Masdar Institute Calls for Focus on R&D-Innovation Ecosystem to Spur Sustainable Economic Growth

At DITEC 2015, Masdar Institute Addresses Optimum Approach to Economic Growth through Integration of R&D and Innovation Investment

Abu Dhabi-UAE: 26 February, 2015 – Although research, development and innovation are related, they are distinctly different. Investing in research and development generates knowledge and new technology, whereas promoting innovation generates business activity and spurs economic growth. This is why the Masdar Institute of Science and Technology places a major emphasis on contributing to developing the UAE's innovation ecosystem.

"In order to achieve sustainable economic growth from innovation, an optimally developed ecosystem is required to integrate innovation and R&D. This can come only through the combined efforts of various stakeholders, including business/commercial entities, state-owned enterprises, large foreign companies, and small and medium enterprises (SMEs)," said Dr Steve Griffiths, Executive Director, Office of Institute Initiatives, Masdar Institute, during the Defense Innovation & Technology Conference (DITEC) 2015.

Highlighting the relevance of Masdar Institute's research agenda, Dr Griffiths remarked that the key to successful collaboration between universities and industrial partners is to engage in research collaborations that achieve tangible outcomes while at the same time promoting human capital development and knowledge creation. At Masdar Institute this is accomplished through a focus on "use-inspired" research, which is research that aims to achieve the practical outcomes sought by industry while also seeking to achieve the fundamental understanding that faculty and students can provide through deeper exploration of research topics.

Dr Griffiths said Masdar Institute's current partnerships in the aerospace and defense sector include collaborations with Boeing, Mubadala Aerospace, Tawazun, Lockheed Martin, and other leading corporate entities. Through these collaborations, Masdar Institute continues to drive innovation in the strategic areas as directed by the UAE and Abu Dhabi economic development strategies, he added.

He added that graduate universities such as the Masdar Institute play a key role in innovation through development of trained human capital and low-to-mid technology-readiness level R&D to generate knowledge, solutions and intellectual property.

The remarks from Dr Griffiths came while he was participating in an industry -academia R&D panel discussion titled 'How industry and academia can collaborate to optimize industry resources and utilize existing academic capabilities in order to catalyze advanced research and technology output.'

Themed 'Advancing Defense Inventors & Technology: 'From Ideas to Application,' DITEC 2015 was hosted by the Abu Dhabi Technology Development Committee and sponsored by Takamul with the strategic partnership of the UAE's Ministry of Defense. The event was held along the International Defense Exhibition and Conference (IDEX) 2015 at the Abu Dhabi National Exhibition Center (ADNEC).

Masdar Institute currently has four Institute Research Centers (iCenters), an innovation and entrepreneurship center (iInnovation), and five sponsored research centers, driving innovation in clean energy and advanced technology areas. By the end of January 2015, Masdar Institute had six issued patents, 52 pending patent applications, with 82 invention disclosures, firmly establishing itself as a leading academic institution that is driving intellectual property. At present, there are 348 students in nine Master's programs and 143 students in the PhD program enrolled in Masdar Institute.

The four iCenters are Institute Center for Energy (iEnergy), Institute Center for Water and Environment (iWater), Institute Center for Microsystems (iMicro), and the Institute Center for Smart and Sustainable Systems (iSmart). These iCenters serve as interfaces for external engagement and they help define the key UAE R&D needs and guiding translational and applied R&D.

ilnnovation (the center of innovation) offers several avenues to students to encourage innovation such as the Technology Management, Innovation and Entrepreneurship ('TMIE') within the Engineering Systems and Management program. Moreover, the 'Technopreneurship' Boot Camps provide faculty and students with experience, insights, and training for technology innovation. Innovation scholarships are also offered for MSc students who may establish startup companies before graduation.

Through use-inspired research, Masdar Institute's illnovation aims to translate discoveries and inventions into innovations that benefit industry and generate new companies. It also organizes seminars and forums on innovation and entrepreneurship annually.

At Masdar Institute, Dr. Griffiths has overall responsibility for research, including large-scale, collaborative research programs and centers, research development, sponsored programs, technology transfer, and research laboratories. Additionally, Dr. Griffiths has an active role in multiple industry, research and innovation bodies outside of Masdar Institute, including the Middle East Solar Industry Association (MESIA) Board of Directors and the Zayed Future Energy Prize Selection Committee. Dr. Griffiths is an associate editor, a member of the editorial board of the international journal *Energy Strategy Reviews*, and author of various works in the energy policy and energy strategy fields. ENDS

About Masdar Institute

The Masdar Institute of Science and Technology (Masdar Institute) was established by the government of Abu Dhabi as a not-for-profit, private graduate university to develop indigenous R&D capacity in Abu Dhabi addressing issues of importance to the region.

In collaboration with the Massachusetts Institute of Technology (MIT), Masdar Institute has developed an academic and research platform that articulates its mission and vision according to critical energy and sustainability challenges. An important characteristic of Masdar Institute is its focus on complex real-world problems that require a multidisciplinary approach for the development of solutions from an integrated technology, systems and policy perspective. This multi-interdisciplinary and integrated approach is supported by the structure of its academic programs and by the emphasis placed on engaging external partners from industry, government, and other academic institutions in collaborative activities.

Serving as a key pillar of innovation and human capital, Masdar Institute remains fundamental to Masdar's core objectives of developing Abu Dhabi's knowledge economy and finding solutions to humanity's toughest challenges such as climate change.

Masdar Institute integrates theory and practice to incubate a culture of innovation and entrepreneurship, working to develop the critical thinkers and leaders of tomorrow. With its world-class faculty and top-tier students, the Institute is committed to finding solutions to the challenges of clean energy and climate change through education and research.

Masdar Institute offers degrees in:

- MSc Engineering Systems and Management
- MSc Computing and Information Science
- MSc Materials Science and Engineering
- MSc Mechanical Engineering
- MSc Water and Environmental Engineering
- MSc Microsystems Engineering
- MSc Electrical Power Engineering
- MSc Chemical Engineering
- MSc Sustainable Critical Infrastructure
- PhD in Interdisciplinary Engineering

Please visit our website http://www.masdar.ac.ae/

For more information contact:

Name: Shaima Al Jarman

Director - Marketing & Communications

Public Affairs Department

Email: saljarman@masdar.ac.ae Phone: +971 02 810 9365