

Algeria
 Argentina
 Bahrain
 Belarus
 Belgium
 Benin
 Bosnia-Herzegovina
 Brazil
 Bulgaria
 Burkina Faso
 Burundi
 Cameroon
 Canada
 Central African Republic
 China
 Colombia
 Congo
 Côte d'Ivoire
 Croatia
 Czech Republic
 Democratic Republic of the Congo
 Egypt
 El Salvador
 Equatorial Guinea
 Fiji
 France
 Gabon
 Ghana
 Guinea
 Hungary
 India
 Indonesia
 Iran
 Japan
 Korea
 Kuwait
 Lebanon
 Madagascar
 Malaysia
 Mauritius
 Mexico
 Moldova
 Morocco
 Papua New Guinea
 Peru
 Poland
 Portugal
 Romania
 Russia
 Rwanda
 Saudi Arabia
 Senegal
 Serbia
 Singapore
 South Africa
 Spain
 Sri Lanka
 Tanzania
 Thailand
 Togo
 Tunisia
 Turkey
 Ukraine
 United Arab Emirates
 United States
 Uruguay
 Vietnam
 Yemen
 Zambia

25

www.econoler.ca
www.econoler.int.com



© ECONOLER INTERNATIONAL INC.
160, rue Saint-Paul, Room 200
Québec (Québec) Canada G1K 3W1
Telephone: 418 692-2592
Fax: 418 692-4899
www.econoler.ca
www.econolerint.com

Foreword

It is with great pleasure that we have produced this publication to celebrate Econoler's twenty-five years of activities in the energy efficiency sector.

Econoler's history, which is—among other things—associated with the development of the extraordinary Energy Performance Contracting (or ESCO) concept, is far from being banal. At the beginning of '80s when Econoler was founded, this concept was totally innovative. Nowadays, it is recognized around the world as one of the most efficient mechanisms for the implementation of energy efficiency projects. As Canada's very first ESCO and one of the first companies in the world to export the concept, having established the first such companies in Africa and Asia, Econoler is proud to be recognized as one of the developers of the concept and one of the first to promote its dissemination throughout the world.

The Econoler story is also the story of a Québec and Canadian firm that has successfully positioned itself on the international scene over the last twenty-five years, having worked up till now in over 60 countries and being globally recognized as a leader in its fields of expertise.

It is also the story of exceptional people whose efforts have contributed to the company's values and promoted its vision of a better world through a more rational use of energy and the improvement of the quality of the environment we live in.

This document provides an outlook on Econoler's creative process and development over the last quarter of a century. It also attempts to focus on the participation of some of the key individuals upon which the company's concept and success are based and to express Econoler's gratitude towards its various partners for their unfailing support over the years.

We wish to thank all those who helped make this document possible. Long live Econoler!



Pierre Langlois
President

Table of Contents

| | |
|--|----|
| Introduction | 1 |
| Chapter 1 | |
| The Founding of Econoler : the Development of the ESCO Concept..... | 3 |
| Chapter 2 | |
| Exportation of the Concept..... | 15 |
| Chapter 3 | |
| A Sinuous Road..... | 19 |
| Chapter 4 | |
| A Change of Direction | 23 |
| Chapter 5 | |
| A New Mission | 31 |
| Chapter 6 | |
| Econoler Today | 37 |
| Awards | 41 |
| Countries Where Econoler Has Left Its Mark..... | 43 |
| Offices and Subsidiaries | 45 |

Introduction

Econoler is celebrating its twenty-fifth anniversary in 2006. This document is intended to recollect the different milestones in the company's remarkable story by retracing the various phases of its development and by acknowledging some of the most important individuals who played a significant role in the process.

Econoler's story is closely linked to the development of the energy efficiency sector in Québec, in Canada and internationally as well. In light of current problems related to climate change and the global energy crisis, the energy efficiency concept is becoming increasingly recognized as one of the main solutions to be adopted throughout the world. This overview of the history of Econoler's development over the last twenty-five years only becomes more fascinating as a result.

When the company was founded, the challenge that Econoler was embracing was considerable. The success experienced since is all the more interesting. The different periods in Econoler's history have been both exciting and often relatively complex. Many people lived through these periods but few have an overall view of the events that shaped the company's destiny in its 25-year existence. Nevertheless, we have been able to track down several individuals who played a key role in the different phases of the company's history and to secure their collaboration in order to draw as accurate a portrait as possible of each phase.

The following chapters therefore describe the significant steps in Econoler's evolution including its creation by Hydro-Québec and ADS in 1981, its years of great achievements in Québec and in Canada, as well as its beginnings and its impressive growth on the international scene. Several of the protagonists are mentioned in passing, but we admit that many collaborators have not been included and we wish to apologize to those we have omitted.

Econoler is now poised for its next twenty-five years and is committed to innovation and to investing itself in all areas related to sustainable development in the energy sector and to limiting the impact the use of energy has on the world's climate. The future is unquestionably promising, for the needs in the energy sectors of Québec, of Canada and of the planet are greater than ever, not only from an economic point of view but from an environmental standpoint as well. It goes without saying that Econoler intends to play a significant role in this important global concern.

We hope you will enjoy reading this brief account.

The Founding of Econoler: the Development of the ESCO Concept

A Company is Born

Econoler was founded in 1981, based on the intent of Nouveler and the experience of ADS associés ltée. Their combined vision and know-how would ensure the success of Econoler as the very first Energy Service Company (ESCO) in Canada and one of the first such companies in the world. Nouveler had been created at the beginning of the '80s by the National Bank of Canada, Hydro-Québec and the Société générale de financement du Québec (SGF). Its objective was to develop new energy-related technologies and to act as a catalyst for Québec's industrial activities in this sector in order to create jobs and improve the competitiveness of the province's business community in the area. To this end, the company's President, Jean Gaulin, had an idea and decided to create a company with the specific mission of developing and implementing energy efficiency projects based on a concept through which turnkey services would be offered, enhanced by adapted financing and an investment payback method that would be solely based on the savings generated by the projects. This novel idea, which—to his knowledge—had not been inspired by any other similar mechanism in Canada or anywhere else in the world, paved the way for the development of a new concept that would allow to eliminate the different barriers related to the implementation of energy efficiency projects. The approach was all the more relevant at a time when the interest rates in Québec for the implementation of such projects were in the vicinity of 20%, which significantly hampered investments, including those in the energy sector.

