ASTM Section D02.B0.03 Update
to
SAE Technical Committee 3

April 17, 2007

ASTM Section D02.B0.03

- Membership
  - Jerry Gropp replaced Bill Sullivan as Chairman, effective September 6, 2006

ASTM Section D02.B0.03

- Scope
  - This Section is responsible for the promotion of knowledge of, and specifications, test methods and terminology for automotive gear lubricants and fluids. This includes gear lubricants used in rear drive axles, power dividers, and fluids used in manual and automatic transmissions of wheeled or track laying vehicles such as passenger cars, recreation vehicles, taxicabs, trailers, trucks, buses, tractors, construction and farm vehicles.

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- Objectives
  - Keep existing performance tests operational, at historic severity and precision levels.
  - Ensure that performance test parts and reference oils are available in adequate supply and of a consistent quality.
  - Develop and maintain performance tests for gear lubricant and transmission fluid categories.
  - Maintain surveillance of test procedures under Section jurisdiction.
  - Work to improve test precision and correlation with field service.
  - Maintain active liaison with related organizations, CEC, SAE.

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Test Procedures Under the Jurisdiction of Section D02.B0.03

Common Designation	ASTM Designation	Purpose of Test
L-33-1	D 7038	To evaluate the rust and corrosion-inhibiting properties of a water-contaminated lubricant
L-37	D 6121	To evaluate the load-carrying, wear, and extreme pressure properties of a lubricant under low-speed, high-torque conditions
L-42	None	To determine the anti-scoring properties of a lubricant subjected to high-speed and shock conditions
L-60-1	D 5704	To evaluate the thermal and oxidative stability of a lubricant
Cyclic Durability	D 5579	To evaluate the thermal stability of a lubricant in a cyclic durability test
Oil Seal Compatibility	D 5662	To determine the compatibility of a lubricant with specific polyacrylate, fluoroelastomer, and nitrile seal materials

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- Tests under the jurisdiction of the Section are used to evaluate lubricants under the following performance categories:
  - API Category GL-5
    - Lubricants for automotive axles
  - ASTM D 5760
    - Lubricants for non-synchronized manual transmissions in buses and heavy-duty trucks
    - Also known as API Category MT-1
  - SAE J2360
    - Multipurpose gear-lubricating oils
    - Technical equivalent of the MIL-PRF-2105E Specification
      - Canceled on February 16, 2005
  - Proposed Category PM-2
    - Lubricants for synchronized manual transmissions in commercial vehicles
    - Currently under development

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- Update on Test Procedures
  - All tests under the jurisdiction of the Section are available for use
  - A slight severity trend (severe) has been identified in three tests
    - L-33-1, L-60-1, and Cyclic Durability tests
    - ASTM Test Monitoring Center working with Surveillance Panels and test laboratories to address
    - Not of sufficient magnitude to inhibit use of tests
  - Shortage of hardware has been a concern for two tests
    - New batch of L-42 test hardware should be approved later this month
    - Production of a new batch of lubrited L-37 test hardware is underway. Evaluation and approval is expected to complete in mid-June

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- Update on Test Procedures, continued
  - L-42 test procedure being written as an ASTM Standard Test Method
    - Expect to ballot within ASTM during CY 2007
  - A rater calibration process is in place for the L-37 test, and is currently being implemented in the L-42 test
  - Oil Seal Compatibility Test Surveillance Panel will survey industry to determine if there is a need to update the elastomers used in this test procedure

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- Update on Performance Categories
  - API Category GL-5 has been written in the form of an ASTM Standard
    - Currently being reviewed by an ASTM Facilitator
    - ASTM ballot should occur later this year
  - Work on the development of proposed Category PM-2 continues
    - New category for synchronized manual transmissions in commercial vehicles
    - Task Force will solicit industry for assistance in identifying reference oils which can be used to identify appropriate pass/fail limits for several tests