

A need for genetic profiles of Alzheimer's disease patients

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Editorial

Alzheimer's disease (AD) is among the most known neurodegenerative disease¹ and represents the most prevalent dementia.² AD has been studied from different angles including biochemistry, proteomics, behavior, environmental factors and genetic risks.³ However, genetic factors seem to be limited due to the low percentage of AD cases in which genetics has been involved.

However, establishing a genetic profile of AD patients followed with statistical analysis of the obtained results might provide data allowing us to link specific genes or group of genes to AD. Such approaches could lie on the current understanding of the genetic aspects of AD as a starting point. Such project could be a part of the brain projects within a context of international collaborations toward a genetic explanation of AD that will allow us to elucidate some of the unknown underlying pathways, use the identified genes to build animals models of AD⁴ and eventually test some therapeutic candidates on the built animal models.

Importantly, those genes identify as related to AD risk or the pathways related or controlled by those genes could represent therapeutic targets toward developing new AD treatments if those genetic data are combined with the pharmacology⁵ (including the traditional medicines⁶ and pharmacognosy⁷), toxicology⁸, chemistry,⁹ zoology¹⁰ and cell culture methods.^{11,12}

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Conflicts of interest

None.

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