

## PHARMACY / MEDICAL POLICY – 5.01.627

# Thymic Stromal Lymphopoietin (TSLP) Inhibitors


Effective Date: **Jan. 3, 2025\***  
Last Revised: Sept. 10, 2024  
Replaces: N/A

RELATED MEDICAL POLICIES:  
None

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## Introduction

Asthma is an inflammatory disease with respiratory symptoms (dyspnea, wheezing, chest tightness and cough) and expiratory airflow limitation that vary in intensity and time. Severe asthma is uncontrolled asthma with poor symptom control despite adherence to good inhaler technique and maximal optimized high-dose ICS-LABA therapy and management of contributory factors, or that worsens when high dose treatment is decreased. Severe asthma can occur at any age, and it is caused by the interaction of genetic and environmental factors.

Thymic Stromal Lymphopoietin (TSLP) Inhibitors are one treatment option in severe asthma. TSLP regulates immunity and barrier surfaces and activates downstream inflammatory effectors, including adaptive and innate immune cells and cytokines. Thus, blocking TSLP, reduces markers of inflammation, including FeNO, blood eosinophils, IL-5, IL-13 and IgE, thereby improving clinical outcomes in severe asthma.

**Note:** The Introduction section is for your general knowledge and is not to be taken as policy coverage criteria. The rest of the policy uses specific words and concepts familiar to medical professionals. It is intended for providers. A provider can be a person, such as a doctor, nurse, psychologist, or dentist. A provider also can be a place where medical care is given, like a hospital, clinic, or lab. This policy informs them about when a service may be covered.

## Policy Coverage Criteria

Drug	Medical Necessity
<p><b>Tezspire (tezepelumab-ekko)</b></p>	<p><b>Tezspire (tezepelumab-ekko) may be considered medically necessary as add-on maintenance treatment for severe asthma when:</b></p> <ul style="list-style-type: none"> <li>• Individual is aged 12 years or older</li> </ul> <p><b>AND</b></p> <ul style="list-style-type: none"> <li>• Individual meets one of the following:               <ul style="list-style-type: none"> <li>○ Two or more asthma exacerbations in the previous 12 months requiring use of oral corticosteroids</li> </ul> </li> </ul> <p><b>OR</b></p> <ul style="list-style-type: none"> <li>○ One or more asthma exacerbations requiring a hospitalization, an emergency department visit, or an urgent care visit in the previous 12 months</li> </ul> <p><b>OR</b></p> <ul style="list-style-type: none"> <li>○ Forced expiratory volume in 1 second (FEV<sub>1</sub>) less than 80% predicted</li> </ul> <p><b>AND</b></p> <ul style="list-style-type: none"> <li>• Individual is using maximum doses of an inhaled corticosteroid</li> </ul> <p><b>AND</b></p> <ul style="list-style-type: none"> <li>• Individual is using an inhaled long-acting beta-agonist (LABA)</li> </ul> <p><b>AND</b></p> <ul style="list-style-type: none"> <li>• Tezspire (tezepelumab-ekko) is not used in combination with Dupixent (dupilumab), Cinqair (reslizumab), Fasentra (benralizumab), Nucala (mepolizumab), or Xolair (omalizumab) when these medications are also being used for the treatment of asthma.</li> </ul> <p><b>AND</b></p> <ul style="list-style-type: none"> <li>• Prescribed by or in consultation with an allergist/immunologist or pulmonologist</li> </ul> <p><b>AND</b></p> <ul style="list-style-type: none"> <li>• The dose prescribed is 210 mg every 4 weeks</li> </ul>



Length of Approval	
Approval	Criteria
Initial authorization	Tezspire (tezepelumab-ekko) may be approved up to 6 months.
Re-authorization criteria	<p>Future re-authorization of Tezspire (tezepelumab-ekko) may be approved for up to 1 year as long as the drug-specific coverage criteria are met, and chart notes demonstrate that the individual continues to show a positive clinical response to therapy as documented by:</p> <ul style="list-style-type: none"> <li>Decrease in exacerbation frequency, ER and urgent care visits, hospitalizations, or requirement for corticosteroids</li> </ul> <p><b>OR</b></p> <ul style="list-style-type: none"> <li>Decrease in frequency and severity of asthma symptoms</li> </ul> <p><b>OR</b></p> <ul style="list-style-type: none"> <li>Increase in quality-of-life measures and ability to perform activities of daily living</li> </ul>

Documentation Requirements
<p>The individual's medical records submitted for review for all conditions should document that medical necessity criteria are met. The record should include the following:</p> <ul style="list-style-type: none"> <li>Office visit notes that contain the diagnosis, relevant history, physical evaluation, lab results and medication history.</li> </ul>

## Coding

Code	Description
<b>HCPCS</b>	
J2356	Injection, tezepelumab-ekko (Tezspire), 1 mg

**Note:** CPT codes, descriptions and materials are copyrighted by the American Medical Association (AMA). HCPCS codes, descriptions and materials are copyrighted by Centers for Medicare Services (CMS).



## Related Information

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### Consideration of Age

The ages stated in this policy for which Tezspire (tezepelumab-ekko) is considered medically necessary are based on the FDA labeling for this drug.

