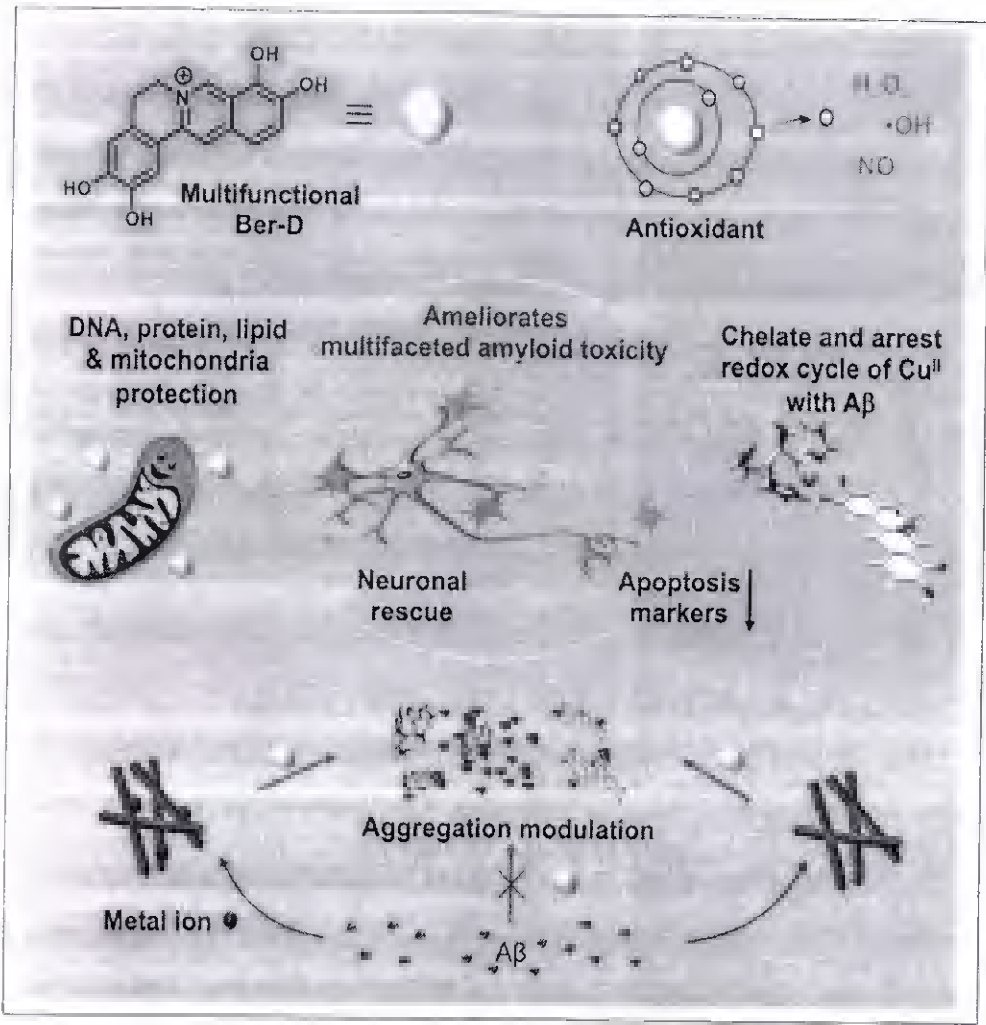




60

Article

Antioxidant Berberine-Derivative Inhibits Multifaceted Amyloid Toxicity



Kolla Rajasekhar,
 Sourav Samanta,
 Vardhaman
 Bagoband, N. Arul
 Murugan,
 Thimmaiah
 Govindaraju

tgraju@jncasr.ac.in

HIGHLIGHTS
 Multifaceted Aβ toxicity
 activates premature
 apoptosis and neuronal
 death in AD

Berberine is modified to
 nontoxic and
 polyphenolic
 multifunctional derivative
 (Ber-D)

Ber-D modulates Aβ
 aggregation, metal
 toxicity, ROS, oxidative
 and biomolecules
 damage

Study revealed
 mitochondrial protection
 and downregulation of
 apoptosis markers

Rajasekhar et al., iScience 23,
 101005
 April 24, 2020 © 2020 The
 Author(s).
<https://doi.org/10.1016/j.isci.2020.101005>

[Handwritten Signature]
 PRINCIPAL
 J.S.S. Banashankar Commerce
 Shantikumar Science College.
 DHANWAL 580 004.