To create this new company, Nouveler began looking for a Québec partner with the technical capacity to develop and implement such projects. After having met most of the engineering firms in Québec that specialized in the energy sector, Nouveler contacted Paul Drouin, President of ADS associés ltée. Founded in 1977, this young engineering firm's mission was to excel in the non-traditional fields of building and industrial HVAC engineering and electricity. From the moment the firm was established, it began conducting energy audits and developed a structured and systematic methodology to do so. By 1980, when computer technologies were being introduced in the business sector, ADS had already designed an energy management software (Energy Management System or EMS) that allowed to follow up on the development and implementation of the energy efficiency projects it was proposing to its clients.

The meeting between the executives of Nouveler and ADS went without a hitch and Nouveler promptly contacted ADS to inform the company that it had been selected to become a joint shareholder of the new company, which was to be called Econoler—a name derived from the French words "économie de l'énergie" (energy savings). The offer was contingent upon certain conditions that required important decisions on the part of the small engineering firm at the time. Indeed, Nouveler requested, in exchange for ADS's title as an Econoler shareholder, an investment of 20% in the company's capital stock that would represent an initial amount of 1 million dollars! On the other hand, Nouveler agreed to provide Econoler with a guarantee of 5 million dollars to finance the first projects undertaken. In exchange for its investment in the new company, ADS would have the exclusive responsibility of all the technical services related to the projects undertaken. ADS accepted the offer and the challenge proposed by Nouveler and found the means to cover the hefty; Econoler was born!

The Launch

At the very beginning, everything had to be created from scratch. The company had no personnel; all documents related to procedures or to promoting the concept needed to be drafted, not to mention the different specialized contracts that were going to be used for the sale and implementation of the new concept in potential customer premises. The ESCO concept only existed in the vision of its creators. All its components would therefore have to be developed as the company activities were implemented.

Robert Rocheleau, Nouveler's Vice President of Finance became the first President of the young company. The initial financial audits and *pro-forma* statements were prepared in collaboration with Samson Bélair Deloitte & Touche. A typical client contract was drafted in collaboration with the Desjardins Ducharme law firm. Paul Drouin and Jean-Claude Angers, two ADS executives and shareholders, acting as technical advisors for Econoler, began to develop the technical structure of the concept the company intended to present to its target clientele. Detailed energy audit formats and procedures were designed and building management and risk management procedures were developed based on the technical expertise and methodologies of ADS. Specific procedures also had to be developed for the monitoring and verification of the savings that would be generated by the projects that were to be implemented. Two key experts from ADS at the time, Pierre Baillargeon and Charles Frenette, were mandated to design the software that would be required to implement the concept, assess energy audits, develop baselines and the targets to reach in terms of consumption. During this period, promotional documentation was also produced to introduce Econoler and its novel concept.

The concept's operations and marketing activities were finally launched in March 1981.

The Concept

The business proposal that was developed was based on the following. Econoler would:

- conduct a series of energy audits and define all the technically and economically viable savings measures to implement in the client's facilities as well as determine the expected payback period for each recommended measure;
- propose a project to the client based on calculations determined by way of an energy audit of all the energy savings measures that would demonstrate an expected payback period of less than 5 years;
- propose a turnkey project to the client in return for management fees that Econoler would include in the total project costs;

- propose energy management services for the client's facilities during the payback period to help the client become familiar with using the new equipment installed in the context of the project and to maximize the equipment's efficiency;
- propose a financing programme to the client that would cover 100% of the investment required for the project, including the fees related to energy audits, all expenses related to project management and energy management as well as financing fees;
- propose a payback guarantee on all project disbursements within a period of less than five years or, failing that, the balance of the investment would become the sole responsibility of Econoler.

Econoler's proposal there-fore consisted in promoting a concept where the costs incurred to carry out a client's project on a short-term basis would be the same as the costs incurred if the client chose to do nothing at all. However, significant gains could be generated in the client's favor as soon as Econoler's investment payback period would come to an end.

ADS, with a number of regional offices throughout Québec, took charge of the initial marketing of the concept and met with several governmental institutions that would be likely to benefit from it. These institutions became the first targeted clientele identified by Econoler not only because of the savings potential they represented but also because of the limited business risks involved. The fact that ADS had established contacts within these institutions over the years was also a factor. Hospitals and schools were indeed choice targets for the proposed concept because, on the one hand, they were large energy consumers that were often confronted with significant budgetary constraints and, on the other, they represented a very low commercial risk. These types of institutions also had to balance their operating budgets, whereas the budgets related to their long-term assets did not allow them to consider investing in energy saving projects at that time.

Although the concept was attractive, there was a certain amount of skepticism on the part of potential clients and significant efforts had to be deployed to convince Econoler's first customers! In addition, an unavoidable constraint in regards to government administrative procedures related to the management of fixed assets made it difficult for the concept to be adopted by institutional establishments. According to governmental administrative services, any work carried out in the context of such projects was, by law, referred to as a fixed asset that had to be owned by the institution whereas the contract that Econoler was proposing stipulated that the assets would remain Econoler's property until the end of the payback period, which would allow it to retain a tangible asset to secure its financing.

After several months of hard work that led to a solution to overcome the administrative barriers, a first institution was finally in a position to sign a contract: the Sainte-Anne-des Monts Hospital on the Gaspé Peninsula. This first contract was signed between Econoler and the institution, represented by Mario Cyr, General Director of the hospital, who agreed to give Econoler a first opportunity.

