IRISH MEDICINES BOARD

Restrictions to the use of Short Acting Beta Agonists (SABAs) in obstetric indications

The European Medicines Agency's Pharmacovigilance Risk Assessment Committee (PRAC) has recommended restricting the use of Short Acting Beta Agonists (SABAs) in obstetric indications. The Committee recommended that these agents no longer be used in oral or suppository forms in obstetric indications, such as for suppressing premature labour or excessive labour contractions. However, the Committee has recommended that injectable forms of these medicines should remain authorised for short-term obstetric use under specific conditions. In Ireland, only injectable forms of these medicines[1] are licensed for use in obstetric indications.

Given the known risk for cardiovascular adverse effects (such as tachycardia and arrhythmia) with high doses of SABAs, the medicines used in obstetric indications already carry safety warnings in their prescribing information and must not be used in patients with a history or a risk for cardiovascular disease. The PRAC assessed the available data from clinical studies, post-marketing reports, and the published literature and considered the relevant treatment guidelines. The committee concluded there was a risk for serious cardiovascular adverse effects for both the mother and unborn baby when SABAs are used in obstetric indications, with the data suggesting these mostly occur with prolonged use. No statistically significant effect of tocolysis on perinatal mortality or morbidity has been observed in randomised, controlled trials. Given that SABAs are associated with serious and dose dependent adverse events, predominantly cardiovascular, that are observed in both the mother and foetus, there is insufficient evidence to support the use of prophylactic oral beta-mimetics for preventing preterm birth in women at high risk of preterm labour with a singleton or twin pregnancy. Given the cardiovascular risks and the very limited data of supporting the benefits of SABAs used via the oral or rectal route as short or longer term tocolytics, the PRAC concluded that their risks were greater than the benefits in obstetric indications and therefore should no longer be used.

Parenteral SABAs are efficacious in the rapid relaxation of the uterus. Women most likely to benefit from the use of tocolytic drugs are those who are at very preterm labour. The delay in preterm labour achieved may be used to implement other measures known to improve perinatal health. Similarly, the use of SABAs in emergency conditions and to enable external cephalic version (ECV) is supported as this reflects limited duration of use, and minimal dosing. On the basis of the evidence evaluated, PRAC has concluded that the benefits of parenteral SABA formulations exceeds the risks in the obstetric indication of tocolysis in the short-term only, limited to a maximum of 48 hours for patients between 22 and 37 weeks of gestation and under specialist supervision. In order to minimise and manage risk to mothers and the foetus, PRAC also recommended that use in tocolysis should be subject to appropriate pre-treatment screening and patient monitoring in order to identify the early onset of cardiovascular events and further minimise risk of a serious cardiovascular event.

Advice to healthcare professionals

- The use of parenteral SABAs should be limited to 48 hours maximum and should be administered under specialist supervision in all authorised obstetric indications (see product information).
- SABAs are associated with serious, sometimes fatal, adverse cardiovascular events in both the mother and the foetus/newborn.
- Parenteral SABAs should not be used in women with a history of heart disease or in conditions where prolongation of the pregnancy is hazardous to the mother or foetus.

Key message

- Due to the risk of cardiovascular events in both the mother and the foetus, parenteral SABAs should be limited to short term use (up to 48 hours) and used under specialist supervision in all authorised obstetric indications.
- Parenteral SABAs should not be used in women with a history of heart disease or in conditions where prolongation of the pregnancy is hazardous to the mother or foetus.

[1] *Parenteral SABAs authorised for the management of tocolysis in Ireland are Ventolin 500mcg/ml solution for injection, Ventolin 1mg/ml concentrate for solution for intravenous infusion and Bricanyl 500mcg/ml solution for injection or infusion.*

Further details are available at www.imb.ie.