

AAN 2022 PERIPHERAL NEUROPATHY GUIDELINES SUMMARY

David Rakel MD, FAAFP, Primary Care, January 13, 2022. <https://www.practiceupdate.com/content/oral-and-topical-treatment-of-painful-diabetic-polyneuropathy-aan-guideline-update/129054>

(This is another summary article of the updated AAN guidelines. The chart is new and there are examples of oral and topical combination therapy.)

The guidelines summarize classes of medicine based on their effect and the confidence of the effect. Below is a summary.

CLASS OF MEDICATION	EFFECT	CONFIDENCE
Oral		
Tricyclics	Large	Low
Gabapentinoids	Moderate	Moderate
Serotonin norepinephrine reuptake inhibitors (SNRIs)	Moderate	Moderate
Sodium channel blockers	Moderate	Moderate
Ginkgo biloba	Large	Low
Topical		
Glyceryl trinitrate spray	Large	Low
Citrullus colosynthis	Large	Low
Capsaicin	Small	Low

Glyceryl trinitrate is a nitrate spray that causes vasodilation. This and Ginkgo biloba both work by improving circulation through promoting nitric oxide. Colocynth oil comes from a watermelon-like plant, which, when used topically, can improve pain but should be avoided orally.

The guidelines encourage realistic expectations. Patients often want complete relief, but a more pragmatic expectation is 30%. Sleep disturbance is also a common comorbidity, so consider dosing before bed and combining oral and topical treatments.

Examples to start with include titrating oral gabapentin to 900 mg or amitriptyline to 75 mg at bedtime combined with topical glyceryl trinitrate spray (nitroglycerin sublingual) spray 400 mcg to the top of both feet at bedtime (this is the same medicine used under the tongue for angina). Or you can use nitroglycerin 2% topical ointment, 1 inch to each foot at bedtime. Have patients wear gloves when applying, so they don't get a headache. You can also use colocynth oil, but this is harder to find. Capsaicin 8% patch can also be used but requires a topical anesthetic to be applied before application.

Although these guidelines did not discuss prevention, reducing the progression of peripheral neuropathy is also important. Maintaining good glucose control in diabetics is an obvious goal, and consider adding the strong antioxidant, alpha-lipoic acid 600 mg daily, which is supported by a meta-analysis and a good safety profile, and may also improve insulin sensitivity.