

## Continued from inside...

### Second Lane

After the first lane has been shot, covered with rock and the rolling has begun, the equipment starts the second lane. The operation is the same as the first lane.

### Sweeping

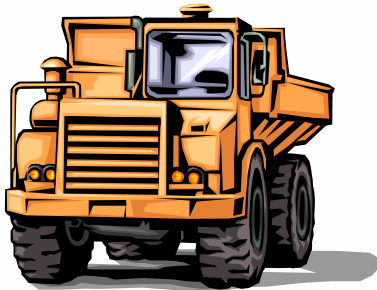
Sweeping is done at the completion of the chipseal process to remove surplus rock from the surface. This loose rock can grind and loosen rock in the chipseal and damage the project. Sweeping is done as soon as possible after the asphalt has set up, usually within 3 to 7 days.

### Fogseal

The City follows each chipseal with a fogseal that helps set the rock and control fly-rock and dust. Fogsealing also adds life to a chipseal. This is a separate process that follows sweeping by up to three weeks.

### Planning

The City of Ontario sealcoats all old and new streets in a neighborhood to save money and prolong street surface life. After a sealcoat, residential streets need only have the sealcoat process every 9 years.



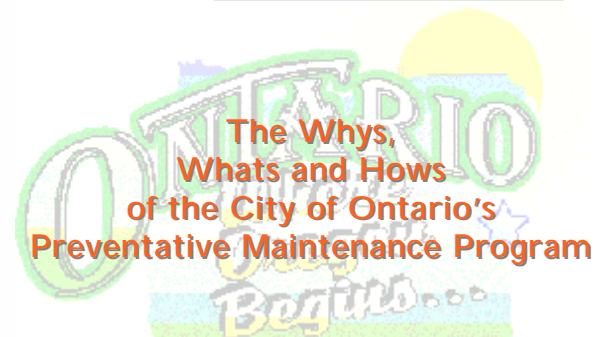
stamp

City of Ontario  
444 SW 4th St.  
Ontario, OR 97914



# CHIP SEAL

Program 2004



Dear Ontario Property Owner,

Asphalt deteriorates in time because of the sun and weather. A chipseal helps seal the surface and provides an armor coat for skid and weather resistance. The best aspect of chipsealing is simple economics.

A 2-inch overlay can preserve a residential road for about 12 years. However, our complete cost for chipsealing that same road is only 15 percent of the cost of a 2-inch overlay and will preserve the roadway surface for about 8 years.

Some preparation work will take place throughout the spring, and the chipseal process traditionally begins the first Monday after the 4th of July. The work involved consists of four phases: applying the chipseal, sweeping excess chips, applying the fogcoat, and microsealing cul-de-sacs. On-street parking will be affected during each phase.

We appreciate your patience during this time, and we realize that while the surface is not very compatible with skates or roller blades, it is still the most economical. For more information, please call the Public Works Director at (541) 881-3231 or the City Shop at (541) 889-8572.

Sincerely,  
*Steve Gaschler*  
*Public Works Director*

## What is a **Chipseal**?

A chipseal is an application of asphalt covered with aggregate rock to maintain an existing asphalt pavement.

### Why Do We Chipseal?

The City of Ontario's Street Department provides safe travel on more than 94 miles of public roads within the City limits. As part of our maintenance program, crews chipseal street surfaces (including new streets) to protect them from water and weather damage and to keep them in good condition. A chipseal application to a road or street has many positive objectives:

- ✓ Chipseal to maintain the existing pavement in its present condition by delaying further aging due to water and sun - this is equally important to new streets;
- ✓ Chipseal to change the texture of the road for skid resistance;
- ✓ Chipseal to supply minimal additional strength to the pavement;
- ✓ Chipseal to provide a moisture barrier and correct existing pavement problems by sealing cracks;
- ✓ Chipseal to give better resistance to studded tires;

Chipsealing saves taxpayers money. By chipsealing instead of overlaying the road, the City saves about \$65,000 per mile. A chipseal should last 8 years with a minimum of maintenance required, and this is money that can be put into other needed projects.

### How is it done?

#### Prep Work

First, the road surface needs to be properly cleaned of debris and any holes patched. Cracks are blown out clean and filled with hot asphalt.

#### Asphalt Application

Next, an asphalt distributor truck starts by shooting only one lane at a time with hot liquid asphalt to assure an even application. The asphalt used is applied at a temperature between 140 and 180 degrees Fahrenheit. After cooling, this asphalt remains slightly flexible to maintain its hold on the rocks.

#### Rock Application

Another piece of equipment, the chip spreader, follows within about a minute with a rock application. The asphalt must be fluid so the rock will be embedded by the displacement of the asphalt. The rocks are an aggregate crushed to a special specification for size and cleanliness.

#### Rolling

Next, a rubber-tire roller is used to set the rock into the fresh oil. This is done to get the flat sides of rock down and produce a tighter chipseal. It takes two to four passes of the roller to set the rock.

