Reviewer's report

**Title:** Neuroprotective effects of Psoralea corylifolia Linn seed extracts on mitochondrial dysfunction induced by 3-nitropropionic acid

**Version:** 2  **Date:** 22 July 2014

**Reviewer:** Vadde Ramakrishna

Reviewer's report:

Reviewer Comments

Title: Neuroprotective effects of Psoralea corylifolia Linn 1 seed extracts on mitochondrial dysfunction induced by 3-nitropropionic acid

Reviewer's report:

In the present study, the authors have assessed that the neuroprotective effects of Psoralea corylifolia Linn seed extracts on mitochondrial dysfunction induced by 3-nitropropionic acid in cultured rat pheochromocytoma (PC12) cells. The authors have performed cell viability assay, ATP measurement, XF-24 metabolic flux analysis, mitochondrial membrane potential, mitochondrial superoxide, and confocal microscopy analysis. The authors found that P. corylifolia seed extracts induces production of ATP and mitochondrial membrane potential and decreases superoxide levels. However, there are some questions and comments as following:

# Major compulsory revisions
1. Active component present in the aqueous and ethanol extract gives more strength for the results. LC MS data strengthen publication

# Minor revisions
1. In figures, only one * significance has been mentioned. What about ** and *** significance.

**Level of interest:** An article of limited interest

**Quality of written English:** Needs some language corrections before being published

**Statistical review:** No, the manuscript does not need to be seen by a statistician.

**Declaration of competing interests:**

No competing interests