



The Most Powerful Name In Corporate News and Information

## Green, Biodegradable Products That Work In Water Is What Flexible Solutions Is About – With Biodegradable Pool And Reservoir Covers And Now Biodegradable Poly Aspartic Acid Products As Detergent Additives And Oil Field Scale Control

Basic Materials  
Specialty Chemicals  
(FSI-NYSE)

Flexible Solutions International Inc.

615 Discovery Street  
Victoria, BC V8T 5G4  
Phone: 250-477-9969



**Daniel B. O'Brien**  
President and CEO, Director

### BIO:

Daniel B. O'Brien is the CEO and a Director of the Company. The Company has employed him since its inception. His responsibilities include coordinating strategy, planning, and product development. He has been involved in the swimming pool industry since 1991 at which time he founded a private company called Flexible Solutions Ltd., which was purchased by the Company, through the share exchange in August 1998. Prior to his involvement with Flexible Solutions Ltd., Mr. O'Brien was a teacher at

Brentwood College where he was in charge of Outdoor Education.

Interview conducted by:  
Lynn Fosse, Senior Editor  
CEOCFOinterviews.com

**CEOCFO:** Mr. O'Brien, you have been with Flexible Solutions since the start: what was the vision of the company when you began, and where are you today?

**Mr. O'Brien:** "The vision when my father and I started the company in 1991 was to start a company to do two things; be good to the environment and make money. Today, we are not only producing and selling the products that we thought we would be, but we are living the dream and we are producing 100% of our products environmentally sound and sustainable. We are making money."

**CEOCFO:** Would you tell us about your product lines?

**Mr. O'Brien:** "We have two product lines. We originated swimming pool covers that are monolayer films and biodegradable. We took those biodegradable films and we expanded them, so they could also be used on reservoirs for saving water. That is the smallest portion of our business now; it is only 10% of our sales. In 2004, we acquired another company out of bankruptcy that has become 90% of our sales. It produces biopolymers, which is in our case the polymerization or joining together of multiple aspartic acid units into poly aspartic acid. Poly aspartic acid has several uses and is fully biodegradable, and we are in the process of opening a factory to make our raw materials from sustainable sources."

**CEOCFO:** What is poly aspartic acid?

**Mr. O'Brien:** "Aspartic acid is an amino acid that is present in every living animal. It is necessary to human life and it is extremely safe since it is part of us. Aspartic acid is normally manufactured from fractions of oil by-products, in particular benzene. When you polymerize it into a polymer or a long chain, it has very different properties while still retaining all its safety and biodegradability. If you take a polymer of aspartic acid it has some abilities, such as it can keep scale from forming on the inside of pipes. Its irritating form is when your kettle gets that white skim on the internal heating element. But if this were happening in your oil field recovery pipes, where the scale from the water that comes up with the oil is plating out on the side of pipes, your oil well may plug with scale before you get all the oil out and it is extraordinarily expensive to remove scale after it occurs. Poly aspartic acid is approved in the Norwegian offshore oil industry for being a biodegradable scale preventative and currently our biggest sales are into the offshore oil industry in Denmark, Norway, and Sweden where they prefer to use biodegradable products if they are available. Another interesting use for a long polymer of aspartic acid is that you can substitute that biodegradable aspartic acid into detergents for either phosphates or the acrylic acid component, which doesn't biodegrade. The result is an equal performance laundry or dishwashing detergent that doesn't release large quantities of non-biodegradable acrylic acid or large quantities of phosphates into the water supply. We are selling this product already for certain biodegradable detergents. We have a company in the United States called Method that sells through Target and they are using our biodegrad-

able raw material, poly aspartic acid to make their detergents, especially their dishwashing detergents more water-friendly. We are also selling into Europe for certain specialty detergents there, and we are hoping over the next few months or year to gain a contract with one of the very large detergent companies so that we will increase our profitability.”

**CEOCFO:** What does the competitive landscape look like?

**Mr. O'Brien:** “There is another company in Europe that makes similar products called Lanxcess. They were spun off from Bayer and they make poly aspartic acid also. We share a group of patents together and they use one process for making it, we use another. Their process uses different raw materials and has a slightly different poly aspartic acid as the outcome. Ours is different and there are advantages to both. Theirs is a little bit less expensive to produce, ours has a more attractive color for dishwashing detergent applications and is easier to specially formulate for the oil field industry.”

**CEOCFO:** When you were looking at companies to take into the fold, how did you know this was the right product?

**Mr. O'Brien:** “At first I had to be convinced. The mergers and acquisitions specialists that brought the idea to us said, ‘You guys are a perfect match.’ I looked at it and said no; I don’t see that. I thought about it for a while longer and it caused me to have to define the three things that I felt were important to Flexible Solutions: it is green, biodegradable and works with water, and they are products that have to be sold to the same customer continuously. We were looking for razor blades, not razors. When we discovered this division that we have now bought, everything it does is integrated with water just like the original Flexible Solutions product was. Everything is biodegradable, so it is green chemistry. Flexible Solutions originally sells biodegradable swimming pool and reservoir covers and the Nano Chem division sells biodegradable processes for detergent additives and oil field scale control. Once I defined what Flexible Solution was, I

could also define whether the prospect was a match.”

