

Major Compositions of Leaf Tea and Flower Tea Using Native *Camellia*(*Camellia japonica*) in Korea

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Most of leaf teas, except flower tea, were considered as good materials with basic conditions for tea manufacture because water content was below 6 %. Crude protein was the greatest component in roasted young leaf tea, crude fats in roasted mature leaf tea and ashes in fermented young leaf tea.

Caffein were present as the highest amount(5.18%) in steamed mature leaf tea, showing less amount than greenp teas. Catechin were contained as the highest amount in all kinds of teas, especially fermented young leaf tea. was the highest(9.57%).

Tannin, which highly related with tea quality including astringent taste, color and perfume, were present as the highest amount in fermented young leaf tea.

Vitamin C was highly detected in the tea from flowers(22.7mg/100g) rather than in the tea from leaves. Theanine were found in flower tea by 1,074 mg/100g and had about twofold of fermented young leaf tea and roasted young leaf tea in content.

Among free amino acids glutamic acid and aspartic acid were higher detected in steamed mature leaf tea and roasted mature leaf tea while asparagine was present as higher amounts in roasted young leaf tea and fermented young leaf tea, expecting these components can improve tea taste. Nucleic acids and their derivatives including CMP, GMP, IMP, hypoxanthine, and AMP were also analyzed through HPLC analysis method. GMP, hypoxanthine, and AMP were detected as the higher amounts by 7.86, 8.57, and 12.67 μ mol/g, respectively, however IMP content was even reduced by all manufacturing processes. In all kinds of tea, sugars such as glucose, fructose, sucrose and maltose were detected, specially glucose and fructose were found as highest amount in roasted flower tea by 65.5 and 59.6 unit, respectively.