



## **Total Parenteral Nutrition (TPN) Corporate Medical Policy**

**File name:** Total Parenteral Nutrition (TPN)

**File code:** UM.SPSVC.08

**Origination:** 10/2004 (as Total Parenteral Nutrition and Enteral Nutrition in the Home) Enteral Nutrition removed to a separate policy in 2011)

**Last Review:** 12/2011

**Next Review:** 11/2012

**Effective Date:** 04/16/2012

### **Document Precedence**

BCBSVT Medical Policies are developed to provide guidance for members and providers regarding coverage in accordance with all terms, conditions and limitations of the subscriber contract. Benefit determinations are based in all cases on the applicable contract language. To the extent that there may be any conflict between Medical Policy and contract language, the contract language takes precedence.

## **Medical Policy**

### **Description**

Total Parenteral Nutrition (TPN) a type of home infusion therapy, also known as parenteral hyperalimentation, is used for patients with medical conditions that impair gastrointestinal absorption to a degree incompatible with life. It is also used for variable periods of time to bolster the nutritional status of severely malnourished patients with medical or surgical conditions. TPN involves percutaneous transvenous implantation of a central venous catheter into the vena cava or right atrium. A nutritionally adequate hypertonic solution consisting of glucose (sugar), amino acids (protein), electrolytes (sodium, potassium), vitamins and minerals, and sometimes fats is administered daily. An infusion pump is generally used to assure a steady flow of the solution either on a continuous (24-hour) or intermittent schedule. If intermittent, a heparin lock device and diluted heparin are used to prevent clotting inside the catheter.

### **Policy**

Total Parenteral Nutrition (TPN) is **considered medically necessary** by the Plan for conditions resulting in significantly inadequate intestinal absorption, including such conditions, but not limited to:

- Crohn's disease;
- Obstructing stricture or neoplasm of the mouth, esophagus, stomach or intestine;
- Loss of the swallowing mechanism due to a central nervous system disorder, where the risk of aspiration is high;
- Short bowel syndrome secondary to massive small bowel resection;
- Malabsorption due to enterocolic, enterovesical, or enterocutaneous fistulas (TPN being temporary until fistula is repaired)
- Motility disorder (pseudo-obstruction);
- Newborn infants with catastrophic gastrointestinal anomalies such as tracheoesophageal fistula, gastroschisis, omphalocele, or massive intestinal atresia;

- Infants and young children who fail to thrive due to systemic disease or secondarily to intestinal insufficiency associated with short bowel syndrome, malabsorption, or chronic idiopathic diarrhea;
- Patients with prolonged paralytic ileus following major surgery or multiple injuries;
- Malabsorption due to Whipple's disease;
- Malabsorption due to chronic infectious enteritis;
- Severe radiation enteritis;
- Severe acute pancreatitis or chronic pancreatitis when a feeding tube cannot be placed or tube feeding is not tolerated;
- Pancreatic pseudocysts;
- Post stem cell transplant patients and specifically those with graft versus host disease;
- Hyperemesis gravidarum when a feeding tube cannot be placed or tolerated;
- Severe burns precluding adequate nutrition.

The following criteria must be met prior to implementation of TPN:

1. the patient must be in a stage of wasting as indicative of the following:
  - weight is significantly less than normal body weight for a patient's height and age in comparison with pre-illness weight; or
  - serum albumin is less than 2.5 gm; or
  - blood urea nitrogen (BUN) is below 10 mg (but this is not a good marker in patients receiving dialysis due to protein catabolism and dehydration); or
  - phosphorus level is less than 2.5 mg (normal phosphorus is 3–4.5 mg); **and**
2. the patient can receive no more than 30% of his/her caloric needs orally.

Medically necessary nutrients, administration supplies, and equipment are all considered **medically necessary** if the criteria for parenteral nutrition are met.

The Plan will cover medically necessary intradialytic parenteral nutrition (IDPN) as an alternative to a regularly scheduled regimen of TPN only in those patients who would be considered candidates for TPN (see above criteria).

