Nonpathogenic Intestinal Protozoa

Organisms:
The following organisms belong to the amebae, are nonpathogenic, and cause no disease.

*Entamoeba dispar* (also resembles *E. moshkovskii*)

*Entamoeba hartmanni*

*Entamoeba coli*

*Endolimax nana*
Iodamoeba bütschlii

The following organisms belong to the flagellates, are nonpathogenic, and cause no disease.

Chilomastix mesnili

Pentatrichomonas hominis – no cyst form known

**Life Cycle:**
Intestine, organisms passed in feces

**Acquired:**
Fecal-oral transmission via cyst (or trophozoite in the case of *Pentatrichomonas hominis*) form; contaminated food and water

**Epidemiology:**
Worldwide, primarily human-to-human transmission

**Clinical Features:**
None

**Clinical Specimen:**
**Intestinal:** Stool

**Laboratory Diagnosis:**
Intestinal: Ova and Parasite examination (concentration, permanent stained smear); identification based on morphology

Organism Description:
**Trophozoite**: No nuclear chromatin, large karyosome, relatively clean cytoplasm (may contain some debris); tremendous nuclear variation (can mimic *Entamoeba hartmanni, Dientamoeba fragilis* and *Iodamoeba bütschlii*).
**Cyst**: May contain linear structures (pale), mature cyst contains 4 nuclei (rare to see two-nucleated stage).

Treatment:
None

Control:
Improved hygiene, adequate disposal of fecal waste, adequate washing of contaminated fruits and vegetables

Comments:
All nonpathogenic intestinal protozoa should be reported to the physician (organism genus, species, stage – trophozoite/cyst). If only nonpathogens are found, but the patient remains symptomatic, other organisms (pathogens) may be present and require additional testing.