

DESEMBER 2018

GENERAL INFORMATION

Enerfil ESCO is a certified Energy Services Company from the Greek State with IT: 23 out of 49. The company is specialized in energy management in buildings, has no employees but has stable external partners for her work. Filippidis Michail is a Mechanical Engineer with special training on Energy Management. He is Energy Inspector 1605, Energy Audit 626 and Building Inspector 2969.

THE COMPANY

Since 1990 the company has been operating in the family business.

The object of the family business was the construction of buildings and the sale of apartments. Since 1997 the company is being actively in Argyroupoli, Elliniko, Vari and Pikermi Attikis. Along with the construction of buildings it manufactures pioneering mechanical works, for the time, in Gerakas and Mellisia.

The projects concern the full energy autonomy of the maisonettes as part of a larger complex. It is devising photovoltaic systems for public buildings among others the IKA of Agios Nikolaos of Crete, the Metsovio National Technical University of Athens and the National Gallery of Athens.

In 2006, 11 units of O.K.A.NA are being studied in a national level and 5 of them were put into operation in 9 months.

In 2009 studies and prepares the " Prototype Building EL", which was completed in 2011, was awarded as the "greenest" building in the «Energy Mastering Awards 2016» competition in 2016 and was presented at the «Energy Efficiency Conference 2016» and later contributed with his techniques and figures of the new KENAK which was voted low in August 2017 and is in effect from 1/1/2018.

Along with the "Prototype Building EL" was studied, was registered OBI and E.P.O. the "DIGENIS" solar thermal system was implemented. The "DIGENIS" device was awarded the "Energy Mastering Awards 2017" with the gold prize and was formally presented at the invitation of the "European Patent Academy" on 26 September 2017 at the "European Sustainability Conference 2017" as the only participation from Greece.

In 2014, a failed collaboration effort was launched to promote the " Prototype Building EL" and the "DIGENIS" solar thermal device to the "Bosch Buderus Hellas" network.

PRODUCTS

The " Prototype Building EL"

Is operating since February 2012 with marvelous results saving 94% energy. Its construction is attended by the Foundation for Research and Technology of Crete and is known by the Democritus University of Thrace and the University of Crete.

The building very poor in BMS is ranked in the "pathetic" category by spending only 9.6 <10 KWh/m²/year.

Two new energy coefficients and a solar thermal system "DIGENIS" have been applied in the building.

"DIGENIS" solar thermal appliance:

From 2011 until now it operates in residential, industrial and hotel facilities without damaging, with very high efficiency and corresponding energy savings. It has a CE and is registered in Greece since 2014 and the European Union from 2016. Until 2017 it had ISO 2001/2008.

It has a PCT A' ranking which concerns to the patent.

Recently took part in the competitive innovation of the National Bank "Business Seeds" and has been selected outside the competition in the final phase.

It is assembled in a small workshop in Kallithea, 128 Filaretou street from Greek hands and accessories by 85%. 3 components are imported from Germany.

THE COMPANY'S PROJECTS

"PROTOTYPE BUILDING EL"

There are two Prototype Building EL in Greece, one in Heraklion Gazi and another one in Korydallos Athens. They both work perfectly by saving 94% and 100% energy.

“DIGENIS”

Projects: All projects have been funded by the "NSRF" or " EXOIKONOMO KAT OIKON " as the "DIGENIS" device has been incorporated and approved by the YPEKA.

Indicatively, the standard projects applied to the "DIGENIS" solar thermal system are presented with comparative results:

1.Industrial Washing Machine in Kefallonia

A. **60%** energy boost **Classic** Solar System 60 collectors and 2 boilers 6.000lit. Installation ground 180m². Installation cost **€ 46,000. Break-even in 6 years.**

B. **87%** energy boost Solar thermal "**DIGENIS**" 20 collectors and 3 boilers1600lit. Installation ground 70m². Installation cost **€ 23,000. Break-even in 2.5 years.**

C. Result to date **12,000 tons water at 74⁰C** with total replacement of a three-way valve and circulators (normal wear and tear). Damage cost in four years time of € 450.

2.Hotel Stella Katrin

A. **75%** energy coverage **Classic** Solar system **159m²** collectors and 2 boilers 6.000lit. Installation ground **180m²**. Cost **€ 54.000. Break even in 7 years.**

B. **95%** energy coverage Solar System "**DIGENIS**" **36m²** collectors with 2 boilers 1500lit. Installation ground **75m²**. Cost **€ 23.000. Break even in 3 years.**

Filippidis Michael:

He studied Mechanical Engineer at TEI of Kavala.

He watched the most cost-effective SEVs for energy saving by TCG and currently has an Energy Inspector's license 1605, an Energy Audit license 626, and is a Building Inspector 2969.

Generally until now, the company has not borrowed money in its name.

It has undertaken projects currently underway in the "EXOIKONOMO KAT OIKON".