### Benefit Application

Tezspire (tezepelumab-ekko) is an injectable drug that must be administered in a health care provider's office. Tezspire will be managed through both the pharmacy and medical benefit.

## Evidence Review

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### Background

Asthma is a chronic airway disorder that affects an estimated 17 million Americans. About 10 million of these have allergic asthma, mediated by a cascade in which IgE is bound to high affinity FcRI receptors on the surface of basophils and mast cells, and is cross-linked by an allergen that results in the degranulation of these effector cells and the release of inflammatory mediators, such as histamine and leukotrienes. These mediators then produce the symptoms of asthma, as well as other related conditions such as allergic rhinitis, atopic dermatitis, and anaphylaxis. The severity of the response varies from trivially annoying to immediately life threatening. As their common mechanism would predict, these diseases share overlapping populations. Treatment with anti-inflammatory drugs such as inhaled corticosteroids can reverse some of these processes; however, successful response often requires weeks to achieve and sometimes a complete reversal is not achieved, even with optimal combinations of steroids, long-acting beta agonists and other agents. A smaller percentage of individuals may have persistent airflow limitations for which no current therapy has been found to be effective (steroid-resistant asthma). The paradigm of asthma has been expanded from bronchospasm and airway inflammation to include airway remodeling in some individuals. The concept that asthma may be a continuum of these processes that can lead to moderate and severe persistent disease is of critical importance to understanding this disease's pathogenesis and pathophysiology.



Since the asthma patient population is heterogeneous, successful maintenance treatment requires an individualized regimen. Current guidelines suggest that individuals with chronic persistent asthma be started on an inhaled corticosteroid. For individuals with moderate to severe symptoms, a long-acting inhaled beta agonist (salmeterol or formoterol) is generally initiated at the same time as the corticosteroid. Individuals with mild symptoms should receive a beta agonist if they fail to achieve full response with a corticosteroid. Other agents such as leukotriene modifiers and theophylline may be added. Tezspire (tezepelumab-ekko) offers an additional therapeutic option for individuals who have not achieved control with these strategies.

## Summary of Evidence

### Efficacy

The efficacy of tezepelumab was evaluated in two randomized, double-blind, parallel group, placebo-controlled clinical trials, PATHWAY and NAVIGATOR, of 52 weeks duration. The two trials enrolled a total of 1609 patients 12 years of age and older with severe asthma. PATHWAY was a 52-week dose-ranging exacerbation trial that enrolled 550 adult patients with severe asthma who received treatment with tezepelumab 70 mg subcutaneously every 4 weeks, tezepelumab 210 mg subcutaneously every 4 weeks, tezepelumab 280 mg subcutaneously every 2 weeks, or placebo subcutaneously. Patients were required to have a history of 2 or more asthma exacerbations requiring oral or injectable corticosteroid treatment or 1 asthma exacerbation resulting in hospitalization in the past 12 months. NAVIGATOR was a 52-week exacerbation trial that enrolled 1061 patients (adult and pediatric patients 12 years of age and older) with severe asthma who received treatment with tezepelumab 210 mg subcutaneously every 4 weeks or placebo subcutaneously every 4 weeks. Patients were required to have a history of 2 or more asthma exacerbations requiring oral or injectable corticosteroid treatment or resulting in hospitalization in the past 12 months. In both PATHWAY and NAVIGATOR, patients were required to have an Asthma Control Questionnaire 6 (ACQ-6) score of 1.5 or more at screening and reduced lung function at baseline [pre-bronchodilator forced expiratory volume in 1 second (FEV1) below 80% predicted in adults, and below 90% predicted in adolescents]. Patients were required to have been on regular treatment with medium or high-dose inhaled corticosteroids (ICS) and at least one additional asthma controller, with or without oral corticosteroids (OCS). Patients continued background asthma therapy throughout the duration of the trials. In both trials, patients were enrolled without requiring a minimum baseline level of blood eosinophils or FeNO.



The primary endpoint for PATHWAY and NAVIGATOR was the rate of clinically significant asthma exacerbations measured over 52 weeks. Clinically significant asthma exacerbations were defined as worsening of asthma requiring the use of or increase in oral or injectable corticosteroids for at least 3 days, or a single depo-injection of corticosteroids, and/or emergency department visits requiring use of oral or injectable corticosteroids and/or hospitalization. In both PATHWAY and NAVIGATOR, patients receiving tezepelumab had significant reductions in the annualized rate of asthma exacerbations compared to placebo. There were also fewer exacerbations requiring emergency room visits and/or hospitalization in patients treated with tezepelumab compared with placebo. In NAVIGATOR, patients receiving tezepelumab experienced fewer exacerbations than those receiving placebo regardless of baseline levels of blood eosinophils or FeNO, additionally time to first exacerbation was longer for the patients receiving tezepelumab compared with placebo. Similar results were seen in PATHWAY. Specifics can be found in the table below.

