

Evolent Clinical Guideline 3190 for Alimta/Pemfexy/Axtle/Pemrydi™ (pemetrexed)

| | | |
|--|---|---|
| Guideline Number: Evolent_CG_3190 | Applicable Codes | |
| <p>"Evolent" refers to Evolent Health LLC and Evolent Specialty Services, Inc.</p> <p>© 2011 - 2025 Evolent. All rights Reserved.</p> | | |
| Original Date: July 2011 | Last Revised Date: October 2025 | Implementation Date: October 2025 |

TABLE OF CONTENTS

| | |
|--|----------|
| STATEMENT | 2 |
| PURPOSE | 2 |
| INDICATIONS..... | 2 |
| MALIGNANT PLEURAL MESOTHELIOMA..... | 2 |
| NON-SMALL CELL LUNG CANCER (NSCLC) | 2 |
| CONTRAINDICATIONS/WARNINGS | 3 |
| EXCLUSION CRITERIA | 4 |
| CODING AND STANDARDS | 5 |
| CODES..... | 5 |
| APPLICABLE LINES OF BUSINESS | 5 |
| POLICY HISTORY..... | 6 |
| LEGAL AND COMPLIANCE..... | 6 |
| GUIDELINE APPROVAL | 6 |
| Committee | 6 |
| DISCLAIMER | 6 |
| REFERENCES..... | 7 |

STATEMENT

Purpose

To define and describe the accepted indications for Alimta/Pemfexy/Axtle/Pemrydi (pemetrexed) usage in the treatment of cancer, including FDA approved indications, and off-label indications.

Evolent is responsible for processing all medication requests from network ordering providers. Medications not authorized by Evolent may be deemed as not approvable and therefore not reimbursable.

The use of this drug must be supported by one of the following: FDA approved product labeling, CMS-approved compendia, National Comprehensive Cancer Network (NCCN), American Society of Clinical Oncology (ASCO) clinical guidelines, or peer-reviewed literature that meets the requirements of the CMS Medicare Benefit Policy Manual Chapter 15.

INDICATIONS

Continuation requests for a not-approvable medication shall be exempt from this Evolent policy provided

- The member has not experienced disease progression on the requested medication AND
- The requested medication was used within the last year without a lapse of more than 30 days of having an active authorization AND
- Additional medication(s) are not being added to the continuation request.

Malignant Pleural Mesothelioma

- The member has malignant pleural mesothelioma and Alimta/Pemfexy/Axtle/Pemrydi (pemetrexed) may be used in ONE of the following:
 - In combination with cisplatin/carboplatin for stage I-IIIA clinically operable disease OR
 - In combination with Keytruda (pembrolizumab) and cisplatin/carboplatin as first-line treatment of unresectable advanced or metastatic disease OR
 - As first line therapy for unresectable or metastatic disease as a single agent or in combination with cisplatin or carboplatin with or without bevacizumab OR
 - As subsequent therapy as a single agent (if not previously used in the first line setting).
- NOTE: Per Evolent Policy, J9304 Pemfexy (pemetrexed) is not supported for the treatment of malignant pleural mesothelioma. This recommendation is based on the lack of Level 1 Evidence (randomized clinical trial and/or meta-analyses) to show superior outcomes with one pemetrexed product over another.

Non-Small Cell Lung Cancer (NSCLC)

- The member has recurrent or metastatic non-squamous NSCLC and Alimta/Pemfexy/Axtle/Pemrydi (pemetrexed) may be used for ANY of the following:

- First line therapy in combination with carboplatin/cisplatin OR
- First line in combination with carboplatin/cisplatin + Keytruda (pembrolizumab) for EGFR negative and ALK negative disease OR
- First line in combination with Rybrevant (amivantamab-vmjw) + carboplatin for EGFR exon 20 insertion mutations OR
- Subsequent therapy in combination with carboplatin/cisplatin OR
- Subsequent therapy in combination with Rybrevant (amivantamab-vmjw) + carboplatin for EGFR exon 19 deletions or exon 21 L858R substitution mutations OR
- Subsequent therapy as a single agent OR
- Maintenance therapy as a single agent after response or stable disease following first-line chemotherapy or maintenance therapy in combination with pembrolizumab following first-line therapy with [pembrolizumab + pemetrexed + cisplatin/carboplatin] OR
- First line therapy in combination with Imfinzi (durvalumab), Imjudo (tremelimumab) and platinum-based chemotherapy for up to 4 cycles in adult members who have not received prior systemic therapy for metastatic or Stage IV NSCLC and the tumor is negative for EGFR and ALK, regardless of PD-L1 expression. This may be followed by maintenance therapy with Imfinzi (durvalumab), 1 dose of Imjudo (tremelimumab) and optional histology-based pemetrexed.
- NOTE 1: Per Evolent Policy, the following regimens are not supported based on the lack of Level 1 Evidence (randomized clinical trial and/or meta-analyses) demonstrating superior outcomes compared to Evolent recommended alternatives agents/regimens, including but not limited to regimens at **Evolent Pathways**:
 - Bevacizumab + Carboplatin/Cisplatin + Pemetrexed followed by maintenance Bevacizumab + Pemetrexed
 - Nivolumab + Ipilimumab + Carboplatin/Cisplatin + Pemetrexed followed by maintenance Nivolumab + Ipilimumab (for a PDL-1 expression 1% or higher)
- NOTE 2: Per Evolent Policy, J9304 Pemfexy (pemetrexed) is not supported for the treatment of NSCLC. This recommendation is based on the lack of Level 1 Evidence (randomized clinical trial and/or meta-analyses) to show superior outcomes with one pemetrexed product over another.

