

HIGHER TECHNICAL INSTITUTE

MECHANICAL ENGINEERING DEPARTMENT

DIPLOMA PROJECT

DESIGN AND CONSTRUCTION
OF A LOW COST AIMING UNIT
FOR G3 ARMY RIFFLE

M/853

SAVVA SAVVAS

JUNE 1999

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by

SAVVA SAVVAS

Project Reports

Submitted to

**the Department of Mechanical Engineering
of the Higher Technical Institute**

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In partial fulfillment of the requirements

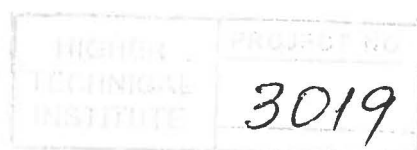
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SUMMARY

Design and Construction of a Low Cost Aiming Unit for G3 Army Rifle

by SAVVAS SAVVA

The purpose of this project was to study the design parameters for a general purpose (day and night) aiming device for rifles.

Firstly all dimensions and specifications for the G3 Army Rifle were given. Then a simple, robust, difficult to destroy and low cost aiming device was designed and constructed with all drawings and calculations.

This project is divided into four chapters:

CHAPTER 1 Various Solutions

CHAPTER 2 Design and Construction

CHAPTER 3 Instructions of use

CHAPTER 4 Cost Analysis

INTRODUCTION

Every country wants its army to be more effective and more efficient. So they spend a big part of their annual budget (a lot of times many billions of dollars) on high technology equipment to make their army more effective and more efficient.

One objective of this project was the low cost of the aiming device that should be designed and constructed.

First, in chapter 1, solutions (ideas) were found and after a benefit analysis (which solutions satisfy the objectives of the project) in chapter 2, the design and construction process for an appropriate system is illustrated.

In chapter 3 some instructions are given, how the device can be used and in chapter 4 a cost analysis is made.

Finally conclusion on the whole work involved in this work are presented and discussed.