Trial	Treatment	Exacerbations Per Year	
		Rate Ratio (95% CI)	
<b>Annualized Asthma Exacerbation Rate</b>			
PATHWAY	Tezepelumab (N=137)	0.20	0.29 (0.16, 0.51)
	Placebo (N=138)	0.72	
NAVIGATOR	Tezepelumab (N=528)	0.93	0.44 (0.37, 0.53)
	Placebo (N=531)	2.10	
<b>Exacerbations Requiring Emergency Room Visits or Hospitalizations</b>			
PATHWAY	Tezepelumab (N=137)	0.03	0.15 (0.04, 0.58)
	Placebo (N=138)	0.18	
NAVIGATOR	Tezepelumab(N=528)	0.06	0.21 (0.12, 0.37)
	Placebo (N=531)	0.28	

Changes from baseline in Asthma Control Questionnaire 6 (ACQ-6) and Standardized Asthma Quality of Life Questionnaire for ages 12 and older [AQLQ(S)+12] were also assessed as secondary endpoints in PATHWAY and NAVIGATOR. In both trials, more patients treated with tezepelumab compared to placebo had a clinically meaningful improvement in ACQ-6 and



AQLQ(S)+12. Clinically meaningful improvement (responder rate) for both measures was defined as improvement in score of 0.5 or more at end of trial. In NAVIGATOR, the ACQ-6 responder rate for tezepelumab was 86% compared with 77% for placebo (OR=1.99; 95% CI 1.43, 2.76) and the AQLQ(S)+12 responder rate for tezepelumab was 78% compared with 72% for placebo (OR=1.36; 95% CI 1.02, 1.82). Similar findings were seen in PATHWAY.

Tezepelumab was also evaluated on reducing the use of maintenance oral corticosteroids (OCS) was evaluated. The trial enrolled 150 adult patients with severe asthma who required treatment with daily OCS (7.5 mg to 30 mg per day) in addition to regular use of high-dose inhaled corticosteroids and a long-acting beta-agonist with or without additional controllers. The primary endpoint was categorized percent reduction from baseline of the final OCS dose at Week 48 (greater than or equal to 90% reduction, greater than or equal to 75% to less than 90% reduction, greater than or equal to 50% to less than 75% reduction, greater than 0% to less than 50% reduction, and no change or no decrease in OCS), while maintaining asthma control. Tezepelumab did not demonstrate a statistically significant reduction in maintenance OCS dose compared with placebo (cumulative OR=1.28; 95% CI 0.69, 2.35).

## Safety

The safety of tezepelumab was based on the pooled safety population from PATHWAY and NAVIGATOR, which consists of 665 adult and pediatric patients 12 years of age and older with severe asthma who received at least one dose of tezepelumab 210 mg subcutaneously once every 4 weeks. The two placebo-controlled clinical trials were of 52 weeks in duration. In addition, a similar safety profile was seen in a trial that enrolled 150 adult patients with severe asthma who required treatment with daily oral corticosteroids. Tezepelumab was found to be generally well tolerated when compared to placebo. The most common adverse effects include pharyngitis (4% tezepelumab vs 3% placebo), arthralgia (4% tezepelumab vs 3% placebo), back pain (4% tezepelumab vs 3% placebo), and injection site reaction (3.3% tezepelumab vs 2.7% placebo).

## 2023 Update

Reviewed prescribing information of all drugs in the policy. Removed trademarks from the brand products for the process of standardization. Changed "patient" to "individual" for the process of standardization.



## 2024 Update

Reviewed prescribing information. The following changes are effective January 3, 2025. Updated to include a prescriber requirement. Updated diagnostic criteria to include the following alternatives: One or more asthma exacerbations requiring a hospitalization, an emergency department visit or an urgent care visit in the previous 12 months and FEV1 less than 80% predicted.

## References

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## History

Date	Comments
03/01/22	New policy, approved February 8, 2022. Added coverage criteria for Tezspire (tezepelumab) for the add-on maintenance treatment of patients aged 12 years and older with severe asthma. Added unlisted biologic HCPC code J3590 to report Tezspire®.
07/01/22	Coding update. Added HCPCS J2356 and removed HCPCS J3590.
09/01/23	Annual Review, approved August 7, 2023. Reviewed prescribing information of all drugs in the policy. Changed the wording from "patient" to "individual" throughout the policy for standardization.
07/01/24	Annual Review, approved June 24, 2024. No changes to policy statements.
10/01/24	Interim Review, approved September 10, 2024. The following policy changes are effective January 3, 2025, following a 90-day provider notification. Updated to include a prescriber requirement. Updated diagnostic criteria to include the following alternatives: One or more asthma exacerbations requiring a hospitalization, an emergency department visit or an urgent care visit in the previous 12 months and FEV1 less than 80% predicted.

**Disclaimer:** This medical policy is a guide in evaluating the medical necessity of a particular service or treatment. The Company adopts policies after careful review of published peer-reviewed scientific literature, national guidelines and local standards of practice. Since medical technology is constantly changing, the Company reserves the right to review and update policies as appropriate. Member contracts differ in their benefits. Always consult the member benefit booklet or contact a member service representative to determine coverage for a specific medical service or supply. CPT codes, descriptions and materials are copyrighted by the American Medical Association (AMA). ©2024 Premera All Rights Reserved.

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