



Regional Activity Centre for Cleaner Production

GREEN COMPETITIVENESS IN THE MEDITERRANEAN

A competitive environmental strategy



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WHAT IS THE GRECO INITIATIVE?

GRECO is a Mediterranean initiative designed to promote green competitiveness in the region by demonstrating the fabulous economic benefit that the environment can offer companies.

The initiative was announced by Spain's Minister for the Environment, Cristina Narbona, in January 2008 during the 15th Conference of the Parties of the Barcelona Convention, held in Almería.

The goal is to encourage as many companies as possible in each of the Mediterranean countries to include the environment as a strategic profitable element in that simultaneously aims to earn them both economic and environmental benefits.

The initiative aims to give small and medium-sized companies the assistance and financial resources needed to discover the best techniques for their situation to prevent pollution, to calculate the profitability of implementing projects and to evaluate the environmental benefit yielded.

In short, it is an effort to create value based on improving the environmental behaviour among Mediterranean organisations as a whole.

WHY GRECO?

"Does the environment costs me money? But exactly how much does it cost me? And even better, how much should it optimally cost me? And how much is it costing my competitors?"

Many business leaders from all over the world are asking these and many other similar questions, taking stock of their actions and realising that nowadays the demands for compliance with environmental regulations entail a significant economic cost. Securing permits and environmental certifications, managing all types of effluents and waste, energy consumption, etc. all affect the bottom line in an increasingly visible way. How should we proceed?

Nowadays we can't just ask ourselves how to offset environmental costs by ignoring the law. We are living in advanced societies with demanding citizens who want to leave a better world for our children and our children's children. That obligates us to more efficiently combat any possible environmental impact we are generating as yet another milestone in our responsibility as business leaders towards the society with which we interact. However, we cannot lose sight of the fact that our primary goal is to keep gaining ground in the markets where we operate with the best profit ratios.

We at CP/RAC have been working elbow-to-elbow with companies in the entire Mediterranean Region for over ten years, including your region, making an effort to lighten this increasingly heavy burden which we must accept in the exercise of our responsibility. As a result of all these years of work, we have developed the GRECO (Green Competitiveness) INITIATIVE, whose mission is to "drive green competitiveness in the Mediterranean region by fostering the visibility of the financial opportunities generated by environmental investments."

As a result, we aim to disseminate and assist Mediterranean companies in their projects involving the implementation of preventative environmental techniques that have already proven



to be successful in the 100 practical cases of real Mediterranean companies published by CP/ RAC, which are actually a range of best practices and techniques from both an environmental and especially a financial standpoint.

WHO ARE WE?

CP/RAC (the Regional Activity Centre for Cleaner Production) has been part of the Mediterranean Action Plan (MAP) since 1996. Under the auspices of the United Nations Environment Programme (UNEP), this plan has been assigned the responsibility of implementing the Convention on the Protection of the Mediterranean Sea against Pollution (the Barcelona Convention). In 2008, CP/RAC was also named a Nominated Centre for the Stockholm Convention, whose goal is to eliminate Persistent Organic Pollutants (POPs) from the environment.

As a result of its responsibilities, CP/RAC has developed a number of projects and programmes throughout the Mediterranean Region, where it has worked intensely to help companies prevent pollution through methods based on profit-maximisation criteria.

As strategic partners in the GRECO INITIATIVE, CP/RAC has the support and close cooperation from prominent partners in the business world, including Business Med (The Mediterranean Union of Business Confederations) and ASCAME (the Association of the Mediterranean Chambers of Commerce and Industry), with the aim to forge close ties with the business world in order to develop, from a Mediterranean perspective, strategies adapted to each local situation by setting up synergies that promote companies' competitiveness using sustainability criteria.





THE GRECO REPORT

Green competitiveness aims to shed new light on the way we do business using an environmental approach. Our way of accomplishing this leans towards the concept of "business opportunity". The goal is to reinforce companies' ability to learn, develop and apply new knowledge.

It is developed through a new paradigm according to which the competitive company ceases to ask itself what it should do to put itself at the service of solving its environmental problems and instead turns to analysing how the environment can help the company achieve competitive advantages.

The GRECO Report published by CP/RAC aims to extract lessons from the practical cases published also by CP/RAC over the years in its collection of MedClean files. The 100 files published include up to 176 cleaner production (CP) initiatives which yield annual profits of more than 14 million euros for the companies spearheading and developing them.

Cleaner production poses a real chance to improve competitiveness based on sustainable production, which includes effective manufacturing and business profitability. However, the report states that the public authorities must set a favourable framework for the application of this strategy to reach its maximum potential, especially among small and medium-sized companies. To achieve this, this framework must obviously include regulatory instruments, but it must especially also contain suitable economic incentives through, for example, an ad-hoc tax policy or direct tools to support SMEs.

