

Tkibuli Mountain Tea

Applicant: Association “Tkibuli Mountain Tea”

NUMBER OF REGISTRATION: 19

DATE OF REGISTRATION: 2016-03-02

Specification

Description of the product

The evergreen, perennial tea crop belongs to the family Theaceae, the botanical homeland of which is deemed to be China. According to one of the versions, in Georgia, the first tea seeds were sown in the estate of the Samegrelo Governor in the village of Goraberezhoul, being further spread to other subtropical areas of West Georgia. As for Tkibuli area, the propagation of tea started here in the 30s. The Okribi zone, where tea is being cultivated, is surrounded by mountain ranges. West winds predominate here, bringing abundant precipitation from the Black Sea area, which together with the mountain temperature regime create favorable conditions for growing and developing quality teas.

Tea bushes of the northern Chinese tea varieties of the *Thea sinensis* group (Kimin, Ningzhou, Kangra) and Georgian selection varieties, which are well adapted to rather cold climatic mountain conditions, are cultivated on the slopes of Okribi Mountain.

The tea varieties grown in Okriba are noted for high content of many chemical components, which is conditioned by the local soil structure, such as: dry matter – 24 %, unoxidizable polyphenols 20-25 %, glucosides – 25 %, proteins - 10-12 %, caffeine - 3-3.5 %, amino acids - 2,0 %, sugars - 2-3 %, mineral matter - 2-2.5 %, cellulose, hemicellulose - 16-18 %, pectin – 10 %, resins - 2-3 %, chlorophyll – 0.6-0.8% and different vitamins.

The tea bush in the Okriba plantations is 50-100 cm in height and 60-80 cm in width. The vegetation period of the tea leaf of intensive green color and of average size makes 150-180 days. The intensive growth of flush starts in the late April, whereas the growth of shoots ends in September. The local tea bush is distinguished by a great number of bright green

shoots and fluffy silvery reclinated long buds (tips), which gives a visual pleasure to its viewer. Tea is plucked manually by skilled tea pickers, which essentially conditions the top quality of the tea leaf plucked under the complex local geographical conditions.

According to its organoleptic properties, the 'Tkibuli Mountain Tea' has a soft, pleasant, delicate, ripe and lively taste, it is manufactured as green, black loose-leaf tea in packs and tea in bags.

Specific steps in production

Tea plucking in full-age plantations starts in the end of April, when the tea leaf growth is most strong and constitutes a major share of the yearly harvest; in June, owing to the small amount of precipitation, the tea plant is characterized of weak growth; in August, the technically ripe 3-4-leaf shoots are maximally plucked; thereafter, the productivity gradually reduces and in the late September, from the mid-October the plant goes to the winter regime, the period of extended rest - dormancy. For the purpose of fertilizing the soil under tea, nitrogenous fertilizers are applied in the amounts determined by a laboratory analysis of soil; also in the early spring, the so-called espallier tea leaf pruning in tea plantations takes place. The local tea bush yields 3174 kg/ha green leaf in a year.

The inherently sensitive nature of the finely plucked green leaf requires a deep and comprehensive knowledge at each stage of its treatment, because the leaf variety (young, rather coarse and coarse) and the kinds of processed tea (black, green loose tea and tea in bags) are to be processed under different process flowsheets.

Since tea plantations are rather distanced from the tea processing factory, the plucked tea consignments, prior to their transporting to the factory, are kept in special tare designated for tea storing, in peripheral points, wherefrom they are delivered to the factory. The quality of the coming tea leaf is examined in the first turn at the factory; thereafter the raw tea leaf undergoes processing under the traditional technology; The withering, rolling, drying, sorting and packing are exclusively carried out in different shops of the factory, first of all, in the course of black tea processing, depending on the amount, the leaf goes to the withering shop (natural withering on 'troughs') or to the rolling machine, in both cases. Once the leaf reaches the factory, it is 'withered'.

The objective of withering is to evaporate the moisture from the green leaves slowly over a period of 14 to 16 hours. The leaf shrinks and becomes soft so that it can withstand twisting and rolling mechanically. The brew characteristics also begin to develop following physical and chemical changes within the leaf structure. Each trough is an air chamber which enables fresh dry air to be passed in a regulated manner through the green leaves until the desired 'wither' is achieved. Approximately, 75 % of the water content in the fresh green leaf is evaporated at this stage.

The withered leaf is then removed from the trough and loaded and twisted in the rolling machines, which, by subjecting the withered leaf to a rolling movement under pressure, twist the leaf, rupture the cells and release natural juices, promoting oxidation and accelerating pigmentation. Rolling pressures and sequences are very meticulously supervised to ensure that the optimum style is imparted, without the detrimental effect of overheating.

