Science Entrepreneurship Short Course Oct. 2-3, 2014 Part II of the AIP-ICTP-UNICAMP Industrial Physics Forum on Industrial Physics in Emerging Economies Sept. 28-Oct. 3, 2014

Goal: Bring universal entrepreneurship concepts and knowledge to attendees.

Audience: Primarily students and faculty in the sciences; will also include some number of independent participants interested in technical entrepreneurship and business development.

Scale: 100 participants

Organization: Attendees will be assigned to a project group of 4-6 individuals. Depending on audience size, the goal is 15-25 groups. During the hands-on components of the workshop groups will attack project components, and present their respective results to the audience at large.

Ancillary Materials: Participants will be provided with a set of handouts and supporting material.

Topics: The short course topics were selected to address elements of business development that can be considered 'universal'; i.e, those which can be applied to any business environment independent of nationality or the specific business or product type. Other topics that are important in entrepreneurship education are location specific (including IP, legal and regulatory issues, finance, taxes, etc.) and are better handled on a smaller scale, locally within specific regions around the world.

Registration: The registration deadline is 31 July. We will require an application, which will allow us to assure that we have an audience that is balanced geographically. For more information, go to:

http://www.aip.org/industry/ipf/2014/capacity-building-industrial-physics-developing-emerging-economies

${\bf Science\ Entre preneurship\ Short\ Course\ Outline-Draft\ Schedule}$

Thursday, Oct. 2, 2014		
8:30-9:00	Registration	Hand out workshop materials; assign individuals to groups for the workshop sessions.
9:00-9:20	Introduction	Present the outline and schedule for the short course
9:20-9:45	Welcome Comments	Joe Niemela presentation on ICTP efforts in entrepreneurship and regional economic development
9:45-10:30	Entrepreneurship: Motivations and Mission	 Hands-on Session: Develop goals/mission/mantra for business concept Sources: Sinek, Simon. How Great Leaders Inspire Action, TED.com Kawasaki, Guy. The Art of the Start. Portfolio Hardcover, 2004.
10:30-11:00	BREAK	
11:00-12:30	Product Lifecycle	 Hands-on Session: Identify the state of the industry and product of interest for each group, and identify areas of improvement/need for development. Sources: Levitt, Theodore, "Exploit the Product Life Cycle", Harvard Business Review, Vol. 43, pp. 81-94, 1965. Harvard Business School Moore, Geoffrey, Crossing the Chasm. The Chasm Group, 2013. Christen, Clayton, The Innovator's Dilemma, Harper Business, 2011.
12:30-14:00	LUNCH	
14:00-16:00	Ideation and Creativity	Hands-on Session: Utilizing technologies supplied (either pre-prepared patents, or using technologies selected from the site visit). Methods of formal lateral thinking will be presented and groups will ideate new product ideas. Methods of evaluating/ranking ideas will be presented and utilized to select optimum concepts. [Repeat of Tuesday/Wednesday Ideation session during conference].

16:00-16:30	BREAK	
16:30-17:00	Summary of Day One	Group discussion of key concepts and approaches – Q and A
17:00-18:30	SOCIAL HOUR	
18:30-20:00	Brazilian Entrepreneurship	Presentations by local/regional successful technology entrepreneurs.
		4x20 min plus questions.
20:00-22:00	DINNER	
22:00	ADJOURN	

Friday, Oct. 3, 2014		
8:30-9:00	Registration	Hand out workshop materials; assign individuals to groups for the workshop sessions.
9:00-9:15	Introduction	Overview of Day 2 topics – International Considerations
9:15-10:30	Intellectual Property	LOCAL PRESENTER - TBD
10:30-11:00	BREAK	
11:00-12:00	Finance	LOCAL PRESENTER- TBD
12:00-12:30	Small Business Funding in Brazil - PIPE	REPRESENTATIVE FROM FAPESP
12:30-14:00	LUNCH	
14:00-15:00	Business Plans and Strategic Planning	Introduction to Business Plans: Uses, organization, and structure.
15:00-15:30	BREAK	
15:30-16:30	Business Plan Preparation	Hands-on Session: Groups will outline business plans for their particular business concepts.
16:30-17:00	Summary of Day Two	Group discussions of key concepts and approaches. Hand out and collect evaluations – Q and A.
17:00	ADJOURN	