Diseases & Conditions

About Cholesterol-Lowering Drugs

Some people have a genetic predisposition to high blood cholesterol levels. These people may need drug therapy in addition to diet to bring their cholesterol down to a safe level.

Niacin (nicotinic acid) is a B-complex vitamin. The main side effects are flushing, itching, tingling, and headache.

Bile-acid sequestrants, such as Questran, work inside the intestine, where they bind to bile from the liver and prevent it from being reabsorbed into the circulation. Bile is made largely from cholesterol, so these drugs deplete the body's supply of cholesterol. The most common side effects from these drugs are constipation, gas, and upset stomach.

HMG-CoA reductase inhibitors, such as Mevacor and Pravachol, block production of cholesterol in the liver itself. These drugs can also produce intestinal side effects, as well as damage to the liver itself, and in a few patients, muscle tenderness.

These drugs will be more effective if you continue to follow a low cholesterol diet. Your doctor may be able to refer you to a dietitian for help in designing a diet especially for you and encouraging you to stay with it.

The chart and text below presents a brief summary of some drugs of the representative classes of available cholesterol-lowering drugs.

Cholesterol-Lowering Drugs	
Brand Name	Generic Name
Atromid-S	clofibrate
Colestid	colestipol
Crestor	rosuvastatin
Lescol	fluvastatin
Lipitor	atorvastatin
Lopid	Gemfibrozil
Mevacor	lovastatin
Niacin	nicotinic acid
Niaspan	niacin
Pravachol	pravastatin
Questran: Questran Light	cholestyramine
Tricor	fenofibrate
Zetia	Ezetimibe
Zocor	simvastatin

Atromid-S (clofibrate)

- Description: Orange, clear gelatin capsule (500mg).
- Purpose: Atromid-S helps to lower levels of cholesterol and triglycerides (blood fats).

- Usual Dosage: One pill three to four times a day is the usual schedule.
- Possible side effects: Nausea, diarrhea, abdominal discomfort, drowsiness, weakness and headache occur occasionally. Skin rash and muscle cramps or stiffness are rare complications.
- Remarks: Keep all appointments with your doctor. Extra care in monitoring blood sugars is needed in diabetics. Periodic blood tests may be required while on this medication. This medication is only a supplement to a low-cholesterol and low-fat diet; therefore, you must continue to follow your doctor's diet recommendations.

Colestid (colestipol granules)

- **Description:** Colestid is available in 5-gram packets, 300-gram and 500 gram canisters, and as a 1 gram yellow, elliptical-shaped tablet.
- **Purpose:** Colestid is a bile acid sequestrant used to lower high cholesterol levels. It works by binding to certain substances in the intestine.
- Usual dosage: One to three packets (5 to 15 grams) one to two times a day. May start with one packet daily and gradually increase dose. If using tablets, usual dose is 2 to 16 grams/day as a single dose or in divided doses.
- **Possible side effects:** Constipation, weight loss, belching, bloating, diarrhea, nausea, vomiting and stomach pain. Rarely, black tarry stools.
- **Remarks:** The powder should never be taken in its dry form; it should always be mixed with at least three to four ounces of water, milk, flavored drink, juice, or carbonated drink. Other medications should be taken one hour before or four hours after taking the Colestid. This medication is only a supplement to a low-cholesterol diet; therefore, you must continue to follow your doctor's diet recommendations.

Crestor (rosuvastatin)

- **Description:** Crestor is available in coated tablets in the following dosage strengths: 5mg (yellow, round tablet), 10mg (pink, round), 20mg (pink, round) and 40mg (pink, oval). Tablets are engraved with the dosage strength on one side of the tablet.
- **Purpose:** Crestor is a "statin" used to lower triglycerides and all bad forms of cholesterol and raise HDL cholesterol (the good form). Crestor should be part of a treatment program that includes a low-fat diet and exercise.
- Usual dosage: The dosage range for Crestor is 5 to 40mg taken once daily, with the starting dose determined by individual response to the drug and the target goal of cholesterol lowering. The usual recommended starting dose is 10mg once daily (at any time of day, with or without food). After 2 to 4 weeks of treatment, lipid levels should be assessed and the dosage adjusted accordingly.
- **Possible side effects:** Crestor may cause rare, but serious side effects including muscle damage that can lead to kidney damage, and liver damage. Other possible side effects include muscle pain, constipation, weakness, abdominal pain, and nausea.
- **Remarks:** Notify your physician promptly of unexplained muscle pain, tenderness, or weakness, particularly if accompanied by fever or feeling sick. Your doctor may have you get blood tests periodically. If you have liver problems, are pregnant, or are breastfeeding, you should not be taking Crestor; call your doctor. This medication is to be taken in addition to following a low-cholesterol diet; therefore, you must continue to follow your doctor's diet recommendations.

