



Marine Engines Performance and Emissions II

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Engines are one of the most important components of ships. The performance of marine engines has been consecutively improved over the years, and current marine engines are more efficient year by year. Regarding emissions, marine engines have also been modified over the years. Nevertheless, marine pollution constitutes an important contribution worldwide. The scientific community is investing significant effort in developing efficient and less pollutant marine engines. According to this, the Special Issue, "Marine Engines Performance and Engines", published as a book [1], was prepared to collect works relating to marine engine performance and emissions in general. A total of 12 works [2–13] were published in this first Special Issue. In order to continue this work, the present Special Issue, "Marine Engines Performance and Engines II", was developed to include more works related to this topic, such as emissions from marine engines, after-treatments, conventional and alternative fuels, mathematical models, marine engine technology, combustion, design, control, injection, lubrication and lubes, auxiliary systems, transport, etc. A total of nine works were published in this second Special Issue.

A special interest was focused on new technologies. Particularly, Markovič et al. [14] analyzed a new generation of the compact system for performing measurements of sold liquids by gas station dispensers; Jírová et al. [15] analyzed an original vibrodiagnostic device to control linear rolling conveyor reliability; Živčák et al. [16] analyzed how to increase the mechanical properties of 3D printed samples by direct metal laser sintering using heat treatment processes; and Varbanets et al. [17], who studied an acoustic method for the estimation of marine low-speed engine turbocharger parameters. Another important topic broached in this Special Issue was related to emissions from marine engines. In this regard, Kao et al. [18] analyzed an AIS-based scenario simulation for the control and improvement of ship emissions in ports. Regarding emission reduction by using alternative fuels, Rodríguez et al. [19] analyzed the possibilities of ammonia as both fuel and NOx reductant in marine engines, and Jablonický et al. [20] developed an assessment of the technical and ecological parameters of a diesel engine in the application of new samples of biofuels. Regarding emissions reduction using post-treatment processes, Ryu and Park [21] analyzed a composite scrubber with a built-in silencer for marine engines. Finally, numerical methods were treated on the works of Rodriguez et al. [19] and Maláková et al. [22].

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