A second contract rapidly followed with Partagec, an institutional centralized laundry servicing hospitals in the Québec City area. A third contract was then signed with a higher education establishment, the Lévis-Lauzon CEGEP, in Lévis on the south shore of Québec City. The company's first year came to an end with contracts totaling 1 million dollars, which was way beyond all expectations. These three initial contracts were going to enable Econoler to reach an initial level of profitability in its first year of operation. Econoler and its concept were officially launched!

However, success was not necessarily totally guaranteed; some clients remained on the defensive and colossal efforts were required to secure every contract. As long as the concept had not proven itself, there was a certain lack of trust in this new approach, although very attractive, and in this young company that resembled no other anywhere else in Canada. In spite of all this, the team pursued its efforts and 3 million dollars in new contracts were signed in 1982.

Significant barriers were encountered in selling the concept, especially due to the special rules in regards to calls for tender in effect at the time in the public sector. Government procedures dictated that calls for tender were mandatory before signing a contract with a company in the private sector. At times, management agreed to request a special waiver on the basis that, because Econoler was the only company in Québec offering this type of service, calls for tender were not in order. In other cases, managers interested in the concept decided to launch calls for tender all the same to respect government procedures, but Econoler ended up being the only bidder and systematically won all the contracts.

The concept began to really become popular and credibility in the new approach increased rapidly. However, to meet the company's growth, the needs in terms of financing started to increase. Because the investments required were increasing and the revenues were delayed because they were based on the energy savings generated, Econoler had to review its agreements with the National Bank to increase its line of credit so that it could meet the needs of the company in terms of its growth. Because of the company's winning formula, the required financing was easily obtained and, in spite of high interest rates, the payback periods of the initial ventures varied between six and twenty-four months.

The Company's Growth

The energy efficiency project concept, integrated with performance guarantees and financing by a third party investor, was beginning to be widely known and Econoler's credibility was growing by the same token. The need for new human resources was pressing, more specifically in terms of company management where individuals who were specifically dedicated to Econoler were required as opposed to the personnel from Nouveler and ADS who had, up till then, overseen the initial operations of the company. A dedicated sales team also had to be put in place to ensure the company's growth. At the end of 1982, Raymond Fortin was elected President and General Director of Econoler.

1983 proved to be a turning point in Econoler's history. Not only were the company sales increasing exponentially, but a new opportunity arose when Hydro-Québec established its new *tariff excédentaire*. This innovative tariff was directly related to the public utility's new large-scale hydraulic facilities and the short-lived surplus in the company's production capacity that occurred as a result. The tariff was such that energy users could take advantage of a supply in electricity that was intended for heating only and that was 20% less costly than the current oil prices. It was only offered to Hydro-Québec's large-scale business clientele on the condition that they install a new electrical heating system in their facilities. This was a wonderful opportunity for Econoler to enhance what it had to offer and include the implementation of new electrical boilers using this new rate in its project proposals. However, because the tariff was only offered to "large customers" in accordance

with Hydro-Québec's regulations, which meant those with a peak demand of over 5,000 MW, Econoler's target market (buildings in the public sector) was excluded.

Based on Econoler's initiative, a partnership was signed by a group of hospitals on the Gaspé Peninsula, some of which had already signed ESCO contracts with Econoler. This group approached Hydro-Québec on several occasions to try to convince the utility that it, as a group, should be considered as a "large customer". Following many meetings and great efforts on the part of the partners, Hydro-Québec finally accepted to recognize the association's proposal and a first "community" ESCO contract was signed between the group and Econoler. The contract included the eight hospitals in the region where all the often-timeworn oil-fired boilers would be replaced by electric heating systems and the institutions would be eligible to take advantage of the new *tarif excédentaire*. The projects were financed and reimbursed based on the savings generated in exactly the same way as all other Econoler projects. This significant bundled project was a first. Moreover, it provided the opportunity to sign a number of additional agreements that were in no way related to the *tarif excédentaire* and that were intended to implement other energy efficiency measures in the same establishments. In 1984, the first bundled project was followed by a second one grouping 13 hospitals in the Québec City region. The success of this particular operation caught the interest of the health care sector and was followed, in 1985, by yet another one that was even more far-reaching than the others—an association of 24 hospitals in the same area. The innovative nature of this approach was targeted towards combining the interests of a group of institutions to carry out a joint energy saving project. The resulting synergy of this type of association made it possible for several other institutions to become part of the project, which allowed them, in turn, to have access to the proposed energy saving programme when they could never have done it on their own.

The same approach was proposed when Hydro-Québec introduced its "dual-energy" tariff a little later on, another innovative rate that allowed to generate savings by replacing electric heating with heating with alternative sources during the utility network's peak periods. In this context, a last project based on the bundled approach by way of a partnership between 43 smaller health and residential care centers resulted in the conversion of the Québec City region's health institutions to dual-energy. Econoler witnessed success story after success story and became Québec's undisputed leader in the energy efficiency sector.

Econoler's financial statements as a result of all these projects were impressive. The National Bank of Canada became increasingly confident in the recommended approach and became more flexible in regards to its financial guarantee requirements. In consideration of the company's profits and the margin of flexibility that it demonstrated in its operations, the bank periodically reviewed the credit limits it was prepared to offer Econoler. The company's line of credit was therefore increased during its first years of operation and shifted from 5 million to 10 million dollars and then to 18 million and, finally to 25 million dollars. Econoler was definitely not at a loss as far as the financing of project development and implementation was concerned.

The need for human resources continued to be pressing so an important hiring campaign was launched and a large number of young engineers and technicians became part of the Econoler team. A special data processing division was created at ADS to redevelop all the tools required to conduct energy audits and to follow up on the implementation and the results of the projects that were launched. The original EMS software, which had been extensively modified since 1981, was replaced by a new improved version called SYNERGIE that would eventually be exported to all Econoler's international operations.

