

Master Thesis Brief Description

Thesis Title	How Heat Island Effect Change The City Of Larnaca Over The Years And What Must Be Done To Mitigate This Problem
Programme of Studies	MSc in Energy Systems and the Built Environment
Course	MES 580 Master Thesis
Area of Study	Sustainable Built Environment
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Students Reg. Number	5385
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Supervisory Committee	Dr. George Karagiorgis, Assoc. Professor, Mechanical Engineering Department Dr. Byron Ioannou, Ass. Professor, Architectural Department
Semester	Fall Semester 2016
Short Description	The purpose of this study was the investigation of the Urban Heat Island effect in the city of Larnaca, with the use of Erdas Imagine program. The analysis was performed for 10 areas in Larnaca since 2005 and the findings were comparatively assessed. Primary data was retrieved from Landsat 7 satellite, a U.S. satellite used to acquire remotely sensed images of the Earth's land surface and surrounding coastal regions, providing information from which researchers can derive surface temperatures and evaluate heat island effect. The results defined that the intensity of the effect in the city of Larnaca appeared to increase in the past years.