



Branch Office of the International Organization of  
Open Society Institute - Assistance Foundation in  
Tajikistan



# **National Workshop on**

## **the ‘Academy of ICT Essentials for Government Leaders’**

## **&**

## **the ‘Primer Series on ICTD for Youth’**

*20-23 August, 2013  
Royal Yavroz, Romit, Tajikistan*

## **- AIDE MEMOIRE -**

*Organized by the Open Society Institute Assistance Foundation (OSI-AF),*

*Association of Internet Service Providers (AISP),*

*United Nations Asian and Pacific Training Centre for Information and Communication Technology for  
Development (UN-APCICT/ESCAP)*

## **BACKGROUND**

The United Nations – Asian and Pacific Training Centre for ICT for Development (UN-APCICT/ESCAP) was established in June 2006 as a regional institute of the Economic and Social Commission for Asia and the Pacific (ESCAP) in Incheon, Republic of Korea. The mission of APCICT is to build the human and institutional capacity of the 62 ESCAP member and associate member States to use ICTs for socio-economic development and attainment of the Millennium Development Goals. To achieve its mission, APCICT develops and implements its programmes and activities around 4 distinct yet inter-related pillars of its work, namely training, research and knowledge sharing, advisory services, and serving as a multilateral cooperation mechanism.

Since its inception, APCICT has designed and executed many impactful ICT for development (ICTD) capacity building programmes to bridge the digital divide. The Centre's flagship training programme is the *Academy of ICT Essentials for Government Leaders* ('Academy'), which aims to impart training using an 11-module curriculum to policymakers and government officials for leveraging the potential of ICTs for achieving national development goals. Since its launch in 2008, the Academy has been rolled-out in 26 countries in the region and is available in 12 languages.

Recognizing the importance of turning today's youth into tomorrow's leader, APCICT has initiated the project, 'Strengthening ICT for Development Education in Institutions of Higher Learning'. This project aims to create a cadre of future leaders equipped with the capacity to use ICTs for achieving development goals through enhanced coverage of ICT for Development (ICTD) in undergraduate and graduate programmes at universities in the Asia-Pacific region. Under this project the 'Primer Series on ICTD for Youth' (Primer Series) was created.

The Primer Series aims to serve as a tool to help educators fill the gap in ICTD coverage in universities by promoting the addition of ICTD topics to existing university curricula while offering quality ICTD content for students in the form of learning modules. The series is composed of multiple issues addressing a range of topics in ICTD. It is intended for students from both technical and non-technical backgrounds and is flexible enough for use in different national contexts. The Primer Series was officially launched in February 2012 in Baku, Azerbaijan. Thus far the Primer Series has been rolled-out in 13 countries/ sub-regions.

The national Training of Trainers (TOT) Workshop on ICT for Development in Tajikistan marks an important step in strengthening the knowledge of both government officials and university faculty on how ICTs can be harnessed to achieve development goals. This event follows a number of ICTD capacity building initiatives in the country.

The first national workshop was held in 2009 in Dushanbe to mark the translation of the Academy programme into Russian. Following this, OSI-AF completed localization of the first eight Academy modules into Tajik language in 2011 and the launch of the Tajik version Academy was held in Dushanbe on 13 September 2011. Following the launch, the second Academy workshop was co-organized from 14-18 September 2011 with APCICT and OSI-AF at Khoja-Obigarm, Tajikistan for Academy modules 3, 7 and 8. Following this training, OSI-AF has carried out three additional Academy workshops at the provincial level.

In addition, the Institute of Entrepreneurship and Service has also held classes utilizing the Academy and Primer Series resources. OSI-AF has also completed localization of the Primer Series into Tajik language. Following finalization, the official launch of the localized version was held in 5 major cities of Tajikistan starting from 28 January 2013.