Between 1981 and 1989, in excess of 1,000 projects were implemented based on Econoler's unique concept in all kinds of commercial, institutional and industrial establishments in Canada. The company invested over 135 million dollars to implement these projects, in spite of the fact that several of the clients financed them on their own, always, however, based on the Energy Performance Contract approach. Annual recurring savings of 35 million dollars were generated by the projects that became recognized, for the most part, as very successful from both a technological and commercial point of view.

The objectives of the company shareholders had been reached and, Econoler's catalytic activities proved to be greatly beneficial for the Province of Québec's economy.

Exportation of the Concept

Canada

In 1983, following Econoler's initial success in the Province of Québec, the rest of Canada began to show interest in the new concept. Canertech, a subsidiary of Petro-Canada that was government-owned at the time, wished to replicate the experience and make use of Econoler's know-how elsewhere in Canada. Since Econoler did not have the financial resources to come to a commitment with Canertech on such a large project, it came up with yet another innovative approach to enable the concept to be implemented throughout Canada by way of franchises. Through this scheme, Econoler would be responsible for all the technical work related to starting up new businesses as well as for the technology transfer required to operate such companies, but it would not take on any financial responsibility. The company would nevertheless remain strongly linked to the success of the new companies because it would be remunerated not only through an initial down payment but through royalties based on the sales of the new ESCOs as well.

Econoler therefore signed a licensing agreement with Canertech that, in turn, transferred it to its newly created provincial subsidiaries located in Ontario, New Brunswick, Nova Scotia and Prince Edward Island. The subsidiaries were created based on the model designed by Econoler and the financial and technical partners were local entities located in each of the provinces where the companies were launched.

With the purpose of maintaining its pan-Canadian role and of protecting its interests in regards to Econoler's activities in Québec, Canertech bought 20% of Econoler's capital shares. Econoler, on its side, developed a structured training programme with the aim of transferring the technical, management and financial expertise it had developed through its new concept to help the new companies launch their operations. A support and follow-up programme was also designed to ensure the success of each new licensee's first contracts.

Europe

Because of its unique approach and its success only after a few years of existence, the concept developed by Econoler began to attract attention on the international level as well. In 1984, the European Economic Community invited Econoler to give seminars to potential investors and institutional players interested in the field of energy efficiency. New exporting opportunities rapidly became evident. Belgium, through the Société nationale d'investissement belge (SNI) and the Geocal engineering group showed an interest in buying a franchise of the Econoler concept with the purpose of implementing it based on how it had been developed for Canada. Econoler agreed to the proposal and created a new company, Econoler International, to carry out and manage this type of activity internationally. Paul Drouin, who was then Co-President of ADS and a board member of Econoler, was named President of the new company and Robert Volders was recruited as its General Manager.

Once again, the structure implemented by Econoler in Québec was adopted and a search for local financial and technical partners was launched. SNI and Geocal became shareholders of the newly formed company and the licensing agreement was signed. Econoler's first European venture was off to a start.

In 1986, following training on Econoler's know-how and the implementation of several projects, the Belgian partners requested rights to extend their franchise with the purpose of becoming Econoler International's official European representative and exporting the concept. Econoler S.A. (later known as TPF-Econoler) was founded and agreements were signed in France in 1986 in partnership with the Banque Nationale de Paris (BNP Bail) and Spie Batignolles, in Spain in 1988 with TPF S.A. (a holding company of Econoler S.A.), S.A. SODIGA (a regional investment company) and S.A. SEDISA (a consulting firm) and in Portugal in 1989, with Petrogal (Petroleos de Portugal), EDP (Electricidade de Portugal), BONANCA (an insurance company), CISF (a leasing company), PROTERMIA (a consulting firm), CARBOL-LUSOMELT (a coal importing company) and Econoler Development. As of then, there were "Econoler operations" in each of these countries.

Asia

In parallel to the European experience, there was an interest in the Econoler's concept elsewhere in the world. Some ten countries demonstrated their intention to acquire rights to the concept. In 1988, two other licensing agreements were signed by Econoler International, the first in Singapore with DBS Land, a subsidiary of the Development Bank of Singapore and a second in South Korea, with Samsung Everland, a Samsung subsidiary. The latter project won several important awards for its innovation and its technical results, including the ACEC's first Canadian Consulting Engineering Award and the Government of South Korea's Award of Merit in the industrial sector.

The United States

As far as the United States were concerned, in 1986, Econoler International was asked to take part in XENERGY's operations, a company that proposed the creation of Econoler USA with the purpose of developing the Econoler concept in the northeast of the country. XENERGY's Carry Bullock then became President of the new company. The projects targeted were essentially cogeneration projects with another novel approach referred to as "chauffage". This new approach was, and still is, a concept whereby the energy production and consumption of buildings was totally taken over, guaranteeing long-term global operational savings. The Econoler teams backed the new subsidiary in the development of several projects, the first of which was implemented at the Detroit Receiving Hospital in Michigan.

International Expansion

As Econoler launched its export activities by making its expertise available in the context of ESCO implementation and operations, several other opportunities associated with the energy efficiency sector became apparent on the international scene. With the help of ADS, several

Economer specialists were recruited to train experts and develop projects for different international organizations, including the Canadian International Development Agency (CIDA) and the United Nations Development Programme (UNDP). Over this period of time, important mandates included, among others, a five-year multi-million dollar energy efficiency development project in the industrial sector of Senegal as well as an institutional energy efficiency programme for buildings in the public sector of Gabon.

