

Maofeng Green Tea:

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Introduction

Maofeng tea is most commonly produced in Huangshan City, China, and is referred to as Yellow Mountain or Huangshan Maofeng Tea, a unique blend among the different variations of green tea on the market (People's Republic of China)¹. This particular strand shows agricultural potential within similar regions of Nepal, primarily the Ilam district (Eastern Nepal, Mechi zone) or other hilly areas. Its production adoption in these regions could have positive economic effects for subsistence farmers and shows great export potential.

Product Information and Benefits to Nepal

History, Geography, Growth, and Processing

Part of what makes Maofeng Tea a particularly unique variation of green tea is its history. In an ancient Chinese legend a love-struck couple were tragically separated by death. The young woman wept over the grave of her deceased lover, until she became the rain, and the young man became a tea tree². This legend gave the tea favoritism throughout its many years of cultivation.

The tea was initially produced in Huangshan City, China, among hilly and mountainous regions at a high altitude¹. Similar geographical locations are actually required to grow any type of tea. According to the UK Tea and Infusions Association, tea grows best in regions that feature a warm and humid climate with an average rainfall of at least 1000 mm per year³. Ideally, tea thrives in “deep, light, acidic and well-drained soil” (UK Tea and Infusions Association), at altitudes ranging from sea level to 2,100 metres³. Particularly at higher altitudes, the tea trees are planted on terraces or in the contours of a hill to avoid soil erosion³.

¹ (People's Republic of China, 2007-2014)

² (Finger Lakes Tea, 2014)

³ (UK Tea and Infusions Association, 2014)

The processing method used during the reign of the Qing Dynasty was to steam, roll and bake the tea shoots immediately after harvesting¹, a practice which is still relevant in modern tea culture. Specifically, “green tea is not oxidized. It is withered, immediately steamed or heated to prevent oxidization and then rolled and dried” (Tea Association of Canada)⁴.

Environmental and Labour Sustainability

Though tea farming presents the possibility for the economic growth of subsistence farmers, there are certain environmental concerns that need to be considered. Firstly, by farming a large quantity of a specific crop the local biodiversity is replaced with a single-species monoculture⁵. According to the research conducted by the Rainforest Alliance, monocultures increase the risk of, “soil erosion, competition for water, [and] pollution from fertilizers” (Rainforest Alliance)⁵. Climate change in Nepal is also a factor to consider, though it applies to farming as a general practice. In recent years, Nepal has experienced continuous ecological disturbances as a result of climate change in the form of floods, severe landslides, and soil erosion⁶. All such threats are particularly concerning for hillside or mountain farmers.

In regards to labour sustainability, hillside farming requires terraces to be dug out and maintained throughout the period of cultivation. While this is an extremely strenuous task, it will ultimately result in higher yields and prevent soil erosion and flooding. In addition, tea farming is primarily a hands on agricultural practice that requires bushes and trees to be plucked by hand³. Though the cumulative working conditions can be physically demanding, this method creates the demand for numerous year round workers and therefore positively effects employment rates within a given region⁵. However, in the interest of poorer subsistence farmers,

⁴ (Tea Association of Canada, 2014)

⁵ (Rainforest Alliance, 1987-2014)

⁶ (Lohani, Climate Change in Nepal - Shall we Wait Until Bitter Consequences?, 2007)

a smaller tea garden would require less labour but would therefore produce a lower economic return.

Sociological Impacts

Within most subsistence farming families, the women are the ones who are most likely to stay home and care for the children and the farm while the men are employed elsewhere⁷.

Deciding to grow tea would be a beneficial agricultural option since, though it requires long hours, the task is not particularly overwhelming since it only involves the picking of leaves on a regular basis.

Regarding the impacts on Nepalese children, a study conducted within hillside villages found that the enrollment of poor children within the local public school system has been low⁷. There is an assumption that this is a consequence of stereotypical domestic responsibilities becoming a priority for young girls and labour opportunities becoming the preference for young boys⁷. This is primarily a result of low household income which could therefore be positively affected by potential export revenue.

However, the production of tea alone is not enough for the average subsistence farmer as it will not provide the family with any source of food. Therefore, it is in the best interest of subsistence farmers to practice crop diversification which would allow for the production of household food in addition to having sellable goods⁸. This would also help in promoting local biodiversity.

Nutritional and Economic Benefits

Maofeng tea, being part of the green tea family, can provide many potential health and nutritional benefits to consumers. A Nepali tea exporting company known as Nepali Tea Traders

⁷ (Pokharel, 2001)

⁸ (Acharya, 2010)

clarifies that green teas, which are picked and processed quickly to avoid oxidation, retain their natural vitamins and antioxidants⁹. The Tea Association of Canada promotes tea as a healthy beverage choice for consumers, stating that, “over the past 15 years, research has found that drinking black, green or oolong tea may offer some protection from cardiovascular disease and cancer, lead to reduced risk of kidney stones, and strengthen bones, teeth and the immune system” (Tea Association of Canada, 2014)¹⁰. There were also numerous scientific studies conducted between 2003 and 2006 pertaining to green tea specifically. The studies found that consumers exhibited lower mortality, improved condition among chronic Leukemia patients, an improved overall antioxidative status, and a reduction of oxidative damage that could lead to cancer¹¹.

In an assessment of the Nepalese tea industry conducted by SAWTEE (South Asia Watch on Trade, Economics & Environment), it appears that “tea has a potential to benefit large segments of the rural population and lift them out of poverty and stagnation” (SAWTEE, 2006)¹². This is possible due to the formulated National Tea Policy in 2000 which provides financial incentives to promote investment, availability of land for plantation use, developing institutions which foster exports, and the establishment of training centers for the use of potential tea farmers¹².

