

**PC-9 Elastomer Task Force Report
Nov. 2, 2000**

The PC-9 Elastomer Task Force -

Using D 471 (PC-7 method):

Survey Industry to select the most aggressive Reference Fluid(s) with field service

This reference fluid(s) will be used to provide a baseline for oil, additive and elastomer manufacturers – as practiced in ILSAC GF-3 and individual OEM specifications

An oil cannot be more aggressive than the reference fluid(s) toward elastomers

An elastomer must be compatible with the reference fluid(s)

Because there are no rigid limits to this approach, it is not suggested that this become part of ASTM D 4485 but rather become part of an EMA specification or individual OEM specifications similar to OEM PCMO specs or the GF-3 ILSAC spec.

Lyle Bowman has given the opinion that it can be incorporated into D 4485 as a comparative limit.

There are several items that must occur for this to happen:

- 1. The D471 PC-7 method must be recognized and accepted in ASTM – preferably in D11.15 who oversee the D471 test method**

D11.15 have agreed to ballot in their group to oversee this test method and add new Service Fluids The new method is undergoing comments on the ASTM Standards Web site. It will be balloted in late October and reviewed at D11.15 December meeting. There have been no changes to the actual test procedure, all changes to the standard have been in identifying part distributor, adding report forms, and some editorial corrections.

The procedure is currently undergoing balloting.

- 2. A continued source of elastomers must be identified and distribution assured**

A source has been identified and is being recommended to the Task Force

- 3. Once Reference oil(s) is identified distribution of it must be assured**

The TMC has agreed to procure and distribute reference oil(s)

At our most recent Task Force meeting we agreed to the following:

- 1. We agreed that the elastomer sheets should be from one source. We have identified two distributors who have expressed interest in distributing the materials and will ask them to bid on supplying the material. OH Technologies has been selected and currently has a supply of the elastomer materials.**
- 2. The additive companies will estimate the number of tests to be run over the next 2 year period to give an idea of the demand for this test This has been accomplished**
- 3. It is requested that those supplying PC-9 matrix oils run the elastomer test on the oils to add to the tests on 20 oils already run. An E-mail has gone to the matrix manger requesting that he forward it on to those blending the matrix oil. It requests PC-9 elastomer tests on all 9 Matrix oils.**

The oil suppliers have been requested to run the PC-9 matrix test. We have had approx. 30 oil formulations tested to date.

- 4. Companies will be developing PC-9 fluids – the request for reference fluids continues until the end of the PC-9 matrix and limits are set by the HDEOCP. At that time, reference fluid selection must be made from the available data.**

As a practical matter elastomer manufacturers need to work on seal materials now since they run 3000 hour life tests.

I will schedule a conference call of the Task Force to review the ballot results and preliminary review of oil data. I will be targeting the afternoon of Nov. 27.

I intend to convene a meeting of the Task Force after receipt of PC-9 matrix oil elastomer data and after D11.15 ballot results – probably in January.

Original report of 2-23-00

Report of 6-27-00

Report of 9-20-00

Report of 11-02-00