

IoT Assistant-Based Secured System for Alzheimer's Disease

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Abstract: *In many countries, the rise in the count of Alzheimer's disease (AD) is an indication that concerns. In order to prevent, detect and help people with AD, new techniques are required. These changes result in a decline in thinking ability, a type of intellectual capacity that is severe enough to interfere with daily life and independence. Relationships, emotions, and conduct are all impacted. When they lose track of familiar individuals or their connections to them, those with Alzheimer's disease are put in an awkward predicament. They tend to remain silent and avoid interacting with others on days when they are always uncomfortable, which is bad for their mental health. That makes it difficult for the patient and the guardians to stay in touch with one another. In order to protect the AD patient, the goal of this work is to build a working model for a system that provides psychological technical assistance and ensures secure transfer of data which may be inspected by a family member. The created transportable prototype can divide the identified images into two groups, including family and non-family persons, by using a Convolutional Neural Network (CNN). This framework combines the use of hardware with headphone-based IoT communication..*

Keywords: Alzheimer's disease, Convolutional Neural Network, IoT communication, intellectual capacity

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