

Clinical Policy: Elosulfase Alfa (Vimizim)

Reference Number: PA.CP.PHAR.162

Effective Date: 01/2018

Last Review Date: 04/2026

Description

Elosulfase alfa (Vimizim[®]) is a hydrolytic lysosomal glycosaminoglycan-specific enzyme.

FDA Approved Indication

Vimizim is indicated for patients with mucopolysaccharidosis type IVA (MPS IVA; Morquio A syndrome).

Policy/Criteria

Provider must submit documentation (such as office chart notes, lab results or other clinical information) supporting that member has met all approval criteria.

It is the policy of PA Health & Wellness that Vimizim is **medically necessary** when the following criteria are met:

I. Initial Approval Criteria

A. Morquio A Syndrome (Mucopolysaccharidosis [MPS IVA]) (must meet all):

1. Diagnosis of Morquio A syndrome (MPS IVA) confirmed by one of the following (a or b):
 - a. Enzyme assay demonstrating a deficiency of N-acetylgalactosamine-6-sulfatase activity;
 - b. DNA testing.
2. Age $\geq$ 5 years;
3. Documentation of member's current weight (in kg);
4. Dose does not exceed 2 mg/kg/week.

Approval duration: 12 months

B. Other diagnoses/indications: Refer to PA.CP.PMN.53

II. Continued Approval

A. Morquio A Syndrome (MPS IVA) (must meet all):

1. Currently receiving medication via PA Health & Wellness benefit or member has previously met all initial approval criteria; or the Continuity of Care policy (PA.PHARM.01) applies;
2. Member is responding positively to therapy as evidenced by improvement in the individual member's MPS IVA disease manifestation profile including any of the following: 6-minute walking test distance, breathing difficulties, muscle weakness, vision or hearing problems, height and weight, hepatomegaly, or splenomegaly;
3. Documentation of member's current weight (in kg);
4. If request is for a dose increase, new dose does not exceed 2 mg/kg/week.

Approval duration: 12 months

B. Other diagnoses/indications (must meet 1 or 2):

1. Currently receiving medication via PA Health & Wellness benefit and documentation supports positive response to therapy; or the Continuity of Care policy (PA.PHARM.01) applies; or
2. Refer to PA.CP.PMN.53

III. Appendices/General Information

Appendix A: Abbreviation/Acronym Key

FDA: Food and Drug Administration

MPS IVA: mucopolysaccharidosis IVA

Appendix B: Therapeutic Alternatives

Not applicable

Appendix C: Contraindications/Boxed Warnings

- Contraindication(s): none reported.
- Boxed warning(s): hypersensitivity reactions including anaphylaxis and risk of acute respiratory complications

Appendix D: General Information

The presenting symptoms and clinical course of MPS IVA can vary from one individual to another. Some examples, however, of improvement in MPS IVA disease as a result of Vimizim therapy may include improvement in:

- 6-minute walking test distance
- Breathing difficulties
- Muscle weakness
- Vision or hearing problems
- Height and weight
- Hepatomegaly or splenomegaly

IV. Dosage and Administration

Indication	Dosing Regimen	Maximum Dose
MPS IVA	2 mg/kg IV once weekly	2 mg/kg/week

V. Product Availability

Single-use vial: 5 mg/5 mL

VI. References

1. Vimizim Prescribing Information. Novato, CA: BioMarin Pharmaceutical, Inc.; October 2025. Available at <http://www.vimizim.com>. Accessed January 14, 2026.
2. Muenzer J. The mucopolysaccharidoses: a heterogeneous group of disorders with variable pediatric presentations. J Pediatr. 2004; 144(5 Suppl): S27-S34.
3. Hendriksz CJ, Berger KI, Giugliani R, et al. International guidelines for the management and treatment of Morquio A syndrome. Am J Med Genet A. 2015; 167(1): 11-25.

4. Akyol MU, Alden TD, Amartino H, et al. Recommendations for the management of MPS IVA: systematic evidence- and consensus-based guidance. Orphanet J of Rare Dis 2019;14(137):1-25.
5. Stapleton M, Hoshina H, Sawamoto K, et al. Critical review of current MPS guidelines and management. Molecular Genetics and Metabolism. 2019;126:238-45.
6. Sawamoto K, Alvarez Gonzalez JV, Piechnik M, et al. Mucopolysaccharidosis IVA: diagnosis, treatment, and management. Intl J Molecular Sciences. 2020;21:1517; doi:10.3390/ijms21041517.

Coding Implications

Codes referenced in this clinical policy are for informational purposes only. Inclusion or exclusion of any codes does not guarantee coverage. Providers should reference the most up-to-date sources of professional coding guidance prior to the submission of claims for reimbursement of covered services.

HCPSC Codes	Description
J1322	Injection, elosulfase alfa, 1 mg

Reviews, Revisions, and Approvals	Date
2Q 2018 annual review: age restriction added; references reviewed and updated.	02/2018
2Q 2019 annual review: references reviewed and updated.	04/2019
2Q 2020 annual review: references reviewed and updated.	04/2020
2Q 2021 annual review: references reviewed and updated.	04/2021
2Q 2022 annual review: added requirement for documentation of current weight for dose calculation purposes; references reviewed and updated.	04/2022
2Q 2023 annual review: no significant changes; references reviewed and updated.	04/2023
2Q 2024 annual review: no significant changes; references reviewed and updated.	04/2024
2Q 2025 annual review: no significant changes; references reviewed and updated.	04/2025
2Q 2026 annual review: no significant changes; updated initial approval duration from 6 months to 12 months; for Continued Therapy added examples of positive treatment response that were already outlined in Appendix D and previously referred to within the criteria; references reviewed and updated.	04/2026