

## **Evaluation of Quality of Gasoline in the Republic of Kosovo Related to Their Motor and Environmental Performance**

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**Abstract:** Evaluation of quality parameters of gasoline, which has been traded in the Republic of Kosovo since 2008, is considered as a monitoring contribution in the frame of overall study of hydrocarbons which are used for energy production, transport, industry and others. The paper focuses primarily on the identification of the main parameters that determine the quality of gasoline, in their compliance with international standards and Kosovo's administrative instructions. For a period of four years the information taken from customs and accredited laboratories has been processed for the analysis of hydrocarbons. While gasoline is considered a less polluting than diesel fuel or crude oil, the study deals with the evaluation of motor performing parameters such as distillation curve Engler, density, number of research octane, number of motor octane, indicators  $t_{10}$ ,  $t_{50}$ ,  $t_{90}$ , etc.. However, in many gasoline samples exceeds in sulphur content is noticed, in aromatic compounds and in vaporization values of gasoline that directly affect environmental pollution. The material through monogram, constructed by laboratory experimental data and calculated by the help of computer programs, gives a complete picture of gasoline quality situation, where for each parameter the numeric value is expressed and percentage of samples that did not meet the referred standards.

**Keyword:** *gasoline, monitoring, density, vaporization, octane number, sulphur content*

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