

# Letter to the Editor

## *To the Editor*

Charles Bonnet syndrome (CBS) is a condition characterized solely by visual hallucination with insight, and dementia or psychosis is absent (1). We report a patient with this syndrome whose visual hallucinations disappeared during treatment with donepezil, an acetylcholine esterase inhibitor.

An 89-year-old woman had been suffering from reading and writing disability since cataracts had developed at the age of 86 years. Nine months before her first visit to our out-patient clinic, she had been complaining of visual hallucinations in which she saw her husband and son, who had already died, a fictitious grandson, and colourful flowers on the ceiling. She recognized these hallucinations to be unreal, and believed they were the result of her missing her husband and son and longing for a grandson. She was not amnesic. Although her MMSE score of 18 indicated mild cognitive impairment, she was not demented or psychotic. Donepezil at 5 mg/day resolved her visual hallucinations almost completely within 2 weeks.

Pliskin et al. suggested that CBS might be an early marker of dementia (2), and Terao et al. reported a patient with diffuse Lewy body disease (DLBD) whose visual hallucinations gradually diminished together with recovery of insight after initiation of donepezil (3). Cummings suggested that an imbalance between dopaminergic and cholinergic transmission underlies not only cognitive dysfunction but also neuropsychiatric symptoms such as hallucinations and delusions seen in Alzheimer's disease (AD) or DLBD (4). Because

donepezil was effective for treating the visual hallucinations in the present case of CBS, such a dopaminergic/cholinergic imbalance may have been responsible for the pathophysiology, which might be similar to that of the cognitive dysfunctions and neuropsychiatric symptoms seen in AD or DLBD. The present case suggests that CBS might be an early manifestation of these dementias.

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## References

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