Lescol (fluvastatin)

- **Description:** Brown and light brown capsule 20mg; Brown and gold capsule 40mg.
- **Purpose:** Lescol is used to lower cholesterol levels in the blood by blocking the formation of cholesterol.
- **Usual dosage:** Typical starting dose is 20mg daily up to a maximum of 80mg a day.
- **Possible side effects:** Upset stomach, constipation, gas, stomach pain, rash, muscle aches.
- **Remarks:** Notify your physician promptly of unexplained muscle pain, tenderness, or weakness, particularly if accompanied by feeling sick or fever. If you have liver problems, are pregnant, or are breastfeeding, you should not be taking Lescol; call your doctor. Your doctor may have you get blood tests periodically. This medication may be taken with or without food and is best taken in the evening. This medication is to be taken in addition to following a low-cholesterol diet; therefore, you must continue to follow your doctor's diet recommendations.

Lipitor (atorvastatin)

- Description: White, oval, film-coated tablets of 10, 20, and 40mg.
- **Purpose:** Lipitor is used to lower cholesterol levels in the blood by blocking the formation of cholesterol.
- Usual dosage: Initial starting doses range from 10-20mg daily and can be increased up to 80mg once daily depending on blood cholesterol tests.
- **Possible side effects:** Upset stomach, constipation, gas, stomach pain, rash, muscle aches.
- **Remarks:** Notify your physician promptly of unexplained muscle pain, tenderness, or weakness, particularly if accompanied by fever or feeling sick. If you have liver problems, are pregnant, or are breastfeeding, you should not be taking Lipitor; call your doctor. Your doctor may have you get blood tests periodically. This medication may be taken with or without food. This medication is to be taken in addition to following a low-cholesterol diet; therefore, you must continue to follow your doctor's diet recommendations.

Lopid (gemfibrozil)

- **Description:** White and maroon capsule (300mg) and white, oblong, film coated and scored tablet (600mg).
- **Purpose:** Lopid is used to lower elevated triglycerides (blood fats) and cholesterol levels in combination with dietary intervention (low cholesterol, low-saturated fat diet).
- Usual dosage: One tablet (600mg) 30 minutes before breakfast and supper.
- **Possible side effects:** Stomach upset, abdominal pain, muscle pain, nausea, diarrhea, vomiting, gas. Lopid may also produce headache, dizziness and blurred vision.
- **Remarks:** Keep all appointments with your doctor. Diabetics need to take extra care in monitoring blood sugars. Periodic blood tests may be required while on this medication. This medication is only a supplement to a low-cholesterol and low-fat diet; therefore, you must continue to follow your doctor's diet recommendations.

Mevacor (lovastatin)

• **Description:** Peach octagonal tablet (10mg), Light blue, octagonal shaped tablet (20mg), Green, octagonal-shaped tablet (40mg).

- **Purpose:** Mevacor is used to lower cholesterol levels in the blood by blocking the formation of cholesterol.
- Usual dosage: 20 to 40mg given once or twice daily.
- **Possible side effects:** Diarrhea, constipation, gas, abdominal pain, muscle pain and inflammation, dizziness, headache, rash, itching, liver inflammation.
- **Remarks:** Take the medicine with a meal; if taken once a day, take it with the evening meal. Periodic blood tests may be necessary while taking this drug. Notify your doctor if you develop unexplained or prolonged muscle pain. If you have liver problems, are pregnant, or are breastfeeding, you should not be taking Mevacor; call your doctor. This medication is only a supplement to a low-cholesterol diet; therefore, you must continue to follow your doctor's diet recommendations.

Niacin (nicotinic acid)

- **Description:** Niacin is available in both tablet and capsule forms. Some of the forms are available without a prescription.
- **Purpose:** Niacin is used in combination with other measures such as diet and weight loss to reduce cholesterol levels.
- Usual dosage: 1 to 2g, three times a day, with or following meals.
- **Possible side effects:** Flushing of the face and upper body, itching or tingling and headache. These effects usually subside with the continued use of niacin.
- **Remarks:** Take with meals to reduce stomach upset. Aspirin may help decrease flushing, if taken 1/2 hour before Niacin. Follow your health care provider's dietary recommendations.

