

European Research & Innovation Project

Innovative climate-control system to extend range of electric vehicles and improve comfort

Interview with Dr. Ing. Francesco Paolo AUSIELLO

Strategic regional projects director at ASTER, Italy



Dr. Ing. Francesco Paolo AUSIELLO

is strategic regional projects director at ASTER in Bologna (Italy). Doctor in Mechanical Engineering graduated from the University of Roma, he held various positions at Magneti Marelli Holding in Emilia Romagna and FIAT (Automotive Industry). He has been one of the three experts who composed the **Strategic Advisory Board (SAB)** of XERIC to accompany the project from the start to the end.

"XERIC started with TRL relatively low.

Now several critical points are overcome and the industrialization phase is short to come."

Can you please tell us a little bit about yourself?

My education was completed in Rome, but from the beginning of my career I moved to Torino. I was looking for automotive innovations as the fil-rouge of my activity.

The energy sector was indeed the area where I developed the first "new and innovative product". It was a small cogenerator, powered by a Fiat automotive engine, named TOTEM, TOTal Energy Module. Unfortunately it was conceived about 30 year before the market uptake. But it entered into the History of Energy Saving applications.

When you were asked to become a member of the XERIC SAB, what convinced you?

My real big interest is devoted to the electrification of mobility, therefore AC innovative systems are so important to reduce consumption and enhance the EV driving distance.

I felt the importance of the project, and this is an expected improvement where XERIC output may become crucial.

What were, according to you, the major challenges to be overcome in XERIC?

Size: to allow the system to be included in a car, miniaturization is the next level to be reached.

And cost: to reach a decision point range, XERIC system may be more expensive than conventional AC system, but less energetically expensive.





Ifter 3 years of work, the final meeting is now going to take place in Brussels in a few weeks. What is your general assessment of the project?

The project started with a TRL relatively low. Now several critical points are overcome and the industrialization phase is short to come.

What are, for you, XERIC's main achievements?

Membrane and cooling cycle efficiency are a good result so far.

From your perspective, what is the outlook for the climate control technology developed in the frame of XERIC?

There is the need to continue a strong effort to make the prototype become a product.

An additional effort is to be done including Automotive suppliers to enter into the partnership, bringing XERIC know how and final product to market that meet the needs of final customers.

"To reduce energy consumption and enhance the EV driving distance is an expected improvement where XERIC output may be crucial."

What will you remember most from your experience as SAB member of XERIC?

I will not remember, I prefer to go on, looking at the project in the next phases until a full success is accomplished. I'm optimist!

Thanks for your time and your valuable guidance provided so far!

XERIC in brief

XERIC is a European Research & Innovation Project

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Number of partners: 8

Coordinator:
Dr. Eng. S. GAETA
GVS spa
Italy





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