CONTRAINdications/WARNINGS

- Contraindications
 - Severe hypersensitivity to pemetrexed or any component of the formulation
- Warnings
 - Bone marrow suppression
 - Pemetrexed may cause severe myelosuppression, including anemia, neutropenia, thrombocytopenia, and/or pancytopenia; myelosuppression is often dose-limiting. Severe myelosuppression may require blood transfusion

or may lead to neutropenic infection. Prophylactic folic acid and vitamin B₁₂ supplements are necessary to reduce hematologic toxicity, febrile neutropenia, and infection; the risk for myelosuppression is higher in patients who did not receive vitamin supplementation.

EXCLUSION CRITERIA

- Dosing exceeds single dose limit of Alimta/Pemfexy/Axtle/Pemrydi (pemetrexed) 500 mg/m².
- Disease progression on Pemetrexed or Pemetrexed containing regimen.
- Use of Alimta/Pemfexy/Axtle/Pemrydi (pemetrexed) for squamous cell NSCLC.
- Investigational use of Alimta/Pemfexy/Axtle/Pemrydi (pemetrexed) with an off-label indication that is not sufficient in evidence or is not generally accepted by the medical community. Sufficient evidence that is not supported by CMS recognized compendia or acceptable peer reviewed literature is defined as any of the following:
 - Whether the clinical characteristics of the patient and the cancer are adequately represented in the published evidence.
 - Whether the administered chemotherapy/biologic therapy/immune therapy/targeted therapy/other oncologic therapy regimen is adequately represented in the published evidence.
 - Whether the reported study outcomes represent clinically meaningful outcomes experienced by patients. Generally, the definition of Clinically Meaningful outcomes are those recommended by ASCO, e.g., Hazard Ratio of less than 0.80 and the recommended survival benefit for OS and PFS should be at least 3 months.
 - Whether the experimental design, in light of the drugs and conditions under investigation, is appropriate to address the investigative question. (For example, in some clinical studies, it may be unnecessary or not feasible to use randomization, double blind trials, placebos, or crossover).
 - That non-randomized clinical trials with a significant number of subjects may be a basis for supportive clinical evidence for determining accepted uses of drugs.
 - That case reports are generally considered uncontrolled and anecdotal information and do not provide adequate supportive clinical evidence for determining accepted uses of drugs.
 - That abstracts (including meeting abstracts) without the full article from the approved peer-reviewed journals lack supporting clinical evidence for determining accepted uses of drugs.

CODING AND STANDARDS

Codes

- J9292 - Injection, pemetrexed dipotassium, 10 mg
- J9294 - Injection, pemetrexed (hospira), not therapeutically equivalent to j9305, 10 mg
- J9296 - Injection, pemetrexed (accord), not therapeutically equivalent to j9305, 10 mg
- J9297 - Injection, pemetrexed (sandoz), not therapeutically equivalent to j9305, 10 mg
- J9304 - Injection, pemetrexed (pemfexy), 10 mg
- J9305 - Injection, pemetrexed, not otherwise specified, 10 mg
- J9314 - Injection, pemetrexed (teva), not therapeutically equivalent to j9305, 10 mg
- J9322 - Injection, pemetrexed (bluepoint), not therapeutically equivalent to j9305, 10 mg
- J9323 - Injection, pemetrexed ditromethamine, 10 mg
- J9324 - Injection, pemetrexed (pemrydi rtu), 10 mg

Applicable Lines of Business

| | |
|-------------------------------------|--|
| <input type="checkbox"/> | CHIP (Children's Health Insurance Program) |
| <input checked="" type="checkbox"/> | Commercial |
| <input checked="" type="checkbox"/> | Exchange/Marketplace |
| <input checked="" type="checkbox"/> | Medicaid |
| <input type="checkbox"/> | Medicare Advantage |