A Sinuous Road

After over five very successful years throughout Québec, Econoler's growth in the province was curbed by a number of important events:

1. In some instances, the replacement of fossil fuel systems by electric heating systems resulted in a premature degradation of chimneys that were no longer in use. This unforeseen occurrence forced Econoler to undertake the required corrective measures in the facilities where this occurred, which represented significant investments. Because of these unforeseen expenses, the company's financial situation suffered significant losses in 1986, which had a negative impact on the growth of its operations over the few following years.
2. That same year, the new federal government decided to refocus Canertech's operations in areas that were not compatible with Econoler's activities. Canertech therefore decided, in that context, to sell its Econoler shares, which Econoler bought back along with the shares of the different ESCOs that had been launched in Ontario, New Brunswick, Prince Edward Island and Nova Scotia.
3. In 1985, a new government was elected in the Province of Québec, which resulted in the development of a new strategic plan at Hydro-Québec over the following years. The government then decided that the public utility should intensify its efforts in the energy efficiency sector by introducing an important demand-side management programme (DSM), which was launched at the beginning of the '90s. Hydro-Québec intended to invest colossal amounts to support the programme—over 100 million dollars per year over a five-year period. In this context, the utility's interest in its involvement with Econoler activities decreased significantly since such involvement would link Hydro-Québec to only one player in the private sector as opposed to opening the door to all players on the market. In addition, extensive lobbying on the part of several of Québec's engineering firms supported Hydro-Québec's more open approach regarding the new DSM programme as they were opposed to Econoler's being the sole beneficiary of this significant market.

Nevertheless and in spite of the context that was impacting the company's orientation, Econoler continued to grow in the second half of the '80s. While maintaining the company's involvement in the public sector, Econoler launched a number of projects in the private sector. Several projects were implemented in different types of industries as well as in a large number of private buildings. The success of the approach that Econoler proposed to its clients was confirmed and, because of the company's technical expertise, of the experience it had gained over the years and of its access to financing that was adapted to its needs, Econoler still remained at the forefront since it had no competitor on the Canadian ESCO market.

However, in 1989, increasing pressure on Hydro-Québec resulted in Nouveler's advising ADS of its intention to withdraw from the company. Buying back Nouveler's shares and covering guarantees to maintain the financial status required by the bank represented too much of an investment for ADS, in spite of its great interest in Econoler. A call was launched to public and private Canadian investors. Because there were no offers on the part of investors in regards to taking over its shares and its major financial commitments, Nouveler decided to end Econoler's operation to conform to the instructions of its major shareholder. Econoler's ESCO in Quebec operations therefore closed at the end of 1989.

As company shareholder, ADS demanded, in exchange for its participation, all the rights to Econoler's technology and to the "Econoler" corporate name as well as 100% of Econoler International's shares. One restriction was imposed to ADS by Hydro-Québec—that it not do business in Québec under the name of Econoler for a period of ten years as of the date of the signed agreement. However, there were no restrictions as to the use of the names Econoler and Econoler International outside of Québec. ADS therefore inherited the overall international franchise network and a considerable potential that was waiting to be exploited in the favorable context that was to come in the '90s for the development of the energy efficiency sector.

A Change of Direction

After Hydro-Québec's withdrawal as the company's shareholder, Econoler had to quickly reposition itself. A good deal of thought went on at ADS, the company's only shareholder at the time, and a new strategic plan was developed to tackle the national and international market.

Québec

In Québec, it became clear that the energy efficiency market would be in full swing once Hydro-Québec's new programme was launched, but the ESCO concept would not be relevant as long as the state-owned utility continued to apply its important subsidy programme for activities in this area. ADS therefore adopted a new strategy and decided to focus its efforts on the consulting market of the Province of Québec and to not reactivate the approach used by Econoler in the '80s. A number of strategies were therefore developed focusing on the Québec market, including:

- the development and management of programmes for Hydro-Québec
- using new Hydro-Québec programmes and the programmes of Gaz Métropolitain, Québec's natural gas distributor, to develop and implement client projects
- positioning itself to design training programmes, to develop demonstration projects and research and development programmes in partnership with institutional players in the energy efficiency sector, namely the Agence de l'efficacité énergétique du Québec (AEE), Canada's Office of Energy Efficiency (OEE) and National Resources Canada (NRCan).

The strategy bore fruit and allowed Econoler, which had become an ADS trademark through the new Econoler-ADS brand name, to differentiate itself from its ESCO services and to position itself as a leader in Québec's energy efficiency sector. The sector was becoming increasingly important in view of the environmental issues that were beginning to be better defined in Canada. Econoler's energy efficiency specialists therefore focused their efforts on the needs of the provincial market through ADS or Econoler-ADS and on those of the international market through Econoler International.

As soon as Hydro-Québec's programmes were launched, the Québec market expanded rapidly. Econoler's provincial operations, by way of ADS, required the services of over 70 specialized engineers and technicians. The development and management of several large programmes were relegated to ADS and revenues from consulting services soared way beyond the company's revenues in the '80s. The management of the implementation of the new "dual-energy residential" tariff became the responsibility of a consortium under ADS and this alone represented a contract of 13 million dollars. This particular mandate included the management of a Hydro-Québec investment portfolio of 170 million dollars over a five-year period that was intended to promote and manage thousands of new projects.

Econoler did realize, however, that a market focused on Québec only could be fragile in that it was essentially supported by different and very significant subsidy programmes. It therefore became clear that, to ensure the company's growth, it was strategic to concentrate its development through the international market where Econoler, via Econoler International, already proved and positioned itself as a leader. This notion would prove to be very sound since Hydro-Québec massively ceased all its energy efficiency programmes in 1995, which resulted in the almost total abolition of this market in Québec over the next ten years.

The ESCO Concept on the International Marketplace

Morocco

After Econoler ceased to operate as an ESCO in Québec, the company, by way of Econoler International, focused on the development of the concept on the international level. Thanks to the support of CIDA, a first ESCO was implemented on the African continent, in Morocco to be precise. With 6 million Canadian dollars in financial support, the launch of this new ESCO represented quite a challenge. In addition to introducing this brand new concept on a developing market (as opposed to Econoler International's other international operations that had all been implemented in countries with stable economies), the project was being launched on a market where institutional stakeholders did not hold the energy efficiency concept in high regard. In fact, the country's electric utility did not perceive the concept in a favorable light because of the risks related to a decrease in its sales. Because of the significant challenge, the management of the new operation was relegated to Raymond Fortin, Econoler's past President and General Director, who had left the company when it closed its Quebec operation in 1989.

