



Surface treatments are cost-effective preventive maintenance methods that renew aging surfaces, protect the underlying pavement structure from moisture deterioration, and fill and seal minor surface deficiencies. Pavement management studies show that timely treatments significantly increase roadway longevity and reduce long term costs. Highway departments have found that a regular schedule of treatments is the lowest cost method of maintaining good quality pavements.



With every dollar spent on preventive maintenance you save many times that amount on expensive reconstruction. At All States Materials Group, our quick, quality surface treatment construction, reduces road closure time and avoids the costly user delays endured during rehabilitation.

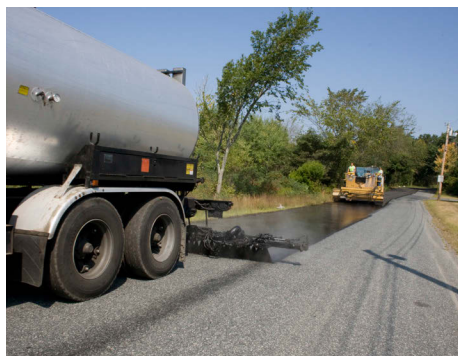
Surface treatments are an ideal low cost solution for improving rural gravel roads. They can also be a good solution for correcting and protecting the surfaces of raveled, poorly constructed or segregated hot mix asphalt pavements.



Surface treatments can be used to restore skid resistance, reduce noise and improve visibility on bituminous concrete pavements.

Surface treatments should be placed on structurally sound roads with good drainage and no signs of base or sub-base failures. The surface should be in generally good condition, with only low severity surface distresses, depending upon the treatment chosen.

Any quality project requires quality materials and quality construction. Our many years of experience combined with quality materials, well-maintained and state-of-the-art equipment, experienced crews, and superior methods provide consistently superior projects.



We always stand behind our work, making sure that your project is a success.



At All States Materials Group, we provide a number of different surface treatments. We can help you determine the strategy which will offer the best performance for your road, depending upon its current condition, traffic requirements and available funding. Let our professionals help you find the right treatment for your road. Our surface treatments include:

- ✓ Chip Seals - *Sand & Stone*
- ✓ Asphalt-Rubber SAM & SAMI
- ✓ Bonded Wearing Course
- ✓ FiberMat® SAM & SAMI
- ✓ Fog Seals



Chip Seals also known as Stone and Sand Seals combine an asphalt layer and cover aggregate to provide a skid resistant wearing surface. The asphalt renews aging surfaces, fills minor cracks, and seals and waterproofs the pavement. It binds the aggregate, which protects the asphalt and provides durable friction. For Stone Seals, we prefer high quality, clean, hard, cubical and uniformly-sized aggregates. Sand Seals need fine, granular, hard and durable sand that is free of organic matter. The asphalt is applied as a water-based emulsion, which bonds to the underlying pavement and the cover aggregate as it cures. Latex may be added to the emulsion before application for durability. Generally, these seals last from three to seven years, depending upon the types of materials, traffic and, most importantly, the condition of the pavement before construction.



### Chip Seal Benefits

- ✓ Waterproofs and seals small cracks and imperfections
- ✓ Enriches aged and oxidized asphalt pavements
- ✓ Improves skid resistance and surface texture
- ✓ Protects underlying pavement from traffic wear
- ✓ Protects the environment and worker safety with water-based emulsion
- ✓ Stretches maintenance dollars as one of the lowest cost treatments available
- ✓ Effective preventive maintenance preserves the value of your pavements



### Chip Seal Uses

Chip seals are suitable for all types of roads from rural to higher traffic volume roadways. Sand seals can fill small cracks and voids, while stone seals provide increased durability and can handle traffic volumes up to 2,500 AADT. Chip seals may also be used on low-traffic, well-

graded gravel roads as a first asphalted surface. For preventive maintenance, the pavement to be sealed should be essentially sound and properly drained.



It should have a good profile and alignment with only minor asphalt aging and cracking. There should be no sign of sub-base movements or surface bleeding. When warranted, potholes and cracks should be filled. The surface should be swept of any stones, sand, mud or other loose debris. Chip seals are the ideal treatment for aging, good quality pavements you want to preserve.

All States Materials Group wants to make sure your road surfacing job is a success. We can help with determining the right treatment at the right time for your pavement. For your overall road program, we can help you evaluate single versus multiple surface treatments as well as other alternatives for cost-effective pavement preservation. Contact our professionals for more information about how All States Materials Group can help you preserve your pavements.