

Gijs Jochems â?? General Manager, Promega Portugal and Spain



Public money has been close to absent over the past decade; in order to keep sustainable, we needed to expand our business into private areas such as pharmaceutical, biotech, and agriculture

20.12.2018

Tags:

[Spain](#), [Biotech](#), [Promega](#)

Gijs Jochems, general manager of Promega Biotech Iberica, a leading

molecular biology solutions provider, speaks about the company's business transformation to collaborate with diverse areas of the private sector. Jochems goes on to give his insights on the state of Spanish innovation and highlights how Promega uses its commitment to CSR to build the scientific ecosystem of Spain.

Could you introduce Promega and its flagship service areas?

From early on, Promega has been involved in basic molecular biology which has given way to our portfolio of over 3,500 products in genomics, protein analysis and expression, cellular analysis, drug discovery and genetic identity. The academic research area is our bread and butter business, however, is it also a very crowded market. We also operate in the forensic sector for which the Spanish scientific police are our biggest client. Another of our operational areas is clinical research; modern clinical diagnostics. We are very strong in automating nucleic acid extraction and many hospitals or clinical centres use our own platform, Maxwell RSC, which allows for 16 to 48 samples to be processed at one time. More than 250 of these instruments are placed throughout Spain. Compared to other countries where Promega is active, this is an area in which the Spanish affiliate is more successful.

In regard to in vitro diagnostics, we do not carry testing kits ourselves; this would then make us a diagnostics company, which creates additional regulatory requirements. However, we do supply components such as polymerases to companies that create diagnostic kits. Promega is one of the largest producers of polymerases in the industry.

What is the strategic importance of the affiliate for the group globally and in Europe?

In 2009, Spain spent EUR nine billion on public R&D expenditure which dropped by more than half to EUR four billion in 2013 because of the crisis. After losing nearly twenty percent of our business from the fallout of academia, this was the moment when we began to rethink our model and diversify into the private market.

In the beginning, 90 percent of Promega's business came from the public sector. Today, the scale has balanced more, and our business has a 40/60 distribution in private and public respectively. This shift has been elemental to the continued success of the affiliate.

At the end of this year, Promega Iberica will break its historical record of performance since starting in Spain in 2005. Promega current has a CAGR of eight percent. In the applied markets segment, which involves agro-food testing and environmental control of water, our affiliate ranks second after the US. In absolute terms, we are fifth in Europe after Germany, UK, France, and Benelux. Despite this, the slope of growth has become less linear and it takes more effort to do business. The sales

cycles have become longer, and customers are looking for better products at lower prices; the landscape is increasingly competitive compared to the past.

How have Promega's operational areas developed in recent years?

Most of our traditional business, research, diagnostics, forensics, etc. comes from the public sector. Public money has been close to absent over the past decade; in order to keep sustainable, we needed to expand our business into private areas such as pharmaceutical, biotech, and agriculture. Traditionally, we have always had a presence in these areas, although minimally. Now, it is a growing trend for the company and we are establishing a stronger foothold.

Agro-food has started to become a very relevant area for the affiliate as we operate in both its main fields of fraud detection and food safety. Fraud detection refers to the identification of fraudulent components such as higher than accepted GMO content in finished goods, an economic issue, whereas food safety deals with pathogen detection to ensure products received by end-users are absent of infectious agents like Salmonella and Listeria. Additionally, detecting pests which harm crops, such as *Xylella fastidiosa*, a bacterium that poses a big threat to olive trees and other cultures, can be grouped into this area. All of the above can be detected by Real-Time PCR, after extraction of the nucleic acids on our Maxwell platform.

Spain is a large market for the food and agriculture area; Spain is producing much of the crops for the rest of Europe. There are many companies working in this area and we began to see this as an appealing opportunity for Promega to use the same technology in diversified sectors. Similarly, we are also growing very quickly in the area of ecologic testing in processes such as water diagnostics.

How is drug development becoming an increasingly important focus sector for Promega?

One of the most important aspects of new drug development is gene expression. This method can be used to identify the desired drug effect in cells and screen candidate compounds for their ability to induce the target effect in order to treat diseases such as cancer. Promega can create cell lines which have all the responsive elements that can activate the desired effect being tested for. We link the cell lines to a bioluminescent read-out which helps mark reactions during experiments. The pharmaceutical companies can then begin testing compounds to identify leads that could potentially trigger the desired reaction. This is also used to identify the toxicity of compounds.

The latest development in drug discovery is kinase engagement. All the intracellular signals passed when activating a receptor are sent through to the nucleus through kinases which have both active and inactive forms. Many of the modern drug discovery endeavours look for compounds which engage with the kinases. Promega has essays available for nearly the entire kinome; there are 518 protein kinases which have been described today. This is one of the biggest areas of innovation that Promega has.