At the very beginning of this new endeavour, Econoler International adopted a commercial strategy whereby the name "Econoler" would no longer be directly associated with its subsidiaries and licensees. This decision was essentially made so that only the company's headquarters would bear the "Econoler" brand name because past experience had demonstrated that there were disadvantages to linking with companies that were not under the direct control of Econoler International or that could ultimately be sold to other entities. The Moroccan venture would therefore be called ADS Maroc.

When ADS Maroc started up in 1991, the required technical staff was recruited locally and trained by Econoler International specialists. The new ESCO's first projects were identified and the CIDA funds were used to partially finance their implementation. However, it was still impossible to implement projects in the public sector because of strict regulations related to mandatory calls for tender for such projects, which did not allow the ESCO concept to be put into application in the sector and deprived the new company of a very strategic market.

In spite of this, between 1991 and 1997, over 50 projects were developed and implemented by ADS Maroc based on the Energy Performance Contract approach. The projects were launched within a wide range of Moroccan economic sectors, including hospitals and

various industries (textiles, fisheries, paper, bottling, etc.). The results were conclusive and the clients were very satisfied with the generated gains. ADS Maroc therefore proved to be a success and demonstrated the viability of the ESCO concept in the context of countries with developing economies. However the scope of the company's success was limited by the lack of financing other than the CIDA funds and by the fact that it was impossible to do business in the public sector. One of Econoler International's priorities would soon be to establish mechanisms, in collaboration with several international financial institutions that would eliminate such barriers in countries with developing economies or economies in transition.

Jordan

In 1993, Energy Management Services (EMS), a newly formed company in Jordan, was seeking a partner to launch the ESCO concept in that country. After extensively touring North America and Europe, EMS selected Econoler International as its strategic partner because of the company's vast and unique international experience in the application of the concept. New CIDA funding, through its Industrial Cooperation Programme, was obtained allowing Econoler International to support the implementation and launch of the EMS ESCO operations that same year. The partnership agreement signed between EMS and Econoler International was a big success and several projects were implemented in Jordan over the following years. EMS took advantage of its Jordanian experience to launch other operations in the region, including in the United Arab Emirates. The partnership is still in effect today with joint ventures on various projects.

The License Agreements Come to an End

In 1996, because of its multiple and direct operations on the international market, Econoler International decided to cancel the various license agreements linking it to its franchises. This allowed the company to focus its efforts on its more strategic operations and to free its licensees from their obligations towards Econoler International. Agreements were therefore signed with most of the franchised partners to terminate their license agreements and to limit their use of the "Econoler" brand name while maintaining their rights to use the concept in their respective countries. This also allowed to eliminate any confusion that could result from the widespread use of the "Econoler" brand name in the context of the significant international expansion that Econoler International witnessed as of the middle of the '90s.

The International Market Opens Up to Energy Efficiency: The Rio Earth Summit

Following the Rio Conference on Climate Change in 1991, other significant opportunities rapidly came to the fore. Although Econoler International had been very active in all forms of energy efficiency consulting activities as early as in the second half of the 1980s, these types of activities remained nevertheless marginal in terms of the company's portfolio. Following the historic meeting in Rio, the overall international community became increasingly aware of the major impact that energy consumption has on the environment and decided to establish mechanisms to address the problem. Several opportunities that were different in nature would become available over the oncoming years and Econoler International certainly intended to take advantage of its predominance in this activity sector.

Between 1992 and 1997, Econoler International was often mandated to provide technical assistance in the context of different types of energy efficiency related projects based on the state-of-the-art expertise it had acquired over the years. Many of these mandates were related to the development of the ESCO concept in all its forms in a large number of countries and on all continents. For example, the company was selected by the World Bank to support the implementation of a first ESCO in China (First Henan ESCO) in 1995; in 1996, it was mandated by the IEPF (Institut de l'énergie et de l'environnement de la Francophonie) to implement the concept in the French-speaking countries of sub-Saharan Africa; and in 1997, UNDESA, the United Nations Department of Economic and Social Affairs, selected Econoler International to take part in the development of the concept in several countries in North Africa and the Middle East.

During this same period, Econoler International also received mandates related to more traditional fields of EE activity such as training and capacity building on a large variety of subjects as well as mandates related to more specific state-of-the-art expertise (demand-side management, for example). The company's international activities increased significantly and, in 1997, virtually replaced Econoler's relatively limited operations on the company's home turf, which were a direct result of Hydro-Québec's withdrawing its subsidy programmes, as described previously.

A New Mission

In 1996, because of Québec's slow economic growth and the success of the DSM programmes implemented in the first half of the '90s, the province's energy demand decreased. Hydro-Québec then decided to reorient its development activities on the international market. The utility's new strategic plan included the development of Hydro-Québec International (HQI) that was entrusted with the mandate to invest significantly in all Hydro-Québec's sectors of operations on the international scene and to support the development of Québec's overall expertise. Significant financial resources of over 1.5 billion Canadian dollars were provisioned to proceed with strategic investments and to reach the new entity's objectives. Michel Clair, who had been Québec's Minister of Energy in the '80s, was named President of HQI.

