

MALARIA: PREVENTION IS BETTER THAN CURE

Key facts on malaria

- Nearly half of the world's population (40%) – approximately **3 billion people** – is at risk of contracting malaria.
- Malaria is spread to humans through bites from **mosquitoes** infected with a parasite.
- Africa is home to **92%** of malaria cases and **93%** of malaria-related deaths.
- Malaria is one of the leading causes of death in **children under 5**, taking the life of a child practically every 2 minutes.
- **Pregnant women** and their **newborns** are particularly vulnerable to malaria due to their low immunity levels.
- Without access to prevention and treatment measures, the impact of the infection can be **long-term** and **life-threatening**.
- Long-lasting insecticide-treated nets (LLINs) are the most effective and inexpensive way to prevent the transmission of malaria. One bed net can protect 2 people for up to **3 years**.
- Globally, malaria control and **elimination** require billions of dollars in investment and a concerted effort among governments, health care providers and communities coming together to create awareness, that **prevention** is better than treatment.

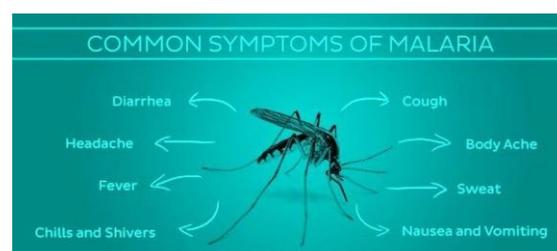
(Source: WHO, 2019)

What is Malaria? Malaria is a life-threatening disease caused by parasite that is transmitted to people through the bite of infected female *Anopheles*

mosquito. It is preventable and curable. In 2017, there were an estimated 219 million cases of malaria in 87 countries. Malaria is caused by *Plasmodium* parasite. The parasite spreads to people through the bite of infected female *Anopheles* mosquito, called “malaria vector”. There are 5 parasite species that cause malaria in humans, and 2 of these species – *P. falciparum* and *P. vivax* – pose the greatest threat.

What are the first signs and symptoms of malaria?

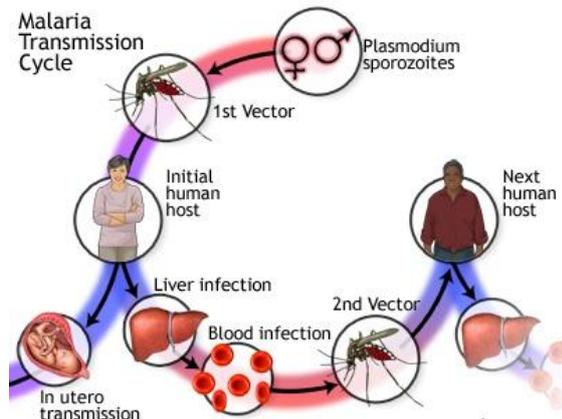
Symptoms usually appear 10-15 days after the infective mosquito bite. The first symptoms – fever, headache, and chills – may be mild and difficult to recognize as malaria. If not treated within 24 hours, *P. falciparum* malaria can progress to severe illness, often leading to death. Children with severe malaria frequently develop one or more of the following symptoms: severe anaemia and cerebral malaria. In adults, multiorgan failure is also frequent.



Who are at high risk? Some population groups are at considerably higher risk of contracting malaria, and developing severe disease, than others. These include infants, children under 5 years of age, pregnant women and patients with HIV/AIDS, as well as non-immune migrants, mobile populations and travelers. National malaria control programmes need to take special measures to protect these population

groups from malaria infections, taking into consideration their specific circumstances.

Transmission? Malaria is transmitted through the bite of female *Anopheles* mosquito which bites between dusk and dawn. The intensity of transmission depends on factors related to the parasite, the vector, the human host, and the environment.



Malaria epidemics can occur when climate and other conditions suddenly favour transmission in areas where people have little or no immunity to malaria. They can also occur when people with low immunity move into areas with intense malaria transmission, for instance to find work, or as refugees.