**CEOCFO:** How are you faring in the current economic environment?

**Mr. O'Brien:** “This is a difficult environment for two reasons; the first is there is less money to go around and people are having to be much more careful about what they purchase and how much they purchase. That is easy for us to work with because we have the ability to slow down or speed up. We have a very tight ship in terms of not very many employees and we have a very productive group of people. We find that the slowing down or speeding up of our business is relatively easy to deal with. The second part of it is the visibility, because we are not able to see with any reliability more than a month into the future and that makes it very

**“We are a company that is in the sweet spot of renewable resources, green chemistry, and the future, which is the microbial factory as opposed to the chemical factory. We have already proven that we can do this profitably, and that we can handle the cost and cost-control necessary to grow in these areas without going into negative cash flow at any time in the last couple of years, and in 2008 actually recording a full year of profit.” - Daniel B. O'Brien**

difficult to plan. I am sure other companies are dealing with the same situation. It will take some time. Even after the credit crisis has been completely reorganized and credit is flowing well again, it will take quite a bit of time before we will be able to see well enough to make major moves and that is what is most difficult about this environment.”

**CEOCFO:** What are your plans for the future?

**Mr. O'Brien:** “The biggest thing we have taken on in the last two years is building a new factory in Alberta, Canada in the southern part of that province. This factory is intended to make all the aspartic acid that we currently buy from sources around the world. We buy thousands of tons of aspartic acid annually and convert it into poly aspartic acid. The new factory will take thousands of tons of sugar grown locally with sugar beets in Alberta and turn it into aspartic acid,

which we will then shift to our Illinois factory to turn it into poly aspartic acid. We are backwardly integrating our supply chain so that instead of using oil-based raw materials, we will be using sustainably sourced sugar-based raw materials.”

**CEOCFO:** How is the climate in Alberta conducive to growing sugar?

**Mr. O'Brien:** “The interesting thing is that there are microclimates around the world. The southern and western part of Alberta has more sunlight than almost anywhere in North America. They have enormously high heat units for growing crops, and it is so dry that everything has to be irrigated, so in climate, it is closer to the central valley of California than you really might suspect even though it is so far north. Sugar beets grow extremely well there and there is an enormous

population of people who immigrated to Canada from the Netherlands who were sugar beet-growing experts. Regarding our plans, I did mention that we hoped to break further into the detergent ingredient business and that has also keyed into this plant that converts sugar into aspartic acid. The various major soap and detergent companies not only demand biodegradable raw materials, but if they are going

to change their formulations, they also expect you to switch to sustainable raw inputs. Although we could have provided biodegradable detergent ingredients from oil, the types of major contracts in the \$10 to \$50 million range that we are looking for from this group of major operators, they really insist on a sustainable raw materials stream. Once the plant is up and running in September, we are expecting to be able to ship large sample batches and reasonably quickly thereafter we have hopes of closing a fairly large deal.”

**CEOCFO:** Can the plant where you actually make the poly aspartic material sustain quick growth?

**Mr. O'Brien:** “We have capacity to handle the first really big contract and the first half of a second one if it were to come into position. Obviously, growth would have to be dealt with from a plan-

ning stage. We have plans for the types of 100% to 150% per year growth that these types of contracts would cause. It may also be possible to capitalize using government subsidies or government loans. We did have great success in Alberta in getting half of the plant capitalized through low-interest loans provided by the Canadian government. The government is encouraging processes that are starting to take chemistry out of the oil plants. Instead of using huge vessels that use heat and energy and catalysts to change chemicals around, we are using individual microbes that have the ability to eat sugar and excrete the aspartic acid that we are intending to use. We are now

going into microbial factories and relatively high-tech processes that can use sustainable material. Governments are very interested in making sure that these processes go forward. We think that as we do encounter the high-speed growth that we anticipate, we will be able to provide at least some of the capital that we need through low-interest loans.”

**CEOCFO:** In closing, why should potential investors put Flexible Solutions on their radar screen?

**Mr. O'Brien:** “We are a company that is in the sweet spot of renewable resources, green chemistry, and the future, which is the microbial factory as opposed to the

chemical factory. We have already proven that we can do this profitably, and that we can handle the cost and cost-control necessary to grow in these areas without going into negative cash flow at any time in the last couple of years, and in 2008 actually recording a full year of profit. Those are the types of companies that I believe, whether it be our company or another company, anyone who can handle these tough times and still progress without taking on unusual risk, is going to be a very successful company as the economy starts up again. If there are interesting acquisitions to be made, it is the strong that will acquire the weak.”



**Flexible Solutions International Inc.**  
**615 Discovery Street**  
**Victoria, BC V8T 5G4**  
**Phone: 250-477-9969**