The newest director

From the north to the south of Brazil, from reservoir recovery engineer to ANP director, Magda Chambriard's career trajectory has been varied and productive. **by Cassiano Viana**

Photos: T&B Petroleum Image Bank

SINCE OCTOBER OF LAST YEAR, engineer Magda Chambriard has been a director of Brazil's National Agency for Oil, Natural Gas and Biofuels (ANP). She is the first female director at the agency, where she has worked for six years, occupying various positions, including Superintendent for Exploration and Superintendent for Block Definition.

With 22 years of experience at Petrobras, where she worked in a variety of positions, this carioca represents the rising profile of women in the Brazilian oil industry.

Oldest daughter in a family with a tradition in medicine, Magda followed a different path, graduating in civil engineering from the Federal University of Rio de Janeiro in 1979. "Two of my siblings studied medicine, while my younger brother became a lawyer," relates Chambriard. "I liked mathematics. My father wanted me to be a professor, but I chose to study civil engineering. I like building sites."

So much so that, even before graduating, she worked on the construction of Rio's metro system, as a technical assistant for finishing works in the first five stations. It was during this time that she had an early experience of sexism in the professional world: while she was observing one of the tunnels being clad in concrete, the work was paralyzed by the superstition of the workers, who, like miners at that time, did not trust the presence of women. "The workers thought I would bring bad luck," she recalls.

Joining Petrobras

In the last year of university, she began knocking on the doors of construction companies. "My father kept reminding me to do the

public competition for Petrobras," she says, smiling. "In fact, I had already graduated and passed the Petrobras exam when a construction company phoned to tell me of a vacant engineering position on a construction project," says Chambriard.

When she visited the company, they told her it was no longer possible to hire her. Apparently, the week before, a married pair of engineers who worked at the company had been fired after having an argument in the office. "The finance director and majority shareholder had made it clear the company would hire no more women," she recalls. In the director's experience, women tended to join the company, marry one of the engineers, and then cause endless marital squabbles, which obliged the company to fire both the women and men. "I cried for three days and then went to Petrobras," she says.

Chambriard joined the oil company in 1980, as a trainee engineer. "I had no experience in oil, but I was only 22." For the first few years, she worked in the company's reservoir engineering area, studying, implementing and monitoring special methods for oil recovery (steam injection, in situ combustion, CO_2 injection) in Brazil's Northeast (Bahia, Sergipe and Rio Grande do Norte).

During the same period, she completed her master's degree in Chemical Engineering at the Federal University of Rio de Janeiro, in 1989.

At that time, she was working with special recovery methods, which went through a boom in the 1980s due to the high oil price. "At a certain time, I had a great need for thermodynamics, physical chemistry, mass transfer, etc. Hence my decision to do a master's degree."

Professional confidence

Chambriard had been at Petrobras for more than eight

years and was due to go to Stanford, where the company sent its professionals for training. "But my husband at that time couldn't leave Brazil," she explains. She spent a year persuading her superintendent she could do something in Brazil instead.

According to Chambriard, doing a master's degree helped to clarify her ideas and professional goals. "A master's is an initiation to research. It's useful for everyone. It's a form of professional development, a way of finding a personal research methodology. A doctorate is a program aimed at learning and research," she notes. "But what I really like is to work in industry."

Her master's degree boosted her professional confidence. "This was my greatest payoff from the degree: to be able to master a situation as a whole, to know how to initiate a project without a light at the end of the tunnel, to deal with uncertainties, face difficulties and obtain a favorable result at the end."

After the master's, Chambriard travelled the length and breadth of Brazil evaluating Petrobras projects, identifying the least risky ones, which ones could be most profitable, or were most attractive in other ways, and how long they would take to bear fruit. "This was essential work to support the company in its decisions on resource allocation."

From 1990 to 2001, she worked in Petrobras' reservoir engineering, production, and new E&P business areas. In 2002, she became a consultant in the company's new business area, negotiating over exploration blocks and mature and developing oil fields, participating in various planning stages of business deals with partners, and negotiating financial terms.

In her 22 years at Petrobras, Chambriard became familiar with practically all of Brazil's producing basins, which gave her a very good vision of the country's potential, both onshore and offshore. "I would say I have a very good grasp of the country's projects," she says. "In Petrobras' new business area, I learned how to deal with companies and to see how partners think, how to make a partnership, and even a pre-partnership, when you are still at the stage of convincing the business partner. I also learned how to deal with the legal and tax part, the contractual part. It was a very valuable experience."

Smooth transition

Chambriard joined the ANP in 2002, as an assistant to the directors, acting mainly in the exploration and production area. "I was apprehensive about leaving Petrobras. After all, I had been there for 22 years. However, I had worked my whole life in exploration and production, so it was quite straightforward to work in this area at the ANP," she explains. "In addition, working in Petrobras' new business area had been a useful transition. Perhaps if I had only worked in the technical area, it would have been harder for me. It was a smooth transition."

Chambriard was brought to the ANP by engineer Newton Monteiro, a big name in the Brazilian and indeed global oil industry. "When I began working with Newton, back at Petrobras, he ran a sector that dealt with mathematical simulations of reservoirs," she recalls. "Until the 1970s, analytical modeling was used. Newton was responsible for introducing numerical modeling to Petrobras, on a reservoir scale."

The two also worked together in the company's new business area. "I benefited a lot from Newton's international experience. After retiring, he joined the ANP, as technician in their production development department, and later he became a director." It was at this time that she was invited to a lunch, where Newton spoke about the ANP's marginal fields project, a 'training' field, which could become a training 'show room.' "This was just an excuse to invite me to join the agency," she jokes.

Accumulating experience

Once at the ANP, Chambriard provided support to the directors in processes related to exploration and production of oil and gas, analyzing projects, and she also helped to examine government participation issues.

Chambriard also provided advice on initiatives to encourage the growth of small and medium sized oil companies in Brazil, on formulating the basis for training field projects in Bahia and Rio Grande do Norte, and on making feasible the public tendering of marginal fields by the agency.

In 2005, she was appointed Superintendent for Exploration, where she was responsible for regulating and inspecting exploration activities undertaken throughout Brazil. One year later, she was made Superintendent for Block Definition, where she was in charge of geological and geophysical studies, which were carried out with the aim of ensuring a thorough understanding of the country's oil and gas resources. One of her duties in this position was to recommend, to the Mines and Energy Ministry and the National Energy Policy Council, which blocks should be included in public auctions for exploration areas.

Chambriard was also involved in preparing the ANP's first multi-year plan on acquiring new data on Brazilian sedimentary basins, which covers around 5 million km2 of basins. "The last few years have been hard work for me," she sums up. What she did not expect was to be appointed a director, at the end of 2008, which became possible on Newton Monteiro's departure.

"Haroldo Lima [director-general of the ANP] was concerned about the technical knowledge of the agency's staff, and a possible discontinuity of work, and he asked Newton to recommend someone to replace him. He suggested me," she explains.

On 29 October of last year, the Federal Senate approved her appointment, after a formal meeting in which she was highly praised by participants. "It was a funny situation, because I was very anxious – I was prepared psychologically to be asked all kinds of questions, but in the end, I was treated very well," she jokes.

It is with these same high spirits that she assesses the future of the oil and gas industry in Brazil. "The current outlook is extremely favorable. The country's extensive sedimentary basins and numerous indications of oil and gas deposits in a wide range of basins, from the north to the south of the country, indicate enormous exploration potential," she states. "In addition, the Brazilian state is investing in data collection, to reduce exploration risk and attract private capital," she concludes. ■