Next, the leaf is thinly spread in a cool, well-ventilated room to slowly oxidize (ferment). This stage, in which the flavanols combine with oxygen in the air, extends over a period ranging from two to four hours, mainly depending on ambient temperature and relative humidity. An experienced tea maker judges at regular intervals the extent of quality development from the fragrance progressively expressed by the leaf. This sensory judgment is critical to the quality of the infused brew. For the visitor, the rich floral aroma emanating from tea rolling and fermenting (oxidization) room is heady and definitely unforgettable.

Once optimum fermentation (oxidization) has been achieved, the oxidized leaf is taken for roasting (or drying) to a tea dryer at 100 °C to arrest further fermentation (oxidization) by deactivating the enzymes, and to remove almost all of the remaining moisture in the leaf. The tea dryer is a chamber which exposes the fermented (oxidized) leaf to hot dry air at regulated, varying temperatures within its parts, for duration of 20 to 30 minutes. A good roast reduces moisture content in the final product to about 4-5 %, resulting in crisp dry tea which is then goes to the tea sifter.

After final grading has been completed, nomenclatures are assigned to the size of the grades. These falls into three categories: 1) Whole Leaf, 2) Broken Leaf; 3) Fanning. In

contrast to the black tea, the withered green tea leaf undergoes fixation (decomposition of oxidizing ferments, which proceeds by the hot moist air (160-180 °C); the length of fixation is 3-4 minutes; thereafter, the leaf is weathered until it becomes of amber color; the moist in it should be 58-59 %. The green tea leaf drying proceeds in the same treatment as that of the black tea and finally the semi-finished product of greenish color is produced and delivered for further grading as the black tea.

For tea in bags a special blend is prepared and the dry mass (powder) is delivered to the grading and packing machine, where it is packed first in 2-2.5 g bags and then in cartons, 25 bags in each.

Geographical area

The green tea for the 'Tkibuli Mountain Tea' is grown in the Okribi area, in particular in the following villages of Tkibuli district: Akhalsopeli, Satsire, Khresili, Bziauri, Manchiori, Dabadzveli.

Link with the geographical area

The rare flavor of both the black and green teas of the mountainous Okribi area is a result of the unique combination of plant genes soil chemistry and the climatic conditions, as well as the soil rich in minerals, abundant rainfall (1373 mm/year), the altitude between 600 to 1200 m above sea level, and the unique temperature variation from -12 to +30 °C. It is important to note that the steep slopes provide ideal natural drainage for the generous rainfall the district receives.

All these natural and agro-climatic conditions play a leading role in the formation of special properties and high quality of the product. It should be noted that the local tea varieties reveal in different places different organoleptic characteristics.

The originality of the region is conditioned by a number of factors: the scenic Nakerala Range located at an altitude of 1200 m interferes with the movement of clouds, contributing thus to the drain of large amount of rainfall within the area, where the 'Tkibuli Mountain Tea' is grown. Intermittent clouds, mist, and direct fall of sun rays on tea bushes

located on steep hill slopes, as well as cold winters greatly determine the particular composition of green tea and contribute to the development of its fine aroma and properties.

The tea bushes of Okribi area are nurtured by intermittent natural rainfall, do not require artificial irrigation and the employment of chemical weed- or pest-killers thanks to the cold winter. The high tea quality is also conditioned by the traditional and cultural practices of tea management, plucking and production, which pass from generation to generation in the local population. All sorts of 'Tkibuli Mountain Tea' rich in natural elements are a pleasant beverage for consumers at any time of a year

Due to the unique and complex combination of natural and agro-climatic conditions prevailing in the region as well as the rich experience of tea growing that the local population has accumulated during decades, tea produced in this region has the distinctive and naturally occurring organoleptic characteristic of taste, aroma and texture which have won the recognition of discerning consumers on both the local and foreign market.

Unique is the tea produced by using the "bouquet" material (two leaves and the bud), which is plucked in relatively small amounts in the Okribi region, for its copper-color, pleasant pungent, floral (rose) flavor, creamy infusion characteristic of quality teas. All these properties put the 'Tkibuli Mountain Tea' as a niche luxury product. As it is narrated, the tea was greatly appreciated during the Big Three meeting at Yalta.

A tea with relatively different characteristics, the so-called broken tea and tea in bags, is produced from three and more leaves.

Specific rules concerning the origin and labeling

Any quantity of brought in green leaf or brought out finished product is registered in a special log; each lot/batch is subjected to on-site analysis in the production and technical laboratory.

The properly finished and packaged product is delivered to the warehouse, where it is stored under optimal conditions; each tea package (individual packs or bags intended for wholesale) shall bear a logo indicating the geographical area and the words 'Tkibuli Mountain Tea', as well as date of manufacture, shelf life, weight, and storage conditions.

Specific rules concerning control

The official control over compliance of the product 'Tkibuli Mountain Tea' with specifications shall be exercised by the Ministry of Agriculture of Georgia.