Sentara® Health Plans

Commercial

Proton Beam Radiation Therapy (PBRT)

Table of Content

Effective Date	10/2007
Next Review Date	3/15/2024
Coverage Policy	Medical 101
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Member-specific benefits take precedence over medical policy and benefits may vary across plans. Refer to the individual's benefit plan for details *.

Purpose:

This policy addresses the medical necessity of Proton Beam Radiation Therapy (PBRT).

Description & Definitions:

Proton beam radiation therapy (PBRT) is a type of external radiation treatment in which protons are targeted to specific tissue mass by using a stereotactic delivery system. Focused radiation is then delivered to the targeted area.

Criteria:

Proton Beam Radiation Therapy (PBRT) is considered medically necessary for **1 or more** of the following:

- Individual has melanoma of the uveal tract (Ocular melanoma-iris, choroid or ciliary body) and **All** of the following:
  - There is no evidence of metastasis or extrascleral extension
- Individual has chordoma or grade I-II chondrosarcoma of the basisphenoid region (skull base tumor) or cervical spine and **All** of the following:
  - Individual has undergone a biopsy or partial resection of the tumor
  - There is no evidence of metastasis
- Sinonasal cancer and **All** of the following:
  - Tumor involves the base of skull and proton therapy is needed to spare the orbit, optic nerve, optic chiasm, or brainstem
- To treat unresectable, non-metastatic hepatocellular cancer with curative intent
- Individual has arteriovenous malformation with **1 or more** of the following:
  - Intracranial arteriovenous malformation not amenable to surgical excision or other conventional forms of treatment
  - Adjacent to critical structures such as the optic nerve, brain stem or spinal cord
- Pediatric patients (age less than 21) for all of the following:
  - To treat all pediatric tumors in which radiation therapy is required
- Individual has a central nervous system lesion and **ALL of** the following:

    - Specific cases where adjacent critical structures cannot be adequately spared with Intensity-modulated radiation therapy (IMRT) or stereotactic radiosurgery (SRS)
- Gallbladder cancer, and unresectable intrahepatic tumor
- Head and neck cancer and **ALL** of the following
    - Highly conformal dose distribution required due to close proximity of tissue to critical structures, as indicated by **1 or more** of the following:
        - Cavernous sinus invasion
        - Intracranial invasion
        - Orbital invasion
        - Periocular location
        - Perineural invasion
        - Skull base invasion
    - Radiation oncologist note in medical record documents that other radiation therapy techniques (eg, 3-dimensional conformal radiation therapy, intensity modulated radiation therapy) cannot achieve adequate precision.

Proton Beam Radiation Therapy (PBRT) is considered **not medically necessary** for any use other than those indicated in clinical criteria, to include but not limited to:

- Breast cancer
- Esophageal cancer
- Gastric cancer
- Gynecologic cancer
- Lung cancer
- Lymphoma (Hodgkin and non-Hodgkin)
- Pancreatic cancer
- Prostate cancer

Coding:

Medically necessary with criteria:

Coding	Description
77520	Proton treatment delivery; simple, without compensation
77522	Proton treatment delivery; simple, with compensation
77523	Proton treatment delivery; intermediate
77525	Proton treatment delivery; complex

Considered Not Medically Necessary:

Coding	Description
	None

U.S. Food and Drug Administration (FDA) - approved only products only.

Document History:

Revised Dates:

- 2022: April

- 2021: April
- 2019: November
- 2016: March, April
- 2015: March
- 2014: April, October, November
- 2013: March, October
- 2012: March, November
- 2011: January, March, May, July
- 2010: August
- 2009: July
- 2008: July

Reviewed Dates:

- 2023: March
- 2020: April
- 2018: October
- 2017: December
- 2014: March
- 2010: July, December

Effective Date:

- October 2007

References:

Specialty Association Guidelines; Government Regulations; Winifred S. Hayes, Inc; UpToDate; Literature Review; Specialty Advisors; National Coverage Determination (NCD); Local Coverage Determination (LCD).

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Special Notes: *

Medical policies can be highly technical and complex and are provided here for informational purposes. These medical policies are intended for use by health care professionals. The medical policies do not constitute medical advice or medical care. Treating health care professionals are solely responsible for diagnosis, treatment, and medical advice. Sentara Health Plan members should discuss the information in the medical policies with their treating health care professionals. Medical technology is constantly evolving, and these medical policies are subject to change without notice, although Sentara Health Plan will notify providers as required in advance of changes that could have a negative impact on benefits.

Services mean both medical and behavioral health (mental health) services and supplies unless We specifically tell You otherwise. We do not cover any services that are not listed in the Covered Services section unless required to be covered under state or federal laws and regulations. We do not cover any services that are not Medically Necessary. We sometimes give examples of specific services that are not covered but that does not mean that other similar services are covered. Some services are covered only if We authorize them. When We say You or Your We mean You and any of Your family members covered under the Plan. Call Member Services if You have questions.

Keywords:

Proton beam radiation, shp medical 101, PBRT, melanoma, uveal tract, chordoma, chondrosarcoma, basisphenoid region, cervical spine, pituitary adenoma