

**Non-Contact Pavement Quality Indicator (PQI™)** – There is a tremendous desire in the road construction industry, as well as from University researchers, for a non-contact device that would make density measurements on-the-run and do so without having to be in contact with the mat surface. Through TransTech Systems' research and development of their cutting edge PQI™ electrical impedance technology and their current, innovative work with the Soil Quality Indicator (SQI™) multi-frequency, electrical impedance spectroscopy technology, it has been determined through their expert physics-based modeling techniques that there is a very strong likelihood that a device can be developed in the near future that will do just that. TransTech also feels that the next logical step is very possible – to multiplex a series of sensors across the width of the mat, attached to either the roller or the screed, and make possible a real time pavement density profile of the entire mat. Software could be developed to graphically, or in a 3-dimensional way, allow the operator or researcher to easily and quickly visualize exactly what the density situation is. If done continuously over entire paved sections, a 3-dimensional profile of the entire mat, both longitudinally and transversely, could be accomplished. This would be revolutionary in the industry and would allow University researchers and contractors to take such readings while traveling at highway speeds!