



University of HUDDERSFIELD

University of Huddersfield Repository

Li, Guoxing, Gu, Fengshou, Wang, Tie and Ball, Andrew

The Potential Effects of Alternative Fuels on the Lubricating Condition of Compression-ignition Engines

Original Citation

Li, Guoxing, Gu, Fengshou, Wang, Tie and Ball, Andrew (2013) The Potential Effects of Alternative Fuels on the Lubricating Condition of Compression-ignition Engines. In: Proceedings of Computing and Engineering Annual Researchers' Conference 2013 : CEARC'13. University of Huddersfield, Huddersfield, p. 233. ISBN 9781862181212

This version is available at <http://eprints.hud.ac.uk/id/eprint/19404/>

The University Repository is a digital collection of the research output of the University, available on Open Access. Copyright and Moral Rights for the items on this site are retained by the individual author and/or other copyright owners. Users may access full items free of charge; copies of full text items generally can be reproduced, displayed or performed and given to third parties in any format or medium for personal research or study, educational or not-for-profit purposes without prior permission or charge, provided:

- The authors, title and full bibliographic details is credited in any copy;
- A hyperlink and/or URL is included for the original metadata page; and
- The content is not changed in any way.

For more information, including our policy and submission procedure, please contact the Repository Team at: E.mailbox@hud.ac.uk.

<http://eprints.hud.ac.uk/>

The Potential Effects of Alternative Fuels on the Lubricating Condition of Compression-ignition Engines

Guoxing Li, Fengshou Gu, Tie Wang, Andrew Ball
University of Huddersfield, Queensgate, Huddersfield HD1 3DH, UK

ABSTRACT

The dielectric constant and the moisture value of the lubricating oil measured from a IC engine running with different alternative fuels on line show a clear difference from the baseline diesel. This demonstrates that alternative fuels will have a noticeable impact on engine lubrication. Further studies should be carried out on clarifying the influences mechanisms and corresponding resolutions.

Keywords: Alternative fuels, Lubricating oil, Moisture, Dielectric property.