

**Most Immediate**

Government of Pakistan  
Ministry of Foreign Affairs  
Islamabad  
\*\*\*\*\*

Subject: **6<sup>th</sup> International Training Course on "Current Technologies and trends in various levels of Spatial Data Infrastructure (SDI)" Scheduled on 1-2 July 2024 in Iran**

Enclosed please find a copy of Parep Tehran's E-Mail Message No.ECO-7/5/2024-A/09 dated 20<sup>th</sup> August 2024 on the subject mentioned above.

2. ECO Secretariate in Tehran has informed that the 6<sup>th</sup> International Training Course on "Current Technologies and Trends in various levels of Spatial Data Infrastructure (SDI)" will be held on 23-24 September 2024 (in virtual mode) by National Cartographic Center of Iran. The Member states are requested to convey their confirmation of participation and share the particulars of the nominee(s) at the earliest but not later than 10 September 2024.

3. Ministry of Information Technology is requested to confirm its participation in subject conference at the earliest. Furthermore, the Ministry may also share the details (name, designation, Mobile / Whats app number & Email address) of the Focal Point for further coordination

4. The same is forwarded for information and further necessary action at your end, please.

*Layke*

(Aayza Shujaat)  
Director (ECO&CARs)

Encl:(As above)

1. ✓ Ministry of Information Technology & Telecommunication [Director (Int'l Coordination)], Islamabad
2. SO to Maj Gen Rafiq Ur Rehman, HI(M), Surveyor General of Pakistan, Rawalpindi

Ministry of Foreign Affairs U.O. ECO-15/28/2024, dated 26 August, 2024

*officer (cmd)*  
*pb. put up / share with Admin for*  
*Process,*  
*28/8/24.*

Dy.No. 726 DG(ICI)  
Dated 28/8/24

E-MAIL MESSAGE

From : Parep Tehran  
To : Foreign Islamabad  
No. : ECO-7/5/2024-A/09  
Dated : 20 August, 2024

TNI-109

Director General (ECO & CARs) from First Secretary

Subject: 6<sup>th</sup> International Training Course on "Current Technologies and trends in various levels of Spatial Data Infrastructure (SDI)" Scheduled on 1-2 July 2024 (in virtual mode) by National Cartographic Center of Iran

Attached, please find ECO Secretariat's self-explanatory N.V. No. 2024/1142 dated 19 August, 2024 (along with 10 pages enclosures) on the subject matter.

2. ECO Secretariat vide its attached note verbale referred para 181 of ECO Work Programme 2024 and Calendar of Events for 2024 and informed the member states that National Cartographic Center (NC) of Iran has proposed to organize the 6<sup>th</sup> International Training Course on "Current Technologies and Trends in Various Levels of Spatial Data Infrastructure (SDI)" on 23-24 September 2024 in virtual mode.

3. The Secretariat requested the member states to convey their confirmation of participation and share the particulars (Name, Designation, Mobile/WhatsApp numbers & Email address) of the nominee(s) at the earliest but not later than 10-September 2024. Note verbale dated 11 August 2024 along with Concept Note & Tentative Program received from M/o Foreign Affairs of Iran is attached for ready reference.

4. Ministry is requested to approach to share the above information/attachments with the relevant authorities in Pakistan with the request to convey its confirmation of participation and particulars (Name, Designation, Mobile/WhatsApp numbers & Email address) of the nominee(s) at the earliest before the deadline with this Mission for onward submission to ECO Secretariat.

Encl: 12 Pages including covering page.

Respectful regards.

Put up the letter

Tahir

Khairat

(Ms. Khirat)

Email: eoptehran@gmail.com

S.S.C.F.  
21/8/2024

Dt. No. 2370 Dir (ECO & CARs)  
Dated 26.8.24

23/8/24 P.R. Home



Economic Cooperation Organization

ECO

No:EME/2024/1142

Priority: Urgent

Date: 19/8/2024

Attachment: Yes

The Secretariat of the Economic Cooperation Organization (ECO) presents its compliments to the Ministry of Foreign Affairs of the Islamic Republic of Iran and the Embassies of the ECO Member States in Tehran, and with reference to Para. 181 of "ECO Work Programme 2024" and Calendar of Events for 2024 has the honour to inform that the National Cartographic Center (NCC) of the Islamic Republic of Iran has proposed to organize the 6<sup>th</sup> International Training Course on "Current technologies and trends in various levels of Spatial Data Infrastructure (SDI)" on 23-24 September 2024 on a virtual mode.