## **TRAINING OF TRAINERS WORKSHOP ON ACADEMY MODULES 9, 10, 11 AND PRIMER SERIES ISSUE 1**

The TOT workshop will be divided into the following three parallel tracks:

- Track I: Primer Series Issue 1, 'An Introduction to ICT for Development'
- Track II: Academy Module 9, 'ICT for Disaster Risk Management' and Module 10, 'ICT, Climate Change and Green Growth'
- Track III: Academy Module 11, 'Social Media for Development'

**Track I: Primer Series Issue 1, ‘An Introduction to ICT for Development’** – This track will focus on the first issue of the Primer Series, titled, ‘*An Introduction to ICT for Development*’. This issue seeks to provide an introduction to and preliminary understanding of the linkages between ICTs and the achievement of human development goals in society. It is designed to provide background information that students in undergraduate and graduate programmes can use as a starting point in the exploration of the various dimensions of the above-mentioned linkages through case studies of ICT applications in key sectors of development in Asia-Pacific countries.

**Track II: Academy Module 9, ‘ICT for Disaster Risk Management’ and Module 10, ‘ICT, Climate Change and Green Growth’** – Modules 9 and 10 respond to the call from member states for capacity development in the area of DRM and CC. Module 9, ‘*ICT for Disaster Risk Management*’, provides government officials and policymakers with an overview of DRM, presents an approach for identifying information needs in DRM, and provides examples of the applications of ICTs for DRM. The module also discusses benefits and barriers for utilizing ICT in DRM. In the specific context of Tajikistan, Module 9 will address some of the outstanding operational issues for more effective realization of National Monitoring and Early Warning System and National Disaster Risk Management Strategy in the country.

Module 10, ‘*ICT, Climate Change and Green Growth*’, provides policymakers with an understanding of the role that ICTs play in observing and monitoring the environment, sharing information about the environment, mobilizing action, facilitating and enhancing environmental decision making, promoting environmental sustainability and abating climate change. The module also explores the potential of ICTs to transform the economy into an engine for sustainable “green” growth, and considers how to integrate ICTs into such an economy. In the specific context, the Module 10 will address some of outstanding operational issues highlighted in Tajikistan’s National Action Plan for Climate Change Mitigation and Adaptation, based on the sound practices in the region.

The details with regards to the intended outcomes of Track II are highlighted in the note at Annex I.

**Track III: Academy Module 11, ‘Social Media for Development’**– The emergence of social media as a powerful and widespread communication platform for exchanging ideas and information among citizens, institutions and communities has presented enormous opportunities in utilizing them for socio-economic development. Module 11, ‘*Social Media for Development*’ provides the core concepts of social media from a development-oriented perspective and describes innovative ways for governments and development stakeholders to leverage them in national development strategies and programmes.

## **OBJECTIVES**

The National TOT Workshop aims to fulfill the following objectives:

- Deliver training on the content and pedagogical methodology of the Academy / Primer Series to future resource persons;
- Strengthen the pool of resource persons who can advocate and deliver training on Academy / Primer Series in Tajikistan;
- Discuss future strategies for the national level roll-out of the Academy / Primer Series with the relevant stakeholders;
- Strengthen existing partnerships and build new ones in order to extend the reach and impact of the Academy / Primer Series;
- Provide an invaluable opportunity for the exchange of experiences and knowledge among trainers from different institutions/agencies; and
- Establish a strong network of national trainers and training institutions committed to promoting ICTD capacity building of government officials and youth.

## **EXPECTED OUTCOMES**

At the end of the meeting, the following outcomes are expected to be achieved:

- Participants attain an understanding of the Academy / Primer Series and the importance of ICTD capacity building among government official, students and youth;
- Participants will be able to serve as a resource person and champion for adoption and uptake of the Academy / Primer Series; and

- Participants' knowledge of ICTD is strengthened.

## **ORGANIZERS**

OSI-AF, AISP and APCICT are co-organizing this event.

## **PARTICIPANTS**

In total, 45 participants will attend the workshop. Track I will be composed of 15 university teachers and postgraduate students; Track II will be composed of representatives from the Committees on Emergency Situations, Geology and Projection of the Environment as well as university teachers; Track III will be composed of teachers and students from the Faculties of Journalism and ICT as well as civil servants from the Department of State Service and administrators of state agency websites.

