

## SNP genotyping by DNA photoligation: application to SNP detection of genes from food crops

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**Abstract.** We describe a simple and inexpensive single-nucleotide polymorphism (SNP) typing method, using DNA photoligation with 5-carboxyviny-2'-deoxyuridine and two fluorophores. This SNP-typing method facilitates qualitative determination of genes from indica and japonica rice, and showed a high degree of single nucleotide specificity up to 10 000. This method can be used in the SNP typing of actual genomic DNA samples from food crops.

**Keywords:** biosensors, DNA recognition, ligation reactions, photochemistry, food crops

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