Total Parenteral Nutrition is considered **not medically necessary** under the following circumstances:

- 750 calories per day or less are being administered by TPN;
- Nutrients and their manner of administration for TPN is not specifically ordered by a physician;
- to increase protein or caloric intake in addition to the patient's daily diet;
- in patients with a stable nutritional status, in whom only short-term parenteral nutrition might be required, i.e., for less than 2 weeks;
- for routine pre- and/or postoperative care;
- Patients with **functional GI tracts** including but not limited to the following:
  - a. Disorders that induce anorexia including cancer;
  - b. Swallowing disorders;
  - c. Temporary defect in gastric emptying such as a metabolic or electrolyte disorder;
  - d. A psychological disorder impairing food intake such as depression or anorexia nervosa;
  - e. A physical disorder impairing food intake such as dyspnea of severe pulmonary or cardiac disease;
  - f. A side effect of a medication.

# **Administrative and Contractual Guidance**

## **Benefit Determination Guidance**

Prior approval is required and benefits are subject to all terms, limitations and conditions of the subscriber contract.

For New England Health Plan (NEHP) members an approved referral authorization is required.

Benefits for FEP members may vary. Please consult the FEP Service Benefit Plan Brochure.

Benefits may be provided for placement of central venous catheters when policy guidelines have been met for TPN.

The total cost of renting equipment should not exceed the purchase cost of the equipment.

## **Eligible Providers**

Home Infusion Providers  
Home Health Agencies

## **Related Policies**

Enteral Nutrition  
Home Infusion Therapy

## **Policy Implementation/Update information**

New Policy

3/1/2005 billing codes updated

5/2006 Minor language changes and additional medical necessity criteria added

6/2007 Code description added. To CAC 9/2007

7/2008 Annual review, new format and benefit application section added. No other changes.

Reviewed by the CAC 9/2008

11/2011 Separated from enteral nutrition policy. Transferred to new policy format. Coding table updated.

Coder reviewed and approved codes-SAF

## **Scientific Background and Reference Resources**

Blue Cross Blue Shield Association (BCBSA) Medical Policy Reference Manual. Total Parenteral Nutrition, and Enteral Nutrition in the Home, Issue 1:2003

## **Approved by BCBSVT Medical Directors      Date Approved**

Antonietta Sculimbrene MD  
Chair, Medical Policy Committee

Robert Wheeler MD  
Chief Medical Officer

## Attachment I

<b>Codes</b>	<b>Number</b>	<b>Description</b>
<b>HCPCS</b>	B9004	Parenteral nutrition infusion pump, portable
	B9006	Parenteral nutrition infusion pump, stationary
	B4164- B5200	Parenteral nutrition solutions and administration supplies
	E0791	Parenteral infusion pump, stationary, single or multichannel
	S9364	Home infusion therapy, total peripheral nutrition (TPN); administrative services, professional pharmacy services, care coordination, and all necessary supplies and equipment, including standard TPN formula (lipids, specialty amino acid formulas, drugs other than in standard formula, and nursing visits coded separately) per diem (do not use with home infusion codes S9365-S9368 using daily volume scales)
	S9365	Home infusion therapy, total peripheral nutrition (TPN); one liter per day, administrative services, professional pharmacy services, care coordination, and all necessary supplies and equipment, including standard TPN formula (lipids, specialty amino acid formulas, drugs other than in standard formula, and nursing visits coded separately) per diem
	S9366	Home infusion therapy, total peripheral nutrition (TPN); more than one liter per day but no more than 2 liters per day, administrative services, professional pharmacy services, care coordination, and all necessary supplies and equipment, including standard TPN formula (lipids, specialty amino acid formulas, drugs other than in standard formula, and nursing visits coded separately) per diem
	S9367	Home infusion therapy, total peripheral nutrition (TPN); more than two liters per day but no more than 3 liters per day, administrative services, professional pharmacy services, care coordination, and all necessary supplies and equipment, including standard TPN formula (lipids, specialty amino acid formulas, drugs other than in standard formula, and nursing visits coded separately) per diem
	S9368	Home infusion therapy, total peripheral nutrition (TPN); more than 3 liters per day, administrative services, professional pharmacy services, care coordination, and all necessary supplies and equipment, including standard TPN formula (lipids, specialty amino acid formulas, drugs other than in standard formula, and nursing visits coded separately) per diem