## **VENUE**

The Workshop will be held at Royal Yavroz in Romit, Tajikistan.

## PROVISIONAL AGENDA

### DAY 1: PARALLEL TRACK II

#### ACADEMY OF ICT ESSENTIALS FOR GOVERNMENT LEADERS Module 9: ICT for Disaster Risk Management

20 August 2013 (Tuesday), Royal Yavroz, Romit, Tajikistan

TIME	DESCRIPTION
08:30 – 09:00	REGISTRATION
<b>JOINT OPENING SESSION</b>	
09:00 – 09:30	<ul style="list-style-type: none"><li><b>Welcome speech</b> <i>Ms. Zuhra Halimova, OSI-AF</i></li><li><b>Welcome speech</b> <i>Dr. Hyeun-Suk Rhee, Director, UN-APCICT/ESCAP</i></li><li><b>Welcome speech</b> <i>Mr. Asomiddin Atoev, AISP</i></li></ul>
09:30 – 10:00	<b>Introduction to APCICT's ICT for development capacity building programmes</b>
10:00 – 10:30	<ul style="list-style-type: none"><li><b>Introduction of participants</b></li><li><b>Group photo</b></li></ul>
10:30 – 11:00	<b>Coffee Break</b>
<b>PARALLEL TRACK II: 'ACADEMY OF ICT ESSENTIALS FOR GOVERNMENT LEADERS' Module 9: 'ICT for Disaster Risk Management'</b>	
<b>International Resource Person:</b> <i>Ms. Gabrielle Iglesias, Senior Project Officer, Asian Disaster Preparedness Center, (Thailand)</i>	
<b>National Resource Persons:</b> <i>Ms. Sayora Ashrapova, Associate Professor of Social Work, Tajik National University Ms. Gulova Farishtamoh, Coordinator of Trainers, Administrator, Public Fund Civil Internet Policy Initiative</i>	
11:00 – 12:30	<b>Session 1: Introduction to Disaster Risk Management (DRM) and ICTs</b> <i>Gabrielle Iglesias, ADPC</i> Module 9 provides an overview of disaster risk management and its information needs while identifying the technology available to reduce disaster risks and respond to disasters.
12:30 – 14:00	<b>Lunch</b>
14:00 – 15:30	<b>SESSION 2: Risk Profile of Central Asia and Tajikistan</b> <i>Sayora Ashrapova, Tajik National University</i>

	This session will present the risk profile of Central Asia, and highlight the hazards present in Tajikistan, areas of exposure, and vulnerabilities of the population and livelihood. It will also convey the country's capacities for disaster risk management in terms of its law, policies, and governance arrangements.
15:30 – 16:00	<i>Coffee Break</i>
16 :00 – 17:30	<p><b>Session 3: ICTs for Disaster Mitigation – In the Specific Context of Tajikistan’s National Risk Management Strategy</b></p> <p><i>Sanjay Srivastava, UNESCAP</i></p> <p>This session presents the need to minimize disaster impacts and reduce disaster risk throughout development planning and implementation. ICTs are used to develop risk information, communicate this information, and utilize them to develop and implement measures such as hazard zoning, land-use planning, the construction of protective structures, etc. The session includes case studies from the CIS region and/or the Asia-Pacific.</p>
17:30 – 18:00	Q&A
18:00	<b>Dinner hosted by APCICT</b>

