

## Clinical Policy: Amifampridine (Firdapse)

Reference Number: PA.CP.PHAR.411

Effective Date: 04/2019

Last Review Date: 01/2024

[Revision Log](#)

### Description

Amifampridine (Firdapse<sup>®</sup>) is potassium channel blocker.

### FDA Approved Indication(s)

Firdapse is indicated for the treatment of Lambert-Eaton myasthenic syndrome (LEMS) in adults and pediatric patients 6 years of age and older.

### 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<sup>®</sup> that Firdapse is **medically necessary** when the following criteria are met:

#### I. Initial Approval Criteria

##### A. Lambert-Eaton Myasthenic Syndrome (must meet all):

1. Diagnosis of LEMS;
2. Documentation of confirmatory diagnostic test results from one of the following (a or b):
  - a. Repetitive Nerve Stimulation (RNS) testing showing reproducible post-exercise increase in compound muscle action potential (CMAP) amplitude of at least 60 percent compared with pre-exercise baseline value or a similar increment on high-frequency repetitive nerve stimulation without exercise;
  - b. If member is unable to complete RNS testing, positive anti-P/Q type voltage-gated calcium channel (VGCC) antibody blood test;
3. Prescribed by or in consultation with a neurologist or neuromuscular specialist;
4. Age  $\geq$  6 years;
5. Documentation of a baseline clinical muscle strength assessment (examples may include but are not limited to the Quantitative Myasthenia Gravis (QMG) score, triple-timed up-and-go test (3TUG), Timed 25-foot Walk test (T25FW)) (see *Appendix D*);
6. Member does not have a history of seizures;
7. Dose does not exceed one of the following (a or b):
  - a. Adults and pediatrics weighing  $\geq$  45 kg: 80 mg (8 tablets) per day;
  - b. Pediatrics weighing  $<$  45 kg: 40 mg (4 tablets) per day.

**Approval duration: 6 months**

##### B. Other diagnoses/indications

1. Refer to the off-label use policy for the relevant line of business if diagnosis is NOT specifically listed under section III (Diagnoses/Indications for which coverage is NOT authorized): PA.CP.PMN.53.

## II. Continued Therapy

### A. Lambert-Eaton Myasthenic Syndrome (must meet all):

1. Currently receiving medication via PA Health & Wellness benefit and documentation supports positive response to therapy or the Continuity of Care policy (PA.LTSS.PHAR.01) applies;
2. Member is responding positively to therapy as evidenced by clinical muscle strength assessments (examples may include but are not limited to the QMG score, 3TUG test, T25FW test) (see *Appendix D*) or member's condition has improved or stabilized based on the prescriber's assessment;
3. Member does not have a history of seizures;
3. If request is for a dose increase, new dose does not exceed one of the following (a or b):
  - a. Adults and pediatrics weighing  $\geq 45$  kg: 80 mg (8 tablets) per day;
  - b. Pediatrics weighing  $< 45$  kg: 40 mg (4 tablets) per day.

**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.LTSS.PHAR.01) applies.

**Approval duration: Duration of request or 6 months (whichever is less);** or

2. Refer to the off-label use policy for the relevant line of business if diagnosis is NOT specifically listed under section III (Diagnoses/Indications for which coverage is NOT authorized): PA.CP.PMN.53 for Medicaid.

## III. Diagnoses/Indications for which coverage is NOT authorized:

- ### A. Non-FDA approved indications, which are not addressed in this policy, unless there is sufficient documentation of efficacy and safety according to the off label use policies – PA.CP.PMN.53 for Medicaid or evidence of coverage documents.

## IV. Appendices/General Information

### *Appendix A: Abbreviation/Acronym Key*

CMAP: compound muscle action potential

FDA: Food and Drug Administration

LEMS: Lambert-Eaton myasthenic syndrome

QMG: Quantitative Myasthenia Gravis

3TUG: triple-timed up-and-go test

RNS: repetitive nerve stimulation

T25FW: Timed 25-foot Walk test

VGCC: voltage-gated calcium channel

### *Appendix B: Therapeutic Alternatives*

Not applicable

### *Appendix C: Contraindications/Boxed Warnings*

- Contraindication(s): history of seizures; hypersensitivity to amifampridine or another aminopyridine
- Boxed warning(s): none reported

