

P206

## Quality characteristics and antioxidant activity of fruit dressing using lentil (*Lens culinaris* Med. cv, *Silvina*) legume

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### Abstract

Dressing is a seasoned mixture usually used as a stuffing in food. Quality characteristics and antioxidant activity of fruit dressing using lentil legume were investigated. The four groups were divided into D-1 (fruit dressing purchased from the local market in Deagu, Korea), D-2 (grapefruit-sugaring dressing prepared with grapefruit sugaring and lentil legume paste), D-3 (vinegar dressing purchased from the local market in Deagu, Korea), D-4 (pineapple-vinegar dressing prepared with pineapple vinegar and lentil legume paste), and then they were analyzed with regard to general compositions, Hunter's color value, mineral and free amino acid content and antioxidant activities. The pH and titratable acidity in all samples ranged from 2.9 to 4.6 and from 0.6 to 1.2%, respectively. The crude protein content were 2.29% for D-2 dressing and 4.03 for D-4 sample, while were not detected D-1 and D-3 samples. In case of Hunter's value, The 'L' and 'a' values of all samples ranged from 45.98 to 56.54 and from -1.59 to 3.30, respectively. The D-4 sample exhibited the higher levels of Ca (215.40 mg/kg), K (1,105.83 mg/kg), Mg (233.63 mg/kg) and Fe (13.78 mg/kg). The levels of heavy metals (As, Pb, Cd and Hg) in all samples were not detected. The contents of total amino acid in D-3 and D-4 samples were 8.269 and 3.419 mg/mL, respectively. The highest contents of total phenols (191.13  $\mu\text{g}$  GAE/mL) and DPPH radical scavenging activity (93.69%, Inhibition) were observed in D-4 sample.

Keywords : fruit dressing, lentil legume, quality characteristics, antioxidant activity

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