In 1997, HQI launched a comprehensive international development programme. It was rapidly observed that the energy efficiency sector was an increasing concern on the part of the company's potential partners and that the ESCO concept proved to be an approach that was increasingly in demand. Having transferred the majority of its energy efficiency specialists to other activity sectors after the cancellation of its programmes, Hydro-Québec came to the conclusion that a new partnership with Econoler International would be a very relevant move. The partnership launched a number of pilot projects, including the development of new business plans in regards to launching ESCOs in the Maghreb countries. These projects were carried out in association with select HQI utility partners in each country, including SONELGAZ in Algeria, ONE in Morocco and STEG in Tunisia. Because of the high level of interest that was demonstrated in these projects and of the great potential that existed for replicating the concept throughout all continents, HQI decided to reinvest in Econoler International and bought 49% of the company's shares. In addition to this significant investment, a loan of \$800,000 US was granted to Econoler International by the International Finance Corporation (IFC), a member of the World Bank Group, through its new *Small and Medium Size Enterprises Fund*, with the purpose of investing in new ESCO subsidiaries in these countries. In the meantime and in the context of a rationalization of the operations of engineering firms in Québec, ADS merged with Soprin creating Soprin ADS, which, in turn and shortly thereafter, merged with Dessau to form the Dessau Soprin group. This is the company that finally became Econoler International's major shareholder, in partnership with HQI. All this materialized at the end of 1998.

The company's head office was located in Québec City because a large number of Econoler International specialists lived there. Pierre Langlois became the company's new President, after having worked in the technical and administrative departments of ADS, Econoler and Econoler International since 1986. He was backed by Pierre Baillargeon and Hakim Zahar, who had also been part of the ADS, Econoler and Econoler International teams for several years. They were both named Vice-President of the company.

Econoler International there-fore became HQI's diver-sifi-cation arm in the international energy efficiency sector. Although it essentially targeted the implementation and management of investment projects through the start up and operation of ESCOs, Econoler International maintained its technical assistance mandate, which it would be extensively developing over the next five years. It also diversified the scope of its expertise to better respond to the overall needs of the current market. Econoler International therefore became involved in new energy efficiency activity sectors, including the development of EE building codes and standards, demand-side management for utilities, the development of institutional energy efficiency policies as well as other related activities. The area of renewable energies also became a focus with different projects in sectors related to the energy potential of biomass (forest and urban), wind power and small hydro. However, a large portion of the company's technical assistance activities remained focused on the development of the ESCO concept. And thus, Econoler International became actively involved in the start-up of new ESCO operations for prestigious electricity producers such as Électricité de France (through one of its subsidiaries in Hungary) and CEMIG in Brazil. It also was involved with the implementation of the concept and all its aspects in several countries, including the Côte d'Ivoire, Egypt, Mexico, Romania, Russia and Thailand.

The Société tunisienne de gérance de l'énergie

Upon HQI's return as an Econoler International shareholder, efforts were focused on materializing the first investments in the ESCOs that were in the process of being developed in the Maghreb. The Tunisian project was the venture that was evolving the fastest and a Memorandum of Understanding (MOU) was signed with Tunisia's national utility, the STEG, in regards to the creation of a joint company with Econoler International to exploit the new concept in the country. However, since the STEG was currently undergoing the privatization of its subsidiaries, its board of directors indicated that, under the circumstances, it would be difficult for the company to consider the creation of a new subsidiary at that time. Negotiations between all parties resulted in a new partnership agreement where the shareholders would be three Tunisian banks (ATB, STB and BDET) and a strategic partner from the private sector. A special partnership agreement was reached with STEG that would become part of the company's board of directors. The company was therefore founded at the end of 1999 and Hakim Zahar, Vice-President of Econoler International, was the new entity's President and General Director during its first years of operation.

The Société Tunisienne de gérance de l'énergie (STGE), a name that recalled its special affiliation with STEG, was the very first ESCO to be implemented in Tunisia and it not only had to develop its market but it also had to promote a concept that was brand new to the country. Between 2000 and 2003, it successfully developed over 40 projects based on the Energy Performance Contract approach and implemented 15 that, for the most part, achieved both their technical and financial objectives.

The STGE's operations were hampered by the lack of adapted funding from Tunisian financial institutions as well as the difficulties arising from the novelty of the concept in Tunisia. In addition, because the Tunisian partners tended to play an essentially passive role, Econoler International was called upon to act as the company's mainstay. In these circumstances, it decided, in 2004, to sell the STGE to one of the shareholders. Following this, it launched a new ESCO in Tunisia, ENERPLUS, and became its only shareholder.

HQI Changes its Course

In 2001, Hydro-Québec decided once again to refocus its strategic development and restructured its international activities by abolishing HQI and entrusting its international development activities to its subsidiaries (HQ Production, TransÉnergie, HQ Distribution). This change was a hard blow to Econoler International's development since its main strategic partner was completely restructuring its approach in regards to its international activities.

2001-2002 proved to be a year of transition during which the company shareholders had difficulties coming to an agreement on a new vision in terms of Econoler International's orientation and development.

In this context, it was hard to follow up on the different investment opportunities developed by Econoler International in ESCOs such as those implemented in Algeria and Brazil. However, the company continued to progress in its specialized technical assistance assignments and took advantage of an increase in the activities of several international institutions in that particular field.

A Change in Direction

Because Hydro-Québec was having difficulties defining a specific niche for Econoler International in the context of the utility's new strategic plan and because of the wait-and-see positioning adopted by Dessau Soprin on the subject, the executives of Econoler International decided to make a proposal to the two shareholders whereby it would buy back the company, which materialized in March of 2002. Econoler International therefore took on a new direction.

Econoler Today

In March of 2002, Econoler International new management decided to adopt a new direction by focusing the company's activities on its state-of-the-art expertise and on new opportunities that were directly linked to this expertise. It therefore began focusing its development activities on the following:

- technical assistance projects in all areas of energy efficiency and clean energy programmes;
- the development of ESCO projects through participation in local companies
- the development of the different Kyoto Protocol mechanisms, taking part in the market related to the structuring of GHG emission reductions transactions
- returning on the Québec market, and reintroducing the Econoler brand name on that market, when the time was right.

This decision was, above all, strategic and took into account the unique experience the company had acquired on the international scene since it was founded in all areas of energy efficiency and renewable energy, not to mention the significant and imminent market potential associated with the Kyoto Protocol. Since the market in Québec remained stagnant, the time was not yet ripe for the enterprise to focus its activities on the province in full force; it therefore focused its efforts on the international market that was really active and growing.