## DAY 2: PARALLEL TRACK II

### ACADEMY OF ICT ESSENTIALS FOR GOVERNMENT LEADERS Module 9: ICT for Disaster Risk Management

21 August 2013 (Wednesday), Royal Yavroz, Romit, Tajikistan

TIME	DESCRIPTION
08:30 – 09:00	<b>Registration</b>
09:00 – 09:10	<b>Introduction to Day 2 Agenda</b>
09:10 – 10:30	<b>SESSION 4: ICTs for Disaster Preparedness – In the Specific Context of Tajikistan's National Monitoring and Early Warning System</b> <i>Sanjay Srivastava, UNESCAP</i> This session presents the need to prepare for disasters to ensure that appropriate and effective actions are taken in the aftermath. ICTs are used to monitor hazards, develop early warning and communicate this information to communities at risk. The session includes case studies from the CIS region and/or the Asia-Pacific, as well as regional initiatives for hazard monitoring and early warning.
10:30 – 11:00	<b>Coffee Break</b>
11:00 – 12:30	<b>SESSION 5: ICTs for Disaster Response</b> <i>Gabrielle Iglesias, ADPC</i> This session presents the challenges for information handling and communication during disasters, and how ICTs can help facilitate response operations. The session includes case studies from the CIS region and/or the Asia-Pacific, as well as regional initiatives for disaster communication and space-borne imagery to support response.
12:30 – 14:00	<b>Lunch</b>
14:00 – 15:00	<b>SESSION 6: ICT for Disaster Recovery and Reconstruction</b> <i>Gabrielle Iglesias, ADPC</i> This session describes the process undertaken to fully restore a community to its pre-disaster level of functioning, and how ICTs can be applied to make the process more effective and transparent.
15:00 – 15:30	<b>Coffee Break</b>
15 :30 – 17:00	<b>SESSION 7: Workshop: Challenges of adopting technology for DRM and Ways Forward</b> <i>Gabrielle Iglesias, ADPC</i> In smaller groups, this session will encourage participants to identify ICT applications for DRM that they need and can implement in their agencies, possible obstacles to developing and using the identified applications, and figure out how to overcome the obstacles.
17:00 – 17:30	<b>Q&amp;A</b>
18:00 –	<b>Dinner</b>

## DAY 3: PARALLEL TRACK II

### ACADEMY OF ICT ESSENTIALS FOR GOVERNMENT LEADERS Module 10: ICT, Climate Change and Green Growth

22 August 2013 (Thursday), Royal Yavroz, Romit, Tajikistan

TIME	DESCRIPTION
08:30 – 09:00	Registration
<b>PARALLEL TRACK II: 'ACADEMY OF ICT ESSENTIALS FOR GOVERNMENT LEADERS' Module 10: 'ICT, Climate Change and Green Growth'</b>	
<b>International Resource Person:</b> <i>Mr. Sanjay Srivastava, Regional Adviser, Disaster Risk Reduction Information and Communications Technology and Disaster Risk Reduction Division United Nations ESCAP (Thailand)</i>	
<b>National Resource Persons:</b> <i>Ms. Sayora Ashrapova, Associate Professor of Social Work of the Tajik National University Ms. Gulova Farishtamoh, Coordinator of Trainers, Administrator, Public Fund Civil Internet Policy Initiative Dr. Amit Kumar, Senior Programme Manager, AKDN Disaster Risk Management Initiative, Aga Kahn Development Network</i>	
09:10 – 10:30	<b>SESSION 1: An Introduction to ICTs, Climate Change and Green Growth</b> <i>Gabrielle Iglesias, ADPC</i> This session introduces the module, the goals for climate change adaptation, climate change mitigation, green growth and the uses of ICTs therein. The session also introduces the trends in ICTs and policy considerations for promoting investments in ICTs for attaining these goals.
10:30 – 11:00	<b>Coffee Break</b>
11:00 – 12:30	<b>SESSION 2: The Impact of Climate Change on Development</b> <i>Sanjay Srivastava, UNESCAP</i> This session presents on how climate change affects the environment, livelihood, and disaster risk. It will draw on the latest research findings, and provide an overview of how the Asia-Pacific region is responding to the challenge.
12:30 – 14:00	<b>Lunch</b>
14:00 – 15:30	<b>SESSION 3: Climate Change Challenges in Tajikistan</b> <i>Sayora Ashrapova, Tajik National University</i> This session presents the climate risk profile of Central Asia, and highlights the climate risk profile of Tajikistan, the sectors that are expected to be affected by climate change, and the measures currently undertaken by the country's development partners in response to the challenge.
15:30 – 16:00	<b>Coffee Break</b>

