

## PHARMACY

### Drug Information

# Medications to Treat *Helicobacter Pylori* Infection



### **What is *Helicobacter pylori* Infection?**

- *Helicobacter pylori* (*H. pylori*) is a bacterium that lives on the lining of the stomach. Most people infected with *H. pylori* do not have any symptoms and may never develop illness as a result of the infection.
- *H. pylori*, however, alters the protective coating within the stomach and duodenum (small intestine) in some individuals, which results in ulcers for these individuals. This allows stomach acid to attack the sensitive underlying tissues.

### **How Do People Get Infected?**

- It is not known how *H. pylori* is transmitted or why some patients shows the symptoms while others do not. The most likely spread is from person to person through faecal-oral or oral-oral routes.

### **How to Prevent Infections?**

- Since the source of *H. pylori* is not known yet, recommendations for avoiding infection have not been made.
- In general, good habits in basic hygiene and food safety should always be adhered to, e.g. washing hands thoroughly before meals, eating food that has been thoroughly cooked and drinking water from a safe, clean source.

### **Common Symptoms and Signs of People Infected With *H. pylori***

- Gnawing or burning pain in the abdomen
- Pain often occurs when the stomach is empty but can occur at any other time and may last from minutes to hours
- Pain is relieved by eating food or taking antacids
- Nausea, vomiting, weight loss and loss of appetite occur less frequently

### **Emergency Symptoms That Require Medical Attention**

If you have any of these symptoms, call your doctor right away:

- Sharp, sudden, persistent stomach pain.
- Bloody or black stools.
- Bloody vomit or vomit that looks like coffee grounds.

These emergency symptoms could be signs of a serious problem or a bleeding ulcer.

### What is the Treatment for *H. pylori* Infections?

- Most treatment plans involve taking several medications for 10 – 14 days.
- The most effective treatment is known as the “triple therapy”. It involves taking two antibiotics to kill the bacteria and a proton pump inhibitor to reduce the amount of acid produced. This combination therapy clears up to 90% of *H. pylori* cases if it is taken correctly.
- A “quadruple therapy” is recommended if the “triple therapy” does not resolve the infection. It involves taking another two types of antibiotics, Bismuth Chelate and a proton pump inhibitor.

### What are the Medications Used to Treat *H. pylori* Infection?

Medication Class	Medication Name	Benefits
Antibiotics	<ul style="list-style-type: none"> <li>• Amoxicillin</li> <li>• Clarithromycin</li> <li>• Metronidazole</li> <li>• Tetracycline</li> <li>• Levofloxacin</li> </ul>	<ul style="list-style-type: none"> <li>• Eradicate <i>H. pylori</i> bacteria.</li> </ul>
Proton pump inhibitors	<ul style="list-style-type: none"> <li>• Omeprazole</li> <li>• Rabeprazole</li> <li>• Esomeprazole</li> <li>• Lansoprazole</li> <li>• Dexlansoprazole</li> </ul>	<ul style="list-style-type: none"> <li>• Suppress stomach acid and help ulcers to heal.</li> </ul>
Stomach Protectant	<ul style="list-style-type: none"> <li>• Bismuth chelate</li> </ul>	<ul style="list-style-type: none"> <li>• Promote ulcer healing.</li> </ul>

### How are the Medications Administered / Taken?

- The full course has to be completed to kill the bacteria and reduce the rate of re-infection. Ulcers take time to heal, hence do not stop your medications even when the pain goes away.

- Take Tetracycline, Bismuth Chelate and Proton Pump Inhibitors on an empty stomach for better absorption.
- If you miss a dose, take the missed dose as soon as you remember. If it is almost time for your next dose, take only the usual dose. Never take a double dosage to make up for the missed dose.

### Can the Medications be Administered / Taken With Other Medications?

- Avoid milk, indigestion remedies, iron/calcium/magnesium supplements, two hours before and after food while taking Tetracycline and Levofloxacin.
- It is important that you inform the doctor, pharmacist about other medications – including over-the-counter medications, supplements and traditional/herbal remedies – that you are currently taking, as they may affect the way you benefit from the medications that treat *H. pylori*.

### What are the Important Side Effects?

- Medications prescribed by your doctor should be beneficial for your condition even though they may result in some inevitable side effects.
- Mild side effects such as dizziness, headache and tiredness may occur. This varies between individuals. Let your doctor know if you experience any serious side effects.

Side Effect	Medication Name	Management
Nausea, vomiting, diarrhoea	Amoxicillin	<u>Nausea &amp; vomiting:</u> Take with or after food. However, Tetracycline is still recommended to be taken on empty stomach for better absorption.
Metallic taste in the mouth, nausea, vomiting, diarrhoea, abdominal pain	Clarithromycin	
		Metronidazole
Nausea, vomiting, diarrhoea	Tetracycline	<u>Diarrhoea:</u> Drink more water.
	Levofloxacin	<u>Metallic taste:</u> Reversible upon

Nausea, vomiting, diarrhoea or constipation		discontinuing the medication. <u>Constipation:</u> Take more fibre/fruits and drink more water.  *If diarrhoea persists more than 5 times a day and the other symptoms are unbearable, please consult a doctor.
Colour urine or stools, constipation	Bismuth chelate	<u>Urine/stool discolouration:</u> Not to be alarmed. It is reversible upon discontinuing the medication.  <u>Constipation:</u> Take more fibre/fruits and drink more water.
Abdominal pain, flatulence (increased passing of gas), diarrhoea, constipation	Omeprazole Rabeprazole Esomeprazole Lansoprazole Dexlansoprazole	Symptoms are usually mild and bearable. It may get better after some time.

If you develop rashes, facial swelling or shortness of breath after taking the medication, you could be allergic to the medication. Please seek medical attention immediately.

### Do I Need Regular Monitoring When Taking These Medications?

- Your doctor may sometimes arrange for you to do a urea breath test at least one month after completion of therapy. This is to check whether the bacteria have completely been eradicated.

### Are There Any Special Precautions That I Need to Take?

- It is important to inform your doctor if you intend to conceive or breastfeed while taking this medication.
- Avoid alcoholic drinks while on Metronidazole.

### How Do I Store These Medications?

- Store your medication in a cool, dry place away from heat, moisture and direct sunlight.

If you have any problem with your treatment, please contact your doctor, pharmacist or nurse clinician.

Please keep all medications out of reach of children.