POLICY HISTORY

| Date | Summary |
|--------------|---|
| October 2025 | <ul style="list-style-type: none"> Converted to new Evolent guideline template This guideline replaces UM ONC_1130 Alimta or Pemfexy (pemetrexed) Added new brand names “Axtle” and “Pemrydi” to relevant sections Updated NSCLC indication to allow maintenance therapy with durvalumab +/- pemetrexed after first-line therapy for recurrent, advanced, or metastatic disease with platinum-based chemotherapy, tremelimumab, and durvalumab if restaging shows stability or response Updated exclusion criteria Updated references |
| October 2024 | <ul style="list-style-type: none"> Added use with pembrolizumab and platinum chemotherapy to MPM indication section Added use with amivantamab and carboplatin in first-line treatment of locally advanced or metastatic NSCLC with EGFR exon 20 insertion mutations Added use with amivantamab and carboplatin for locally advanced or metastatic NSCLC with EGFR exon 19 deletions or exon 21 L858R substitution mutations whose disease has progressed on or after treatment with an EGFR tyrosine kinase inhibitor Updated references |

LEGAL AND COMPLIANCE

Guideline Approval

Committee

Reviewed / Approved by Evolent Specialty Services Clinical Guideline Review Committee

Disclaimer

Evolent Clinical Guidelines do not constitute medical advice. Treating health care professionals are solely responsible for diagnosis, treatment, and medical advice. Evolent uses Clinical Guidelines in accordance with its contractual obligations to provide utilization management. Coverage for services varies for individual members according to the terms of their health care coverage or government program. Individual members' health care coverage may not utilize some Evolent Clinical Guidelines. Evolent clinical guidelines

contain guidance that requires prior authorization and service limitations. A list of procedure codes, services or drugs may not be all inclusive and does not imply that a service or drug is a covered or non-covered service or drug. Evolent reserves the right to review and update this Clinical Guideline in its sole discretion. Notice of any changes shall be provided as required by applicable provider agreements and laws or regulations. Members should contact their Plan customer service representative for specific coverage information.

REFERENCES

1. Johnson ML, et al; POSEIDON investigators. Durvalumab With or Without Tremelimumab in Combination With Chemotherapy as First-Line Therapy for Metastatic Non-Small-Cell Lung Cancer: The Phase III POSEIDON Study. *J Clin Oncol.* 2023 Feb 20;41(6):1213-1227. doi: 10.1200/JCO.22.00975.
2. Barlesi F, et al. Randomized phase III trial of maintenance bevacizumab with or without pemetrexed after first-line induction with bevacizumab, cisplatin, and pemetrexed in advanced nonsquamous non-small-cell lung cancer: AVAPERL (MO22089). *J Clin Oncol.* 2013 Aug 20;31(24):3004-11. doi: 10.1200/JCO.2012.42.3749.
3. Chu Q, et al. Pembrolizumab plus chemotherapy versus chemotherapy in untreated advanced pleural mesothelioma in Canada, Italy, and France: a phase 3, open-label, randomised controlled trial. *Lancet.* 2023 Dec 16;402(10419):2295-2306. doi: 10.1016/S0140-6736(23)01613-6.
4. Passaro A, et al; MARIPOSA-2 Investigators. Amivantamab plus chemotherapy with and without lazertinib in EGFR-mutant advanced NSCLC after disease progression on osimertinib: primary results from the phase III MARIPOSA-2 study. *Ann Oncol.* 2024 Jan;35(1):77-90. doi: 10.1016/j.annonc.2023.10.117.
5. Zhou C, et al; PAPILLON Investigators. Amivantamab plus Chemotherapy in NSCLC with EGFR Exon 20 Insertions. *N Engl J Med.* 2023 Nov 30;389(22):2039-2051. doi: 10.1056/NEJMoa2306441.
6. Alimta prescribing information. Eli Lilly and Company. Indianapolis IN 2024.
7. Pemfexy prescribing information. Eagle Pharmaceuticals, Inc. Woodcliff Lake, NJ 2022.
8. Axtle prescribing information. Avyxa Pharma. LLC. Troy Hills, NJ 2024.
9. Pemrydi prescribing information. Amneal Pharmaceuticals LLC. Bridgewater, NJ 2025.
10. Clinical Pharmacology Elsevier Gold Standard 2025.
11. Micromedex® Healthcare Series: Micromedex Drugdex Ann Arbor, Michigan 2025.
12. National Comprehensive Cancer Network. Cancer Guidelines and Drugs and Biologics Compendium 2025.
13. AHFS Drug Information. American Society of Health-Systems Pharmacists or Wolters Kluwer Lexi-Drugs. Bethesda, MD 2025.
14. Ellis LM, et al. American Society of Clinical Oncology perspective: Raising the bar for clinical trials by defining clinically meaningful outcomes. *J Clin Oncol.* 2014 Apr 20;32(12):1277-80.
15. Medicare Benefit Policy Manual Chapter 15 Covered Medical and Other Health Services: <https://www.cms.gov/Regulations-and-Guidance/Guidance/Manuals/Downloads/bp102c15.pdf>.
16. Current and Resolved Drug Shortages and Discontinuations Reported to the FDA: <http://www.accessdata.fda.gov/scripts/drugshortages/default.cfm>.