Niaspan (niacin slow release)

- **Description:** Niaspan is an off-white capsule-shaped tablet containing either 375, 500, 750, or 1000mg of niacin in an extended-release formulation.
- **Purpose:** Niaspan is used to help lower LDL "bad" cholesterol and increase HDL "good" cholesterol and also is useful to help lower triglycerides. It should be used with other measures such as diet modification.
- Usual dosage: Niaspan comes in a 21 day starter pack with seven tablets of 375mg for the first 7 days, seven tablets of 500mg for the next seven days (days 8-14) and seven tablets of 750mg for the next seven days (days 15-21). Then you should continue taking 1000-2000mg daily as prescribed by your doctor.
- **Possible side effects:** Facial and upper body flushing, itching, stomach upset, headache.
- **Remarks:** Aspirin may help to decrease flushing if taken 1/2 hour before the Niaspan. Taking Niaspan with food will help to decrease stomach upset. Follow your health care provider's dietary recommendations.

Pravachol (pravastatin)

- **Description:** White to off-white tablets available in 10 and 20mg strengths.
- **Purpose:** Pravachol is used to lower the levels of cholesterol and other fats in the blood. This may help prevent medical problems caused by cholesterol clogging the blood vessels.
- Usual dosage: 10 to 40mg once daily at bedtime.
- **Possible side effects:** Constipation, diarrhea, dizziness, gas or heartburn.

• **Remarks:** Follow dietary recommendations. Your doctor may have you get blood tests periodically. Promptly report unexplained muscle pain, tenderness, or weakness, especially if you have a fever or do not feel well. If you have liver problems, are pregnant, or are breastfeeding, you should not be taking Pravachol; call your doctor.

Questran; Questran Light (cholestyramine resin powder)

- Description: Questran is available in 9-gram packets and 378-gram cans. Each Questran packet or scoop from the can contains 4 g of the active ingredient (cholestyramine). Questran Light is available in 5-gram packets containing Nutrasweet as a sweetener. Each 5-gram Questran Light packet contains 4 g of the active ingredient (cholestyramine).
- **Purpose:** Questran and Questran Light are used to lower high blood cholesterol levels. They work by binding to certain substances in the intestine.
- **Usual dosage:** One to three packets (or scoops) twice daily. May start with one packet daily and gradually increase dose as directed.
- **Possible side effects:** Constipation, weight loss, belching, bloating, diarrhea, nausea, vomiting, stomach pain, and, rarely, black, tarry stools.
- **Remarks:** This medication should never be taken in its dry form; it should always be mixed with at least 3 to 4 ounces of water, milk, juice, or carbonated drink. Questran and Questran Light can be mixed with other foods (check with your doctor or pharmacist). Other medications should be taken one hour before or four hours after taking Questran or Questran Light. This medication is only a supplement to a low- cholesterol diet; therefore, you must continue following your doctor's diet recommendations.

Tricor (fenofibrate)

Description: Available as yellow capsules (67mg).

Purpose: Tricor is used to lower elevated triglyceride and cholesterol levels in combination with dietary changes (low cholesterol, low-saturated fat diet).

Usual dosage: Initial starting dose is 1-3 capsules daily depending on initial triglyceride levels.

Possible side effects: Upset stomach, headache, rash, flu-like symptoms or muscle aches.

Remarks: Promptly report unexplained muscle pain, tenderness, or weakness, particularly if accompanied by fever or feeling sick. Your doctor may have you get blood tests periodically. This medication may be taken with or without food.

Zetia (ezetimibe)

- **Description:** Zetia is available as a 10mg white to off-white capsule-shaped tablet with "414" engraved on one side.
- **Purpose:** Zetia is used to lower the levels of total cholesterol and LDL in the blood. It is used for patients who cannot control their cholesterol levels by diet alone. Zetia can be used by itself or combined with other drugs used to lower cholesterol.
- **Usual dosage:** 10mg once daily with or without food.
- **Possible side effects:** Stomach pain, feeling tired, back and joint pain, diarrhea.

• **Remarks:** Remain on a cholesterol-lowering diet while taking this drug. Tell your doctor if you have or have had liver problems. If you have liver problems, are pregnant, or are breastfeeding, do not take Zetia while taking a "statin" cholesterol-lowering drug. Report any unexplained muscle pain, tenderness or weakness, especially if you have a fever and do not feel well.

Zocor (simvastatin)

- **Description:** Buff shield-shaped tablet (5mg), Peach shield-shaped tablet (10mg), Tan shield-shaped tablet (20mg), Brick-red, shield-shaped tablet (40mg).
- **Purpose:** Zocor is used to lower the levels of cholesterol and other fats in the blood. This may help prevent medical problems caused by cholesterol clogging the blood vessels.
- Usual dosage: 5 to 40mg daily as a single dose in the evening.
- **Possible side effects:** Constipation, diarrhea, dizziness, gas, heartburn.
- **Remarks:** Follow dietary recommendations. Your doctor may have you get blood tests periodically. Report any unexplained muscle pain, tenderness or weakness, especially if you have a fever and do not feel well. If you have liver problems, are pregnant, or are breastfeeding, you should not be taking Zocor; call your doctor.

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