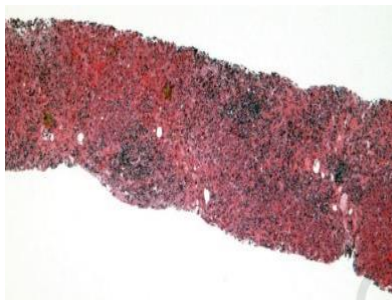


### What is AIH?

**Autoimmune hepatitis (AIH)** is a rare and chronic auto-immune liver disease where the immune system attacks your liver cells.

Your liver makes many proteins, is good at clearing toxins, and is key for a healthy immune system. In AIH, your immune cells attack the liver however and this injury causes inflammation (hepatitis), which if not treated results in liver damage and scarring i.e. cirrhosis.

AIH is a lifelong disease that can be managed. The key to this is working together with your medical team to use the best treatments to control the inflammation.



### Contact Information

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[www.uhn.ca/Medicine/Clinics/Liver\\_Clinic](http://www.uhn.ca/Medicine/Clinics/Liver_Clinic)



@Autoimmuneliver

### Resources

**Canadian Liver Foundation**

[www.liver.ca](http://www.liver.ca)

**Autoimmune Hepatitis  
Association**

<http://www.aihep.org/>

### How Can I Help?

**Donate now:** Contact Josh  
Lai at 416-340-5204 /  
[josh.lai@uhn.ca](mailto:josh.lai@uhn.ca) or visit  
[tgwhf.ca](http://tgwhf.ca)

**Research:** Ask your physician  
how you can help with any  
research into this disease.

# Autoimmune Hepatitis (AIH)



TORONTO CENTRE FOR  
LIVER DISEASE

## How do I know I have AIH?

Many patients with AIH **will not have symptoms.**

If symptoms exist, they include:

- Fatigue (tiredness)
- Decreased appetite
- Drowsiness
- Aches/pains in muscles

In some patients, there may be jaundice (yellowing of the skin and eyes.)

## How is AIH Diagnosed?

Currently, there is no one perfect test for AIH. In a blood test, patients with AIH will often have what are known as auto-antibodies (e.g. ANA, SMA), higher amounts of IgG (a type of antibody that fights infections), as well as high liver enzymes, particularly ALT or AST.

Diagnosis is also based on making sure there is no infection, no medication related liver damage, and nothing inherited. A liver biopsy is frequently used to help confirm the diagnosis and the need for long-term treatment.

## Why do I have AIH?

Every year over 1000 people in Canada are diagnosed with AIH; it occurs in people of all ages, ethnicities and genders. Although the cause is unknown, AIH may be triggered by environmental toxins in people who have an underlying genetic predisposition.

Environmental toxins may include infections, drugs, herbs, toxins we don't even know the name of, bacteria in the bowel etc. People with AIH will often have other autoimmune diseases such as thyroid disease, celiac disease, or rheumatoid arthritis.

## How is AIH Treated?

Treatments are tailored to each individual patient, as AIH is a disease that differs between each person. AIH is managed well by suppressing the immune system and decreasing inflammation in the liver. This is achieved first through corticosteroids (working like a fire-extinguisher to rapidly treat inflammation), then maintained with drugs like **azathioprine** (like a smoke-detector to stop inflammation coming back).

**Treatment has been shown to make people live longer.**

**Prednisone** is a corticosteroid which is used to suppress the immune system and decrease inflammation rapidly. It is the first form of therapy and will be prescribed in doses around 20-30 mg/day, with doses dropping over time.

Therapy will continue for 12-24 months before considering any drug withdrawal, although the corticosteroid dose drops over time. Stopping treatment completely is unusual as disease often recurs.

To manage treatment side-effects some patients need alternative medicines, such as Budesonide, Mercaptopurine, Mycophenolate, Tacrolimus or Rituximab.

## Virtual Medicine

Providing easy access to quality health care is a priority for physicians at The Toronto Center for Liver disease. For this reason, virtual communication tools are utilized to provide follow up appointments where appropriate.

## FAQ

### *What are the side effects of corticosteroids?*

Side effects include weight gain, puffiness of the face, diabetes, cataracts, fluid retention, osteoporosis as well as susceptibility to infection. In order to combat these side-effects, practices such as vitamin D supplements, monitoring blood glucose and blood pressure as well as cataracts are important; equally important is using the optimal dose of corticosteroids.

### *What are the side effects of azathioprine?*

Side effects include pancreatitis, nausea/flu-like symptoms, liver toxicity as well as a risk for skin and blood cancers. To combat this, bloods are monitored regularly. Most people do very well on Azathioprine.

## Key Points:

- 1. Your immune system attacks the liver cells in AIH.**
- 2. AIH is treatable by suppressing this attack.**
- 3. Whilst all treatments have risks, for most treatment, benefits far outweigh treatment side-effects.**
- 4. Before treatments for AIH were used routinely, there was a very high risk of liver damage; now liver transplant for AIH is very uncommon.**