How malaria is diagnosed and treated?

Early diagnosis and treatment of malaria reduce disease and prevent deaths. It also contributes to reduce malaria transmission. The best available treatment, particularly for *P. falciparum* malaria, is artemisinin-based combination therapy (ACT).

WHO recommends that all cases of suspected malaria be confirmed using parasite-based diagnostic testing (either microscopy or rapid diagnostic test) before administering treatment. Results of parasitological confirmation can be available in 30 minutes or less.

Which are prescribed antimalarial drugs?

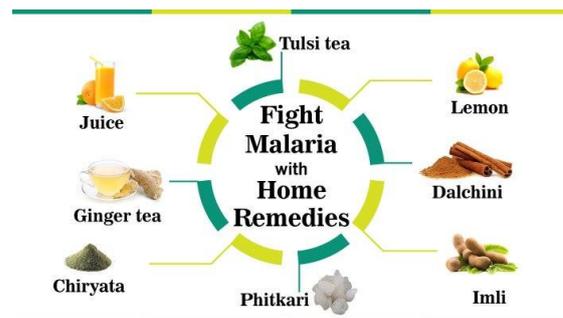
Antimalarial medicines can also be used to prevent malaria. For travelers, malaria can be prevented through chemoprophylaxis, which suppresses the blood stage of malaria infections, thereby preventing malaria disease. For pregnant women living in moderate-to-high transmission areas, WHO recommends intermittent preventive treatment with sulfadoxine-pyrimethamine, at each scheduled antenatal visit after the first trimester.

Any vaccine developed against malaria till date?

RTS,S/AS01 (RTS,S) is the first and, to date, the only vaccine to show partial protection against malaria in young children. It acts against *P. falciparum*, the most deadly malaria parasite globally and the most prevalent in Africa.

What are the home remedies for malaria?

One can have 2 to 3 glasses of fresh orange juice if infected with malaria. Anti-inflammatory, antioxidant and antimicrobial properties in cinnamon help in dealing with symptoms of malaria. Ginger in hot water with small amount of honey is also helpful during malaria.



How long will it take to recover from malaria?

In general, it takes about two weeks of treatment to be cured of malaria. However, in some individuals, relapses are possible. The time period from initial parasite infection to the appearance of symptoms varies according to the particular species of *Plasmodium* that infects an individual.

Which plants and trees naturally repel mosquitoes? *Citronella*, (one of the ingredients of all the commercial mosquito repellents) Lavender, Basil, Rosemary, Garlic are some of important plants and herbs that repel mosquitoes. Neem and Eucalyptus are important mosquito repelling trees. Neem oil mixed with coconut oil/citronella oil/eucalyptus oil can

be applied on body as protection measure against mosquitoes.

Is malaria contagious from human to human? No, malaria is not contagious. Malaria does not spread from person to person and is not sexually transmitted. Malaria is transmitted from mosquitoes to humans.

PREVENT MOSQUITO BREEDING TO PREVENT MALARIA

- Clean and dry coolers at least once a week. Put diesel / petrol / temephos granules in those coolers which cannot be emptied.
- Change water of bird pots regularly.
- Overhead and other water tanks should be kept covered by tight fitting lid.
- Don't keep unused containers, tyres, cups, broken utensils etc. in open.
- Prevention of mosquito breeding at construction site is responsibility of builder/owner.

Helpline Numbers: Toll-free no. 1800-1122-60

[On detection of repeated breeding, besides challan Police complaint may be lodged under Sec. 269 IPC]

Telephone Numbers for Delhi region

<u>Zone</u>	<u>Control Room</u>	<u>DHO</u>	<u>Anti-malaria Officer</u>
Central	29812700	29819445	29819204
South	26517188	26566671	26513077
Najafgarh	25321235	28014535	28010349
West	25422700	25117204	25103415

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