To all beneficiaries enrolled in a Prepaid Health Plan (PHP): for questions about benefits and services available on or after implementation, please contact your PHP.

Table of Contents

1.0	Descrij	Description of the Procedure, Product, or Service				
2.0	Eligibility Requirements					
	2.1	Provisions				
		2.1.1 General]			
		2.1.2 Specific				
	2.2	Special Provisions	2			
		2.2.1 EPSDT Special Provision: Exception to Policy Limitations for a Medicaid Beneficiary under 21 Years of Age	2			
2.0	****					
3.0		the Procedure, Product, or Service Is Covered				
	3.1	General Criteria Covered				
	3.2	Specific Criteria Covered				
		3.2.1 Specific criteria covered by Medicaid				
		3.2.2 Medicaid Additional Criteria Covered				
4.0	When the Procedure, Product, or Service Is Not Covered					
7.0	4.1	General Criteria Not Covered				
2	4.2	Specific Criteria Not Covered				
	7.2	4.2.1 Specific Criteria Not Covered by Medicaid				
		4.2.1 Specific Criteria Not Covered by Medicaid				
	4.3	Psychosocial History				
		· · · · · · · · · · · · · · · · · · ·				
	4.4	Medical Compliance				
5.0	Requir	Requirements for and Limitations on Coverage				
	5.1	Prior Approval				
	5.2	Prior Approval Requirements				
		5.2.1 General				
		5.2.2 Specific				
	5.3	Additional Limitations or Requirements				
		•				
6.0		ers Eligible to Bill for the Procedure, Product, or Service				
	6.1	Provider Qualifications and Occupational Licensing Entity Regulations	(
	6.2	Provider Certifications	(
7.0	Additio	onal Requirements				
	7.1	Compliance				
8.0	Policy	Implementation/Revision Information	8			
Attach	ment Δ·	Claims-Related Information	16			
ituutii	Α.	Claim Type				

23H12 i

NC Medicaid Ventricular Assist Devices (VAD)

Medicaid Clinical Coverage Policy No: 11C Amended Date: August 15, 2023

В.	International Classification of Diseases and Related Health Problems, Tenth Revisions,		
	Clinical Modification (ICD-10-CM) and Procedural Coding System (PCS)	10	
C.	Code(s)	10	
D.	Modifiers		
E.	Billing Units	10	
F.	Place of Service	10	
G.	Co-payments	11	
	Reimbursement		

23H12 ii

1.0 Description of the Procedure, Product, or Service

A ventricular assist device (VAD) is surgically attached to one or both intact heart ventricles and used to assist or augment the ability of a damaged or weakened native heart to pump blood. Improvement in the performance of the native heart may allow the device to be removed. VADs are used as a bridge to a heart transplant, for support of blood circulation post-cardiotomy, or destination therapy.

1.1 Definitions

Bridge-to-Transplant (BTT): A ventricular assist device used for a beneficiary waiting for a heart transplant.

Destination Therapy (DT): A ventricular assist device used as a long term or permanent placement for a beneficiary that requires permanent mechanical cardiac support and is not a candidate for heart transplantation at the time of the VAD implant.

Native Heart: A beneficiary's natural heart.

2.0 Eligibility Requirements

2.1 Provisions

2.1.1 General

(The term "General" found throughout this policy applies to all Medicaid policies)

- a. An eligible beneficiary shall be enrolled in the NC Medicaid Program (Medicaid is NC Medicaid program, unless context clearly indicates otherwise);
- b. Provider(s) shall verify each Medicaid beneficiary's eligibility each time a service is rendered.
- c. The Medicaid beneficiary may have service restrictions due to their eligibility category that would make them ineligible for this service.

2.1.2 Specific

(The term "Specific" found throughout this policy only applies to this policy)

a. Medicaid

None Apply.

2.2 Special Provisions

2.2.1 EPSDT Special Provision: Exception to Policy Limitations for a Medicaid Beneficiary under 21 Years of Age

a. 42 U.S.C. § 1396d(r) [1905(r) of the Social Security Act]

Early and Periodic Screening, Diagnostic, and Treatment (EPSDT) is a federal Medicaid requirement that requires the state Medicaid agency to cover services, products, or procedures for Medicaid beneficiary under 21 years of age **if** the service is **medically necessary health care** to correct or ameliorate a defect, physical or mental illness, or a condition [health problem] identified through a screening examination (includes any evaluation by a physician or other licensed practitioner).

