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## Improvement in Storage Stability of Fish Fillet Using Dietary Soybean Phospholipids

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Soybean phospholipids are known to exhibit antioxidant effects on oils and fats. However, few studies have examined their antioxidant effects in vivo. In this study, we investigated the influence of dietary soybean phospholipids on fish fillet oxidation. For 4 weeks, we fed rainbow trout diets containing 0, 1.0, or 2.5% soybean phospholipids, of which the lipid content was adjusted with soybean oil. We compared oxidation stability in fillets after the feeding period. In the fillet of fish fed the soybean phospholipid-containing diets, the thiobarbituric acid reactive substance (TBARS) level following an oxidation test was significantly inhibited compared to that in the fillet of fish fed a soybean oil-containing diet. Similarly, the syntheses of malondialdehyde (MDA) and 4-hydroxyalkenals (HAE) were significantly inhibited. These results suggest that the administration of soybean phospholipids improves the storage stability of fish fillet.

**Keywords:** [soybean phospholipids](#), [oxidation](#), [lipid](#), [fish](#)


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