IMPACT: International Journal of Research in Applied, Natural and Social Sciences (IMPACT: IJRANSS)
ISSN (P): 2347-4580; ISSN (E): 2321-8851
Vol. 6, Issue 2, Feb 2018, 33-68

EVALUATING NEUROPROTECTIVE EFFECTS OF ASCORBIC ACID AGAINST 3-NITROPROPIONIC ACID INDUCED HUNTINGTON'S DISEASE IN RATS: POSSIBLE INVOLVEMENT OF GABAA RECEPTORS

Dharmender Jaglan & Chanpreet Singh

Chandigarh College of Pharmacy, Landran, Mohali, Punjab, India

Received: 03 Feb 2018 **Accepted:** 09 Feb 2018 **Published:** 21 Feb 2018

ABSTRACT

Huntington's disease (HD) is a genetic, progressive and fatal neurodegenerative disorder characterized by the gradual development of involuntary muscle movements and associated with severe degeneration of basal ganglia neurons (Paulsen et al., 2008; Raymond et al., 2011). An expanded unstable CAG trinucleotide repeat within the coding region of the HD gene has been identified as the genetic mutation responsible for the disease (HD Collaborative Research Group, 1993). The progression of disease is generally late-onset and characterized by psychiatric, cognitive and motor disturbances (Shannon, 2011) due to progressive neurodegeneration in the cerebral cortex, hippocampus, striatum and basal ganglia (Bates, 2004; Hart et al., 2013). In some cases, involuntary movements may be prominent even in the early stages. As documented, first signs of HD are behavioral disturbances and learning difficulties (Paulsen & Canybeare, 2005; Stout et al., 2012).

KEYWORDS: *Disease, Generally Late-Onset,Characterized By Psychiatric Cognitive*