

ACADEMIA

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Cabinet approves agribiotech institute

Seen as an important step towards the second green revolution, the union cabinet on August 23, 2012, approved the proposal of Ministry of Agriculture for the establishment of Indian Institute of Agricultural Biotechnology (IIAB). Based at Ranchi in Jharkhand, the institute under the Department of Agricultural Research (DAR) will come up at a cost of ~~287.50 crore~~ ^{287.50 crore} during the 12th Five Year Plan. The mandate of the institute would be to undertake multi-disciplinary basic and strategic research with a view to future developing crops for traits such as increased yield, or increased tolerance to biotic and abiotic stresses.

As a mother institute, it will provide both curricula and course material to India's agricultural universities currently running or trying to establish successful agricultural biotechnology graduate and post-graduate programs.

DBT to aid UG colleges in select states

Department of Biotechnology (DBT), under its Star College Scheme, has launched a new program for select states and union territories in the country, which aims to offer young scholars at undergraduate (UG) level an opportunity to excel in their life sciences and biotechnology careers. This new initiative will provide support for improving knowledge and skills of teachers in basic life sciences and specialized techniques; access to specialized infrastructure to students; assurance of consumables, reagents and chemicals for students; substantial hands-on experience in designing and conducting practical biotechnologies and critical thinking; and access to knowledge banks with strong support of books and journals including e-journal facilities.

For the colleges to become eligible for this program, the colleges should be among the top three life science undergraduate programs in the city. However, private colleges cannot be part of the program.

program between India and Denmark. Novozymes has a significant business in India with over 400 employees. In recent years, the company has invested in a state-of-the-art R&D facility in Bangalore. The new exchange program will also help to attract scientists with an international mindset.

The new exchange program, which is the first-of-its-kind between India and Denmark, is funded to the tune of \$332,020 a year by Novozymes and the Holck-Larsen Foundation. The program will run from 2013 to 2019, and each year it will allow approximately 25 scientists to participate in exchange visits between India and Denmark. The funds will be managed by the Technical University of Denmark, the University of Copenhagen and Aarhus University.

BIOFUND

BMS Foundation awards \$1.6 mn to fight diabetes

Bristol-Myers Squibb (BMS) Foundation will provide \$1.6 million in grants to four healthcare institutions in India to help improve diabetes education, prevention and care, increase healthcare worker capacity in rural and tribal areas and among the urban poor. BMS Foundation has employed a similar capacity-building approach with its 10-year-old Delivering Hope initiative to address hepatitis B and C in Asia.

The prevalence of diabetes in India has grown roughly four-fold since the early 1970s, from about two percent of the population in 1972 to 8.3 percent today, due to factors ranging from genetic predisposition to lifestyle and dietary changes.

The various organizations that will receive the 'Together on Diabetes' grants, include Mamta Health Institute for Mother and Child (a national New Delhi-based organization and operating in 14 Indian states, will receive \$706,995 over three years to pilot a study to determine the feasibility of involving India's lay community health workers and integrating various systems of medicine including modern) and AYUSH (to prevent and control non-communicable diseases, especially type 2 diabetes).

The grant will also be provided to the All India Institute of Diabetes and Research in Naranpura and Swasthya Diabetes Hospital in Ahmedabad. They will receive \$465,685 over two years to develop and test a three-setting model to improve access to diabetes education, prevention and care for the poor in rural, tribal and urban settings.

NEW PRODUCTS

Venus launches TROIS

TROIS, a patent protected topical nano-emulsion with natural ingredients, from Venus Remedies targets arthritic pain with no any side effects.

Chandigarh-based Venus Remedies, a research based global pharmaceutical company has launched for the first time a research based product TROIS in the Indian market. This patent protected topical nano-emulsion has been developed by using the integrated natural medicine approach to relieve from all kind of arthritic pain. The company claims that Trois is the most effective drug for the treatment of Arthritis and is getting outstanding response in the various markets across India.

Mylan launches 18 ARV products

Mylan Pharmaceuticals, a subsidiary of Mylan, has commenced commercial operations in India, starting with the launch of a comprehensive portfolio of 18 antiretroviral (ARV) products for the treatment of AIDS. Mylan is the third largest generic and specialty pharmaceutical company in the world. Mylan's Nashik facility in India, which produces the company's finished-dosage-form ARVs for markets around the world, has been subjected to good manufacturing practices (GMP) inspections by several leading regulatory authorities, including the US Food and Drug Administration (FDA) and the WHO.

The Mylan portfolio will initially include a comprehensive range of 18 products, including heat stable, combination, and pediatric formulations. In addition to providing a broad range of ARV products, Mylan will launch several initiatives aimed at educating and supporting medical professionals in their efforts to more effectively treat their patients and helping patients better manage their disease.