The report shows that the majority of the cases analysed enabled companies to earn very significant financial profits and gain environmental benefits through modest investments which would be affordable for many companies. It was common to see short payback periods (less than six months in more than half the cases analysed) and high internal rates of return which demonstrates the environment comes to seem like a key element for the profitability of the companies' investments, rather than a cost regardless of whether these investments were in production, organisation or another area.

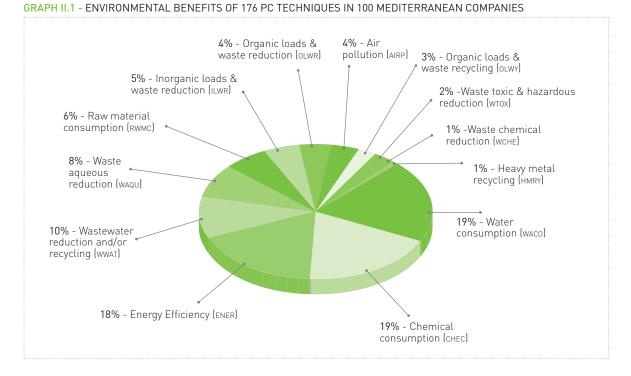
The report makes several classifications. The first one refers to the type of techniques developed by the companies. The techniques that show an attractive profitability include:

- Good environmental practices
- Use of alternative raw materials
- Gas and heat recovery and recycling systems
- Energy savings
- Organic material recovery and recycling systems

If we analyse the savings generated, once again good environmental practices stand out as the most common technique, and the initial investment was low or nonexistent. Therefore, this proves the benefit of initiating any process of implementing strategies based on green competitiveness that involve a lower initial cost, as they are more profitable and represent the most interesting cash flows, leading to extremely high internal rates of return.

The patterns of green competitiveness have also been analysed according to the sector of the companies analysed. We have seen that although all the techniques may be applicable to any sector there is a certain correlation between techniques and sectors. In this sense, cross-thinking enables us to identify actions outside a given sector that have enormous potential benefit, both economic and environmental, across sectors (horizontal techniques).

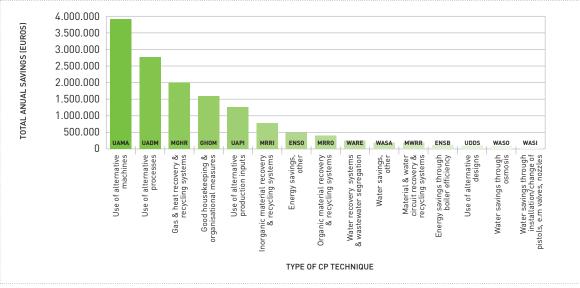




A Spanish company that produces milk for consumption and other dairy products, with an environmental investment of around 23,000 euros, managed to get yearly savings of more than 200,000 euros, which is an internal rate of return of more than 800%. The achievements where thanks to a reduction in water consumption of 23.7% per cubic metres of product, in the organic load associated with its dumping and in the consumption of chemical cleaning additives, in addition to unquantified energy savings and an increase in the productive capacity.

A Bosnian wire manufacturer, by installing gas and water meters and using the excess energy for a drying process that technically improved the galvanising process, managed to saving 26,000 euros with a minimum investment of 500 euros. These savings were thanks to the 70% drop in water consumption, 10% drop in natural gas consumption and a 50% drop in additives to the galvanisation process.







Tech. Code	Technology purpose	Environmental Benefit	Investment	Annual savings	Payback months
WASI	Water savings through installation/ change of pistols	WACO	246	18260	0.16
WASA	Water savings, other	ENER	9,000.0	165.888,0	0.65
MRRO	Organic material recovery & recycling systems	OLWY	0.0	5,477.0	0
	Organic material recovery & recycling systems	OLWY	750	10500	0.85
	Organic material recovery & recycling systems	OLWY	2,700.0	138,975.0	0.23
	Organic material recovery & recycling systems	WACO	0	2,007.5	0
MRRI	Inorganic material recovery & recycling systems	WPMR	0	308	0
	Inorganic material recovery & recycling systems	ILWR	0	59231.38	0
	Inorganic material recovery & recycling systems	RWMC+ENER	0	20520	0
MGHR	Gas & heat recovery & recycling systems	ENER	10556	193223	0.65
MWRR	Material & water circuit recovery & recycling systems	WWAT	1000	19000	0.63
	Material & water circuit recovery & recycling systems	WWAT	500	16000	0.375
	Material & water circuit recovery & recycling systems	MPCO	250	9000	0.33
	Material & water circuit recovery & recycling systems	CHEC	250	11000	0.27
	Material & water circuit recovery & recycling systems	ENER	250	13000	0.23
	Material & water circuit recovery & recycling systems	WWAT	250	29000	0.10
ENSB	Energy savings through boiler efficiency	ENER	592	10924	0.65
	Energy savings through boiler efficiency	ENER	0	15337	0
ENSO	Energy savings, other	ENER	6	186	0.38
WARE	Water recovery systems & wastewater segregation	WACO+WWAT	0	2000	0
	Water recovery systems & wastewater segregation	WWAT	0	5400	0
GHOM	Good housekeeping & organizational measures	WACO	8.16	375.38	0.26
	Good housekeeping & organizational measures	OLWR	0	59949.1	0
	Good housekeeping & organizational measures	OLWR	0	612	0
	Good housekeeping & organizational measures	ENER	0	114	0
	Good housekeeping & organizational measures	ENER	0	406	0

