



1. Overview
 - a. Cryosurgery is a procedure that exposes skin lesions to extreme cold to produce cell injury and destruction. The term comes from the Greek words *cryo* (icy cold) and *surgery* (handiwork).
 - b. The most common skin lesions designated for removal by cryosurgical methods in children include: warts (Verrucae), Molluscum contagiosum, and other benign lesions
 - c. Options to cryosurgery for treatment of warts in children include duct tape, and salicylic acid patches.
2. Goal of the Procedure
 - a. To remove lesions for cosmetic reasons
 - b. To remove lesions causing discomfort
3. References
 - a. [Bruggink, S. C., Gussekloo, J., Berger, M. Y., Zaaijer, K., Assendelft, W. J. J., de Waal, M. W. M., ...Eekhof, J. A. H. \(2010\). Cryotherapy with liquid nitrogen versus topical salicylic acid application for cutaneous warts in primary care: randomized controlled study. *Canadian Medical Association Journal*, 182\(15\), 1624-1630.](#)
 - b. [de Haen, M., Spigt, M. G., van Uden, C. J. T., van Neer, P., Feron, F. J. M. & Konttnerus, A. \(2006\). Efficacy of duct tape vs placebo in the treatment of verruca vulgaris \(warts\) in primary school children. *Archives of Pediatric Adolescent Medicine*, 160, 1121-1125.](#)
4. Required Reading / Review
 - a. [Freezing a big wart off a knee with liquid nitrogen! \(kid does not even blink\). You Tube Video, Paul Thomas, M.D. \(Posted March 3, 2018\)](#)
 - b. [Zimmerman, E. E., & Crawford, P. \(2012\). Cutaneous cryosurgery. *American Family Physician*, 86\(12\), 1118-1124.](#)
5. Required Procedure Competencies
 - a. Properly perform cryo on a lesion