Effective University IP and technology Transfer
Egypt

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A study charged by ESCAWA
Proposed Intellectual Property and Technology Transfer Policies for Universities and Research Centers in Egypt

1) Technology Transfer Process
2) Support of Technology Transfer
3) Suggested IP and Technology Transfer Policy Suitable for the Egyptian Context
4) Terms of Reference and Conditions of Liaison Officers to the EISH and TTO
TECHNOLOGY TRANSFER PROCESS

Legal disclosure and protection of the invention

Selecting a commercialization method

Executing the chosen commercialization method
**TECHNOLOGY TRANSFER PROCESS**

**Stages 1: Legal disclosure and protection of the invention**

- Invention Disclosure
  - Prior knowledge searches (including patents)
  - Initial market studies

- Filing for a patent/s
  - Provisional patent
  - Formal patent application (within a year)
Stages 2: Selecting a Commercialization Method

- **Licensing**
  - Simple Licensing: Well-known and almost standardized method and requires minimized financing from the institution.
  - multiple licenses and/or combination of exclusive and/or non-exclusive licenses

- **Start-up**
  - Is certain to disturb the institution’s culture and to be staff intensive. Additionally, it usually defers revenues and will require changes in few of the Egyptian laws.
  - Low on cash, and the institution may need to accept an equity share in the start-up company instead of upfront payments
Initiating Licensing Process
- Active licensing starts once the TTO files a patent application.
- Inventor/s may be requested to review the technology with their TTO and to provide further developments to enhance its value and marketability.

Marketing Activities
- Direct Personal Contacts
- Direct Marketing
- TTO Website
- Conferences, Innovation and Trade Shows

License Negotiation
- During the entire licensing process, it is important for the TTO to be highly involved in the inventors’ communication with the licensee.
- Licensing negotiations deal with commercial matters, and at this point the inventor normally is not involved.
Conventional Model of University/Research Center Technology Transfer

Scientific Discovery
Invention Discovery
Evaluation of Invention
Patent
Marketing of Tech. to Firms
Negotiation of License
License to Firm

University Scientist
University Scientist and TTO
University Scientist and TTO
University Scientist and TTO
University Scientist, TTO, and Firm/Entrepr.
University Scientist, TTO, and Firm/Entrepr.
University Scientist, TTO, and Firm/Entrepr.
Support of Technology Transfer

- National Level Support
- Institution Support

Institutional Set-up and Practical Aspects for Technology Transfer from Universities to Industry
What Can Government Do To Fuel Technology Transfer?

Support institution-industry research and development partnerships

Empower investment of private-sector in technology-based businesses and new technologies

Eliminate legal hurdles for institution-industry technology transfer

Champion the role of institutions in economic development

Focus on human capitals and ways to enhance quality-of-life

Invest, Support and nurture organizations that work in entrepreneurial support
Support of Technology Transfer

What Can Institution Do To Fuel Technology Transfer?

- Supportive Institution Culture
- Coherent Mission
- Proper Staffing
- Well-defined Rules and Processes
- Exhibiting a Customer-Friendly Attitude
- Starting Time and Duration
- Appropriate Patenting Budget
- Proof of Concept Budget

Institution Support
SUGGESTED IP AND TECHNOLOGY TRANSFER POLICY SUITABLE FOR THE EGYPTIAN CONTEXT
IP POLICY

- Having a clear and definite mission statement, vision, structure, Intellectual Property (IP) policy and a Technology Transfer procedure at Egyptian Institution.
- The Organization Structure of each TTO should serve the role of TTO as indicated in its mission statement and the vision.
- The definition of the IP policy in institutions is a primary step in developing the needed infrastructure for a knowledge transfer in any organization.
- IP policy crafts legal basis for the management of Intellectual Property Rights (IPR) in the institution and is a pivot for the required organizational infrastructure.
- The IP policy should address essential topics for any effective technology transfer arrangement and processes such as who owns IP generated in the institution and what are the options for acquisition of IP rights.
- It should provide the needed foundations for legal reassurance and certainty in the IP commercialization process.
- Additionally, it must be in order with national IP laws and policies as well as innovation policies.
- Establishing a clear Technology Transfer procedure.
Policy Overview

Breakdown:

I. Inventions, Patents and Licensing
II. Copyright Policy
III. Tangible Research Property
Policy Overview - Key Highlights

Inventions, Patents and Licensing:
- Introduce and integrate TTO into procedures
- Clarity for establishing ownership
- Updated revenue distribution scheme (see next slide)
Placing IP in the Public Domain

I. Patentable Subject Matter

I.2.6 The inventors, acting collectively when there is more than one, are free to place their inventions in the public domain if, after discussing their plans with the TTO, they believe it would be in the best interest of technology transfer and if doing so is not in violation of the terms of any agreements that supported or related to the work.

I.5.2 The inventor, or inventors acting collectively when there is more than one, is free to place inventions in the public domain in accordance with Section I.2.6. AUC will not assert intellectual property rights when inventors have placed their inventions in the public domain.

II. Copyrights

II.6.1 Making University-Owned Works Freely Available to the Public: If a creator of a work whose copyright is owned by the University, including a creator of a work-for-hire, wishes to make a work freely available to the public, through noncommercial licensing or other means, the University, subject to the terms of any applicable agreements with third parties under which the work was created, will accommodate such wishes as long as it determines that the benefits to the public of making such works freely available outweigh any advantages that might be derived from commercialization. The University, through the Intellectual Property Committee, will act as expeditiously as reasonably possible in making such determination.
I.2.2. Generally students shall own any potentially patentable invention that they make, discover, or create in the course of their research unless:

(i) the student has received financial support from the University in the form of wages, salary, stipend or grant funds for the research;

(ii) the student has made more than incidental use of University resources, outside of general classroom projects and instruction, in the form of funds, facilities or personnel, in connection with the research;

(iii) the research was specially commissioned by the University or was co-invented with a University faculty member;

(iv) the research depends on background intellectual property owned by the University; or

(v) the research has been funded by a sponsor under a grant or sponsored research agreement, or is subject to a materials transfer agreement, confidential disclosure agreement or other legal obligation that restricts ownership of the intellectual property.
## Royalty Distribution

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<tr>
<th>Gross Revenue</th>
<th>Deduction of directly assignable expenses</th>
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<tbody>
<tr>
<td>Net Revenue</td>
<td>Inventor</td>
</tr>
<tr>
<td>First LE 500,000</td>
<td>70%</td>
</tr>
<tr>
<td>Next LE 500,000</td>
<td>50%</td>
</tr>
<tr>
<td>Above LE 1,000,000</td>
<td>33%</td>
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- Egypt has moved forwards and has already established 32 TTOs in Egyptian Universities and Research Centers.
- The establishment of National Technology Transfer Office (NTTO) will be duplication and may cause confusion among stakeholders. Hence, we propose the establishment of another entity to provide support to the existing TTOs.
- Such an entity may be the base for future innovation activities and initiatives in Egypt. Hence we propose the name of Egypt Innovation Support Hub (EISH).
EGYPT’S INNOVATION SUPPORT HUB (EISH)

EISH Director

Admin Assistant

Manager of Life Sciences Technology Licensing

Manager of Physical Sciences Technology Licensing

Intellectual Property Manager