Zelsuvmi (berdazimer topical gel, 10.3%)

Summary

Molluscum contagiosum (molluscum) is a widespread skin infection caused by the molluscum virus, a dermatotropic DNA poxvirus. This condition predominantly affects children and is common worldwide. The infection results in small, flesh-colored papules and papulovesicles, measuring 1-4 mm across, which usually have a distinct umbilicated or dimpled center. These papules are typically not accompanied by much inflammation; however, when an inflammatory response is observed, it often signals the start of disease resolution.

- Although molluscum lesions are generally painless, they might itch or become irritated. Scratching or picking at the bumps can lead to autoinoculation, scarring, or secondary bacterial infections.
- The primary mode of molluscum transmission is through direct person-to-person contact or by autoinoculation. Indirect transmission can occur through touching contaminated items like towels, clothes, or toys.
- In immunocompetent individuals, molluscum contagiosum often resolves spontaneously within 6 to 12 months. Treatment may be warranted to decrease spread, relieve symptoms, or reduce duration.
- Immunocompromised individuals are at a higher risk of extensive and persistent disease.

Molluscum contagiosum is often self-limiting in immunocompetent individuals, but decision to treat may be based on risk of inoculation (to self or others via open lesion or sexual transmission in the case of genital lesions). If one chooses to treat molluscum contagiosum, management options include cryotherapy, curettage, Ycanth (cantharidin) topical solution, or podophyllotoxin. Limited data is available for other therapies (e.g., Zelsuvmi [berdazimer], imiquimod, potassium hydroxide, topical retinoids).

Zelsuvmi (berdazimer topical gel, 10.3%) is a new topical treatment for molluscum contagiosum in those 1 year and older. Zelsuvmi (berdazimer topical gel, 10.3%), is a nitric-oxide releasing agent, however the exact mechanism of action is unknown. The Plan has reviewed available evidence for Zelsuvmi (berdazimer topical gel, 10.3%) and determined that it provides modest incremental benefit over vehicle gel for achieving complete clearance of molluscum lesions after 12 weeks of treatment. Overall, Zelsuvmi (berdazimer topical gel, 10.3%) has not been conclusively proven superior to standard treatments or active non-intervention for this self-limited condition.

Definitions

"Immunocompetent" means having a functional immune system, not weakened by disease or medication.

"Immunosuppression" refers to a state where the immune system is suppressed, either by specific conditions like HIV, medications, or malignancies.

"Molluscum Contagiosum" is a viral skin infection caused by the molluscipox virus resulting in small, raised, typically painless bumps on the skin.

Policy Statement on Zelsuvmi (berdazimer topical gel, 10.3%) Efficacy

While Zelsuvmi (berdazimer sodium) gel 10.3% represents a novel topical treatment option for molluscum contagiosum, the available evidence from the clinical trials is not consistent or robust enough to consider it proven or medically necessary at this time. Across the three phase 3 studies, efficacy results were mixed, with one trial showing clear benefit, and two failing to demonstrate a significant treatment effect. Even in the positive trial, the magnitude of benefit over vehicle gel was modest (e.g. 32.4% vs 19.7% in NI-MC-304, a 12.8% difference).

Efficacy was studied in 3 clinical trials B-SIMPLE 4, B-SIMPLE 2, and B-SIMPLE 1

- B-SIMPLE 4 (N=891) (NCT04535531):
    - Primary endpoint (complete clearance at Week 12): Berdazimer statistically superior to vehicle (32.4% vs 19.7%, $p<0.0001$).

        - Treatment difference: 12.8% (95% CI: 7.1% to 18.6%, number needed to treat [NNT] = 8)
    - Key secondary endpoint (complete clearance at Week 8): Berdazimer statistically superior (19.6% vs 11.6%, p=0.0012).
        - Treatment difference: 7.5% (95% CI: 3.0-12.0%, NNT = 14)
- B-SIMPLE 2 (N=355) (NCT03927703):
    - Primary endpoint (complete clearance at Week 12): Berdazimer NOT statistically significant compared to vehicle (30.0% vs 20.3%, p=0.0510).
        - Treatment difference: 9.2% (95% CI: -0.04% to 18.4%).
    - Secondary endpoint (complete clearance at Week 8): Berdazimer statistically superior (13.9% vs 5.9%, treatment difference of 7.8%, NNT = 13).
- B-SIMPLE 1 (N=352) (NCT03927716):
    - Primary endpoint (complete clearance at Week 12): Berdazimer NOT statistically significant compared to vehicle (25.8% vs 21.6%, p=0.3637).
        - Treatment difference: 4.3% (95% CI: -5.0% to 13.6%).
    - Secondary endpoint (complete clearance at Week 8): Berdazimer NOT statistically superior (15.3% vs 10.3%).

Medical Necessity Criteria for Zelsuvmi (berdazimer topical gel, 10.3%)

The Plan considers Zelsuvmi (berdazimer topical gel, 10.3%) to be not medically necessary for treatment of molluscum contagiosum or any other indication, as available evidence is insufficient to determine that it provides a significant net health benefit over standard therapies or active non-intervention. See Policy Statement on Zelsuvmi (berdazimer topical gel, 10.3%) Efficacy above.

Experimental or Investigational / Not Medically Necessary

Zelsuvmi (berdazimer topical gel, 10.3%) for any indication is considered experimental, investigational, and not medically necessary as current evidence is insufficient to support conclusions regarding long-term efficacy and safety compared with standard treatment options for molluscum contagiosum. The modest benefit provided by Zelsuvmi (berdazimer topical gel, 10.3%) is not clearly superior to active non-intervention for this self-limited condition in light of potential risks. Therefore, the Plan considers Zelsuvmi to be unproven, and not medically necessary.

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Clinical Guideline Revision / History Information

Original Date: 5/29/2024

Reviewed/Revised: 10/01/2025