In this work, Experiments were conducted to recover exhaust waste heat from a diesel engine using heat exchanger (HE). Thermocouple-attached liner is used to measure the combustion zone readings in a precise manner. A partial amount (20%) of exhaust gas from the heat exchanger was reused to operate the diesel engine. Tests were performed at different injection pressures like 190 bar, 200 bar, 210 bar, 220 bar and 230 bar. Heat transfer takes place between exhaust gas and oil (thermic fluid) at different injection pressure. Engine performance parameter such as Exhaust gas temperature, brake thermal efficiency, Brake specific fuel consumption were analyzed. It reveals that at 230 bar injection pressure, both the temperature of exhaust gas outlet from the heat exchanger and thermic fluid (oil) is almost equal at full load. Brake thermal efficiency of diesel engine has improved by 8.16 % at 230 bar injection pressure. However, brake specific fuel consumption has reduced for increased injection pressure (Ref: Arumugam K, Senthilkumaar JS, Shiva kumaar RG. An approach to improve the performance and exhaust gas energy recovery for a DI diesel engine with heat exchanger. Discovery, 2015, 31(137), 8-15); (Image: http://3.imimg.com/).
COMMUNICATION
ENGINEERING

An approach to improve the performance and exhaust gas energy recovery for a DI diesel engine with heat exchanger

Arumugam K, Senthilkumaar JS, Shiva kumaar RG

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Discovery, 2015, 31(137), 8-15

Recruitment Consulting Service

Anush Athithyan M, Dhivya A, Elavarasi R, Kabilo Kambattan K, Gunasekar K

Every business needs person as an employee and person needs a job. So they are in need to meet each other and share their requirements and skills. There are many categories of requirements and skills, it should be met for employment. This can be made online and ease the work of both recruiter and job seeker through this application. A Job Portal needs to be developed using Java Web Technology. It allows Recruiters to register their company and job details, were Job Seekers to register their personal details. Registered job seekers are provided with job alert through their personal Email id, this makes the user to identify the relevant job. As we knew communication between the Seeker and Recruiter are handled by contact number or through Email, were this portal provides the messaging service which makes the communication simple. Both will have login process to apply or view the applied application to make it secured.

Discovery, 2015, 31(137), 16-20