This means EPSDT covers most of the medical or remedial care a child needs to improve or maintain his or her health in the best condition possible, compensate for a health problem, prevent it from worsening, or prevent the development of additional health problems.

Medically necessary services will be provided in the most economic mode, as long as the treatment made available is similarly efficacious to the service requested by the beneficiary's physician, therapist, or other licensed practitioner; the determination process does not delay the delivery of the needed service; and the determination does not limit the beneficiary's right to a free choice of providers.

EPSDT does not require the state Medicaid agency to provide any service, product or procedure:

- 1. that is unsafe, ineffective, or experimental or investigational.
- 2. that is not medical in nature or not generally recognized as an accepted method of medical practice or treatment.

Service limitations on scope, amount, duration, frequency, location of service, and other specific criteria described in clinical coverage policies may be exceeded or may not apply as long as the provider's documentation shows that the requested service is medically necessary "to correct or ameliorate a defect, physical or mental illness, or a condition" [health problem]; that is, provider documentation shows how the service, product, or procedure meets all EPSDT criteria, including to correct or improve or maintain the beneficiary's health in the best condition possible, compensate for a health problem, prevent it from worsening, or prevent the development of additional health problems.

b. EPSDT and Prior Approval Requirements

- 1. If the service, product, or procedure requires prior approval, the fact that the beneficiary is under 21 years of age does **NOT** eliminate the requirement for prior approval.
- 2. **IMPORTANT ADDITIONAL INFORMATION** about EPSDT and prior approval is found in the *NCTracks Provider Claims and Billing Assistance Guide*, and on the EPSDT provider page. The Web addresses are specified below.

NCTracks Provider Claims and Billing Assistance Guide: https://www.nctracks.nc.gov/content/public/providers/provider-manuals.html

EPSDT provider page: https://medicaid.ncdhhs.gov/

3.0 When the Procedure, Product, or Service Is Covered

Note: Refer to Subsection 2.2.1 regarding EPSDT Exception to Policy Limitations for Medicaid Beneficiaries under 21 Years of Age.

3.1 General Criteria Covered

Medicaid shall cover the procedure, product, or service related to this policy when medically necessary, and:

- a. the procedure, product, or service is individualized, specific, and consistent with symptoms or confirmed diagnosis of the illness or injury under treatment, and not in excess of the beneficiary's needs;
- b. the procedure, product, or service can be safely furnished, and no equally effective and more conservative or less costly treatment is available statewide; and
- c. the procedure, product, or service is furnished in a manner not primarily intended for the convenience of the beneficiary, the beneficiary's caretaker, or the provider.

3.2 Specific Criteria Covered

3.2.1 Specific criteria covered by Medicaid

Medicaid shall cover a Food and Drug Administration FDA-approved Ventricular Assist Device (VAD) when used according to the device-specific, FDA-approved indications.

VADs are covered when **all** the following criteria for a given indication are met:

a. Post-cardiotomy:

- 1. The beneficiary is in relatively good health other than the cardiovascular problem for which surgery was undertaken;
- 2. All appropriate measures have been attempted to correct low arterial pH, arterial blood gas abnormalities, electrolytes, hypovolemia, inadequate cardiac rate, dysrhythmias and residual hypothermia;
- 3. Cardiac resuscitation employing pharmacologic agents in a systematic fashion has been attempted. The use of the intra-aortic balloon pump (IABP) is recommended prior to VAD assistance, its use may not be appropriate, as in cases of fibrillating heart or peripheral atherosclerosis; and
- 4. Hemodynamic selection criteria:
 - A. Cardiac index (CI) of less than 2.0L/min/m while receiving maximal medical support;
 - B. Systolic Blood Pressure less than 90mm Hg;

- C. Pulmonary Capillary Wedge Pressure greater than 18 mm Hg;
- D. Left atrial pressure of 20 mm Hg; and
- E. On maximum inotropic volume and support.

b. Bridge to Transplant

- 1. The beneficiary is
 - A. approved for heart transplantation by a Medicare-approved heart transplant center and is active on the Organ Procurement and Transplantation Network (OPTN) heart transplant waitlist, or
 - B. undergoing evaluation to determine candidacy for a cardiac transplant; and
- 2. at-risk of imminent death from left ventricular failure before donor heart procurement.

