

# Combining nortriptyline and morphine provides better pain relief than using either drug alone

April 7 2015

---

The combination of two well-known drugs will have unprecedented effects on pain management, says new research from Queen's.

Combining morphine, a narcotic [pain](#) reliever, and nortriptyline, an antidepressant, has been found to successfully relieve [chronic neuropathic pain](#) - or a localized sensation of pain due to abnormal function of the nervous system - in 87 per cent of patients, and significantly better than with either drug alone.

"Chronic pain is an increasingly common problem and can exert disastrous personal, societal, and socio-economic impacts on patients, their families, and their communities," says Ian Gilron, lead author of the study. "Current [neuropathic pain](#) treatments are ineffective or intolerable for many sufferers so this new evidence supporting the morphine-nortriptyline combination is important news for patients."

During the study, average daily pain was measured using a patient's numerical rating of pain on a validated scale from 0 - 10. It was found that average daily pain before treatment was 5.6, which dropped to 2.6 when the patient was receiving the drug combination. On average, patients taking nortriptyline and morphine alone rated their pain at 3.1 and 3.4, respectively.

It was also found that common side effects for both drugs, which can

include constipation and dry mouth, did not worsen during the combination treatment.

"It's important to remember that we don't want to completely eliminate patients' ability to sense pain as it's a warning system for us, but we do want to find the right balance of [pain relief](#) and drug side effects," says Dr. Gilron, a professor in Queen's School of Medicine and anesthesiologist at Kingston General Hospital. "Morphine and nortriptyline are excellent candidates for [pain management](#) because of the extensive research conducted on them, their low cost, and widespread availability all over the world."

In the double-blind, randomized crossover study, every patient had the opportunity to try every one of the three treatments: the combination, morphine alone and [nortriptyline](#) alone in each of the three six-week treatment periods. Throughout each treatment period, patients attended follow-up assessments to record their pain levels and side effects.

This research was published in *Pain*, the highest impact pain journal globally.

Provided by Queen's University

Citation: Combining nortriptyline and morphine provides better pain relief than using either drug alone (2015, April 7) retrieved 1 April 2023 from <https://medicalxpress.com/news/2015-04-combining-nortriptyline-morphine-pain-relief.html>

<p>This document is subject to copyright. Apart from any fair dealing for the purpose of private study or research, no part may be reproduced without the written permission. The content is provided for information purposes only.</p>
--