

Use of Intradermal Lidocaine & Topical Anaesthetics to Ease Cannulation Pain - Teaching Points for Nurses & Clerical Staff

Limit the use of topical anaesthetics

Many patients do not report experiencing severe discomfort with cannulation and do not require intradermal lidocaine or a topical anaesthetic.

Intradermal lidocaine and topical anaesthetics are expensive and there is no published evidence to support widespread or universal use. Moreover, the use of these agents has been associated with transient cutaneous vasoconstriction, which has posed concerns of potentially more difficult venous access. They have, however, been shown to be effective in patients where significant pain or a fear of needles may be an impediment to successful dialysis.

BC Renal (BCR)-funded topical anaesthetics

BCR funds 2 topical anaesthetics for patients that meet specific criteria:

1. Lidocaine 2.5%/ prilocaine 2.5% (EMLA®); and
2. Liposomal lidocaine 4% (Maxilene-4®)

Criteria for patients to have their topical anaesthetic covered by BCR funding:

1. Patients in whom cannulation has been attempted using intradermal lidocaine®* and the patient continues to complain of significant pain; OR

2. Patients who have small, shallow or young fistulas (more difficult to inject intradermal lidocaine®); OR
3. Patients who have a severe fear of needles (precluding the use of intradermal lidocaine); OR
4. Children 19 and under.

*With the exceptions noted above, intradermal lidocaine should be considered first for cost reasons.

Topical anaesthetic must be ordered by a nephrologist using the pre-printed “Order Form for Topical Anaesthetics”. Order is faxed to and filled by the patient’s community BCR pharmacy.

Side effects: Rare and may include whitening or redness of the skin and slight puffiness and initial burning or itching on the skin where the cream is applied. These are normal reactions and will disappear without treatment.

Instructions for patients on the application of topical anaesthetics:

Refer to [BCRrenal.ca/resource-gallery/Documents/Topical_Anaesthetics-Emla.pdf](https://www.bcrenal.ca/resource-gallery/Documents/Topical_Anaesthetics-Emla.pdf)