

## **Should we prescribe medical marijuana for adult patients with drug-resistant epilepsy? No!**

**I. Blatt, Israel**

Patients with drug resistant epilepsy (DRE) are desperate to find a treatment which will relieve their seizure burden, and readily embrace promises for a magic cure propagated in the social media. When this magic bullet is not the product of pharmaceutical companies but rather a plant-derived natural substance shunned by the medical establishment, this new treatment is even more readily accepted by the lay public. However, the medical community has the responsibility to operate according to scientific principles, and recommend therapies only when they are evidence based. Every new drug application submitted to the regulatory authorities has to undergo multiple phases of rigorous testing, including carefully planned randomized, controlled clinical trials (RCTs). This strategy remains the gold standard of drug development, and rightly so. Cannabidiol (CBD) does have anti-seizure properties and may prove an effective AED in the future, but so far data are lacking both regarding efficacy in other epilepsies beside Dravet and Lennox-Gastaut syndromes, and also regarding long term safety and cognitive adverse effects. No molecule presumed to be a potential AED should be allowed to simply bypass the whole regulatory process, and CBD is no exception to this rule. A 2014 Cochrane review stated that "no reliable conclusions can be drawn at present regarding the efficacy of cannabinoids as a treatment for epilepsy". A 2018 review concluded that existing RCT evidence is mostly in pediatric samples with rare and severe epilepsy syndromes; RCTs examining other syndromes and cannabinoids are needed. Until such information becomes available neurologists should not prescribe medical marijuana to adult patients with DRE.