Toxoplasmosis

Toxoplasmosis is a worldwide disease caused by the protozoan parasite *Toxoplasma gondii*. It primarily affects the central nervous system, but can also affect other organs such as the eyes, heart, and liver. The disease is most common among adults and is usually asymptomatic or causes mild flu-like symptoms. However, it can be severe in pregnant women, newborns, and immunocompromised individuals, leading to congenital infection or opportunistic infection, respectively.

**Prevalence and Incidence**

- **Prevalence**: Approximately 1 in 20 adults in the United States have been infected with *Toxoplasma gondii*.
- **Incidence**: The number of new cases in the United States is not well documented, but it is estimated to be around 100,000 cases per year.

**Transmission Routes**

- **Fetal Infection**: Vertical transmission from infected mothers to the fetus during pregnancy.
- **Congenital Infection**: Infants born to infected mothers may develop serious neurological, ocular, or cardiac complications.
- **Postnatal Infection**: Transmission can occur through the ingestion of contaminated food or water, or through contact with infected domestic cats or soil contaminated with cat feces.

**Prevention Measures**

- **Fetal Prevention**: Antepartum testing and treatment with pyrimethamine and sulfadiazine are recommended for women with a high risk of infection.
- **Postnatal Prevention**: Avoiding raw or undercooked meat, poultry, and other potential sources of contamination.

**Conclusion**

Understanding the epidemiology and transmission of Toxoplasmosis is crucial for preventing serious complications, especially in pregnant women and immunocompromised individuals. Continuous monitoring and research are necessary to improve prevention strategies and treatment options.