NOTE: The use of an FDA-approved biventricular device may be considered as a medically necessary bridge-to-transplantation for a beneficiary with biventricular failure who is currently listed as a candidate for heart transplant.

c. **Destination Therapy** (all criteria must be met)

- 1. The device has been FDA approved for Destination Therapy
- 2. The beneficiary has chronic end-state heart failure as classified by New York Heart Association (NHYA) class IV (see table below) and is not a candidate for a heart transplant.
- 3. The beneficiary has failed to respond to maximum medical management such as:
 - A. Beta-blockers or Ace Inhibitors for at least 45 of the last 60 days, or
 - B. Has been balloon pump dependent for the last 7 days, or
 - C. Has been IV inotrope dependent for 14 days.
- 4. Have left ventricular ejection fraction (LVEF) less than 25%.
- 5. The member demonstrates functional limitations with peak oxygen consumption less than or equal to 14 ml/kg/min. (**Note:** This criterion may be waived in a beneficiary who is unable to perform exercise stress testing).

New York Heart Association (NYHA) Functional Classification:

Class	Beneficiary Symptoms	
I	No limitation of physical activity. Ordinary physical activity does	
	not cause undue fatigue, palpitation, dyspnea (shortness of	
	breath).	
II	Slight limitation of physical activity. Comfortable at rest.	
	Ordinary physical activity results in fatigue, palpitation, dyspnea	
	(shortness of breath).	
III	Marked limitation of physical activity. Comfortable at rest. Less	
	than ordinary activity causes fatigue, palpitation, or dyspnea.	
IV	Unable to carry on any physical activity without discomfort.	
	Symptoms of heart failure at rest. If any physical activity is	
	undertaken, discomfort increases.	

3.2.2 Medicaid Additional Criteria Covered

None Apply.

4.0 When the Procedure, Product, or Service Is Not Covered

Note: Refer to Subsection 2.2.1 regarding EPSDT Exception to Policy Limitations for Medicaid Beneficiaries under 21 Years of Age.

4.1 General Criteria Not Covered

Medicaid shall not cover the procedure, product, or service related to this policy when:

- a. the beneficiary does not meet the eligibility requirements listed in Section 2.0;
- b. the beneficiary does not meet the criteria listed in Section 3.0;
- c. the procedure, product, or service duplicates another provider's procedure, product, or service; or
- d. the procedure, product, or service is experimental, investigational, or part of a clinical trial.

4.2 Specific Criteria Not Covered

4.2.1 Specific Criteria Not Covered by Medicaid

Medicaid shall not cover a VAD when the beneficiary does not meet the medical necessity criteria listed in **Section 3.0** and for **any** of the following situations:

- a. For any off-label indication;
- b. Use of a non-FDA approved or cleared ventricular assist device is considered investigational; or
- c. Other applications of ventricular devices that are considered investigational.
- d. Contraindicated in the following conditions:
 - 1. Chronic irreversible hepatic, renal or respiratory failure;
 - 2. Systemic infection;
 - 3. Blood dyscrasia; or
 - 4. Uncorrected aortic insufficiency.

4.2.2 Medicaid Additional Criteria Not Covered

None Apply.

4.3 Psychosocial History

Medicaid shall not cover a VAD when the beneficiary or caretaker's psychosocial history limits the ability to comply with pre-transplant or post-transplant medical care.

4.4 Medical Compliance

Medicaid shall not cover a VAD when the beneficiary or caretaker's failure or refusal to comply would make compliance with the disciplined medical regime improbable.

5.0 Requirements for and Limitations on Coverage

Note: Refer to Subsection 2.2.1 regarding EPSDT Exception to Policy Limitations for Medicaid Beneficiaries under 21 Years of Age.

5.1 Prior Approval

Medicaid shall not require prior approval for a ventricular assist device.

5.2 Prior Approval Requirements

5.2.1 General

None Apply.

5.2.2 Specific

None Apply.

