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Avesthagen's new avatar

Viloo Morawalla Patell
Founder & Managing Director, Avesthagen
On the company's re-structuring moves



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Avesthagen's **new** avatar

Re emerging with four different profit and loss entities, Avesthagen has a clear vision to become a global company. **Arshiya Khan** details a few moves

The plan was clear but the roads had hurdles, however this could hardly stop Dr Villoo Morawala-Patell, Founder Chairperson and Managing Director, Avesthagen from achieving from what she wanted to. Born in a small lab inside the National Center for Biological Sciences (NCBS), in Bangalore, Avesthagen today has its wings spread across boundaries, with around 400 employees. And Morawala-Patell feels she still has a long voyage to undertake to provide the national and global investors the returns that they have waited for.

The science of business

Morawala-Patell has built a 'Business of Science' and developed a new model of 'Science of Business' to deliver products from ideas. Following a



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**Dr Villoo Morawala-Patell,
Founder Chairperson and Managing Director,
Avesthagen**

systems biology approach, it developed AdePt, a comprehensive database of medicinal plants linked to disease conditions. The second was MetaGrid, which is an algorithm that links metabolites to efficacy at the cell assay level. And the company has used these two technologies to partner with companies. Collaborating with several giants of global industry has also been one of Morawala-

Patell's far-sighted endeavours. Avesthagen has fruitful partnerships for co-development and research. With Cipla it has tied up for bioPharma development and manufacture. And its partnership with Cipla is now at a stage where the company has supported the development of three biosimilars upto pre-clinical stage. However, Morawala-Patell adds, from now on Avesthagen will be taking

forward these biosimilars on its own through clinicals and regulatory. Being optimistic she remarks, "Of course when the molecules are ready, we hope Cipla with its tremendous marketing strength will take them to the market."

Also included in the list is the company's tie-up with France's Groupe Limagrain (the largest seed company in Europe) to create new varieties of seeds, with bioMerieux for diagnostics and alliances with Groupe Danone, and Nestle Nutrition and Godrej Industries. On the diagnostics side is the Avesthagenome project for which the company has already filed a patent for one of the markers in breast cancer which has also been published in a paper in science journal 'Nature'. Morawala-Patell informs that they have collected 3200 samples to date from six cities namely Hyderabad, Bangalore, Navsari, Surat, Pune and Ahmedabad. And to make sure that all the 'OMICS' platforms work well they have used 24 samples linked to breast



Drug designing process at Avesthagen

cancer as a study. These are preliminary results and we will need to look at many more samples to come up with a statistically significant conclusion, she adds.

Going ahead they are now collecting a set of diabetes cohort from the samples and have around 128 people. The company is also planning to send a report update on the work done to date

to *Nature* shortly, Morawala-Patell informs.

Though the company has a dozen collaborations it is still eyeing new ones at different levels, the latest one being its alliance with Uxmal SA, a Chilean biotechnology company, for promoting R&D of bioactives for commercialisation and use in functional foods, healthcare, cosmetics, etc. Though biotech in India is still maturing, the fact of the matter is

VIEWPOINT

The European biotechnology industry is calling for urgent action at both EU and national levels after a new study suggested that a fifth of small European biopharmaceutical companies could be facing bankruptcy by the end of the year as a result of the global financial crisis. The crisis is directly affecting the European healthcare biotech sector by reducing its access to liquidity and credit? What will be the effect of the Indian biotech sector?

All biotech is facing a liquidity crunch like the rest of the world. The PE, VC funds government funds and industry funds will have to step up efforts, if they want their countries to participate in the future global growth. This total deviation of funds to only focus on cash rich companies is ridiculous and short sighted and will come to bite these very same investors. There is a need for a new breed of investors that knows the domain and has an appetite for risk capital. "No risk, no gain." It's very simple. Most bankers who were anyway willy nilly responsible for

the global financial meltdown are once again making an even greater mistake by not supporting early and mid stage innovation companies.

The only way to resolve global problems of overgrowth, pollution, healthcare, environment and moral decay is to re-order the world through innovation, to enable proper participatory growth for all living forms. And this will only come through technology investments and encouraging thousands of entrepreneurs. We have to get out of the crab-in-the-well mindset. There cannot be two or three large companies per field in India. There have to be hundreds of innovative companies and only then there will be a revolution of change for the better. All of us entrepreneurs who work hard for a new better tomorrow must tighten our belts, broaden our shoulders, enlarge our hearts, stand with our heads held high and ride out the storm. The winds will settle and we must sail through. It has to be so or there is little hope.

SPOTLIGHT

that there are companies, which are providing inroads for the western world to explore all opportunities in the Indian biotech sector.

The case in point is the recent alliance of Avesthagen with Uxmal, where Avesthagen was considered to be high on technology and knowledge and therefore Chilean scientists and government approached them to set up the joint venture: Avesthagen Latam SpA, a 75:25 JV between Avesthagen and Uxmal, which will tap a large emerging market for its technologies, products and services. Speaking on this development, Morawala-Patell remarks, "I see the Uxmal relationship as an R&D transfer of Avesthagen expertise in genomics, transcriptomics, metabolomics to Uxmal through Chilean grant funding. This will be a co-development of novel products from the plant found in Antarctica for anti-cancer and other cosmeceuticals." The company will also be licensing its Adept database platform and three of its bioactives to Avesthagen Latam. The JV will serve the multiple purposes of R&D partnering, joint product development, sales and marketing and will also impart training to Chilean scientists and make revenues, informs Morawala-Patell.