	<p><b>SESSION 4: ICT Applications for Mitigating Climate Change</b></p> <p><i>Gabrielle Iglesias, ADPC</i></p> <p>This session presents why societies need to mitigate climate change and shows important ICT applications for monitoring the environment, improving energy production, improving efficiency of energy use and for promoting exchange of knowledge and practice. The session includes case studies from the CIS region and/or the Asia-Pacific, as well as regional initiatives supporting climate change mitigation. The session also introduces the policy considerations for promoting investments in ICTs for climate change mitigation.</p>
16 :00 – 17:30	<b>Q&amp;A</b>
18:00 –	<i>Dinner</i>

## DAY 4: PARALLEL TRACK II

### ACADEMY OF ICT ESSENTIALS FOR GOVERNMENT LEADERS Module 10: ICT, Climate Change and Green Growth

23 August 2013 (Friday), Royal Yavroz, Romit, Tajikistan

TIME	DESCRIPTION
08:30 – 09:00	<b>Registration</b>
09:00 – 09:10	<b>Introduction to Day 4 Agenda</b>
09:10 – 10:30	<b>SESSION 5: ICT Applications for Adapting to Climate Change – In the Specific Context of Tajikistan's National Action Plan on Climate Change</b> <i>Sanjay Srivastava, UNESCAP</i> This session presents why societies need to adapt to climate change and shows important ICT applications for monitoring and modeling the climate, projecting future climates, adapting to the changes and for promoting exchange of knowledge and practice. The session includes case studies from the CIS region and/or the Asia-Pacific, as well as regional initiatives supporting climate change adaptation. The session also introduces the policy considerations for promoting investments in ICTs for climate change adaptation.
10:30 – 11:00	<b>Coffee Break</b>
11:00 – 12:30	<b>SESSION 6: ICTs for Green Growth and Sustainable Development</b> <i>Gulova Farishtamoh, Public Fund Civil Internet Policy Initiative</i> This session presents what is green growth and why it is important, the regional initiatives promoting it and the critical role that ICTs could play within this approach to development. The session includes case studies from the CIS region and/or the Asia-Pacific. The session also introduces the policy considerations for promoting investments in ICTs for promoting green growth.
12:30 – 14:00	<b>Lunch</b>
14:00 – 15:30	<b>SESSION 7: Workshop: Challenges of Adopting Appropriate Technology for Climate Change and Green Growth and Ways Forward</b> <i>Sanjay Srivastava, UNESCAP</i> In smaller groups, this session will encourage participants to identify ICT applications for green growth, climate change mitigation or climate change adaptation, possible obstacles to developing and using the identified applications, and figure out how to overcome the obstacles.
15:30 – 16:00	<b>Coffee Break</b>

	<p><b>Round Table Discussion</b>  <i>Sanjay Srivastava, UNESCAP</i></p> <p><b>Topics for discussion:</b>  <i>The Academy Programme</i></p> <ul style="list-style-type: none"> <li>• What topics/areas would you like to see covered by new Academy Modules in the future?</li> <li>• How can the Academy programme be effectively marketed to expand the stakeholder base?</li> <li>• What kind of outreach strategy is necessary?</li> <li>• How can the reach and usage of online tools (e.g. APCICT Virtual Academy, e-Collaborative Hub) be improved?</li> <li>• Any other relevant discussion points</li> </ul>
16:00 – 17:00	
17:00 – 17:30	<b>CLOSING SESSION</b>

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## **Annex I**

### **Tajikistan: Intended benefits of the Academy Module 9 - 'ICT for Disaster Risk Management' and Module 10 – 'ICT, Climate Change and Green Growth'**

**I. Context:** Tajikistan, a landlocked country with the challenging mountainous terrain, is prone to disasters. The most frequent disasters faced by the population of Tajikistan are:

- Earthquakes; the most serious risk.
- Epidemics, avalanches, mudflows and floods pose significant risk.
- Droughts cause significant economic damage and losses.

