探討日本綠茶中的關鍵氣味化合物及焙茶最適加工條件

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一、前言

二、不同品質 (高、中、低) 抹茶中的關鍵氣味化合物

三、日本綠茶 (煎茶、抹茶、玉露及焙茶) 的加工處理方式對其關鍵氣味成分之影響

四、由日本綠茶 (番茶、煎茶) 烘烤前後關鍵氣味化合物含量變化找出焙茶最適烘烤條件

五、結論

摘要

綠茶是日本主要的茶葉型態，為非發酵茶的一種，近年來因其健康益處及特殊風味，在全世界非常流行。日本綠茶依據收穫前後的加工處理，可分為未遮蔭的蒸綠茶 (煎茶)、遮蔭的蒸綠茶 (抹茶和玉露)，焙茶則是將番茶或煎茶再以高溫烘烤而形成，而此加工過程可能會導致兒茶素之降解及丙烯醯胺之生成。本篇報告的目的為探討各種日本綠茶中的關鍵氣味化合物並找出焙茶最適烘烤條件，以得知不同加工處理對綠茶風味之影響。利用氣相層析質譜儀搭配氣相層析嗅聞法與香氣萃取物稀釋分析法可找出各綠茶之關鍵氣味化合物。抹茶的關鍵氣味化合物為 4-羥基-2,5-二甲基-3 (2 氫)-呋喃酮、香豆素、3-甲基-2,4-壬二酮、(E,Z)-2,6-壬二烯醛、反式-4,5-環氧-(E)-2-癸醛、(Z)-1,5-辛二烯-3-酮、α-紫羅蘭酮和 (E)-異丁香酚，煎茶中的關鍵氣味化合物為γ-甲硫丙醛及吲哚，玉露中的關鍵氣味化合物為吲哚，焙茶中的關鍵氣味化合物則是 2,3-二乙基吡嗪、2,3-二乙基-5-甲基吡嗪、2-乙基-3,6-二甲基吡嗪、癒創木酚及香蘭素，而 160℃ 30 分鐘則為焙茶的最佳烘烤條件。

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