

Frequently Asked Questions on the Hong Kong Childhood Immunisation Programme (2007)

What is the Hong Kong Childhood Immunisation Programme (2007)?

In Hong Kong, childhood immunisation programme has been established for many years. It includes vaccines for the prevention of tuberculosis, hepatitis B, poliomyelitis, diphtheria, tetanus, pertussis, measles, mumps and rubella. In 2006, the Scientific Committee on Vaccine Preventable Diseases of the Centre for Health Protection, Department of Health, updated the recommendations on the local childhood immunisation programme. The updated childhood immunisation programme will be launched on 1 February 2007*.

The following table summarizes the original and the updated childhood immunisation schedule recommended:

Original Immunisation Recommended		Updated Immunisation Recommended	
Age	Immunisation	Age	Immunisation
Newborn	B.C.G. Vaccine Hepatitis B Vaccine - First Dose Polio Type I Vaccine	Newborn	B.C.G. Vaccine Hepatitis B Vaccine - First Dose
1 month	Hepatitis B Vaccine – Second Dose	1 month	Hepatitis B Vaccine - Second Dose
2-4 months	DTwP Vaccine - First Dose Polio Trivalent Vaccine - First Dose	2 months	DTaP-IPV Vaccine – First Dose
3-5 months	DTwP Vaccine - Second Dose	4 months	DTaP-IPV Vaccine – Second Dose
4-6 months	DTwP Vaccine - Third Dose Polio Trivalent Vaccine – Second Dose	6 months	DTaP-IPV Vaccine – Third Dose Hepatitis B Vaccine - Third Dose
6 months	Hepatitis B Vaccine - Third Dose	1 year	MMR Vaccine - First Dose
1 year	MMR Vaccine - First Dose	1½ years	DTaP-IPV Vaccine – Booster Dose
1½ years	DTwP Vaccine - Booster Dose Polio Trivalent Vaccine - Booster Dose	Primary 1	MMR Vaccine - Second Dose DTaP-IPV Vaccine – Booster Dose
Primary 1	MMR Vaccine - Second Dose DT Vaccine - Booster Dose Polio Trivalent Vaccine - Booster Dose	Primary 6	dTap-IPV Vaccine* – Booster Dose
Primary 6	dT Vaccine - Booster Dose Polio Trivalent Vaccine - Booster Dose		

Remarks:

DTwP Vaccine: Diphtheria, Tetanus & whole cell Pertussis Vaccine

DTaP-IPV Vaccine: Diphtheria, Tetanus, acellular Pertussis & Inactivated Poliovirus Vaccine

dTap-IPV Vaccine: Diphtheria, Tetanus, acellular Pertussis (reduced dose) & Inactivated Poliovirus Vaccine

DT Vaccine: Diphtheria & Tetanus Vaccine

dT Vaccine: Diphtheria & Tetanus Vaccine (reduced dose)

MMR Vaccine: Measles, Mumps & Rubella Vaccine

* The new vaccine for Primary 6 students will be adopted at a later phase.

What are the components of the new DTaP-IPV vaccine?

The DTaP-IPV vaccine is a combination vaccine containing diphtheria and tetanus toxoids, purified proteins of *Bordetella pertussis* (acellular) as well as inactivated polioviruses (types I, II & III). The old DTwP vaccine is also a combination vaccine with similar components for diphtheria and tetanus but contains the “whole-cell” component for pertussis and does not contain the poliovirus component.

Why we need to use the new vaccine?

There are several rationales behind:

1. DTaP is found to be at least equally effective but associated with less frequent and less severe local and systemic adverse reactions when compared to DTwP.
2. OPV contains live, attenuated viruses which may cause Vaccine Associated Paralytic Poliomyelitis (VAPP). It is also contraindicated among individuals or household close contacts with conditions such as cancer, HIV carriers or AIDS patients, immunodeficiency as well as those on long term corticosteroids. The newly introduced IPV contains killed polio viruses which would not lead to VAPP and can be used under circumstances when OPV is contraindicated.
3. The use of combined DTaP-IPV vaccine reduces the number of vaccinations to be taken in the same visit. It also reduces the chance of local reactions.

Does it mean that original vaccines being used have problems?

No, but the new vaccine has the advantage of having fewer side effects.

What are the side effects of the new vaccine?

Minor side effects include local reactions (such as pain, redness or swelling). Moderate or severe systemic side effects occur less frequently which include temperature of 40.5°C (105°F) or higher, persistent crying lasting for 3 hours or longer, febrile seizures as well as hypotonic-hyporesponsive episodes. Infrequently, transient benign swelling of the entire upper arm or thigh after the 4th and 5th doses of DTaP vaccines has been reported.

Is the new vaccine safe for my child?

It is safe for most children. All children can be vaccinated with the new vaccine except for those with contraindication.

What are the contraindications for the new vaccine?