The Secretariat has further the honour to request the Member States to nominate the relevant participants for the subject event and convey their names, designations and the contact details (email, phone number) at the earliest but not later than 10 September 2024.

The Note Verbale from the Ministry of Foreign Affairs of the Islamic Republic of Iran No. 531/2157736 dated 11 August 2024 pertaining to the Training Course is transmitted enclosed herewith along with its Concept Note and Tentative Programme.

For further coordination or queries, Mr. Nurlan Darimov, Programme Officer of the ECO Secretariat may be contacted via email: [darimov@eco.int](mailto:darimov@eco.int) or cell. (whatsapp): +20 128 993 9551.

The Secretariat of the Economic Cooperation Organization avails itself of this opportunity to renew to the esteemed Ministry of Foreign Affairs and the Embassies of ECO Member States, the assurances of its highest consideration.



All ECO Member States - Tehran

ECO Secretariat - No. 1, Golbou Alley, Kamranleh, Tehran, Iran - Postal Code: 19519 33114 - P.O.Box: 14155-6176

Tel: +98 (21) 22831733-4 Fax: +98 (21) 22831732 Email: [registry@eco.int](mailto:registry@eco.int) Website: <http://www.eco.int>



Be green. Print wisely.



**Islamic Republic of Iran  
Ministry of Foreign Affairs**

Unofficial translation

**In the Name of God**


**NOTE**

**No: 531/2157736**

**Ministry of Foreign Affairs of the Islamic Republic of Iran presents its compliments to the Secretariat of the Economic Cooperation Organization (ECO) in Tehran, and with reference to the Note verbal No: EME/2024/843 dated 27 June 2024, has the honor to inform that the 6<sup>th</sup> international specialized training course on "The Current Technologies and Trends in Various Levels of Spatial Data Infrastructure (SDI)" will be held virtually by National Cartographic Center of the Islamic Republic of Iran on 23-24 September 2024. Concept Note and tentative programme of the Event are attached.**

**It would be appreciated if the Secretariat conveys the matter to the Member States and informs this Ministry accordingly.**

**Ministry of Foreign Affairs of the Islamic Republic of Iran avails itself of this opportunity to renew to the Secretariat of the Economic Cooperation Organization (ECO) in Tehran the assurances of its highest consideration.**

 **11 August 2024**

**Secretariat of the Economic Cooperation Organization (ECO) - Tehran**



جمهوری اسلامی ایران  
وزارت امور خارجه

شماره : ۵۳۱/۲۱۵۷۷۳۶  
تاریخ : ۱۴۰۳/۰۵/۲۱  
پیوست : دارد

به نام خدا

یادداشت

وزارت امور خارجه جمهوری اسلامی ایران با اظهار تعارفات خود به دبیرخانه سازمان همکاریهای اقتصادی (اگو) در تهران احتراماً اشعار می‌دارد:

بازگشت به یادداشت شماره 843 / 2024 / EME مورخ ۷ تیر ۱۴۰۳ به اطلاع می‌رساند ششمین دوره آموزشی تخصصی بین‌المللی "The Current Technologies and Trends in Various Levels of Spatial Data Infrastructure (SDI)" در تاریخ ۲۳-۲۴ سپتامبر ۲۰۲۴ به شکل مجازی توسط سازمان نقشه برداری جمهوری اسلامی ایران برگزار خواهد شد. به پیوست اطلاعات تکمیلی و برنامه رویداد ارسال می‌گردد.