We work with pharmaceutical companies and CROs who use these products in the small molecule screening of the drug discovery process. On the other hand, there are also large molecules (therapeutic proteins or antibodies) being screened, which bring us to biotech organizations. For example, ADCC assays are used for antibody screenings to ensure the proper antigen is being identified by the antibody and that the molecule is effective. We have many biological assays which are attuned to biotech companies working on therapies using immune checkpoints.

How does Promega distinguish itself as a partner of choice in the Spanish market?

Absolutely through our service offering. We have evolved from just providing clients with products to leveraging complete turnkey solutions. Having a focus in critical areas is instrumental to our competitive advantage, for example, hiring an agronomic engineer as part of the marketing team to act as the expert in that area. Additionally, Promega has an extremely qualified sales force and more than half of the team has a doctoral thesis; we have more doctors in Promega than not. We are specialists in the sector who are highly educated and can understand the clients' needs to be able to offer the best solutions.

What major trends in innovation and R&D have you seen emerge in the Spanish market?

Of course, the trend that the industry has seen has been big pharmaceutical players acquiring biotech companies to bring in short-term growth and innovation. In particular, this is impacting immunotherapies, an area which was previously nonexistent that has seen tremendous growth in Spain. There are a number of companies dedicated to formulating biosimilars which have emerged in recent years.

During the crisis years, many smaller organizations could not survive and defaulted. The biggest challenge in Spain is funding. The overall spending on R&D is only 1.2 percent of GDP compared to the average 2.3 percent throughout Europe or countries like Germany and the UK which are well over three percent.

Part of the challenge with funding comes from the issue that one-third of the GDP expenditure for R&D is in the form of low-interest loans. It is impossible for a researcher to pay back the loan when he does not have a model of revenue; basic research only works with direct investment. This portion of allocated funding goes untouched which brings the resources available back to the levels of the early 2000s.

Looking at the state of innovation, where does Spain rank and what needs to be done in order to drive the ecosystem?

Spain ranks in the bottom level of Europe when it comes to innovation investment. Spain has very competitive universities which produce strong talent at the European level. The challenge is how can the basic research being done in the country be supported in order to transform into tangible results which can reach society.

One solution is technology transfer. Many universities still have the mentality of only generating knowledge rather than collaborating with industry to identify what are the market needs and developing together to ensure the innovations are relevant.

Due to the lack of funding, the country also faces the critical issue of brain drain. Spain is exporting their scientific talent to countries such as the UK, the US, and France. Regions like the Basque Country and Catalonia have recognized the importance of this and built communities to foster biotech and startup development. This is a model that must be expanded to the rest of Spain in order to grow the knowledge economy rather than just sectors like construction and tourism.

Promega is dedicated to improving society through its CSR initiatives. How is the company applying this philosophy to improve the scientific ecosystem of Spain?

We take many initiatives to work with young scientists; one being micro-sponsorships. We offer funding to help cover the editorial costs of publishing university research, at a maximum of EUR 500, to ensure we reach as many scientists as possible. Additionally, we have a new lab startup program in which we can offer a discount of 50 percent on our products for the first year.

Another platform we work closely with is InnorMadrid, which addresses innovation for the communities in the north of Madrid. They are trying to put service providers like Promega in touch with academia to develop collaborations ranging from technology transfers to educational programs. This initiative is putting more effort into creating a biomedical ecosystem in Madrid.

Promega is also developing orientation programs to educate students on what they can do with a biology degree. University students often only think about working in a laboratory or becoming a school teacher. By opening the scope, we try to engage in programs like science weeks or workshops to make students more aware of future career paths.

Looking forward, what is your vision for Promega in Spain over the next five years?

I foresee strong growth in the market, especially in the biologics sector. This is an area which Promega has a lot of innovation to offer and can really build a strong presence. Additionally, agriculture and animal health are promising opportunities for the company and if funding bounces back academia will be recovered in our business model. Promega will continue to put a focus on building the scientific ecosystem in Spain and supporting the future generation of young scientists.

Our business areas will balance out, even more, reaching close to a 50/50 division between public and private sectors. Our innovative focus has been in drug discovery and through these kinds of business activities, the private sector will continue to be an increasingly prominent driving force of the company.

Overall, Promega will have to shift its current generalist approach to a more specialized one to continue its growth trajectory. Sooner or later we will formulate specialized sales forces for priority market segments. This will aid in Promega's positioning of industry expertise; an important aspect for our customers.

After 13 years of building the affiliate up from the ground, what has been your largest lesson during this time period?

The number one thing that stands out is that a project like this cannot be done alone; you need the right team who you can place complete trust on. The management of Promega in Spain is complex, and we all wear many different hats as a team of 22. Having a strong network of talent who can be co-responsible of the variety of new tasks we face on a daily basis has been fundamental to the success of Promega.

[See more interviews](#)