TABLE 1 – BEST 50 TECHNIQUES ACCORDING TO PAYBACK (LESS THAN 1 MONTH)



Tech. Code	Technology purpose	Environmental Benefit	Investment	Annual savings	Payback months
GHOM	Good housekeeping & organizational measures	WWAT	0	6689.5	0
	Good housekeeping & organizational measures	WACO+CHEC	0	24518	0
	Good housekeeping & organizational measures	WACO	0	58340	0
	Good housekeeping & organizational measures	ILWR+WWAT	0	165384.7	0
	Good housekeeping & organizational measures	CHEC+WAQU	0	46125	0
	Good housekeeping & organizational measures	WWAT	0	125000	0
	Good housekeeping & organizational measures	WACO	0	3427.45	0
	Good housekeeping & organizational measures	WACO	0	612000	0
UAPI	Use of alternative production inputs	OLWY	0	75000	0
	Use of alternative production inputs	WW00	0	9015.5	0
	Use of alternative production inputs	CHEC	0	10269	0
	Use of alternative production inputs	WWAT+WTOX	0	908.75	0
UDDS	Use of alternative designs	WPAC	0	23295.4	0
	Use of alternative designs	RWMC	0	30300	0
	Use of alternative processes	WACO+ILWR	3005.06	36721.84	0.98
UADM	Use of alternative processes	AIRP+WPAI	600	87000	0.08
	Use of alternative processes	ENER+WACO	414.5	73273.51	0.06
	Use of alternative processes	ENER+ILWR	88	2209	0.47
	Use of alternative processes	OLWR	0	35399	0
	Use of alternative processes	WACO+ENER	0	64445.7	0
	Use of alternative processes	AIRP	0	99775	0
	Use of alternative processes	CHEC+WWAT +ENER	0	479546	0
	Use of alternative processes	WACO+RWMC +WAQU	58.45	924.5	0.75
	Use of alternative processes	WPAY+ILWY +CHEC	177	3418.1	0.62
UAMA	Use of alternative machines	CHEC+RWMC	41312.39	1105032.12	0.44



IN SUMMARY

The report shows that, in addition to the support of public institutions, private companies can make a huge contribution to protecting the environment without abandoning their profitability goals, and without having to concentrate exclusively on complying with the legal regulations. The use of the necessary tools may effectively reduce the potential environmental impact while improving companies' bottom line (profitability)

The goal is to adopt win-win strategies based on cleaner production, that is, preventing or lowering pollution before it is generated. Based on anticipation, on predictions, on proactiveness, on questioning the procedures, flows, materials, productive structure, technology, training and organisation. In short, it means being willing to improve, based on our responsibility for the environment, in a long-term effort for the future of the company. It therefore means including the environment as a core part of the company's competitive strategy that is part of everyday decision making in all areas of the company.

The GRECO Initiative wants to help you achieve this. A huge number of Mediterranean companies have already done it. One hundred of them want to tell you about it.

Don't miss the chance to participate in this initiative. We are hoping to help you and ensure that your success makes not just your company grow, but also other companies that can learn from your experience.

SHALL WE GET STARTED?

A Turkish company in the textile sector managed to get annual savings of around 25,000 euros with no investment, simply by introducing certain good environmental practices that led to better control over the operation. The profits included reductions in the consumption of water, thermal energy and chemical additives.

HOW CAN I GET STARTED?

We at CP/RAC have set up an e-mail address where you can join the **GRECO INITIATIVE** or send gueries to: **info@grecoinitiative.com**

You can also visit our web-site for further information: **www.grecoinitiative.com** If you wish, you can use your Local Antenna, whose contact information is in the box below.













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