

ENTONOX[®]

Everything a parent-to-be
needs to know



Safe and effective pain relief

- ENTONOX®, a ready-to-use gas mixture consisting of 50% nitrous oxide and 50% oxygen, is an effective method of pain relief for mothers who want to remain in control during labour and as far as possible ensure a natural birth experience^{1,2}
- ENTONOX® has no known negative effects on the baby¹
- There are no known negative effects on breathing, circulation, the ability to push, or other bodily functions^{3,4}
- The benefits of ENTONOX® are gained quickly, and the gas and its effects are rapidly eliminated from the body⁵
- ENTONOX® does not prevent mothers from moving freely during labour
- ENTONOX® can be combined with all other methods of pain relief
- ENTONOX® is one of the most commonly used methods of pain relief during childbirth



What is ENTONOX®?

There are two different methods of pain relief available to mothers during childbirth:

- Systemic opioids, eg. morphine
- Regional analgesia, eg. ENTONOX® and epidural anaesthesia

Although ENTONOX® does not completely eliminate the pain of contractions it makes them more manageable, enabling mothers to remain in control while reducing their feelings of anxiety¹.

How does it compare with other methods of pain relief?

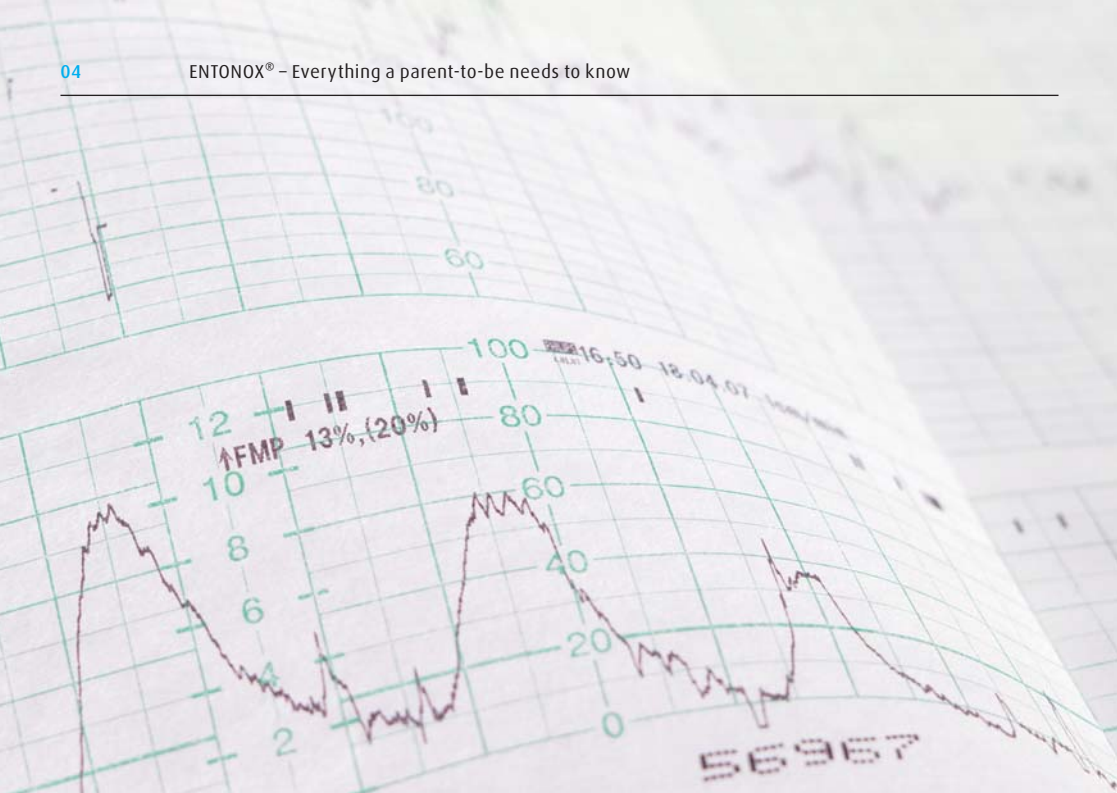
ENTONOX® takes effect within the brain and spinal cord, reducing pain sensations. It is fast and effective: the onset of pain relief is gained within two to three minutes.

ENTONOX® is a commonly used alternative to epidurals or systemic opioids such as Pethidine. After cessation of administration all effects wear off rapidly¹.

