

**(STREP) PNEUMOCOCCAL CONJUGATE VACCINE – 13  
VALENT (PREVNAR 13<sup>®</sup> BY PFIZER)  
(PCV13)**

**GENERAL INFORMATION**

Pneumococcal conjugate vaccine (PCV13) helps to prevent invasive diseases caused by 13 strains of *S. pneumoniae* (including bloodstream infections, meningitis and ear infections).

PCV13 replaces PCV7 and expands coverage to include 6 additional disease-causing strains.

The vaccine is approved by the Federal Food and Drug Administration (FDA) for use in infants and children at least six (6) weeks of age through 71 months old.

Immunosuppressed children may not respond optimally to immunization; however, it is still important to administer.

Pneumococcal conjugate vaccine may be administered simultaneously with other vaccines

**PCV13 is recommended for:**

All children who have not reached their 5<sup>th</sup> birthday; even if they have completed the PCV7 vaccine series. (See **Plan** for additional recommendations)

All children aged 60 through 71 months (until 6<sup>th</sup> birthday) with underlying medical conditions that increase their risk for invasive pneumococcal disease (IPD) – **Table 3.**

**Contraindications** to giving the vaccine include the following:

An immediate anaphylactic reaction to the vaccine or a constituent of the vaccine, such as diphtheria toxoid

Acute, moderate, or severe illnesses with or without fever (defer until resolution).

Note: Mild illness with or without fever is NOT a contraindication.

Note: There is no risk for latex allergic patients. The product does not contain latex.

**Adverse events:**

Swelling, redness and/or pain at site of administration

Low-grade fever

Systemic reactions infrequent, serious adverse reactions rare

**PLAN**

Have accompanying adult read “Vaccine Information Statement” (VIS)

Counsel regarding benefits, side effects, and management

**Administration of vaccine:**

The recommended immunization schedule consists of three (3) doses at approximately two (2) month intervals (ages 2, 4, and 6 months), followed by a fourth dose at 12-15 months of age. (See **Table 1** for dosing schedule)

The usual age for the first dose is 2 months, but it can be given as young as six (6) weeks of age

The recommended dosing interval is 4-8 weeks  
 The fourth dose should be administered at age 12-15 months, and at least 8 weeks after the third dose

Healthy children age 24-59 months who have never had a dose of PCV13 should receive one dose of PCV13. (See **Table 2**)

Children age 24-59 months who are incompletely immunized and have underlying medical conditions predisposing them to severe pneumococcal disease (sickle cell disease, asplenia, HIV infection, immunocompromise or chronic illness) should follow the catch-up recommendations in **Table 2** below.

The dose is 0.5 ml to be given intramuscularly  
 Shake vigorously immediately prior to administration of vaccine in order to obtain a uniform suspension

### **Table 1: Routine Schedule**

Recommended routine vaccination schedule for PCV13 among infants and children who have not received previous doses of PCV7 or PCV13, by age at first dose

Age at first dose (mos.)	Primary PCV13 series*	PCV13 booster dose†
2–6	3 doses (ideally age 2, 4, 6 mos.)	1 dose at age 12–15 mos.
7–11	2 doses	1 dose at age 12–15 mos
12–23	2 doses	—
24–59 (Healthy children)	1 dose	—
24–71 (Children with certain chronic diseases or immunocompromising conditions§)	2 doses	—

\* Minimum interval between doses is 8 weeks except for children vaccinated at age <12 months for whom minimum interval between doses is 4 weeks. Minimum age for administration of first dose is 6 weeks.

† Given at least 8 weeks after the previous dose.

§ For complete list of conditions, see **Table 3**.

### **Table 2: Transition Schedule**

Recommended transition schedule from PCV7 to 13-valent vaccine (PCV13) vaccination among infants and children, according to number of previous PCV7 doses received

	Infant series			Booster dose	Supplemental PCV13 dose
	2 mos	4 mos	6 mos	≥12 mos*	14–59 mos†
PCV7	PCV13	PCV13	PCV13	PCV13	—
PCV7	PCV7	PCV13	PCV13	PCV13	—
PCV7	PCV7	PCV7	PCV7	PCV13	—
PCV7	PCV7	PCV7	PCV7	PCV7	PCV13

\* No additional PCV13 doses are indicated for children age 12–23 months who have received 2 or 3 doses of PCV before age 12 months and at least 1 dose of PCV13 at age ≥12 months.

† For children with underlying medical conditions (see **Table 3**), a single supplemental PCV13 dose is recommended through age 71 months

### **Table 3: Medical Conditions that Increase Risk of Invasive Pneumococcal Disease**

Underlying medical conditions that are indications for pneumococcal vaccination among children, by risk group

<b>Risk group</b>	<b>Condition</b>
Immunocompetent children	Chronic heart disease* Chronic lung disease† Diabetes mellitus Cerebrospinal fluid leaks Cochlear implant
Children with functional or anatomic asplenia	Sickle cell disease and other hemoglobinopathies Congenital or acquired asplenia, or splenic dysfunction
Children with immunocompromising conditions	HIV infection Chronic renal failure and nephrotic syndrome Diseases treated with immunosuppressive drugs or radiation therapy, including malignant neoplasms, leukemias, lymphomas, and Hodgkin disease; or solid organ transplant Congenital immunodeficiency§

\* Particularly cyanotic congenital heart disease and cardiac failure.

† Including asthma if treated with prolonged high-dose oral corticosteroids.

§ Includes B- (humoral) or T-lymphocyte deficiency; complement deficiencies, particularly C1, C2, C3, and C4 deficiency; and phagocytic disorders (excluding chronic granulomatous disease).

#### **Note:**

The use of PCV13 does not replace the use of 23-valent pneumococcal polysaccharide vaccine (PPSV23) in children  $\geq 24$  months of age with the underlying medical conditions listed in **Table 3**. PCV13 should be given at least 8 weeks after the last dose of PCV7 or PPSV23. If a child will need PPSV23 and PCV13, it is preferred to administer the PCV13 before the PPSV23 (at least 8 weeks apart).

With a physician or nurse practitioner order, a single dose of PCV13 may be administered to children aged 6-18 years who have sickle cell disease, HIV or other immunocompromising condition, cochlear implant or cerebrospinal fluid leaks, regardless of PPSV23 or PCV7 immunization status.

#### **Post Immunization Administrative Issues:**

Advise to wait in clinic 20 minutes after injection

Record manufacturer and lot number of the vaccine administered, date, name, address and title of person administering vaccine

Instruct parent to contact Health Department if adverse reaction occurs (complete appropriate Vaccine Adverse Event Report [VAERS] Form)

**Referral Indicators:**

A history of anaphylactic hypersensitivity to any component of the vaccine

**Follow-up:**

Return for next pneumococcal vaccine dose at appropriate interval

**REFERENCES:**

CDC. Licensure of a 13-Valent Pneumococcal Conjugate Vaccine (PCV13) and Recommendations for Use Among Children — Advisory Committee on Immunization Practices (ACIP), 2010. MMWR  
<http://www.cdc.gov/mmwr/pdf/wk/mm5909.pdf>

PREVNAR 13 (Pneumococcal 13-valent Conjugate Vaccine [Diphtheria CRM197 Protein]) Prescribing Information:  
<http://www.wyeth.com/content/showlabeling.asp?id=501>