Cipla launches Qvir kit for HIV/AIDS

Cipla, India's leading pharmaceutical company, launched Qvir, a novel four-drug kit for the treatment of HIV/AIDS. The kit consists of two tablets, one containing a combination of Tenofovir plus Emtricitabine and the other containing a combination of Atazanavir plus Ritonavir. Both these tablets are packaged together in one strip which represents a single day's treatment.

combination therapy, commonly used in India. Studies of this combination regimen have shown that it is effective and well tolerated by over 80 percent of patients using it.

The Qvir Kit is manufactured in Cipla's state-of-the-art manufacturing facility in Patalganga, which is approved by international regulatory bodies. It will cost \$3 (INR 158) per kit and is presently available in the market. As the tablets are packaged together in one strip, the patient does not have to remember which tablet he took and cannot mistakenly take two of the same tablet.

MANUFACTURING

West Pharma sets up new facility

West Pharmaceutical India Packaging, an indirect subsidiary of West Pharmaceutical Services, US, hosted a ceremony to mark the start of construction of its new compression molding facility in Sri City, Chennai, India. The plant will become part of West's global supply chain for its world-class, standard-setting pharmaceutical packaging components.

In June 2012, West signed a 99-year lease on 72,800 square meters of land in the Sri City Special Economic Zone (SEZ). Sri City offers all the advantages of an SEZ with a metropolitan location and was selected primarily on suitability because of land, availability of utilities, labor suitability, logistics, quality of life and SEZ special factors.

Construction of phase I will begin in August 2012 on a metal seal assembly and compression molding facility that will produce metal and elastomeric pharmaceutical components used in primary packaging of injectable medicines manufactured by West's pharmaceutical and biopharmaceutical customers in India and the wider Asia Pacific region.

The built-up area of phase I will be 15,300 square meters, with commercial production of metal components expected to begin in the first quarter of 2014. Production of a range of West's high-quality standard elastomeric components is expected to begin in the first quarter of 2015. The capability to produce ready-to-sterilize components will be available by 2016. The built-up area for the plant and office will eventually reach 37,700 square meters at the completion of Phase three in 2023.

Infosys joins 'Every Woman Every Child'

Information technology services major Infosys has made a commitment to work with the MDG Health Alliance, the United Nations Foundation, and the Clinton Health Access Initiative as an innovation partner for the India public-private partnership to end child diarrheal deaths, in support of the UN secretary general's 'Every Woman Every Child' movement. Infosys Labs, the research and innovation arm of Infosys, will institute an innovation co-creation lab to explore ways that technology can be used to solve critical maternal and child health challenges. This partnership will mobilize public and private sector stakeholders to achieve universal coverage of children in India through the intervention of oral rehydration solution (ORS) and zinc by 2015, thereby playing a critical role in preventing diarrheal deaths.

Reported and actual trial deaths differ?

The Indian health ministry has attributed the cause of majority of reported clinical trials death cases to a host of reasons not actually linked to trials. As per the union health minister, Ghulam Nabi Azad, the Serious Adverse Events (SAEs) of deaths may occur during clinical trials due to various reasons including life-threatening diseases like cancer, cardio-vascular conditions like congestive heart failure or stroke and other serious diseases. "They could also be due to the side-effects of the drugs or their administration to critically or terminally ill patients. Such deaths are investigated to arrive at the causal relationship if any," stated Azad while speaking in the parliament on August 28, 2012.

As per available data of health ministry, the number of SAEs of deaths during clinical trials reported in between 2010, 2011 and June, 2012 are 668, 438 and 211 respectively. However, SAEs of death due to clinical trials were 22 and 16 in 2010 and 2011 respectively. "Action is taken against the pharmaceutical companies that violate the condition of approval of clinical trials as per provisions of the Drugs & Cosmetics Rule," added the minister.

Agri minister calls for quality seeds

The Indian seeds industry needs the right push as poor monsoons this year have once again highlighted the need for hybrids that will increase farm productivity and profitability. Farmers' suicides in the past few years have also brought this need to the fore. Commenting on this need, while applauding the Indian seed industry for achieving self-sufficiency in quality seed production, Minister of State for Agriculture, Government of India, Harish Rawat recently said there is a need for production and distribution of hybrids as these have the potential to increase farm productivity and profitability.

He added that focus is needed on fodder crops, green manure and minor millets. According to the minister, these areas have not drawn

adequate attention so far. Rawat made this comment at a function to inaugurate the golden jubilee year of the National Seeds Corporation (NSC) on August 16, 2012.

LifeCell reaches milestone in India

LifeCell International, India's largest stem cell bank, achieved a milestone of successfully preserving 50,000 umbilical cord blood stem cell units in its preservation center and laboratory located in Chennai.

Established in 2004, LifeCell is India's first private stem cell storage company and still retains the position of being the market leader with over 50,000 parents, including some of the most popular celebrity couples having stored their baby's umbilical cord stem cells with it. With a pan-India presence, LifeCell's services extend to over 100 towns and cities in the country. Its preservation facility in Chennai is one of the most reputed in the industry with several national and international accreditations to its credit.

