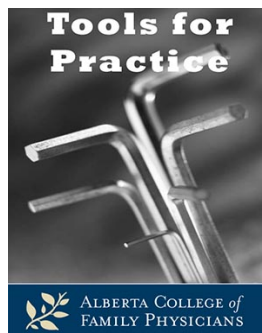


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## What can't they do: Steroids for my sore throat?

**Question: Do corticosteroids reduce pain in patients with acute pharyngitis?**

**Bottom-line: Corticosteroids (when added to antibiotics) reduce pain in patients with sore throats. For every four patients treated, one additional patient will be pain free at 24 hours, especially in adults with documented streptococcus pharyngitis and more severe symptoms.**

### Evidence:

- Highest quality systematic review (published twice).<sup>1,2</sup>
  - Eight randomized placebo-controlled trials (RCTs) of single-dose oral or intramuscular steroids (commonly dexamethasone) in 743 children or adults with sore throats.
    - Patients given steroids were more likely pain free at:
      - 24 hours [39% vs. placebo 12%, number needed to treat (NNT)=4].
      - 48 hours [76% vs. 47%, NNT=4].
    - Pain relief onset ~6 hours faster.
  - Adults, patients with group A streptococcus (GAS), and those with more severe symptoms seem to benefit more.
  - Limitations:
    - Potential confounders (e.g. analgesic use) not always reported.<sup>3,4,5</sup>
    - Treatment differed from normal clinical practice:
      - All patients in adult studies were given antibiotics, often without throat swabs.<sup>1</sup>
  - Other reviews found similar results.<sup>6,7</sup>
- Highest quality/most relevant RCTs (similar baseline characteristics, more complete reporting, and used oral dexamethasone):
  - Pediatrics: 184 children in Canadian emergency department with <48 hours of moderate sore throat found dexamethasone (0.6mg/kg, max 10mg):<sup>8</sup>
    - Decreased time to pain relief by 5.5 hours in GAS positive patients, but increased time to pain relief by four hours (not statistically significant) in GAS negative patients.

- Adults: 120 patients in American emergency department with moderate-severe sore throat (all given antibiotics, ~33-43% GAS positive)<sup>9</sup> found that patients given 10mg dexamethasone were:
  - More likely pain free at 24 hours (29.3% vs. 11.1%, NNT=6).

**Context:**

- Most sore throats resolve in 2-5 days.<sup>10</sup>
- Steroid adverse events: No differences reported<sup>1,2</sup> but concerns about using in patients who actually have leukemia or lymphoma.<sup>11</sup>
- Current guidelines do not recommend steroids for pharyngitis.<sup>12</sup>

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**Disclosure:**

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