

HIGHER TECHNICAL INSTITUTE

ELECTRICAL ENGINEERING DEPARTMENT

DIPLOMA PROJECT

PV POWERED LIGHTING SYSTEM

E1873

HADIIGEORGIU GEORGIA

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**PROJECT SUPERVISOR:
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SUMMARY

The aim of this project is to learn more about renewable energy and investigate about the solar energy.

I started this project by notice the necessity of renewable energy in our life. And the basic reason that it is mentioned is the abundance of oil and secondly but of the same importance is the destruction of the environment.

Secondly the report refers to different kinds of renewable energy and where it can be use each kind of this energy.

The general energy situation in Cyprus is discussed next. The conclusion I made is that the only kind of renewable energy used now in Cyprus is the solar water heaters. This chapter conducts with the present market situation and national energy policy.

As it mentioned before the first target of this project is to investigate about solar energy; about PV cells and how they work. To learn more about photovoltaic, a construction was made.

Finally and the most important is the experimental part, the construction was been used for measurements. The conclusions of these measurements are:

1. The radiation and load are very important factors in the PV operation.
2. Cyprus has the necessary Radiation for use solar power systems.