Export Potential

The export of tea to Canada presents rapidly growing economic potential. Statistics Canada found that, “imports of tea and coffee increased significantly from \$487.9 million in

⁹ (Nepali Tea Traders, 2014)

¹⁰ (Tea Association of Canada, 2014)

¹¹ (Tea Association of Canada, 2014)

¹² (SAWTEE, 2006)

1999 to \$845.3 million in 2009 (of which 71.5% was imported from the U.S.) (Government of Canada, 2010)¹³. This means that there is a market share of 28.5% in the import tea and coffee market that Nepal can penetrate. The Government of Nepal also noted that tea demonstrates high export performance as well as high socio-economic impact¹⁴. The growing demand for green tea specifically is propelled by the potential health benefits that it offers⁹. Further, there is a growing specialty market of consumers concerned with ethically produced products from developing countries, which allows for premium pricing for fair trade goods¹³.

Concerning the logistics of exporting tea, the lightweight and small surface area of the product would allow for ease during transportation. As well, since the product is composed of dried leaves, the only concerns during storage is the humidity level which can be combatted with the use of waterproof packaging. It is assumed that only the odorant compound and not the taste is affected by temperature fluctuations between 15°C and 25°C¹⁵.

The prime strategy for exporting tea to Canada would be for farmers to work with local organizations such as Nepali Tea Traders⁹ or Kanchanjangha Tea Estate and Research Centre¹⁶. Both traders boast about their ethically and organically grown teas and grant programs that support Nepalese agriculture and are available to the international market. Though they do not deal specifically with Canadian consumers, there is the possibility of processing orders online which could prove to be a valuable avenue of export. However, there is a potential Canadian trader known as the West Coast Coffee Traders¹⁷. Working out of British Columbia, they create international partnerships with farmers for sales in the specialty coffee and tea market¹⁷.

¹³ (Government of Canada, 2010)

¹⁴ (Government of Nepal, 2010)

¹⁵ (Tsuyoshi Katsuno, 2014)

¹⁶ (KTE, 2011)

¹⁷ (WestCoast Coffee Traders, 1992-2014)

References

- Acharya, U. P. (2010). Livelihood Strategy of Bote Community: A Case of Bote Community of Patihani VDC of Chitwan. *Dhaulagiri Journal of Sociology and Anthropology*, 247-258.
- Finger Lakes Tea. (2014). *The Legend of Mao Feng*. Retrieved from Finger Lakes Tea Company: <http://www.fingerlakestea.com/legend.php>
- Government of Canada. (2010, December). *The Canadian Tea Industry*. Retrieved from Statistics Canada: <http://www.agr.gc.ca/eng/industry-markets-and-trade/statistics-and->

- market-information/by-product-sector/processed-food-and-beverages/the-canadian-tea-industry/?id=1298047470064#tea
- Government of Nepal. (2010). *Executive Summary and Action Matrix*. Kathmandu: Ministry of Commerce and Supplies.
- KTE. (2011). *Mission Statement/Goal*. Retrieved from Kanchanjangha Tea Estate and Research Centre: http://www.organickte.com/?page=show_page&c=61
- Lohani, S. N. (2007). Climate Change in Nepal - Shall we Wait Until Bitter Consequences? *Journal of Agriculture and Environment*, 38-44.
- Nepali Tea Traders. (2014). *Shop Teas*. Retrieved from Nepali Tea Traders: <http://www.nepaliteatraders.com/pages/shop-teas>
- People's Republic of China. (2007-2014). *Kaleidoscope - Food Culture*. Retrieved from Cultural China: <http://kaleidoscope.cultural-china.com/en/131Kaleidoscope315.html>
- Pokharel, B. (2001). Gender Roles and Activities Among the Rural Poor Households: Case Studies From Hill Villages. *Occasional Papers in Sociology and Anthropology*, 65-81.
- Rainforest Alliance. (1987-2014). *Sustainable Agriculture*. Retrieved from Rainforest Alliance: <http://www.rainforest-alliance.org/work/agriculture/tea>
- SAWTEE. (2006). Tea Industry in Nepal and its Impact on Poverty. *South Asia Watch on Trade, Economics & Environment*, 1-10.
- Tea Association of Canada. (2014). *Tea - A Healthy Beverage Choice* . Retrieved from Tea Association of Canada: <http://www.tea.ca/tea-health/tea-a-healthy-beverage-choice/>
- Tea Association of Canada. (2014). *Tea and Health Scientific Research Summary*. Retrieved from Tea Association of Canada: <http://www.tea.ca/tea-health/tea-and-health-scientific-research-summary/>
- Tea Association of Canada. (2014). *Tea Types*. Retrieved from Tea Association of Canada: <http://www.tea.ca/about-tea/tea-types/>
- Tsuyoshi Katsuno, H. K. (2014). Characterisation of Odorant Compounds and their Biochemical Formation in Green Tea with Low Temperature Storage Process. *Elsevier*, 388-395.
- UK Tea and Infusions Association. (2014). *Tea Growing and Production*. Retrieved from UK Tea and Infusions Association : <http://www.tea.co.uk/tea-growing-and-production>
- WestCoast Coffee Traders. (1992-2014). Retrieved from West Coast Coffee Traders: <http://www.westcoastcoffeetraders.com/>