5.3 Additional Limitations or Requirements

LIMITATIONS: Replacements of the device or a component of the device is considered medically necessary when any of the following criteria are met:

- a. A change in the physiological condition of the insured individual documented in the medical record necessitates a different device; or
- b. A comorbidity is proven to be exacerbated by the current device or component: or
- c. A non-warranty repair of the device or component is imminent; and the cost of the required repair is estimated to be more than the cost of a replacement device or component.

6.0 Providers Eligible to Bill for the Procedure, Product, or Service

To be eligible to bill for the procedure, product, or service related to this policy, the provider(s) shall:

- a. meet Medicaid qualifications for participation;
- b. have a current and signed Department of Health and Human Services (DHHS) Provider Administrative Participation Agreement; and
- c. bill only for procedures, products, and services that are within the scope of their clinical practice, as defined by the appropriate licensing entity.

6.1 Provider Qualifications and Occupational Licensing Entity Regulations

None Apply.

6.2 Provider Certifications

None Apply.

7.0 Additional Requirements

Note: Refer to Subsection 2.2.1 regarding EPSDT Exception to Policy Limitations for Medicaid Beneficiaries under 21 Years of Age.

7.1 Compliance

Provider(s) shall comply with the following in effect at the time the service is rendered:

Medicaid

- a. All applicable agreements, federal, state and local laws and regulations including the Health Insurance Portability and Accountability Act (HIPAA) and record retention requirements; and
- b. All NC Medicaid's clinical (medical) coverage policies, guidelines, policies, provider manuals, implementation updates, and bulletins published by the Centers for Medicare and Medicaid Services (CMS), DHHS, DHHS division(s) or fiscal contractor(s).

FDA approved procedures, products, and devices for implantation must be used.

Implants, products, and devices must be used according to all current FDA requirements at the time of surgery.

7 23H12

8.0 Policy Implementation/Revision Information

Original Effective Date: January 1, 1994

Revision Information:

7/1/05Entire PolicyPolicy was updated to include coverage criteria effective with approved date of State Plan amendment 4/1/05.9/1/05Section 2.2The special provision related to EPSDT was revised.12/1/05Section 2.2The web address for DMA's EDPST policy instructions was a to this section.12/1/06Sections 2.2The special provision related to EPSDT was revised.	dded
approved date of State Plan amendment 4/1/05. 9/1/05 Section 2.2 The special provision related to EPSDT was revised. 12/1/05 Section 2.2 The web address for DMA's EDPST policy instructions was a to this section. 12/1/06 Sections 2.2 The special provision related to EPSDT was revised.	dded
12/1/05 Section 2.2 The web address for DMA's EDPST policy instructions was a to this section. 12/1/06 Sections 2.2 The special provision related to EPSDT was revised.	
to this section. 12/1/06 Sections 2.2 The special provision related to EPSDT was revised.	
12/1/06 Sections 2.2 The special provision related to EPSDT was revised.	/
1 1	/
	V
12/1/06 Sections 3.0 and 4.0 A note regarding EPSDT was added to these sections.	y
5/1/07 Sections 2 through 4 EPSDT information was revised to clarify exceptions to polic	
limitations for beneficiaries under 21 years of age.	
5/1/07 Attachment A Added the UB-04 as an accepted claims form.	
7/1/2010 Throughout Policy Conversion: Implementation of Session Law 2009-451	
Section 10.32 "NC HEALTH CHOICE/PROCEDURES F	ЭR
CHANGING MEDICAL POLICY."	
11/1/11 Throughout Updated Standard DMA template language	
Sections 1.0, 3.1, 3.2, Policy was updated to include coverage criteria and requirement	nts to
4.1 and 4.2, 5.1, 5.2, meet current community standards of practice	
7.1, Attachment A –C.	
coding	
3/1/12 Throughout Technical changes to merge Medicaid and NCHC current cov	erage
into one policy.	
10/01/2015 All Sections and Attachments Updated policy template language and added ICD-10 codes to comply with federally mandated 10/1/2015 implementation w	مسم
	nere
applicable. 03/01/2018 Section 1.0 Deleted the previous description and added a new description.	
03/01/2018 Subsection 1.1 Added definitions for Bridge To Transplant, Destination-Ther	
and Native heart	ару
03/01/2018 Subsection 3.2.1.b Updated text.	
03/01/2018 Subsection 3.2.1.c Updated text.	
03/01/2018 Subsection 4.2.1 Removed text in a sentence and created a list as 4.2.1.d	
03/01/2018 Subsection 5.2 Prior approval requirement removed.	
03/01/2018 Subsection 5.3 Limitations added for a replacement of the device or a compo	
of the device.	10111
03/01/2018 Subsection 7.1 Updated text. Removal of last statement.	
03/01/2018 Attachment A, Sections Remove CPT, Revenue and ICD 10 codes from the policy.	
B and C	
03/15/2019 Table of Contents Added, "To all beneficiaries enrolled in a Prepaid Health Plan	
(PHP): for questions about benefits and services available on	
after November 1, 2019, please contact your PHP."	
03/15/2019 All Sections and Updated policy template language.	
Attachments	

