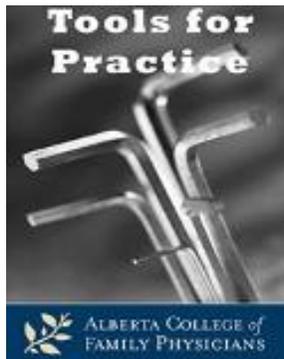


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[\(en français\)](#)



Antispasmodics and peppermint oil: Old news or a breath of fresh air in managing Irritable Bowel Syndrome

Clinical Question: Are antispasmodics (including peppermint oil) effective in treating irritable bowel syndrome symptoms?

Bottom Line: Approximately 60% of patients report overall symptom or abdominal pain "improvement" on antispasmodics (including peppermint oil), compared to ~30-50% on placebo, with numbers needed to treat of 3-8. Compared to placebo, adverse events occur for an additional 1 in 20 with antispasmodics and 1 in 11 on peppermint oil.

Evidence:

- 3 Systematic Reviews:
 - 29 randomized controlled trials (RCTs), 2333 patients, various antispasmodics, including peppermint oil.¹ Patient reported outcomes after 1 week to 6 months:
 - Overall "symptom improvement": 57% versus 39% placebo; number needed to treat (NNT)=6.
 - Abdominal pain "improvement": 58% versus 46% placebo; NNT=8
 - Older systematic review (13 RCTs, 1379 patients). Outcomes at 2 weeks-6 months similar.² Adverse events (dry mouth, dizziness, blurred vision reported):
 - 14% versus 9% placebo; number needed to harm (NNH)=20.
 - Systematic review of peppermint oil alone (9 RCTs, 726 patients, 2-12 weeks duration).³
 - Overall "symptom improvement": 69 versus 31% placebo; NNT=3.
 - Abdominal pain "improvement": 57% versus 27% placebo; NNT=4.
 - Overall adverse events (including heartburn, dry mouth, peppermint smell/taste):
 - 22% versus 13% placebo; NNH=11.
- Newest RCTs:
 - 712 patients randomized to hyoscine, hyoscine + acetaminophen, acetaminophen, or placebo for four weeks.⁴ Paper translated by TFP authors.
 - "Slight" or "significant" symptom improvement: hyoscine + acetaminophen=81%, hyoscine=76%, acetaminophen=72%, placebo=64%;

- Hyoscine groups statistically better than placebo.
 - Adverse events: 5% overall.
 - 427 patients given pinaverium 50mg or placebo TID.⁵ After 4 weeks:
 - >30% improvement in abdominal pain: 62% versus 30% placebo; NNT=3.
 - 72 patients given peppermint oil tablets or placebo.⁶ After 4 weeks:
 - Mean reduction 4-point symptom score: ~1.2 peppermint oil versus 0.7 placebo.
- Limitations: small studies,^{1,2} short durations,¹ multiple/incomplete outcomes reported^{1,4}, conflicts of interest/industry funding^{3,6}, use of non-validated scales.⁶

Context:

- Large placebo response often seen in IBS studies.⁷
- Guidelines recommend considering antispasmodics^{8,9} or peppermint oil⁸ in IBS patients.
- Antispasmodics in Canada include hyoscine, pinaverium, trimebutine, dicycloverine, peppermint oil.
 - Cost varies significantly
 - Peppermint oil ranges ~\$60 to \$360 for 3 months.¹⁰

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Disclosures:

Authors have no conflicts to declare.

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