As of 2002, Econoler International grew in leaps and bounds and its operations expanded in all its sectors of activity. In addition to its evolution in the fields of expertise it had developed since the beginning of the millennium, new services were added to those provided by Econoler International, including monitoring and verification plans for energy efficiency projects, the design of diversified and innovative financial tools for several international financial institutions, the management of specialized energy efficiency funds, the evaluation of projects and programmes implemented by different international organizations, etc. Because of the significant needs in these particular sectors, Econoler International was in a very favorable position because of the extensive experience it had gained over the last twenty years.

In 2004, Econoler International proceeded with two new strategic investments aimed at maintaining the company's position as an investor in the area of ESCOs on the international scene. A new ESCO, ENERPLUS, was launched in Tunisia and a partnership with Energobit in Romania resulted in the creation of one of the first ESCOs in that country, EnergoEco.

Finally, in 2006, Econoler International decided that the time had come for it to resurface on the Québec market. Econoler was therefore reintroduced as an entity for the national market. As for a first step in this comeback, Econoler, in association with a number of strategic partners, launched ENER21, a new enterprise providing energy management outsourcing services to building and industry managers.

Looking up for to the Future

Over the last twenty-five years, the Econoler group, through its different entities and subsidiaries, have participated in the development and implementation of around 3,000 projects in over 60 countries. Through Econoler International, the group has developed the energy efficiency market on all continents and worked in collaboration with most of the large international financial institutions, including the World Bank, the African Development Bank (AfDB), the Asian Development Bank (ADB), the European Bank for Reconstruction and Development (EBRD), the Inter-American Development Bank (IADB), etc., as well as with most of the United Nations Agencies, including the UNDP, UNEP, UNIDO, UNDESA, UNOPS, etc.

The Econoler group head office is still located in Québec City and, today, remains a leader in its fields of expertise—in Quebec and internationally. As a forerunner in the ESCO concept and the first to establish such an enterprise in Canada—and the only ESCO in Québec for a period of ten years, as well as the first to launch ESCOs in Africa, the Middle East and Asia through Econoler International, the Econoler group intends to continue to be a pioneer in the key sectors of its activities.

Thanks to its dynamic spirit and its renowned expertise, the Econoler group will continue to progress and to contribute to bringing forth a more energy-efficient world while maintaining its respect for sustainable development and the environment for the generations to come.

Awards

CTI World Leadership Award (2000)

Climate Technology Initiative

Exporting Award, Energy Sector (1997 and 2000)

Gala de l'exportation, Salon international Le monde
des affaires, Québec

Energia Contest, Exporting Sector (2000)

AQME

Energia Contest, Training Sector (1997)

AQME

Energia Contest, Institutional Sector (1997)

AQME

Canadian Consulting Engineering Award (1990)

Association of Consulting Engineers of Canada

Award of Merit, Industrial Sector (1990)

Republic of South Korea

Honorable Mention, Energy Efficiency and Design (1985)

National Resources Canada

Countries Where Econoler Has Left Its Mark

The Americas

Argentina, Brazil, Canada, Colombia, United States, Guyana, Mexico, Peru, El Salvador, Uruguay

Africa

South Africa, Algeria, Benin, Burkina Faso, Burundi, Cameroon, Congo, Côte-d'Ivoire, Egypt, Gabon, Ghana, Equatorial Guinea, Kenya, Madagascar, Morocco, Mauritania, Central African Republic, Democratic Republic of the Congo, Rwanda, Senegal, Tanzania, Togo, Tunisia, Zambia

Asia

China, India, Indonesia, Japan, Malaysia, Singapore, Sri Lanka, Thailand, Vietnam

Europe

Belgium, Belarus, Bosnia-Herzegovina, Bulgaria, Croatia, Spain, France, Hungary, Moldavia, Poland, Portugal, Czech Republic, Romania, Russia, Serbia, Ukraine

Pacific Islands

Fiji, Papua New Guinea

Middle East

Saudi Arabia, Bahrain, United Arab Emirates, Iran, Jordan, Lebanon, Turkey, Yemen

Offices and Subsidiaries

Head Office

160, rue St-Paul, bur. 200
Québec, Québec
Canada
G1K 3W1
Contact: Mr. Pierre Langlois, President
Phone: 1-418-692-2592
Fax: 1-418-692-4899
Info: info@econolerint.com
Website: www.econoler.ca
www.econolerint.com

Subsidiaries

EnergoEco

400633 Cluj-Napoca
Str. Luncii nr. 5A, Roumanie
Contact: Mr. Florin Pop, General Director
Phone: 40 264 207500
Fax: 40 264 207555
E-mail: florin.pop@energoeco.com
Website: www.energoeco.com

Enerplus

Boîte postale No 33
2013 Ben Arous, Tunisie
Contact: Mr. Mabrouck Sghaier, Director
Phone: (216) 79 491 134
Fax: (216) 79 491 134
E-mail: msghaier@econolerint.com
Website: www.enerplus.com.tn

ENER21

160 rue St-Paul, bur 200
Québec, Québec
Canada
G1K 3W1
Contact person: Mr. Nathan Chatterley, Director
Phone:
Montreal: (514) 815-3168
Quebec: (418) 692-2592
Fax:
Montreal: (514) 815-0088
Quebec: (418) 692-4899
Email: info@ener21.com
Website: www.ener21.com

Project office

EEE

4 Kuzman Shapkarev Str.
Sofia 1000, Bulgarie
Contact person: Mr. Ivan Gerginov, Executive Director
Phone: +359 2 81 000 80
Fax: +359 2 81 000 99
E-mail: Gerginov@bgeef.com
Website: www.bgeef.com

Liaison office

Washington (USA)

2020 Pennsylvania Avenue

N.W., PMB 192

Washington DC 20006, USA

Contact person: Mrs. Michèle Calderon, Representative

Phone: (202) 686-7243

Fax: (202) 362-6716

E-mail: mcalderson@econolerint.com