

Findings support lower doses of atropine in pediatric myopia Rx

May 18 2017



(HealthDay)—Adverse effects are less frequent at lower doses of

atropine, and higher doses are not more effective in reducing progression of myopia in children, according to a meta-analysis published online May 11 in *JAMA Ophthalmology*.

Qianwen Gong, M.D., from Sichuan University in Chengdu, China, and colleagues examined the efficacy versus the [adverse effects](#) of [atropine](#) in treatment of myopia in children in [randomized clinical trials](#) and cohort studies. Data were included for 19 unique studies with 3,137 unique children, aged younger than 18 years.

The researchers found that the weighted mean differences between the atropine and control groups in myopia progression were 0.50, 0.57, and 0.62 diopters per year for low-, moderate-, and high-dose atropine, respectively (P of 0.97, 1.76, and 1.94, respectively). With respect to [myopia](#) progression, all doses of atropine were equally beneficial (P = 0.15). There were more adverse effects with high-dose atropine (incidence of photophobia, 43.1, 17.8, and 6.3 percent, respectively, for high-, moderate-, and low-dose atropine; P = 0.03). There were no differences in the incidence of adverse effects between Asian and white patients (P = 0.37 for photophobia).

"This meta-analysis suggests that the efficacy of atropine is dose independent within this range, whereas the adverse effects are dose dependent," the authors write.

More information: [Abstract/Full Text \(subscription or payment may be required\)](#)

Copyright © 2017 [HealthDay](#). All rights reserved.

Citation: Findings support lower doses of atropine in pediatric myopia Rx (2017, May 18) retrieved 17 February 2023 from <https://medicalxpress.com/news/2017-05-doses-atropine->

pediatric-myopia-rx.html

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.