India helps Sri Lanka to set up pharma hub

India is going to help Sri Lanka set up a pharma hub, as part of its bilateral relationship with the island nation. Dr P V Appaji, director general, Pharmaceutical Export Promotion Council of India (Pharmexcil), led the Indian pharmaceutical delegation, which was on a two-day visit to Colombo. This was part of the initiative taken by Anand Sharma, Indian minister of industry, commerce and textiles, to set up the proposed pharmaceutical manufacturing hub in Sri Lanka.

Both Sri Lanka and India have jointly appointed a high level bilateral task force to implement the Indian proposals in order to increase bilateral trade to \$10 billion by 2015 from current levels of \$5 billion.

NCBS, Institut Curie, CNRS to collaborate on research

The National Centre for Biological Sciences (NCBS) of the Tata Institute of Fundamental Research (TIFR), the Institut Curie in Paris and the Centre National de la Recherche Scientifique (CNRS) have signed a joint agreement on collaborative research.

The agreement will facilitate development of close cooperative and mutually beneficial relationships between the three organizations via enhanced mobility for researchers and programs of joint multi-institutional research.

It is anticipated that these collaborative efforts will be in most areas of cutting edge biological research currently under way at these locations and also in the field of the history of science. This is indeed a unique opportunity since the CNRS is also committed to supporting CNRS researchers in setting up research laboratories in collaborating institutes, the world over. All the three institutes are considered to be leaders in carrying out cutting edge research.

Scientists sequence malaria genome

Scientists have sequenced genome of the malaria parasite that constitutes about 65 percent malaria cases in India, paving the way for new vaccines to combat the disease. The National Institute of Malaria Research in India was a part of the study which focused on *Plasmodium vivax* (*P.vivax*), a species of malaria that afflicts humans and the most prevalent human malaria parasite outside Africa

The study was led by Jane Carlton, part of New York University's Center for Genomics and Systems Biology. The researchers examined *P. vivax* strains from different geographic locations in West Africa, South America, and Asia, providing the researchers with the first genome-wide perspective of global variability within this species. Their analysis showed that *P. vivax* has twice as much genetic diversity as the world-wide *Plasmodium falciparum* (*P. falciparum*) strains, revealing an unexpected ability to evolve and, therefore, presenting new challenges in the search for treatments. Researchers from The Broad Institute, Arizona State University, and the Centers for Disease Control and Prevention were also part of the *P. vivax* sequencing.

Agilent launches X-ray diffractometer

Agilent Technologies has launched GV1000 X-ray Diffractometer, used for collection of high-quality diffraction data from crystalline samples of biological macromolecules.

Incorporating innovative gradient vacuum technology, the GV1000 features an extremely compact and high brilliance X-ray source, designed to be both reliable and simple to service. Combined with Agilent's precision four-circle goniometer and high-performance CCD detectors, the GV1000 is the ideal solution for the challenging requirements of modern macromolecular crystallography laboratories. The GV1000 is the highest performing single-wavelength system in Agilent's expanding X-ray crystallography portfolio. GV1000 benefits from Agilent's expertise in providing innovative solutions for all single-crystal X-ray diffraction applications.

Shimadzu launches new high-end LCMS-8080

Shimadzu has launched a high-end liquid chromatography mass spectrometer, the LCMS-8080, which delivers best-in-class

sensitivity, high quality data and fast cycle times. An extension of its ultra fast mass spectrometry (UFMS) range, the new model's high speed capabilities increase productivity in the laboratory by delivering accurate measurements.

Ideal for users requiring information rich analyses, the LCMS-8080 can be used across a wide range of applications including food safety testing, drugs of abuse screening as well as in clinical, environmental and ADME laboratories. The instrument delivers high quality and accurate data over long periods of use due to its simple and rapid method development.

Eppendorf expands tissue culture consumables range

Eppendorf expanded its tissue culture consumables (TCC) product range with the launch of new Easypet 3, cell counting plate and CellRepel TCC. New Easypet 3 electronic pipetting aid gives greater accuracy by controlling the speed conveniently and intuitively with the use of the operating buttons. It also requires decreased battery charging time, thereby allowing increased cordless operation time. Vibrant backlit LEDs highlight the battery status contributing to the user's peace of mind. It is lightweight, well-balanced and extremely easy to use. Being cordless, it enables flexibility in the laboratory allowing the user to freely move around the workplace.

Eppendorf products are broadly used in academic and commercial research laboratories, ranging from pharmaceutical to biotechnological industries.

Thermo Fisher launches microbiological incubators

Thermo Fisher Scientific recently introduced new large-capacity Thermo Scientific Heratherm microbiological incubators in Europe, the Asia-Pacific region, Latin-America and Africa.

The new products complete the range of Heratherm microbiological incubators, adding two more sizes for high sample volume or larger samples, that of 400 and 750-liter capacity. The general protocol incubators are designed for routine applications in pharmaceutical, medical, food and research laboratories. The Advanced Protocol Security incubators come with mechanical convection technology for temperature performance, keeping sample environment stable, even according to highest requirements. The unique 140° C decontamination cycle is comparable to sterilization, supporting the scientist in avoiding sample contamination.