OKLAHOMA DEPARTMENT OF TRANSPORTATION
SUMMARY OF
PAVEMENT AND BRIDGE DECK SMOOTHNESS REQUIREMENTS

In ODOT's 2009 Standard Specification for Highway Construction, General Requirements for Surfaces Section under construction methods, a smoothness tolerance of 1/8 inch per 10 feet using a 10 foot straight edge is defined. The specification applies to PFC (permeable friction course), OGFC (open graded friction course), HMA (hot mix asphalt), PCCP (P.C. concrete pavement) and Bridge Decks. Areas where 1/8 to 1/2 inch per 10 feet tolerances are present are to be ground to within specified tolerances at the contractor's expense. Any areas found above the 1/2 inch tolerance are to be removed and replaced at the contractor's expense. Corrective measures used to ensure the specified surface tolerance are to be approved by the resident engineer at no additional cost to the department. ODOT currently uses this standard for small paving projects and intersections. For larger projects, the contract will contain a special provision written specifically for Pavement Smoothness which is summarized below and is also attached for your information.

Commonly for large projects with quality control and quality assurance pertaining to pavement and bridge deck smoothness there is a special provision that supersedes the spec book. The Special Provisions apply to all types of Portland cement and asphalt concrete pavements as well as bridge decks. ODOT is in the process of rewriting the special provision for Pavement and Bridge Deck Smoothness and hopes to implement the new changes soon.

Smoothness measurement equipment to be used for control and for acceptance testing shall include either The California Profilograph or The Lightweight Profilometer. The current special provision uses a 0.2 inch blanking band. This will change to a zero blanking banking band in the new provision with the exception of bridge decks which will remain at the 0.2inch blanking band. This is the major change to the special provision. Bumps will still be defined as deviations in excess of 0.60 inches (without using a blanking band) and remain subject to corrective measures.