1. Immediate anaphylactic reaction to any of the vaccine components or following previous dose of DTaP-IPV.
2. Encephalopathy or other neurological conditions within 7 days following previous dose of DTaP-IPV or a pertussis-containing vaccine.

Are there any precautions when administering this new vaccine for my child?

Please consult your family doctor if any of the following events occurs in your child within the specified period after administration of vaccines with pertussis component (e.g. DTwP and DTaP):

1. Temperature of $\geq 40.5^{\circ}\text{C}$ ($\geq 105^{\circ}\text{F}$) within 48 hours, not attributable to another identifiable cause.
2. Collapse or shock-like state (hypotonic hyporesponsive episode) within 48 hours.
3. Persistent crying lasting ≥ 3 hours, occurring within 48 hours.
4. Convulsions with or without fever, occurring within 3 days.

If my child is unfit for DTwP due to medical conditions, can he/she receive this new vaccine, which contains acellular pertussis component?

If the child is unfit for DTwP, it is important to find out the reasons behind this. A thorough assessment by a medical doctor is needed before receiving the new vaccine.

My child has viral infection such as chickenpox, mumps, measles or roseola, can he/she receive the vaccine today?

People who are moderately or severely ill at the time the shot is scheduled should wait until they recover before getting the vaccine as a precautionary measure.

With the use of the new vaccine, why is there a change in the time intervals between vaccinations?

The recommended new vaccination schedule is set according to various international standards in order to provide the best protection.

How long can I defer the first dose of DTaP-IPV for my baby? What is the appropriate time interval for the new vaccine besides the recommended schedule as my child will probably turn up beyond the recommended dates due to various reasons (e.g. illness, being cared in mainland China)?

The first dose of DTaP-IPV should be given at the age of two months. It is strongly advisable to follow the recommended schedule for vaccination in order to provide the best protection for your child.

Can my baby acquire immunity if he/she receives some doses of DTwP/OPV and some doses of DTaP-IPV vaccines? Will there be any adverse effects from such a programme?

Vaccination with DTwP/OPV can be continued with DTaP-IPV and this transition is both safe and effective in acquiring immunity for your child.

My child has received some vaccinations in mainland China or an overseas country

that has a different childhood immunisation programme from that of Hong Kong. How will you integrate the new vaccination programme for my child?

It will be considered on a case-by-case basis by doctors. Please consult your family doctor for provision of relevant vaccination according to what your child has received.

Why the Department of Health is not providing the 5-in-1 or 6-in-1 vaccines but just the DTaP-IPV vaccine for my child?

The main differences are presence of additional *Haemophilus influenzae* type b (Hib) component for 5-in-1 combination vaccine and additional Hib and Hepatitis B virus (HBV) components for 6-in-1 combination vaccine. The additional components of 5-in-1 or 6-in-1 combination vaccines are Hib and HBV. Vaccination against Hib disease is currently not included in the childhood immunisation programme. The recommended vaccination schedule for hepatitis B (0, 1, 6 months) is different from that of the DTaP-IPV vaccine.

I prefer my child to have both the third doses of DTaP-IPV and hepatitis B vaccine separately instead of receiving two injections simultaneously at 6 months. Will this request upset the efficacy of vaccines?

Separate administration of the two doses will not affect the efficacy. However it is important to note that the vaccines should be given within the appropriate time interval according to the schedule.

According to this new regime, my baby at the age of 6 months will receive 3 instead of 2 doses of polio vaccine; will there be any adverse effect or protective effect from this extra dose?

Instead of one dose of type 1 oral poliovirus vaccine and two doses of oral polio trivalent vaccine in the past, a child should have received three doses of inactivated trivalent polio vaccine by 6 months of age which should be safe and offers at least the same or better overall protection to all 3 types of polioviruses.

Primary 1 students are used to receiving DT and OPV, will it do any harm for them by receiving the new vaccine DTaP-IPV?

The extra acellular pertussis (aP) component of the new vaccine offers boosting effect for the prevention of pertussis. The new vaccine is generally safe and effective. Vaccine associated side effects are minor and uncommon.

Can my child in Primary 6 have DTaP-IPV instead of dT?

DTaP-IPV should only be used for children under the age of 10. Vaccines with reduced amount of diphtheria toxoid, such as dT or dTap should be used for children aged 10 or above.

My child was born outside Hong Kong and I have lost all his/her immunisation records. What kind of immunisation programme will DH give him? Will that be safe for him/her?

A new series of immunisation according to the local programme would be started for your child for those without contraindications.

Will dTap-IPV be used for my child who will be promoted to Primary 6 in the next academic year (2007/08)?

The new vaccine for Primary 6 students will be adopted later.

Where can I obtain further information about the updated childhood immunisation programme?

For any further question, parents of children from birth to 5 years old, please call the Family Health Service 24-hour Information Hotline at 2112 9900 [with effect from 1.1.2007]. For parents of primary school students, please contact the School Immunisation Team of the Department of Health at Tel: 2615 8566 or 2615 8567.