

# REDOX CATALYSIS OF AZO ISOMERIZATION. A NEW MECHANISM FOR NANOSCALE MECHANICAL SWITCHING

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Azobenzenes undergo photo-stimulated isomerization between *cis* (contracted) and *trans* (expanded) states and may thereby serve as actuators in nanomechanical systems. We have developed a redox-appended azobenzene (AA-N=N-An) capable of electrically stimulated extension which will allow high resolution, single molecule photo-electrical nanomechanical switching.