How should ENTONOX® be used?

ENTONOX® is self-administered and that gives mothers control over when they want their pain relief to take effect. A demand valve is used to deliver the gas and mothers have the choice of using a mouthpiece or facemask to inhale the gas mixture, whichever they prefer. You should advise them on how to correctly use the equipment^{1,6}.





When should mothers start using ENTONOX®?

Either you or the doctor will supervise the use of ENTONOX®. There are no limits on when to use ENTONOX®. It can be used during early labour to help mothers cope with labour pains and, if required, for uncomfortable vaginal examinations.

It is mostly used towards the end of the first stage of labour to provide pain relief during contractions. It can also be used during the second stage of labour. Mothers will find it helps if there is a premature urge to push and their cervix is not fully dilated. Using ENTONOX®, changing position, and amending their breathing technique will help eliminate the urge to push⁶.

The only time that ENTONOX® is not normally used is at the point of birth as the mother will need to push and participate fully in the birthing process.

How soon does ENTONOX® take effect?

The best time for mothers to start breathing ENTONOX® is when their uterus begins to tighten prior to a contraction. They shouldn't expect immediate results though. It takes about 30 seconds for the initial effects of ENTONOX® to be felt, with full relief after about two to three minutes.

By keeping track of their contractions mothers can time their ENTONOX® intake for maximum effect. If they start breathing in ENTONOX® at the first sign of a contraction, the gas should reach peak effect at the height of a contraction.

If they stop inhaling ENTONOX® at the height of a contraction, they will avoid feeling the full effect of the drug between contractions and reduce the likelihood of undesirable effects, for example drowsiness.



What effect will ENTONOX® have on the baby?

ENTONOX® is known to cross the placenta but has no known negative effects on the baby. In fact the oxygen part of ENTONOX® may help increase the levels of oxygen in the bloodstream, which ultimately will pass via the placenta to the baby. This is good for the baby, especially during a labour contraction^{2, 7, 8}.

Are there any side-effects?

Some mothers experience certain side effects, but these usually wear off quickly after cessation of administration. It is often difficult to tell if these side-effects are caused by labour or from breathing ENTONOX®.

Many mothers comment on feelings of lightheadedness during administration and sometimes nausea can be experienced.

Mothers sometimes complain of a dry mouth, so they may wish to have a glass of water to sip or small ice cubes to suck. They may experience a tingling sensation, usually in their fingers. This is due to hyperventilation (overbreathing). You can help by reminding them of their breathing exercises – if they sigh out slowly this will automatically lead to rhythmical breathing.

How soon does ENTONOX® wear off?

The effects wear off rapidly after cessation of administration.

Can ENTONOX® be used at any other time?

There are no limits on when to use ENTONOX® and it can be safely used in combination with all other analgesic techniques¹.



References

1. Rooks JP. Nitrous oxide for pain in labor – why not in the United States? Birth. 2007 March; 34(1):3–5.
2. Rosen MA. Nitrous oxide for relief of labor pain: a systematic review. Am J Obstet Gynecol. 2002 May; 186(5 Suppl Nature):S110–26. Review.
3. O’Sullivan I, Bengner J. Nitrous oxide in emergency medicine. Emerg Med J. 2003 May; 20(3):214–7. Review.
4. Faddy SC, Garlick SR. A systematic review of the safety of analgesia with 50% nitrous oxide: can lay responders use analgesic gases in the prehospital setting? Emerg Med J. 2005 Dec; 22(12):901–8. Review.
5. Lindblam A, Jansson O, Jeppsson B, Tornebrandt K, Benoni C, Hedenbro JL. Nitrous oxide for colonoscopy discomfort: a randomized double-blind study. Endoscopy. 1994. Mar; 26(3): 282–6.
6. Bishop JT. Administration of nitrous oxide in labor: expanding the options for women. J Midwifery Women’s Health. 2007 May–June; 52(3):308–9.
7. Davies JM, Hogg M, Rosen M. Maternal arterial oxygen tension during intermittent inhalation analgesia. Br J Anaesthesia. 1975; 47: 370–377.
8. Huch A, Huch R, Schneider H, Rooth G. Continuous transcutaneous monitoring of fetal oxygen tension during labour, British Journal of Obstetrics & Gynaecology. 1977: 84(51) p.39

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