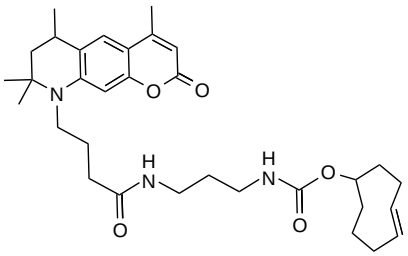
AATOM™ 390 TCO

Catalog Number: 70206
Unit Size: 1 mg

Product Details

Storage Conditions	Freeze (< -15 °C), Minimize light exposure
Expiration Date	12 months upon receiving

Chemical Properties

Appearance	Solid light yellow
Molecular Weight	551.73
Soluble In	DMSO
Chemical Structure	

Spectral Properties

Excitation Wavelength	390 nm
Emission Wavelength	475 nm

Applications

AATOM™ 390 is a coumarin-based fluorescent dye characterized by its high fluorescence quantum yield, large Stokes shift, good photostability, and low molecular weight. It exhibits moderate hydrophilicity and is optimally excited within the 360-410 nm range, with a mercury arc lamp (emission lines at 365 nm and 405 nm) serving as an effective excitation source. This dye is well-suited for applications in single-molecule detection and advanced high-resolution microscopy techniques, including PALM, dSTORM, and STED. Additionally, AATOM™ 390 is compatible with flow cytometry (FACS), fluorescence in situ hybridization (FISH), and other diverse biological assays.

AATOM™ 390 TCO is particularly useful for labeling tetrazine-modified biomolecules under copper-free conditions. It reacts with tetrazine-functionalized molecules, forming a stable conjugate via a dihydropyrazine moiety. This click reaction is favored over others due to its extremely fast kinetics and higher yields under mild reaction conditions, making it a popular choice for researchers. This product is manufactured by AAT Bioquest and is not affiliated with ATTO-TEC GmbH.

©2025 AAT Bioquest, Inc. Last revised October 2025. For more information and tools, please visit https://www.aatbio.com