OPEN PEER REVIEW REPORT 1

Name of journal: Neural Regeneration Research

Manuscript NO: NRR-D-22-00825

Title: Silenced Vav1 attenuates the inflammatory response and neuronal apoptosis in cerebral I/R

rats by repressing microglial and NLPR3 inflammasome activation

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Reviewer's country: Italy

COMMENTS TO AUTHORS

In the manuscript, authors investigated the effects of Vav1 on cerebral I/R injury. The Authors used both in vivo and in vitro models of stroke, specifically middle cerebral artery occlusion/reperfusion (MCAO/R) rats and BV-2 microglia cells subjected to oxygen-glucose deprivation/reperfusion (OGD/R). The manuscript is well written and of high interest for the scientific community. The experimental design is adequate, however, there are a few concerns that require the Authors attention: 1)In the Abstract the Authors should mention what is Vav1 to give an idea to the readers before showing the obtained results.

2)in the Materials and Methods section some relevant information are missing, such as the total number of the animals used in the study, the number of animals used for each study group, which kind of microscope was used to acquire TCC staining, ELISA microplate reader was used

3) Full Western blot figures with respective molecular weights should be included as supplementary figures.