

محتوى دورات التدريب (Courses Syllabus)

TICO 102: The Art of Pitching.

Target Audience: All TICO officers. Open to Researchers

Course Pre-Requisites: TICO 100

Class Contact hours: 6 hours

Course Detailed Syllabus:

This course will include brief presentation of what must be covered in a business pitch and how to cover it as well as what makes a pitch a great one. Examples of high quality and lower quality pitches will be presented and critiqued by participants to allow them to identify strengths and weaknesses. Participants will prepare and present their own pitches and will be critiqued in detail by the instructor and audience to fine-tune their pitching skills.

In-class activities

Students will select a business idea to pitch, do the necessary research, take turns presenting their own pitches and critiquing other participants pitching.

Individual study hours:

Participants will incorporate relevant material in their manual.

Group work hours

Not applicable

Learning Assessment Mechanism:

Each participant will be required to pitch a real problem they studied to a panel of experts and will be evaluated on the quality of their 10 min pitch and 3 min pitch. Participant's manual will be assessed.

Instructor Assessment Mechanism

Confidential instructor assessment forms will be filled by students at the end of the course.

Summary Table

	Class contact	Hands-on activities	Individual study/ Project	Group work	Total Hours
Hours	6hrs	In class	6 hrs		12hrs

TICO103: Communications, Negotiation and Conflict Resolution

Target Audience: AllTICO officers

Course Pre-Requisites: TICO 102

Class Contact hours: 12 hours

Course Detailed Syllabus:

Learning outcomes: Upon the completion of this course, the participants will be able to perform the following:

- Communicate effectively using simple, concise and direct language
- Build and work effectively in a team
- Learn to overcome skepticism, build trust and create alliances
- Understand conflict and its stages
- Develop and apply different conflict resolution tactics
- Build a strong negotiation base, understand and articulate your position
- Learn to read the other negotiating party, what their “must have” is & what is negotiable for them.

In-class activities

Participants will be engaged in role-playing exercises in class as well as in case study discussions. They will be given specific cases to prepare for the second day.

Individual study hours: Participants will incorporate relevant material in their manual.

Group work hours: Not applicable

Resources and References: To be filled by instructor.

Learning Assessment Mechanism:

The learning achieved in the course will be assessed through a written exam based on case studies. Participant's manual will be assessed.

Instructor Assessment Mechanism

Confidential instructor assessment forms will be filled by students at the end of the course.

Course Syllabus Prepared by: T. Aboulnasr

Summary Table

	Class contact	Hands-on activities	Individual study/ Project	Group work	Total Hours
Hours	12 hrs	In class	6 hrs		18 hrs

TICO 104: The Strategic Planning of University/ Research Facility Innovation

Target Audience: All TICO Directors, VPs for Research, VPs for Community Affairs and Service (and equivalent roles).

Course Pre-Requisites: TICO 101

Class Contact hours: 6 hours

Course Detailed Syllabus:

In this course, directors of the TICO offices will develop a shared understanding of the policies, mechanisms and structures that are needed to invigorate innovation at university/ research institution-wide level. The following topics are to be covered:

- 1) Building & leveraging industry networks: developing university-industry clubs, advisory boards, etc.
- 2) Building and capitalizing on Alumni networks.
- 3) The effect of internships on university-industry links, student employment and innovation.
- 4) Processes in support of innovation: alumni relations' management, industrial relations management and student internship administration.
- 5) Focusing student research: capitalizing on final year projects and research-degree theses.
- 6) The role of collaboration and networks: why innovation cannot be a solo activity, link to entrepreneurship.

In-class activities

Participants will conduct group exercises to apply material covered in class. Examples include:

- Develop a problem statement for connecting industry to university.
- Carry out and present a SWOT analysis for the situation with your university (in teams: focus on common aspects)
- Develop and present an action plan for your GICO to promote better university/ research facility- industry collaboration

Individual work:

Participants will read a number of articles and case studies on technology transfer and fostering links with industry (4 hours).

Group work hours: Participants will work in groups to review and refine action plans developed in class and present a written full action plan (including required resources and institutional support mechanisms) (2 hours).

Learning Assessment Mechanism:

A written exam confirming the participants' understanding of the nature of linking university/ research facility to industry, and an assessed written action plan.

Course Assessment Mechanism

Confidential instructor assessment forms will be filled by students at the end of the course.

Summary Table:

	Class contact	Individual study/ Project	Group work	Total Hours
Hours	6	4	2	12

TICO105: Project Management for Technology Professionals

Target Audience: AllTICO officers

Course Pre-Requisites: TICO 100

Class Contact hours: 24 hours

Course Detailed Syllabus:

Project Framework: Project identification, The project life cycle, Project stakeholders

Project Scope Management: Scope definition, Creating WBS, Project charter

Project Scheduling: Time management processes, Time planning techniques (CPM and PERT), Building project schedule and Gantt chart

Resource Management: Fundamentals of resource definition, Deployment of resources dictionary, Resource loading, Viewing resources profile; histograms.

Project Risk Management: Defining project risks, Risk management planning, Project risk analysis, Risk monitoring and control

Project HR Management: Develop HR plan, Acquire and develop project staff, Manage project staff.

Practical Implementation: Basic use of PM tool; MS-Project, Business cases

In-class activities

Module 2: Hands-on exercise: Establishing a New Project

Module 3: Hands-on exercise: Create Project Time Plan

Module 4: Hands-on exercise: Estimate Resource to Class Project

Module 5: Hands-on exercise: Create Project Risk Map

Individual study hours: Participants will incorporate relevant material in their manual.

Group work hours: Not applicable

Learning Assessment Mechanism:

Participants will be given a specific project and required to apply what they learned. Participant’s manual will be assessed.

Instructor Assessment Mechanism

Confidential instructor assessment forms will be filled by students at the end of the course.

Summary Table

	Class contact	Hands-on activities	Individual study/ Project	Group work	Total Hours
Hours	24hrs	In class	6hrs		30hrs

TICO 106 : Measurement of Innovation Activities in Industry

Target Audience: All TICO offices

Course Pre-Requisites: None

Class Contact Hours: 10 hours

Course detailed syllabus

In this course, members of the TICO office will understand the difference between innovation and invention, types of innovation and what international methods used to measure the technological innovation activities in firms. The participants will learn the ability to determine the scale of innovation activities and knowing the internal and systemic factors that can influence on innovation activities. Also, the participant will know the difference between major terminology such as Research and experimental development (R&D), Scientific and technical education and training (STET) and Scientific and technological services (STS).

At the end, the of course will give a brief on the analytic hierarchy process (AHP) for organizing and analyzing complex decisions.

In- Class activities

Participants will conduct two group exercise to apply material covered in class.

Group work hours: not applicable

Learning assessment mechanism:

A written exam confirming the participants' understanding of how to measure the innovation activities in industry

Instructors Assessment Mechanism

Confidential instructors assessment forms will be filled by students at the end of the course.

Summary Table

	Class contact	Individual study	Group work	Total hours
hour	10	----	2	12 hours