*Appendix D: General Information*

- QMG is a physician-rated evaluation consisting of 13 assessments of muscle function (e.g., swallowing, speech, forced vital capacity, movement of arms and legs). Each assessment is rated 0 to 3, where 0 indicates “no weakness” and 3 indicates “severe weakness” (lower scores reflect better muscle strength).
- The 3TUG is a functional mobility test that requires a patient to stand up from a straight-backed armchair, walk 3 meters, turn around, walk back, and sit down in the chair. Based upon literature reports that a significant change in gait for a similar walk-test is an increase in time of more than 20%, this was incorporated into the secondary endpoint used in the NCT02970162 clinical trial.
- The T25FW test, a component of the Multiple Sclerosis Functional Composite, is a quantitative mobility and leg function performance test based on a timed 25-foot walk. The patient was directed to walk a clearly marked 25-foot course as quickly and safely as possible. Following a period of rest, the timed 25-foot walk is repeated to determine an average score.
- During RNS testing, an increase in the CMAP amplitude >100% after exercise or with high-frequency RNS is considered diagnostic of a presynaptic neuromuscular junction disorder, and the increase is frequently even greater. However, some studies have found that a significant number of patients have increments with RNS below 100%; thus, increments of 60 to 99% are strongly supportive of a presynaptic neuromuscular junction disorder.
- P/Q-type VGCC antibody result is strongly suggestive of LEMS. However, P/Q-type VGCC antibodies are present in a variety of clinical situations where LEMS is not present. While the anti-P/Q-type VGCC antibody test is confirmatory in patients who otherwise have clinical and electrophysiologic features of LEMS, the antibody test alone is not diagnostic, especially in the presence of a malignancy or amyotrophic lateral sclerosis.
- On February 1, 2022 the FDA converted the final approval of Ruzurgi to a tentative approval. Due to the 7-year orphan-drug exclusivity for Catalyst’s product Firdapse, the application for Ruzurgi for the treatment of LEMS in patients 6 to less than 17 years of age may not be finally approved for marketing until the period of exclusivity has expired. As a result Ruzurgi is no longer commercially available.

**V. Dosage and Administration**

Indication	Dosing Regimen	Maximum Dose
LEMS	Adults and pediatrics weighing $\geq$ 45 kg: 15 mg to 30 mg PO daily, in 3 to 4 divided doses. Dose can be increased by 5 mg daily every 3 to 4 days. The maximum single dose is 20 mg.	Adults and pediatrics weighing $\geq$ 45 kg: 80 mg/day
	Pediatrics weighing < 45 kg: 5 mg to 15 mg PO daily, in 3 to 4 divided doses. Dose can be increased by 2.5 mg daily every 3 to 4 days. The maximum single dose is 10 mg.	Pediatrics weighing < 45 kg: 40 mg/day

**VI. Product Availability**

Tablet: 10 mg

**VII. References**

1. Firdapse Prescribing Information. Coral Gables, FL: Catalyst Pharmaceuticals, Inc.; May 2023. Available at: <https://firdapsehcp.com/pdfs/firdapse-pi.pdf>. Accessed October 6, 2023.
2. Weinberg DH. Lambert-Eaton myasthenic syndrome: Clinical features and diagnosis. In: UpToDate, Waltham, MA. Updated July 15, 2021. Accessed October 19, 2023.
3. American Association of Electrodiagnostic Medicing (AAEM) Quality Assurance Committee. Practice Parameter for Repetitive Nerve Stimulation and Single Fiber EMG Evaluation of Adults with Suspected Myasthenia Gravis or Lambert–Eaton Myasthenic Syndrome: Summary Statement. Muscle Nerve 2001 September 24 (9): 1236-1238.
4. Oh SJ, Kurokawa K, Claussen GC, Ryan HF Jr. Electrophysiological diagnostic criteria of Lambert-Eaton myasthenic syndrome. Muscle Nerve 2005;32:515–520.

Reviews, Revisions, and Approvals	Date
Policy created	04/2019
1Q 2020 annual review: Added new FDA-approved agent: Ruzurgi, in line with previously approved clinical guidance for amifampridine; added quantities associated with dosing requirements; for Ruzurgi requests added reference to HIM non-formulary policy in approval durations for each criteria set; references reviewed and updated.	01/2020
1Q 2021 annual review: added requirement for diagnostic testing to confirm diagnosis; references reviewed and updated.	01/2021
1Q 2022 annual review: for Ruzurgi redirection modified from medical justification to member must use language per template; references reviewed and updated.	01/2022
1Q 2023 annual review: Ruzurgi redirection and references to Ruzurgi removed as the product is no longer commercially available; RT4 pediatric extension updated with age limit down to 6 years; added requirement that member does not have a history of seizures as use is contraindicated; references reviewed and updated.	01/2023
1Q 2024 annual review: added additional option for prescribing by a neuromuscular specialist; applied exclusion for history of seizures to continued therapy requests; references reviewed and updated.	01/2024