What is it?

Tetanus, diphtheria and inactivated polio vaccine (Td-Polio) protects older children and adults against tetanus, diphtheria and polio – in a single injection. It is used in children at least 7 years of age who missed their 4-6 year booster as well as to boost previously immunized adults. The vaccine can also be used to immunize children aged 7 years and older and adults who have not been adequately vaccinated in the past.

Tetanus, commonly known as lockjaw, is a serious, sometimes fatal disease of the nervous system caused by bacteria, Clostridium tetani. Those who survive often have lasting problems with speech, memory, and mental function. Because of routine vaccination, tetanus occurs rarely in Canada. (For more information, see Facts About...Tetanus)

Diphtheria is a vaccine preventable disease caused by the bacteria, Corynebacterium diphtheriae. The bacteria produce a toxin (poison) that is carried in the blood stream. This serious infection which often involves the nose, throat, and much less frequently the skin, may result in breathing problems, heart failure and nerve damage. Vaccination has resulted in diphtheria becoming a rare disease in Canada. (For more information, see Facts About...Diphtheria)

Polio (short for poliomyelitis) is a viral disease that attacks the nervous system and can destroy the nerve cells in muscles leading to permanent paralysis of the muscles used for breathing, eating and walking. It can also cause death. Vaccination has resulted in Canada having been certified in 1994, as polio free. (For more information, see Facts About...Polio).

How effective is the Td-Polio vaccine?

When Td-Polio vaccine is given as recommended, it protects virtually 100% of people against tetanus, over 95% of people against diphtheria, and 99% of children against polio. For people who become ill, vaccination usually results in milder illness than those who are not immunized.
Who should receive the vaccine?

Td-Polio vaccine is recommended as a booster for children aged 7 years or more who missed their 4-6 year booster vaccine containing diphtheria, pertussis, tetanus and polio (DPTP) components. Td-Polio vaccine can also be used as a booster for adults who have been previously vaccinated against these diseases. The vaccine is also available for children aged 7 and older and adults who were not vaccinated in the past.

The National Advisory Committee on Immunization acknowledges that pregnant women and breastfeeding mothers can receive Td-Polio vaccine without safety concerns. However, the benefits and potential risks of vaccination should be discussed with a doctor.

The following groups should also discuss the benefits and potential risks of Td-Polio vaccine with a doctor before vaccination:
- Those who have a bleeding disorder that may cause severe bleeding from an intra-muscular injection
- Persons with immune system problems

What is the schedule for the vaccine?

For children aged 7 years or older who missed their 4-6 year booster, a single dose of Td-Polio can be given. Td-Polio can also be given to previously immunized adults who may be visiting a country where polio still exists and who are due for their 10-year tetanus-diphtheria booster.

For children aged 7 and older and adults who have not been previously vaccinated against tetanus, diphtheria and polio, a series of 3 doses is required. The first 2 doses should be given 1-2 months apart and the third dose 6 to 12 months later. Td-Polio vaccine may be given at the same time as other routine vaccine/s but at a different site with a separate syringe.

When traveling to a developing country and it is more than 5 years after the last tetanus-diphtheria booster, discuss with your doctor if you or your child should have a Td booster or a Td-Polio booster since some developing countries may not provide health care facilities to guarantee the safe administration of a booster if required.
Are there side effects with the vaccine?
Td-Polio is a very safe vaccine. Mild pain (21%), swelling (1%) and redness (<1%) are common at the injection site, usually occurring within 24 hours after receiving the vaccine and lasting 1-3 days. Local reactions tend to be more severe when people have received frequent boosters of tetanus-diphtheria vaccines. Mild fever (<1%), headache (4%), malaise (3%), muscle aches (6%), nausea (2%), joint pain (2%) and dizziness have also been reported, usually within 1-3 days after vaccination. A cold, wet compress to the site and/or using acetaminophen can help to prevent or relieve pain, swelling and/or fever after vaccination, if necessary. The tetanus component of the vaccine has also been related to irritation of the nerves of the shoulder and arm. As a result of vaccine-induced immune system reaction, tetanus vaccines are likely able to trigger a rare paralyzing, though usually temporary, condition called Guillain Barré Syndrome in adults (not in children).

Severe allergic reactions after vaccination are very rare and may not be related to the vaccine. However, if you think a serious reaction is developing, seek medical attention right away. Unusual or significant changes in your health or your child’s health should be reported to a doctor and the Health Department.

Who should NOT get the vaccine?
The following people should not have the Td-Polio vaccine:
- Children less than seven years old
- Child has been appropriately immunized with oral polio (use Td vaccine)
- Individuals who have had a serious allergic reaction (called anaphylaxis) to a previous dose of Td or Td-Polio vaccine or have a known allergy to any of their components:
  - Neomycin
  - Polymyxin B
  - Aluminum
  - Formaldehyde
- Individuals with a high fever or serious infection worse than a cold. They should defer the vaccine until they feel well

Your record of protection
After your child/you receive an immunization, make sure your child's/your immunization record (the "Yellow Immunization Record") is updated. For school age children and children attending daycare, call the Health Department to update your child’s immunization records. Keep your records in a safe place!