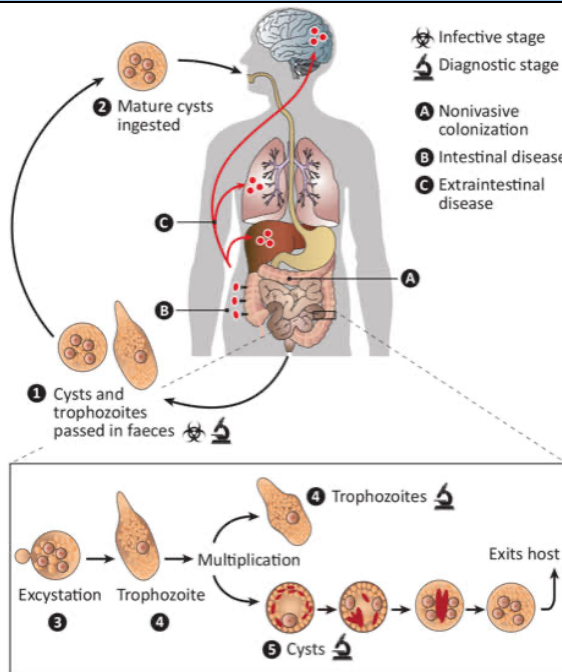


Figure 1: Entamoeba histolytica life cycle



Cysts and trophozoites are passed in faeces **1**. Cysts are typically found in formed stool, whereas trophozoites are typically found in diarrheal stool. Infection with *Entamoeba histolytica* (and *E. dispar*) occurs via ingestion of mature cysts **2** from faecally contaminated food, water, or hands. Exposure to infectious cysts and trophozoites in faecal matter during sexual contact may also occur. Excystation **3** occurs in the small intestine and trophozoites **4** are released, which migrate to the large intestine. Trophozoites may remain confined to the intestinal lumen (A: non-invasive infection) with individuals continuing to pass cysts in their stool (asymptomatic carriers). Trophozoites can invade the intestinal mucosa (B: intestinal disease), or blood vessels, reaching extraintestinal sites such as the liver, brain, and lungs (C: extraintestinal disease). Trophozoites multiply by binary fission and produce cysts **5**, and both stages are passed in the faeces **1**. Cysts can survive days to weeks in the external environment and remain infectious in the environment due to the protection conferred by their walls. Trophozoites passed in the stool are rapidly destroyed once outside the body, and if ingested would not survive exposure to the gastric environment.

Source: CDC (Centers for Disease Control and Prevention, Atlanta, Georgia, USA):

<https://www.cdc.gov/dpdx/amebiasis/>