KAISER PERMANENTE® Mid-Atlantic States	**Pectus Excavatum, Pectus Carinatum and Poland's Syndrome: Surgical Correction** **Medical Coverage Policy**

Utilization *ALERT*

- Prior to use of this MCP for evaluation of medical necessity, benefit coverage MUST be verified in the member's EOC or benefit document.
- Please refer to the member's specific benefit coverage contract or governmental guidelines for plastic and reconstructive benefits and exclusions.
- Certain plastic surgery procedures may not be covered benefits because of specific exclusions in self-funded or employer's contracts that retain grandfathered exclusions from Essential Health Benefits.
- For Medicare members, please refer to CMS guideline through the Medicare Coverage Database.

I. Procedure: Surgical correction of congenital chest wall deformities

II. Diagnoses: Pectus Excavatum, Pectus Carinatum and Poland's Syndrome

III. Specialty: Pediatric Surgery

IV. Indications for Referral

Patients with noted chest wall deformities may be referred for initial consultation with a board-certified pediatric surgeon. Surgical repair will be considered as follows:

A. Kaiser Permanente Mid-Atlantic States considers surgical reconstruction of pectus excavatum medically necessary when the pectus index (Haller index) is greater than 3.25 or the Corrective Index is greater than or equal to 28% and **ANY ONE** of the following are present:
   1. Pulmonary function studies demonstrate at least moderately severe restrictive airway disease; **or**
   2. Echocardiography demonstrates findings consistent with external compression; **or**
   3. Abnormal cardiovascular or ventilatory limitation is evident during cardiopulmonary exercise testing

B. Kaiser Permanente Mid-Atlantic States considers surgical reconstruction of pectus carinatum as medically necessary when there is documented evidence of a Haller Index of less than or equal to 2.0 and a significant physical functional impairment (e.g., cardiac or respiratory insufficiency) and the procedure is expected to correct the impairment.

[1] The pectus index (Haller index) is obtained from a CT chest by dividing the transverse diameter of the chest by the anterior-posterior diameter.

C. Pectus carinatum treatment, for those members who do not meet surgical criteria, with orthotic compression bracing may be medically necessary when all the following criteria are met:
   1. Individual is motivated to adhere to treatment AND
   2. skeletal growth is incomplete

D. Kaiser Permanente Mid-Atlantic States considers surgical reconstruction of chest deformity of Poland's syndrome to be medically necessary when rib formation is absent and functional deficits are documented.

V. Limitations and Exclusions

A. The goal of surgery to reconstruct congenital chest wall deformities is to improve physical function.

B. Procedures and services intended to improve or maintain appearance, not expected to significantly improve physical function or pain, are considered cosmetic and excluded.

C. The following interventions for the treatment of pectus excavatum are not medically necessary. They are considered experimental and investigational because their effectiveness has not been established.
   1. The magnetic mini-mover procedure;
   2. The vacuum bell; and
   3. Dynamic Compression System

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Approval History

Date approved by RUMC*	**Date filed with the State of Maryland**	**Date of Implementation** (Ten days after filing)
03/18/2011	03/21/2011	04/01/2011
03/20/2012	03/21/2012	04/01/2012
03/28/2013	03/29/2013	04/09/2013
04/02/2014	04/03/2014	04/13/2014
04/22/2015	04/28/2015	05/11/2015
04/26/2016	04/28/2016	05/11/2016

Approval History

Effective June 01, 2016, state filing is no longer required per Maryland House Bill HB 798 – Health Insurance – Reporting

Date approved by RUMC	**Date of Implementation**
04/25/2017	04/26/2017
04/27/2018	04/27/2018
04/25/2019	04/25/2019
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03/22/2021	03/22/2021
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*****The Regional Utilization Management Committee received *delegated authority* from the Regional Quality Improvement Committee to review and approve designated Utilization Management and Medical Coverage Policies in 2011.

Note: Kaiser Permanente Mid-Atlantic States (KPMAS) include referral and authorization criteria to support primary care and specialty care practitioners, as appropriate, in caring for members with selected conditions. Whenever possible, Medical Coverage Policies are evidence-based and may also include expert opinion. Medical Coverage Policies are not intended or designed as a substitute for the reasonable exercise of independent clinical judgment by a practitioner in any particular set of circumstances for an individual member.

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