THE ROLE OF ACADEMIA IN BRIDGING THE INNOVATION GAPS

M. Dahmani Fathallah
UN/ESCWA: EGM / BEIRUT 11/2016
THE WORLD WITHOUT ACADEMIC INNOVATION
First, have a definite, clear practical ideal; a goal, and objective. Second, have the necessary means to achieve your ends; wisdom, money, materials, and methods. Third, adjust all your means to that end.”

Aristotle (384 BC-322 BC)
THE KID’S ELLIPSIS

KNOWLEDGE, INNOVATION & DEVELOPMENT

NOTHING IS CLOSED, NOTHING IS OVER, THERE IS ALWAYS SOMETHING TO COME

MORE PRONE TO MATHEMATICAL MODELIZATION
Each component must function well and relate effectively to the others.
COMMON INNOVATION GAPS

- Lack or insuficiente funding
- Loose or no adequate policies
- Low relevance
- Misconception, misapprehension
- Shortage of innovation specialists
- Low R&D capabilities
How can universities fill such gaps & contribute to sustaining innovation?

- Endorse higher education paradigm shift
- ‘Entrepreneurial Universities’
  - But “Student demographics issue”

- Engage into strategic planning & restructuring
REVISED UNIVERSITY CORE MISSION

- Creator of knowledge, Knowledge Server

- TARGETED R&D
  i.e. research driven to harness industry science links.

- Capacity Building: Production of skilled HR to stimulate the absorptive capacity of industry through innovation.
## A PERSPECTIVE FOR DEVELOPING A KNOWLEDGE-INNOVATION & DEVELOPMENT ECO-SYSTEM

<table>
<thead>
<tr>
<th>RESEARCH &amp; TRANSFER OF TECHNOLOGY</th>
<th>HR &amp; CAPACITY BUILDING</th>
</tr>
</thead>
<tbody>
<tr>
<td>KNOWLEDGE GENERATION <em>(R&amp;D)</em></td>
<td>Academic training of the next breed of innovation specialists. (Strategists, Managers, IP Specialists, VCs...)</td>
</tr>
<tr>
<td>KNOWLEDGE SERVICES: (knowledge dissemination)</td>
<td>Consultation</td>
</tr>
<tr>
<td>Incubation/ Science Parks</td>
<td>Vocational training</td>
</tr>
<tr>
<td>SPIN OFFS</td>
<td></td>
</tr>
<tr>
<td>HUMAN CAPITAL FLOWS</td>
<td></td>
</tr>
<tr>
<td>TTO</td>
<td></td>
</tr>
</tbody>
</table>

The most important success factor for tech transfer to look for is the quality of the R&D
### ACADEMIC
- Curricula Overhaul
- New Program (PhD Innovation Management)
- Vocational Training (Workshop, Seminars, Certificates)
- High Level Research
- R & D (5 Years Program Projects + KPIs)
- Institute for Training & Consultation
- Student & Researchers’ Mobility
- Staff Continuous Training Program

### MANAGEMENT
- Relevance to the GCC Socioeconomic Environment
- Innovation Strategic Planning Unit
- IP Policies
- Incentive Program
- Spun Off a CRO [Health]
- ERP [SAP]
- Business Intelligence
- Informal ISLs
SOME OUTCOMES

5 YEARS PERIODS

- Over 90% employability of AGU graduates
- 300% increase of IP our assets
- 160% increase of our publications
- 28% increase of our publications citations [impact]
- From 0 to 10 contracts with GCC industries
- From 6 to 19 contracts with public sector
The Zebra & The Lion Allegory
Classical Capacity Building

A. Watkins's view
Our View: SCALED UP INNOVATION CAPACITY BUILDING

Federation of GCC Universities
From Comparative to Competitive Advantage
To achieve sustainable development, decisions makers in the Arab countries need to:

- Built NSIs that allow all actors to contribute equally to achieve sustainable innovation.
- Develop a Bayh-Dole-like act
- Universities should be empowered so as to:
  - Endorse the new education paradigm
  - Be relevant to their socio-economic environment
  - Create the right environment for innovation through strategic planning and a good use of the innovation enablers.
Prof. M. Dahmani Fathallah

Dean College of Graduate Studies
Arabian Gulf University - Bahrain

d.fathallah@agu.edu.bh
dahmani.fathallah@gmail.com