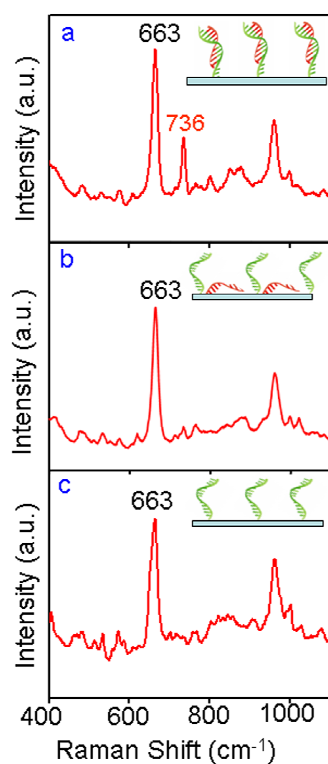


# Label-Free detection of DNA Hybridization using Surface Enhanced Raman Spectroscopy

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## Supporting Information

Experimental results of the adenine-free detection of DNA hybridization.



**S1.** SERS label-free detection of DNA hybridization based on adenine-free probe. SERS of: (a) probe SN3 hybridized with complementary DNA sequence C-SN3 (target), (b) probe SN3 hybridized with non-complementary DNA sequence SN4 (control) and (c) DNA probe SN3 (adenine-free) only.

The detection technique discriminates DNA hybridization (a) versus non-specific binding (b). in the case of a non-complementary sequence, where almost no peak appears at 736 cm<sup>-1</sup>. This indicates that non-specific binding is minimal