

Stomach aches and pains

W Rabbets
BPharm

Amayeza Info Services

Corresponding author, email: wilna@amayeza-info.co.za

Belly pain, a common ailment across all ages, often triggers the urge for quick relief. Hyoscine butyl-bromide (HBB), known by brands like Buscopan, emerges as a potential solution, promising to relax muscles and ease cramps. This article delves into the world of HBB for belly pain, examining its effectiveness in specific conditions such as irritable bowel syndrome and menstrual cramps. It also sheds light on limitations and potential side effects, emphasising the importance of responsible use under medical guidance.

Keywords: stomach aches, pains

© Medpharm

Prof Nurs Today 2024;28(1):24-25

Exploring the efficacy and limitations of hyoscine butyl-bromide for belly pain symptoms

Belly pain, a universally unpleasant experience, can range from a mild grumble to a debilitating cramp. It is unfortunately a very common experience. While self-treatment might be tempting, understanding the type of pain and its potential causes is crucial for seeking appropriate relief.

Ways to describe stomach pain include:

- Generalised pain – This is pain that is felt in more than half of the abdomen. This type of pain is more typical of a stomach virus, indigestion, or gas. If the pain becomes more severe, it may be caused by a blockage of the intestines.
- Localised pain – This is pain found in only one area of the abdomen. It is more likely to be a sign of a problem in an organ, such as the appendix, gallbladder, or stomach.
- Cramp-like pain – This type of pain is mostly not serious. It is likely to be caused by gas and bloating and is often followed by diarrhoea. Menstrual pain can also fall in this group and is felt in the lower part of the abdomen. If this type of pain occurs more often, or coincides with a fever, it is more serious and the patient should be referred to the doctor.
- Sharp or sudden colicky pain – This type of pain often comes in waves and can start and end suddenly. It could indicate appendicitis, gallstones or kidney stones and a patient should seek immediate medical attention if these symptoms are accompanied by fever, nausea, or vomiting.^{1,2,3}

Treatment

Hyoscine butyl-bromide (HBB), also known by brand names like Buscopan, is a popular medication used to relieve cramping abdominal pain. It works by relaxing the smooth muscles in the digestive tract, offering temporary relief for certain types of belly pain.^{4,5} However, it's crucial to understand both its efficacy and limitations before self-medicating or advising patients on its use. Nurses are often on the front lines of managing abdominal pain, and HBB is a frequently used medication for this purpose.

Efficacy

HBB works by relaxing smooth muscles in the digestive and urinary tracts, potentially relieving crampy pain caused by irritable bowel syndrome (IBS), menstrual cramps, or muscle spasms. It can also offer temporary relief from pain caused by bladder spasms.^{4,6} Studies suggest moderate to good efficacy for cramps, particularly in the short term.⁵ HBB may also help reduce discomfort associated with stomach cramps during gastritis flare-ups.

Oral HBB starts working within 15–30 minutes, offering quick relief for acute pain episodes.^{2,6} Compared to other antispasmodics, HBB has a relatively low side effect profile due to its minimal systemic absorption.⁷ HBB is available in several formulations for use by infants through to adults^{4,8} and because it is available over-the-counter it is easily available to patients as a self-management option for belly pain for the whole family.⁸

Limitations and precautions

HBB is not a cure and primarily provides symptomatic relief of cramping pain and does not address the underlying cause. It will not help with pain caused by inflammation, infection, or ulcers and could even mask symptoms of serious conditions, delaying proper diagnosis. HBB is not for everyone and people who have glaucoma, gastrointestinal obstruction, porphyria⁹ or urinary retention should not take HBB to treat abdominal pain.^{4,6}

Adverse effects are rare at therapeutic doses and the product is generally well-tolerated. Potential side effects include dry mouth, constipation, urinary retention, drowsiness, and blurred vision. In rare cases, it may cause paradoxical stimulation and excitation.^{4,6}

A doctor should be consulted if abdominal pain is severe, persistent, or accompanied by other symptoms like fever, vomiting, or bloody stools.^{1,3}

Conclusion

In summary, HBB (Buscopan) is a valuable medication for managing abdominal pain associated with various gastrointestinal conditions. As nurses, it is essential to have a comprehensive understanding of its indications, administration, dosage, monitoring, and patient information. By effectively utilising Buscopan as part of a holistic approach

to pain management, nurses can help improve patient comfort and quality of life.

References

1. Villines Z, Varma A. Sharp stomach pain that comes and goes: 10 causes. *Medical News Today*. 2023. Available at: <https://www.medicalnewstoday.com/articles/325078>. Accessed: 22 February 2024.
2. Phillips MM. Abdominal pain: Medlineplus medical encyclopedia, MedlinePlus. 2022. Available at: <https://medlineplus.gov/ency/article/003120.htm>. Accessed: 22 February 2024.
3. Abdominal pain. *Healthdirect*. 2021 Available at: <https://www.healthdirect.gov.au/abdominal-pain#>. Accessed: 22 February 2024.
4. Stewart M. Hyoscine butylbromide tablets - buscopan. (side effects, dosage), *Patient.info*. 2023. Available at: <https://patient.info/medicine/hyoscine-butylbromide-tablets-buscopan>. Accessed: 22 February 2024.
5. Tytgat GN. Hyoscine butylbromide: A review of its use in the treatment of abdominal cramping and pain. *Drugs*. 2007. Available at: <https://pubmed.ncbi.nlm.nih.gov/17547475>. Accessed: 22 February 2024.
6. NHS choices. 2021. Available at: <https://www.nhs.uk/medicines/buscopan-hyoscine-butylbromide/>. Accessed: 22 February 2024.
7. Corsetti M, Forestier S, Jimenez M. Hyoscine butylbromide mode of action on bowel motility: ..., *Wiley Online Library*. 2022;35(4):e14451. <https://doi.org/10.1111/nmo.14451>.
8. Rossiter D, Blockman M, Barnes KI. *South African Medicines Formulary*. Cape Town: South African Medical Association. 2022.
9. Abdominal pain in porphyria: University of Cape Town (no date) *Porphyria South Africa*. Available at: <https://porphyria.uct.ac.za/porphyria-professionals/acute-symptoms/abdominal-pain-porphyria>. Accessed: 22 February 2024.