NC Medicaid	Medicaid
Ventricular Assist Devices (VADs)	Clinical Coverage Policy No: 11C
	Amended Date: August 15, 2023

Date	Section Revised	Change
01/06/2020	Table of Contents	Updated policy template language, "To all beneficiaries enrolled in
		a Prepaid Health Plan (PHP): for questions about benefits and
		services available on or after implementation, please contact your
		PHP."
01/06/2020	Attachment A	Added, "Unless directed otherwise, Institutional Claims must be
		billed according to the National Uniform Billing Guidelines. All
		claims must comply with National Coding Guidelines".
8/15/2023	All Sections and	Updated policy template language due to North Carolina Health
	Attachments	Choice Program's move to Medicaid. Policy posted 8/15/2023 with
		an effective date of 4/1/2023.

Attachment A: Claims-Related Information

Provider(s) shall comply with the, *NCTracks Provider Claims and Billing Assistance Guide*, Medicaid bulletins, fee schedules, NC Medicaid's clinical coverage policies and any other relevant documents for specific coverage and reimbursement for Medicaid:

A. Claim Type

Professional (CMS-1500/837P transaction)

Institutional (UB-04/837I transaction)

Unless directed otherwise, Institutional Claims must be billed according to the National Uniform Billing Guidelines. All claims must comply with National Coding Guidelines.

B. International Classification of Diseases and Related Health Problems, Tenth Revisions, Clinical Modification (ICD-10-CM) and Procedural Coding System (PCS)

Provider(s) shall report the ICD-10-CM and Procedural Coding System (PCS) to the highest level of specificity that supports medical necessity. Provider(s) shall use the current ICD-10 edition and any subsequent editions in effect at the time of service. Provider(s) shall refer to the applicable edition for code description, as it is no longer documented in the policy.

C. Code(s)

Provider(s) shall report the most specific billing code that accurately and completely describes the procedure, product or service provided. Provider(s) shall use the Current Procedural Terminology (CPT), Health Care Procedure Coding System (HCPCS), and UB-04 Data Specifications Manual (for a complete listing of valid revenue codes) and any subsequent editions in effect at the time of service. Provider(s) shall refer to the applicable edition for the code description, as it is no longer documented in the policy.

If no such specific CPT or HCPCS code exists, then the provider(s) shall report the procedure, product or service using the appropriate unlisted procedure or service code.

Unlisted Procedure or Service

CPT: The provider(s) shall refer to and comply with the Instructions for Use of the CPT Codebook, Unlisted Procedure or Service, and Special Report as documented in the current CPT in effect at the time of service.

HCPCS: The provider(s) shall refer to and comply with the Instructions For Use of HCPCS National Level II codes, Unlisted Procedure or Service and Special Report as documented in the current HCPCS edition in effect at the time of service.

D. Modifiers

Provider(s) shall follow applicable modifier guidelines.

E. Billing Units

One billing unit is allowed per day.

F. Place of Service

Inpatient Acute Care Hospital.

G. Co-payments

Co-payments are not required for a Ventricular Assist Device.

For Medicaid refer to Medicaid State Plan:

https://medicaid.ncdhhs.gov/meetings-notices/medicaid-state-plan-public-notices

H. Reimbursement

Provider(s) shall bill their usual and customary charges. For a schedule of rates, refer to: https://medicaid.ncdhhs.gov/