Name-Surname	Angeliki Gkros
Thesis Title	*Very high resolution mean monthly sunshine hours surfaces for Greece using GIS for the normal period 1977-2002*
Supervisor	D. Asimakopoulos, Professor
Summary	The purpose of this thesis was to produce very high resolution monthly sunshine hours maps for the Greek area. Mean sunshine data series were obtained from 46 meteorological stations of the Hellenic National Meteorological Service. The time series used consist of 25 years' observations for the normal period 1977 to 2002. The spatial distribution of the monthly mean sunshine hours series was achieved by using an interpolation method developed for meteorological purposes named MISH. MISH method was developed by the Hungarian Meteorological Service (OMSZ) by Szentimrey and Bihari (2007; 2014) and shows many advantages as compared to other geostatistical methods. AURELHY method which was developed by the French Meteorological Service (Meteo-France), was also used for the selection of geographic and topographic parameters. The climate maps included in climate atlas were created by using GIS and specifically the ArcGIS software package. In ArcMap software environment the appropriate mapping performance was selected and the creation of 12 maps in total took place. The spatial interpolation of monthly mean sunshine hours has been performed with resolution half minutes (730 m approximately at 38°N).
Key words	Sunshine Climatology, Spatial Analysis, Greece
Evaluation committee	D. Asimakopoulos, Professor M. Santamouris, Professor H. Flocas, Associate Professor