The penetration of fluorescence silica nanoparticles into living cell using TAT peptides modification method

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Dye-doped silica nanoparticles(SiNPs) could make uniform size and shape and easily control of various diameters. These dye-doped SiNPs have functionalized using HIV1-TAT peptides that can deliver cargos such as oligonucleotides and proteins across the plasma membrane into living cells. In this study, we prepared TAT-functionalized SiNPs conjugated Cy5 labeled oligonucleotides and TAT peptide for the purpose of improving intracellular delivery.

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