

Fact Sheet

What causes hepatitis A?

Hepatitis A is a liver disease caused by hepatitis A virus (HAV).

How does HAV spread?

HAV is spread from person to person by putting something in the mouth that has been contaminated with the stool (poop) of a person with HAV infection. This type of spread is called "fecal-oral". This can happen in a variety of ways, for example, when an infected person who prepares or handles food doesn't wash his or her hands adequately after using the toilet and then touches other people's food. A person can also be infected by drinking water contaminated with HAV or drinking beverages chilled with contaminated ice. Contaminated food, water, and ice can be significant sources of infection for travelers to many areas of the world. For this reason, the virus is more easily spread in areas where there are poor sanitary conditions or where good personal hygiene is not observed.

Most infections result from contact with a household member or a sex partner who has hepatitis A. Casual contact, as in the usual office, factory, or school setting, does not spread the virus.

Can HAV be spread through sex?

Yes. Sex involves close, intimate contact (vaginal or anal) and increases the risk of exposure to HAV in the feces of an infected person.

How long does it take to show signs of illness after coming in close contact with a person who has HAV infection?

It can take 15-50 days to become infected (average 28 days). People with HAV infection might not have any signs or symptoms of the disease. Adults are more likely to have symptoms than children. About 7 out of 10 adults have symptoms, while children less than age 6 years have no symptoms, usually. Some people have symptoms of hepatitis A recur for 6-9 months; this condition is called relapsing hepatitis A.

What are the symptoms of hepatitis A?

People with symptoms of hepatitis A can feel quite sick. If symptoms are present, they usually occur suddenly and might include fever, tiredness, loss of appetite, nausea, abdominal discomfort, dark urine, and jaundice (yellowing of the skin and eyes).

Symptoms usually last less than 2 months; some people (10%-15%) are ill for as long as 6 months. Studies show that 11%-22% of people with hepatitis A are hospitalized. Infected adults who become ill lose an average of 15½ days of work if not hospitalized and 33¼ days of work, if hospitalized.

How serious is hepatitis A?

Hepatitis A can be quite serious. Each year in the United States, approximately 100 people die from HAV-related causes.

Can people become chronically infected with HAV?

No. HAV only causes acute (recently acquired) infection, not chronic infection. Relapsing hepatitis A, as described above, goes away and is NOT a chronic HAV infection. (Both hepatitis B and hepatitis C viruses can cause chronic infection.)

How common is hepatitis A in the United States?

In 2005, there were 4,488 acute cases of hepatitis A reported to the Centers for Disease Control and Prevention (CDC). An estimated 42,000 new infections were estimated to have occurred in 2005. The occurrence of HAV infection has been steadily decreasing over the past several years. Since the licensure of vaccines to prevent HAV infection, disease rates have fallen to the lowest level ever recorded in the United States.

How common is HAV infection in the world?

HAV infection occurs widely throughout the world. The infection is especially common in countries in Latin America, Africa, the Middle East, Asia, the Caribbean, and the Western Pacific. This means that people can become infected with HAV in many travel destinations, even when using luxury tourist accommodations. The only destinations around the world for which CDC does not recommend hepatitis A vaccination or immune globulin (IG) for U.S. travelers before departure are Canada, Western Europe, Australia, New Zealand, and Japan.

How does a person know if s/he is HAV infected?

To diagnose acute hepatitis A, a blood test called IgM anti-HAV is needed. There is also a blood test available that shows if a person was infected with HAV in the past (hepatitis A antibody [anti-HAV]). Talk to your doctor or someone from your local health department if you suspect that you have been exposed to HAV or any type of hepatitis virus.

Is there a medicine to treat hepatitis A?

There is no medicine that will treat or "cure" hepatitis A. Supportive care includes bed rest, fluids, and fever-reducing medicines. Take fever-reducing medicine only if your physician recommends it.

How long can a person with HAV infection spread HAV?

The most likely time for an HAV-infected person to spread HAV to others is during the two weeks before the infected person develops symptoms. Clearly, if a person doesn't even know that s/he is infected, it makes it difficult to protect others from getting the infection. The risk of spreading HAV becomes smaller over time and can still be present one week or longer after symptoms develop (e.g., yellowing of skin and eyes). Infants are more likely to be capable of spreading HAV for longer periods of time.

If a person has had close personal contact with an HAV-infected person and hasn't been vaccinated, what should the person do?

If an unvaccinated person thinks that s/he might have been exposed, s/he should call their health professional immediately to schedule an appointment to determine whether a real exposure has occurred and whether IG should be administered. IG is a concentrated dose of human antibodies that includes anti-HAV. In most cases, this preparation can protect an exposed person from developing HAV infection. It's important to give IG within two weeks following the exposure (the closer to the exposure the better). (See Q & A about "Hepatitis A Vaccine" for information about IG.)

Can a person get infected with HAV more than once?

No. Once you recover from the infection, you develop antibodies called anti-HAV that provide lifelong protection from future infections. After recovering from hepatitis A, you won't get it again and you cannot transmit HAV to others.

How does HAV differ from hepatitis B virus (HBV) and hepatitis C virus (HCV)?

HBV, HCV, and HAV are viruses that attack and injure the liver, and can cause similar symptoms. Usually, people get HAV infection from close personal contact with an infected person. HBV and HCV are spread when an infected person's blood or blood contaminated body fluids enter another person's bloodstream. HBV and HCV infections can cause lifelong (chronic) liver problems. HAV does not.

