



Product Information

DNA-functionalized SWCNTs (DNA-SWCNTs)

Cat. No.: X26-04-ZQ538

Size: 100 mg; 250 mg; 500 mg; 1 g; 5 g

Synonym: DNA-modified SWCNTs; Oligonucleotide-functionalized SWCNTs; DNA-SWCNT hybrid

This product is for research use only and is not intended for diagnostic use.

Product Information

Description	These single-walled carbon nanotubes are wrapped with specific DNA sequences, which facilitates their separation by electronic type and improves their water solubility. The DNA molecules interact with the nanotube surface through pi-pi stacking, leaving the phosphate backbone exposed to provide electrostatic stabilization. This modification allows for the use of DNA hybridization as a tool for organizing nanotubes into complex structures.
Source	Custom synthesis
Functional Group	DNA
Form	Solid or powder
Purity	≥95%
Impurities	No visible impurities to the naked eye.
Identity	HPLC/MS/NMR
Stability	This product is stable for one year when stored at the recommended temperature in lyophilized powder.
Quality Level	Research grade
Applications	This product can be used for the study of DNA-nanomaterial interactions, the development of nanotube-based molecular sensors, and research into electronic type-separation.
Storage	Store at -20°C.