, and protecting them from unacceptable forms of work, strengthening social protection and workers' institutions should be ensured.

Building resilience and climate mitigation¹⁰

The tea industry is particularly vulnerable to climate change and its impact – which is already visible and likely to intensify. Climate-smart agriculture, water conservation, reforestation and biodiversity practices need to be initiated to mitigate the impact of extreme climate conditions such as landslides, floods and droughts.

Targeted, well-coordinated interventions, involving all stakeholders are required to ensure that not only the plantation companies but also smallholders are equipped with the skills needed to implement best practices to adapt to climate change and mitigate the impact of natural disasters.

Environmental sustainability contributes to improved competitiveness, profitability and job creation. Climate change adaptation measures will create resilience, decent jobs and enhanced

¹⁰ Concluding statement of the Tripartite National Dialogue on Future of Work in the Tea Plantation Sector in Sri Lanka https://www.ilo.org/colombo/whatwedo/events/WCMS_636018/lang--en/index.htm

productivity if the tea industry seizes the opportunity for technological leapfrogging by introducing the latest and most efficient technology. The requirement for higher level skills may increase the attractiveness of the industry for youth, if they also provide opportunities for jobs and incomes at higher levels. In addition, certification schemes for environmental sustainability can be an effective measure to enhance ecosystem services and also contribute to decent work and productive employment.

Pilot test the proposed business models

The proposed business models, namely supply chain model, contract farming-based model and the best farmer cluster model were developed based on the findings of the rapid assessment. These business models are built on existing best practices identified during the field study. It is envisaged that these models will facilitate overcoming the challenges and prepare the tea smallholder subsector for the future.

Develop a skilled labour pool at regional level

The government should take the initiative to set up a mechanism to develop a skilled labour pool at the regional level with the support of tea industry stakeholders. Such initiatives are crucial in order to overcome severe labour shortage in the tea industry. Skills development, vocational training qualification and attractive incentive packages should form an integral part of this endeavour in order to attract unemployed youth. This training should instil job related training in areas such as sustainable farming practices, tea value addition and processing, machinery use, food safety and quality standards, tea tourism etc.

Farmer clustering on trainer on-farm model as a best practice

Farmer to extension officer ratio is very wide in most of the areas due to lack of extension officers. There are smallholders who follow best crop management practices in green leaf production and are willing to play the role of farmer trainer. It is proposed to link the farmer trainer to the surrounding cluster of farmers with the support of the community, the TSHDA and possibly a funding agency. This model would be able to create an effective farmer-centred technology sharing platform to facilitate the change towards sustainable production through innovation.

Use information and communication technology to streamline the supply chain operations

It is proposed to develop a mobile application platform to link primary stakeholders in the supply chain to enhance the information flow within the system and supply chain efficiency. This should be introduced after pilot testing and field verifications.

Promote rural business incubators

It was revealed that the majority of the smallholdings are not managed as real business ventures. One of the main reasons identified during the study for this situation is that there is no publicity on the role models among the smallholders, to set as benchmarks. However, there are suitable cases of farmers, who use improved technology on tea farming in mid country and healthy organic tea farming operations in the low country and sustainable smallholder tea farming with Rainforest Alliance in mid and high-grown regions of the country. Many of these smallholders are resourceful and can be used by the TSHDA or other organizations as role models or business incubators.

Promote tea tourism

It is recommended to pilot test and promote tea tourism in order to enhance the livelihood of tea smallholder families. Young family members and spouses of tea smallholders should be given proper training while helping them to upgrade the facilities to host visitors.

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