During the period from 1997 to 2011, conservative calculations indicated a total damage of about USD 353 million caused by disasters or in average of USD 23.5 million a year<sup>1</sup>.

Tajikistan is experiencing the impacts of climate change. More frequent droughts and heightened extreme weather conditions are hitting poor communities, eroding their resilience. The country's glaciers are melting, bringing the danger, in the future, of greater water shortages. The number of days with extremely hot weather has doubled since 1940 and on average glaciers have retreated of one third while the drought index has increased with severe drought events occurring in 1971, 2000 and 2001<sup>2</sup>. A major cold wave affected Tajikistan in 2007, freezing rivers and interrupting hydropower production. According to the IPCC (2007) "the projected decrease in mean precipitation in Central Asia will be accompanied by an increase in the frequency of very dry spring, summer and autumn seasons. Changes in seasonality and amount of water flows from river systems are likely to occur due to climate change. Changes in runoff of river basins could have a significant effect on the power output of hydropower generating countries like Tajikistan, which is the third highest producer in the world<sup>3</sup>."

**II. Areas of Intended Benefits:** In 2010 Tajikistan has established a multi-component National Monitoring and Early Warning System, which monitors and analyzes natural, economic, food, energy and other risk factors in Tajikistan. National Disaster Risk Management Strategy for 2010-2015 was developed by the Committee of Emergency Situations and Civil Defense, in cooperation with relevant ministries, agencies and international organizations. The primary focus of Tajikistan's National Disaster Risk Management Strategy has been on the integration of disaster risk reduction into all development activities and the improvement of disaster preparedness and response. The Module 9 will address the outstanding operational issues with regards to more effective realization of National Monitoring and Early Warning System and National Disaster Risk Management Strategy.

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<sup>1</sup> Statement of Tajikistan Government at Global Platform for Disaster Risk Reduction, Geneva, may 2013

<sup>2</sup> Makhmaliev et al. The second national communication of the Republic of Tajikistan under the United Nations Framework Convention of Climate Change. Dushanbe, State Agency for Hydrometeorology of the Committee for Environmental Protection, 2008

<sup>3</sup> IPCC, Fourth Assessment Report, 2007, Impacts, Vulnerabilities and Adaptation

The Tajikistan's National Action Plan (NAP) for Climate Change Mitigation includes the measures on GHG emission reduction and enhancing of carbon natural sinks such as enhancement of energy efficiency in relevant sectors of the national economy, application of effective technologies and use of energy sources in the national economy that promotes high rates of economical growth and reduce or limit greenhouse gas emissions, protection and enhancement of natural sinks and reservoirs of greenhouse gases, promotion of sustainable forest management practices, afforestation and reforestation, promotion of sustainable forms of agriculture. Considering Tajikistan's circumstances, adaptation to climate change is as important task in solving climate change problem as reduction of GHG emissions. Important directions of NAP measures on adaptation to climate change include<sup>4</sup>:

- Improvement of the systematic observation networks and environmental monitoring to revise and renew adaptation measures;
- Improvement of the system of data collection, interpretation and dissemination;
- Enhancement of weather forecasting, climate modeling and early warning systems for minimization of natural disasters risk and preparedness to extreme phenomena;
- Capacity building to strengthen institutional, technical and human resources to promote adaptation and research in fields of climate and hydrological investigations, geographical information systems, environmental impact assessment, protection and re-cultivation of lands, rational use of water resources, conservation of ecosystems, sustainable agriculture, infrastructure.

The Module 10 will address some of outstanding operational issues, amenable to ICTs, highlighted in Tajikistan's National Action Plan for Climate Change Mitigation and Adaptation, based on the sound practices in the region.

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<sup>4</sup> Tajikistan First National Communications Report 2002 <http://unfccc.int/resource/docs/natc/tainc1.pdf>