There are vaccines that will protect people from HAV infection and HBV infection. Currently, there is no vaccine to protect people from HCV infection. There are medications that are approved by the Food and Drug Administration (FDA) for treatment of chronic HBV and HCV infections. If a person has had one type of viral hepatitis in the past, it is still possible to get the other types.

When did the first hepatitis A vaccine first become available?

There are currently two hepatitis A vaccine products approved by the FDA in the United States. The first hepatitis A vaccine became available in 1995 (HAVRIXR), followed by the second hepatitis A vaccine in 1996 (VAQTAR). They are equally safe and effective.

What kind of vaccine is hepatitis A vaccine?

Hepatitis A vaccine is an inactivated virus vaccine. No part of the vaccine is "live".

How is hepatitis A vaccine given?

The vaccine is given by an injection into the muscle of the upper arm for adults, but may also be given in the thigh muscle of a younger child.

Who should get this vaccine?

People at increased risk for exposure to HAV infection or those who are more likely to get seriously ill if infected with HAV should be vaccinated. According to CDC recommendations, these individuals include:

- All children at age 1 year (12-23 months)
- People age 12 months or older who are traveling to or working in any area of the world except the United States, Canada, Western Europe, Japan, New Zealand, and Australia
- Men who have sex with men
- Illegal drug users, both oral and injecting
- People who have blood clotting disorders
- People who work with HAV-infected primates or with HAV in a research laboratory setting. No other groups have been shown to be at increased risk for HAV infection because of occupational exposure.
- People with chronic liver disease are not at increased risk of getting infected, but are at risk for developing serious complications if they get infected.
- Any person who wishes to be immune to hepatitis A

Hepatitis A vaccine is NOT routinely recommended for healthcare workers, sewage workers, or daycare providers. Children who are not vaccinated by age two years should be vaccinated as soon as feasible.

How many doses of hepatitis A vaccine are recommended for fullest protection?

Two doses are recommended. The second dose is given no sooner than six months after the first dose.

I'm not in a group for which hepatitis A vaccine is recommended. Can I still get vaccinated to protect myself against HAV-contaminated food, etc.?

Yes. Hepatitis A vaccine is safe and effective and is licensed for use in any person age 12 months and older.

How long does hepatitis A vaccine protect you?

Estimates for long term protection for fully vaccinated people (that is the full two dose series) suggest that protection from HAV infection could last for at least 25 years in adults and at least 14-20 years in children. Experts continue to study the long term effectiveness of this vaccine to determine whether a booster dose will be needed.

What organizations recommend hepatitis A vaccine?

The CDC, the American Academy of Pediatrics, the American Academy of Family Physicians, the American College of Obstetricians and Gynecologists, and the American College of Physicians.

Is hepatitis A vaccine safe?

Yes, hepatitis A vaccine is very safe. No serious adverse events have been attributed definitively to hepatitis A vaccine. Since the licensure of the first hepatitis A vaccine in 1995, approximately 188 million doses of hepatitis A vaccine have been sold worldwide, including 50 million doses in the United States.

What side effects have been reported with this vaccine?

The most common side effect is a sore arm, which happens to one out of two adults and one out of five children. Less common side effects include headache, loss of appetite, low-grade fever, or tiredness. When these problems happen, they usually start 3-5 days after vaccination and usually last for one or two days. A very rare but serious side effect is a generalized allergic reaction. If this happened, it typically occurs within a few minutes to a few hours following the injection.

How effective is hepatitis A vaccine?

Hepatitis A vaccine is very effective. It appears that 100% of adults, adolescents, and children become immune to HAV infection after getting two doses.

After one dose, at least 94% of people become immune for the short term, for example, before travel to high-risk countries.

Who should not receive hepatitis A vaccine?

People who have had a serious allergic reaction to hepatitis A vaccine in the past, or who are known to be allergic to any part of the hepatitis A vaccine, should not receive it. People with moderate or severe acute illness should wait to receive hepatitis A vaccine until their condition has improved.

Can I receive hepatitis A vaccine when I am pregnant?

The answer to this question is not well studied, but because hepatitis A vaccine is produced from inactivated HAV, the theoretical risk to the developing fetus is expected to be low. The risk associated with vaccination, however, should be weighed against the risk for hepatitis A in women who may be at high risk for exposure to HAV.

Can the vaccine cause HAV infection?

No.

Is there a vaccine that protects against both HAV and HBV infections?

Yes. TwinrixR, the hepatitis A and hepatitis B combination vaccine manufactured by GlaxoSmith-Kline, was licensed for use in the United States in 2001 for people 18 years of age and older. Three doses of Twinrix are necessary for full protection against both hepatitis A and hepatitis B virus infections.

How soon are people protected after receiving hepatitis A vaccine?

Optimal protection against HAV infection begins four weeks after the first dose of hepatitis A vaccine.

What is immune globulin (IG)?

IG is a preparation of antibodies that can be given before exposure to HAV for short-term protection against HAV infection and for people who have already been exposed to HAV. IG must be given within 2 weeks after exposure to HAV for maximum protection.

If risk of infection (e.g., travel) starts sooner than 4 weeks after the first vaccine dose, what should be done?

Because protection might not be optimal until 4 weeks after vaccination, people traveling to a high risk area less than 4 weeks after the initial dose of hepatitis A vaccine should also be given an injection of IG.

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Adapted from <http://www.immunize.org/catg.d/p4204.pdf> on 6/6/2008. We thank the [Immunization Action Coalition](#)

This fact sheet is for information only and is not meant to be used for self-diagnosis or as a substitute for consultation with a health care provider. If you have any questions about the disease described above or think that you may have this infection, consult a health care provider.

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