

2013 INTELLIGENT COMPACTION SHOWCASE



OVERVIEW 5 PDH's Available

Roller Integrated Compaction Monitoring (RICM) [i.e., intelligent compaction (IC) or continuous compaction control (CCC)] refers to the compaction of road materials, including subgrade soils, aggregate bases, stabilized materials, and asphalt-paving materials, using modern rollers equipped with an integrated IC or CCC measuring system.

Developed over recent years, intelligent compaction technology has made great strides in combining old and new technologies. Instrumentation, computer technology, and GPS have transformed the slow roller into one of the smartest devices on a jobsite.

The technology continuously records the roller's location and reaction to layer stiffness and plots the result during compaction operations, so the operator can adjust to ensure appropriate compaction effort. The recorded stiffness measurements can be correlated to conventional physical and engineering properties of materials, such as dry density, strength, and modulus.

The features of RICM will help roadway engineers and contractors build consistent (uniform) quality layers to distribute the traffic loads to the subgrade, and will greatly improve the construction quality of roadway compaction in Louisiana. The new technology will benefit the contractor by speeding compaction by focusing efforts where needed to control uniformity.

LADOTD project (424-04-0053, H.002890) - US 90 Frontage Roads from Darnall to LA85 has been selected to provide an evaluation of the technology. The site is located southeast of New Iberia, Louisiana, and consists of the extension of frontage roads from Darnall Road to LA 85 along US 90. Shadowing the normal acceptance process, intelligent roller data will be collected from each pavement layer as measurement passes (soil) and compaction passes for HMA. Work is being coordinated through the LTRC Geotechnical and Asphalt laboratories with SHRP2 contacts, the district forces, and the construction contractor.

LADOTD, in partnership with FHWA and SHRP2 partners, is presenting this 2013 Intelligent Compaction Showcase as part of the 2013 Every Day Counts (EDC) initiative. The EDC initiative is designed to identify and deploy innovation aimed at reducing the time it takes to deliver highway projects, enhance safety, and protect the environment.



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SCHEDULE OF EVENTS

Wednesday, May 15, 2013

Breakfast, Registration 7:30 a.m. – 9:00 a.m. Ramada New Iberia

2915 Hwy 14, New Iberia

Welcome 9:00 a.m. Conference Room, X

Technical Presentations 9:00 a.m. – 10:20 a.m. Conference Room, X

Speaker 1, 20 min George Chang, Transtec

Speaker 2, 20 min David White, Iowa State University, NCHRP

Speaker 3, 20 min Caterpillar, MDP - - Onsite Roller

Speaker 4, 20 min Gavin Gautreau, LTRC – Project Data, Contractor Comments,

and Question/Answer

Break 10:20 a.m. – 10:30 a.m. Conference Room, X

Technical Presentations 10:30 a.m. – 11:50 a.m. Conference Room, X

Speaker 1, 20 min Sid Scott, Hill International, SHRP-2

Speaker 2, 20 min Other DOT

Speaker 3, 20 min David Koerkenmeier, Sakai - - Onsite Roller

Speaker 4, 20 min Bill King, LTRC – Project Data, Contractor Comments,

and Question/Answer

Lunch 11:50 a.m. – 12:50 p.m. Conference Room, X

Site Visit / Equipment Demo 12:50 p.m. – 3:00 p.m.

US 90 Frontage Roads, Darnall Road to LA 85, New Iberia, Louisiana

Hardhat and safety vest are required.

Depart: 3:00 p.m.