

Ethosuximide

Ethosuximide is an anticonvulsant medication used to treat absence seizures, or petit mal seizures, which are mostly seen in school-age children. This drug is a first line agent for this neurological disorder, and is preferred over similar drugs because it does not cause hepatotoxicity. The mechanism of action for ethosuximide is blocking thalamic t-type Ca^{2+} channels, leading to decreased neuronal transmission. Side effects of this drug include Stevens-Johnson syndrome, which is a life-threatening skin and mucous membrane hypersensitivity reaction, fatigue, and diarrhea, while constipation can occur in some.



PLAY PICMONIC

Indications

First Line Absence Seizure Treatment

[First-place Absent-mind Caesar](#)

Ethosuxamide is used as a first line agent to treat absence seizures (petit mal seizures), and is preferred over other agents because this drug does not cause hepatotoxicity.

Mechanism of Action

Blocks Thalamic T-Type Ca^{2+} Channels

[Block-guy blocking Thor-T on Calcium-cow at Channel](#)

This medication binds and blocks thalamic T-type Ca^{2+} channels. T-type channels serve pacemaking functions in both central neurons and support calcium signaling, and are also involved in the modulation of firing patterns of neurons.

Side Effects

Stevens-Johnson Syndrome

[Steve-Johns](#)

Ethosuxamide can trigger Stevens-Johnson syndrome. Stevens-Johnson syndrome is a life threatening skin condition, which is a hypersensitivity complex affecting the skin and mucous membranes.

Fatigue

[Sleepy-guy](#)

Patients taking ethosuximide can complain of fatigue, as this is a common side effect.

Diarrhea

[Toilet](#)

Patients taking this drug often have the side effect of diarrhea and GI upset. Constipation can also occur.