Abstract

The size of aggregates used in asphalt mix varies from a few microns to a few centimeters. Thus, different imaging equipment are necessary to capture information at different scales. In this talk, Dr. Das will discuss recent explorations with scanning electron microscope, optical microscope, desktop scanner, and camera on aggregates and asphalt mix. Some ideas and results related to shape characterization of aggregates, asphalt binder adsorption in aggregates, estimation of aggregate size distribution, nature and effect of aggregate distribution (ranging from coarse aggregate to filler) on the response of asphalt mix etc. will be presented.

Imaging Studies on Aggregates and Asphalt Mix—from Microscope to Camera

Who: Animesh Das, Ph. D.
Professor, Department of Civil Engineering, Indian Institute of Technology Kanpur, India
What: Civil Engineering Seminar
Where: 3540 Engineering Building
When: July 10, 2018
10:00am-11:00am
Refreshments will be served

About the Speaker

Dr. Animesh Das is a Professor in the Department of Civil Engineering, IIT Kanpur, India. Dr. Das’s area of interest is pavement material characterization, analysis, design and evaluation. He has published more than fifty papers in scientific journals of repute. He has co-authored a text book titled ‘Principles of Transportation Engineering’ published by the Prentice-Hall of India (currently known as PHI learning) in 2003 and authored another book titled ‘Analysis of Pavement Structures’ published by CRC Press - Taylor and Francis Group in 2014. He has received numerous awards in recognition to his contribution in his field. To name a few, Young Engineer Award in 2004 from Indian National Academy of Engineers (INAЕ), IRC-Pt. Jawaharlal Nehru Birth Centenary Award in 2006 from Indian Roads Congress (IRC), Fulbright-Nehru Senior Research Fellowship in 2012 by United States India Educational Foundation (USIEF).

Website: http://home.iitk.ac.in/~adas/