

League of Immuno-Legends Disease Handout

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Disclaimer: All of the information contained in this document was taken from the Centers for Disease Control and Prevention at cdc.gov, 2021

Common Cold

Virus

Viral infection of the nose and throat (upper respiratory tract)

- **Symptoms:** Sore throat, congestion, runny nose, sneezing
- **Treatments:** Stay hydrated, rest, decongestants, cough syrup
- **Prevention:** Wash hands, disinfect items, use tissues, eat well, get enough exercise and sleep

Influenza (Flu)

Virus

Viral infection that attacks your respiratory system — your nose, throat and lungs

- **Symptoms:** Fever, cough, sore throat, fatigue
- **Treatments:** Stay hydrated, rest, pain relievers, antiviral drugs
- **Prevention:** Vaccination, wash hands and clean surfaces, cover coughs and sneezes, avoid touching face

Rabies

Virus

Fatal, but preventable virus that affects the central nervous system and spreads to people by a bite or scratch from an infected animal.

- **Symptoms:** Fever, delirium, hallucinations, hydrophobia
- **Treatments:** Fatal disease with no existing treatments, shot administered *immediately* can help
- **Prevention:** Vaccinate pets, report stray animals, avoid wild animals

Norovirus

Virus

Extremely contagious virus often misnamed the “stomach flu” that causes inflammation of the stomach or intestines.

- **Symptoms:** Diarrhea, vomiting, nausea, stomach pain
- **Treatments:** Stay hydrated, rest, stay home, avoid sugary drinks
- **Prevention:** Wash hands, carefully clean foods, disinfect surfaces

Lyme Disease

Bacteria

Bacterial infection that causes more than 300,000 illnesses each year in the United States transmitted through the bite of infected ticks.

- **Symptoms:** Fever, headache, sore throat, skin rash
- **Treatments:** Antibiotics
- **Prevention:** Reduce exposure to ticks, walk on trails, treat clothes, check for ticks on self and pets

Strep Throat

Bacteria

Bacterial infection caused by “group A strep” spread through contact with droplets from an infected person.

- **Symptoms:** Sore throat, fever, red/swollen tonsils, tiny red spots
- **Treatments:** Antibiotics, acetaminophen, iBuprofen
- **Prevention:** Wash hands, cover coughs and sneezes

Anthrax

Bacteria

Serious bacterial infection that is transmitted when spores get inside the body, become activated, multiply, spread and produce toxins.

- **Symptoms:** Fever, chills, chest discomfort, shortness of breath, confusion, shaking
- **Treatments:** Antibiotics, antitoxin
- **Prevention:** Rare, can receive vaccination in high-risk areas

Pneumonia

Bacteria

Infection of the lungs that can cause mild to severe illness in individuals of all ages.

- **Symptoms:** Fever, cough with mucus, fever, chills, shortness of breath, chest pain, tiredness
- **Treatments:** Antibiotics, aspirin, stay hydrated, rest
- **Prevention:** Vaccination, wash hands and clean surfaces, cover coughs and sneezes, avoid cigarettes

Malaria

Parasitic

Serious and sometimes fatal disease caused by a parasite that commonly infects humans through mosquitos.

- **Symptoms:** High fever, shaking chills, and other flu-like symptoms
- **Treatments:** Depends on species of parasite, area infected and drug resistance status
- **Prevention:** Insecticide treated nets, indoor residual spraying, intermittent preventative treatment

Lung Cancer

Cancerous

Disease in which cells in the lungs grow out of control.

- **Symptoms:** Recurring cough, coughing up blood, chest pain, loss of appetite, hoarseness
- **Treatments:** Immunotherapies, chemotherapy, surgery, targeted drug therapy
- **Prevention:** Avoid smoking and secondhand smoke, test for radon

Athlete's Foot

Fungal

Infection of the skin and feet caused by a variety of different fungi.

- **Symptoms:** Skin fissures or scales that can be red and itchy
- **Treatments:** Anti-fungal medications and creams, anti-fungal soap, keep foot dry, clean and cool
- **Prevention:** Clip nails, avoid walking barefoot in locker rooms or public showers

Tapeworm

Parasitic

Parasitic infection caused by a tapeworm often found in raw or undercooked meat.

- **Symptoms:** Stomach pain, unexplained weight-loss, intestinal blockage, digestive problems
- **Treatments:** Anthelmintics, prescription medication
- **Prevention:** Cook meat to safe temperatures

Melanoma (Skin Cancer)

Cancerous

Third most common form of skin cancer in the United States and most deadly.

- **Symptoms:** New pigmented or unusual looking skin growth/mole
- **Treatments:** Immunotherapies, chemotherapy, surgery, radiation
- **Prevention:** Protect yourself from UV rays, stay in the shade, use sunscreen, avoid indoor tanning

Ringworm

Fungal

Common skin infection caused by a fungus.

- **Symptoms:** Itchy skin, ring-shaped rash, red, scaly cracked skin, hair loss
- **Treatments:** Anti-fungal creams, prescription medications
- **Prevention:** Keep skin clean and dry, avoid walking barefoot in locker rooms and public showers, change underwear and socks daily

Breast Cancer

Cancerous

Disease in which cells in the breast grow out of control.

- **Symptoms:** Lumps in the chest area, bloody nipple discharge, breast irregularities
- **Treatments:** Chemotherapy, surgery, radiation
- **Prevention:** Can decrease some risk by keeping a healthy weight, exercising, and avoiding alcohol

Prostate Cancer

Cancerous

Disease in which cells in the prostate grow out of control.

- **Symptoms:** Pain or trouble when urinating, usually causes no symptoms at all
- **Treatments:** Radiation, surgery, chemotherapy, hormone therapy
- **Prevention:** Can decrease some risk by keeping a healthy weight and exercising