

Combination Vaccines Q & A

Q: What are combination vaccines?

A: Combination vaccines have multiple antigens that prevent different diseases.

Q: What combination vaccines are available through the Vaccines for Children (VFC) Program?

A: Comvax® (*Hepatitis B - Hib*) and Pediarix™ (*DTaP - Hepatitis B – eIPV*) are combination vaccines that are available through the VFC Program. Other, more well-known, combination vaccines available through the program include MMR, Td, DTaP and Twinrix® (*Hepatitis A - Hepatitis B*). Eight out of 19 vaccines available through VFC are combination vaccines.

Q: Why should I implement combination vaccines in my practice?

A: There are many reasons to use combination vaccines. It has been shown that combination vaccines may improve timely vaccination coverage¹. Health care professionals like combination vaccines because they do not have to give as many injections. Children like them because they do not get poked as often, and parents like them for the same reason. Combination vaccines can reduce the cost of stocking and administering separate vaccines and **should be used when medically appropriate and cost-effective**.

Q: How and when do I use combination vaccines?

A: Combination vaccines may be used whenever all components of the combination vaccine are indicated and none of the components are contraindicated. Detailed information is in the package inserts.

Q: Will administering a combination vaccine result in extra doses of vaccine antigens?

A: In some cases, administering a combination vaccine will result in children receiving extra doses of an antigen. The most common examples involve the administration of either Comvax® or Pediarix™ to a child who received the first dose of hepatitis B vaccine at birth. Because both combination vaccines contain the hepatitis B antigen, children who received a dose of hepatitis B at birth and who receive the complete series of one of the combination vaccines will receive four doses of Hepatitis B. Experts agree that 4 doses of hepatitis B may be administered when a birth dose is given and that a child who receives 4 doses of hepatitis B vaccine is not at increased risk of side effects.

Q: Is administering extra doses of vaccine recommended?

A: It is strongly recommended that all babies receive a dose of hepatitis B vaccine at birth. Using combination vaccines is the preferred method of reducing the number of needle sticks needed during immunization visits. When children have already received the recommended vaccination(s) for some of the antigens in a combination vaccine (as with the birth dose of hepatitis B), administering the extra antigen(s) found in the combination is acceptable if doing so will reduce the number of required injections.

Q: Where would I go for more information about the combination vaccines?

A: Vaccine manufacturers have the most current information about combination vaccines. Individual manufacturer websites are www.gskvaccines.com (GSK), www.vaccineshoppe.com (Aventis Pasteur), www.vaccineworld.com (Wyeth) and www.merckvaccines.com (Merck).

Q: Where can I get help incorporating combination vaccines in my practice?

A: The Oregon Immunization Program Health Education staff (503-731-4020) and your Local County Health Department are available to assist you.

¹ CDC. Combination Vaccines for Childhood Immunization. Recommendations of the Advisory Committee on Immunization Practices (ACIP), American Academy of Pediatrics (AAP) and American Academy of Family Physicians (AAFP). MMWR 1999; 48(No. RR-5):2 July 2004

Specific Combination Vaccines Q & A

Q: What is the dosing schedule for Pediarix™?

A: Pediarix™ contains the vaccine components DTaP, IPV, and hepatitis B. The primary series includes doses at 2, 4, and 6 months of age for a total of 3 doses. Pediarix™ is licensed for children 6 weeks to 7 years of age. It should be followed with the 4th and 5th doses of DTaP and a 4th dose of IPV at the appropriate ages.

Q: Where do I find a Vaccine Information Statement (VIS) for combination vaccines?

A: VIS forms can be downloaded directly from the Immunization Action Coalition website at www.immunize.org. For combination vaccines, use the VIS for each antigen contained within the vaccine, just as would happen when administering any single dose.

Q: What is the dosing schedule for Comvax®?

A: Comvax® contains the vaccine components hepatitis B and Hib (PRP-OMP) and is licensed for children 6 weeks to 5 years of age. All infants should receive a primary series of conjugate Hib vaccine (separate or in combination) beginning at 2 months of age. If Comvax® is used for the first 2 doses at 2 and 4 months of age, the series can be completed with a third dose of any licensed Hib vaccine given after 12 months of age. If other Hib vaccines such as HibTITER or ActHIB are given as the first or second dose of the series, and depending on the age of the child, a fourth dose may be required to complete the series.

Q: Can Pediarix™ and Comvax® be given to infants born to mothers who are HBsAg-positive?

A: Comvax® and Pediarix™ are approved by ACIP for use in children born to HBsAg-positive and HBsAg-unknown women, but not for the hepatitis B birth dose. Neither of these combination vaccines should be used in infants under 6 weeks of age. Only monovalent hepatitis B can be used for the birth dose.

Q: What is the dosing schedule for TriHIBit®?

A: TriHIBit® contains the vaccine components Hib and DTaP, and is formed when ActHib® is reconstituted with Tripedia®. TriHIBit® is only approved for the fourth dose of the DTaP and the last dose of the Hib series. This combination vaccine is NOT approved for the primary series at 2, 4, and 6 months of age.

Q: What is the dosing schedule for Twinrix®?

A: Twinrix® is indicated for persons 18 and older who need both hepatitis A and B vaccination. The series consists of three doses, given on a 0, 1, and 6 month schedule.

Q: Are the different brands of DTaP interchangeable?

A: ACIP recommends that the series be completed with the same brand of DTaP vaccine if possible. However, if the brand used in the primary series is unknown or unavailable, any available DTaP product may be used so as not to defer vaccination.