### DEVELOPMENT OF AN 8031 CONTROLLED DISPLAY

Project report submitted by CHRISTODOULOU G. CHRISTODOULOS

to the ELECTRICAL ENGINEERING DEPARTMENT

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#### **INTRODUCTION**

Microprocessors are used more and more where speed and automations are necessary for the completion of a job. A microprocessor cannot operate on its own, so some other components (peripheral IC) are connected to it and the result is a microcontroller. The design, construction, programing and testing of a microcontroller is the aim of this project. The microprocessor used is the Intel 8031 that belongs to the MCS-51 family. What is special on the 8031; is the fact that is partly a microcontroller on its own. The function of the microcontroller designed is to send messages to a display through a keyboard.

The presentation of the project is devided in the following chapters:

- CHAPTER 1: A report is made for the architecture of the MCS-51 family; explaining the main parts of the 8051 which is the basic member.
- CHAPTER 2: An outline of the block diagram of the project is made for the reader to understand the main parts.
- CHAPTER 3: In this chapter the design and circuit diagram are explained.
- CHAPTER 4: The testing and troubleshooting methods used are mentioned and explained.

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