موقع را مغتنم شمرده، احترامات فائقه را تجدید می‌نماید.  
دبیرخانه سازمان همکاریهای اقتصادی (اگو) - تهران

# ECONOMIC COOPERATION ORGANIZATION (ECO)

## TRAINING COURSE



The National Cartographic Center of Iran with the support of ECO Secretariat holds a training course on:

### **The Current Technologies and Trends in Various Levels of Spatial Data Infrastructure (SDI)**

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**23-24 September 2024**

## **I. Background**

Spatial Data Infrastructure (SDI) plays a crucial role in modern society by providing a framework and tools for managing, sharing, and accessing spatial data. At its core, SDI is a platform that allows organizations to collect, store, analyze, and present spatial information in a coherent and consistent manner. The success of an SDI implementation relies heavily on the understanding of basic concepts, design principles, and implementing architectures. Therefore, it is imperative for professionals in the field to have a solid grasp of these fundamental aspects to effectively leverage the benefits of SDI in their work. In an effort to promote knowledge and expertise in the field of SDI, we are organizing an educational workshop that will delve into the intricacies of spatial data infrastructure. The workshop will cover a wide range of topics, including an overview of SDI, its basic concepts, the design and implementing architecture, and best practices for implementation.

Furthermore, the workshop will focus on advancing spatial tools in SDI and Geoportals, showcasing some of the sub-portals that have been developed in our own SDI. Participants will have the opportunity to gain insights into the technical details of these portals, learn about the innovative approaches used in their development, and explore potential applications in their own work. By providing a platform for professionals to enhance their knowledge and skills in SDI, our workshop aims to empower individuals and organizations to effectively harness the power of spatial data for informed decision-making and sustainable development. We invite stakeholders from various sectors to join us in this educational journey towards a more spatially informed and connected world.

In addition to SDI activities, Iran has been steadily advancing in the field of geospatial technologies, with significant investments and developments in recent years. The country has shown a growing interest in leveraging geospatial data for various applications, including urban planning, environmental monitoring, disaster management, agriculture, and infrastructure development. Key advancements in Iran's geospatial sector include the adoption of Digital Twin technology, the implementation of 3D Spatial Services for enhanced spatial visualization, and the integration of Building Information Modeling (BIM) for more efficient construction and urban planning practices. These technologies have helped improve decision-making processes, optimize

resource management, and enhance overall operational efficiencies across different sectors. Looking towards the future, Iran is poised to continue its trajectory towards more advanced geospatial technologies. Some of the forecasted trends include further integration of Artificial Intelligence (AI) algorithms for advanced spatial analysis and predictive modeling, the expansion of GeoCloud services for enhanced data storage and sharing capabilities, and the development of innovative solutions for addressing complex geospatial challenges. By staying at the forefront of geospatial innovation and embracing emerging technologies, Iran is well-positioned to unlock new opportunities, drive socioeconomic growth, and address key societal and environmental challenges in the years to come.

## **2. About the Virtual Capacity Building Workshop**

The National Cartographic Center of Iran, supported by the Economic Cooperation Organization (ECO), will host a two-day Virtual Capacity Building Workshop. The workshop aims to enhance participants' awareness, knowledge, and comprehension of the progressive geospatial technologies in Iran and forecast future trends.

The program is designed to raise and improve awareness, knowledge, and understanding of SDI to achievement of sustainable development and digital economic, new technologies in GIS to introduce and inform participants about its applications.

Also, in this training course, the participants would learn the important aspects of SDI and its technical details, new technologies including Digital Twin, 3D Spatial Services, Building Information Modeling (BIM), examples of 3D Spatial Web Services implementation, and the current technologies and applications of GeoCloud and Artificial Intelligence in the field of Geomatics through lectures, and demonstrations.

At the final stages of the workshop, participants would have a better and real understanding of the main aspects of SDI and the official tasks of the National Cartographic Center of Iran from a SDI point of view.



The workshop consists of two different parts:

### **1- The Current Technologies and Trends in Various Levels of Spatial Data Infrastructure (SDI)**

#### **Topics of Day1: SDI; the Concepts, Architecture, Geoportals, WPS**

- Fundamentals and Concepts of SDI
- Introduction of Iran SDI Architecture
- Practical Applications of Spatial Data Infrastructure
- Introduction of Web Processing Service Standard
- Setting up WPS on Geoserver

#### **Topics of Day 2: Advancing Geospatial Technologies in Iran: Envisioning a Bright Future:**

- Introducing the Digital Twin, Smart Cities and five-year program of NCC of Iran;
- 3D Spatial Web Services;
- Introduction to some OGC standards used in implementation of 3D spatial web services;
- Building Information Modeling (BIM);
- GeoCloud and Artificial Intelligence Application in Geomatics.