The new avatar

Most Indian biotech companies survive by doing reverse engineering or contract work but Morawala-Patell set out to give Avesthagen a strong focus in innovative R&D in diverse areas such as bioAgriculture, bioNutrition, biopharmaceuticals and drug discovery. And now she has split these four strategic business units as four independent profit and loss (P&L) entities, so that it can take care of its own financial requirements. However Morawala-Patell

clarifies, "Avesthagen has not split but re-emerged with clarity as the company has now grown from its integrated science and innovation model to emerge with significant product pipelines. She underlines, "The exercise is about unlocking of the value in Avesthagen and making the public aware that Avesthagen has created significant products in its short life of eight years and also to make sure that each product is either licensed or developed further to make sure that it reaches the market." For the smooth progress, the company has appointed Deloitte to ensure that the process is carried out in a tax efficient

Even before Avesthagen was born I ran from pillar to post trying to make both the public institutions and PE/VC funds understand that to create sustainable innovation the PPP model was essential

manner keeping all the stake holders interest. The process will be completed in the next three months, she informs.

As per this re structuring the bionutrition P&L will include marketing subsidiary Good Earth, while bioagri P&L will comprise the

seeds company Atash and agri-related R&D.

The drug discovery P&L will focus on the Avesthagenome project and work on cancer stem cells.

The biopharma P&L is working on developing biosimilars in collaboration with Indian generic major, Cipla. Avesthagen has

four molecules in the biopharma segment, which are in pre-clinical stage. These are in therapy areas of cancer, auto-immune and anaemia.

In the bionutrition space, the company has finished pre-clinical studies on its bioactive molecule for which it has partnered with French company, Danone. This is in the area of metabolic disorders. The company's bioagri portfolio has three projects - environment adjusted crops which can grow in limited and saline water, oil seed from engineered sunflowers and biofuel.

The differentiating factor

The public private partnership (PPP) (in this case, between an Indian company and foreign government) is not a common one that is followed in the Indian biotech segment. But for Morawala-Patell, thinking out of the box is something that differentiates the company from the crowd. She says, "I have always been the proponent from the last 10 years of this model of a public private partnership for biotech." But her dream of building a company on those lines did not happen over night. There were

Greenhouse facility at Avesthagen



SPOTLIGHT



Plant tissue culture process at Avesthagen

hurdles and shortcomings like in any other case that made her try new and better ways and thus yielding better results. As the adage goes, with every mistake you learn a new way of doing things, so it's a learning process. And Morawala-Patell's story is no different. She continues, "Even before Avesthagen was born I ran from pillar to post trying to make both the public institutions and private equity (PE) / venture capital (VC) funds understand that to create sustainable innovation the PPP model was essential. Remember at this time there were not many VCs that were supportive of the innovative companies and this has not changed much."

Giving a recap she says, "In 1998 when I registered Avesthagen (Public) and Avestha Gengraine Technologies Private Limited, I tried to demonstrate this to the powers that be by example and spent a couple of years chasing this approach but I saw that I was being looked upon as a maverick and a non conformist. At some point I realised that this really was my story so I merged the two

entities and adsorbed Avesthagen as the brand that stood for PPP, for socio-economic equality and honesty." This clearly highlights the fact that Avesthagen never deviated from the PPP approach from the time it was born. And Morawala-Patell is very much likely to follow the same approach for its new baby Avesthagen Latam SpA. "With Avesthagen Latam it is a similar strategy. We have to work with the Government and an approach to forming JVs around a focussed output: either product or R&D in a defined period of time with a clear access to the market is the only way forward," says Morawala-Patell. Avesthagen will enter global markets by different regions using this approach. Being confident of this model, Morawala-Patell says they will work on developing this model for Africa, Central Asia, Russia and former Soviet States, Eastern Europe, Philippines, Thailand, Indonesia and the Pacific Rim.

The way ahead

With a fifth of small European

Avesthagen facility

biopharmaceutical companies possibly facing bankruptcy by the end of the year, the fear is that many Indian biotech companies could also face the same fate, thanks to the liquidity and credit crisis. Speaking about the ripple effect on the Indian biotech, Morawala-Patell strongly calls for a change in the mindset. (see box: Viewpoint)

Today, the company has a portfolio of 350 patents filed, it continues to build and intensify its intellectual property through product commercialisation. As Avesthagen moves towards achieving a 'Predictive Preventive Personalised Healthcare' model through its four P&L units-- BioPharmaceuticals, BioNutrition, BioAgri and Science and Innovation, she feels, "The future is dynamic and can change, although the first point is to stabilise Avesthagen and lead it to success and build a global company." Going by her nature of being fearless if the cause is right, we don't see it a distant dream. ■

arshiya.khan@expressindia.com

