

ABSTRACT

For the writing of this thesis, there has been done a wide research through the Internet and in library books, mainly on the field of thermodynamics. The main aim of this thesis is to teach students the theory and the operations of Internal Combustion Engines to obtain a base and be able to handle with the processing of thermodynamics experiments. Also be able to understand and analyze the results and measurements obtained from the experimental equipment. The first part of this graduation thesis includes analysis of the theory of Internal Combustion Engines, as historical data, various parts of engines, types of Internal Combustion Engines, future prospects and experimental data collected from previous experiments. The second part analyzes the experimental results extracted from the software Versatile Data Acquisition and Data Collection System of the experimental Internal Combustion Engine of the Cyprus University of Technology.