## **II. Relevance of this workshop to the ECO Region**

The upcoming educational workshop on Spatial Data Infrastructure (SDI) and Advancing Geospatial Technologies in Iran and Envisioning a Bright Future holds great relevance for the ECO region, as it addresses the crucial need for efficient management and utilization of geospatial data in the region. SDI plays a vital role in enhancing decision-making processes, promoting sustainable development, and fostering collaboration among various stakeholders. On the other hand, by harnessing the power of geospatial technologies, countries in the ECO region can address common issues such as climate change, natural disasters, urban planning, agriculture, and water resource management. These technologies provide a means to collect, analyze, and visualize spatial data to support evidence-based decision-making and sustainable development.

Overall, this workshop serves as a platform for stakeholders in the ECO region to strengthen their capacity in geospatial data management, enhance their technical skills, and explore innovative solutions to common challenges. By investing in the development of SDI and spatial tools and advanced geospatial technologies, we can unlock the full potential of geospatial data for sustainable development and economic growth in the ECO region.

### **III. Participants**

The Virtual Capacity Building Workshop is open to interested participants, but prior registration is required for all interested participants. The Registration Link is <https://www.skyroom.online/ch/ncc.gov/eco> . Participants are expected to be Geomatics professionals of ECO Member States with minimum knowledge of SDI and new technologies in GIS.

#### IV. Provisional Annotated Agenda

The provisional annotated agenda for the Virtual Capacity Building Workshop is as follows:

<b>Inauguration of Workshop</b>	
<b>Day 1: September 23, 2024</b>  <i>09:00 – 10:00 hrs.</i> <i>(UTC+3:30, IRAN time)</i>	<ul style="list-style-type: none"><li>▪ Welcome address by Dr. Madad from NCC</li><li>▪ Welcome address by ECO Geomatics Secretary</li><li>▪ Address by ECO Secretariat</li><li>▪ Group Photo</li></ul>
<b>Day 1: September 23, 2024</b>	<b>Instructor: Dr. Rezaee &amp; Dr. Ghasemloo &amp; Eng. Rafiee</b>
<b>Session 1:</b>  <i>10:00-12:00</i> <i>(UTC+3:30, IRAN time)</i>	<ul style="list-style-type: none"><li>▪ Fundamentals and Concepts of SDI</li><li>▪ Introduction of IranSDI Architecture</li><li>▪ Practical Applications of Spatial Data Infrastructure</li></ul>
<b>Session 2:</b>  <i>13:00-14:00</i> <i>(UTC+3:30, IRAN time)</i>	<ul style="list-style-type: none"><li>▪ Introduction of Web Processing Service Standard</li><li>▪ Setting up WPS on GeoServer</li><li>▪ Conclusion of the first day sessions</li></ul>

Program of Workshop	
<p><b>Day 2: September 24, 2024</b></p> <p><i>10:00 – 10:15 hrs. (UTC+3:30, IRAN time)</i></p>	<ul style="list-style-type: none"> <li>▪ Introduction to Day 2 Sessions by Dr. Madad</li> </ul>
<p><b>Day 2: September 24, 2024</b></p>	<p><b>Instructor: Eng. Rabiee &amp; Eng. Fathi Eng. Amiri &amp; Dr. Ahmadlou</b></p>
<p><b>Session 1:</b></p> <p><i>10:15-12:00 (UTC+3:30, IRAN time)</i></p>	<ul style="list-style-type: none"> <li>▪ Introduction of Integrating Geospatial and statistical Information-GSGF</li> <li>▪ Implementation of Table Joining Service(TJS)</li> </ul>
<p><b>Session 2:</b></p> <p><i>13:00-15:00 (UTC+3:30, IRAN time)</i></p>	<ul style="list-style-type: none"> <li>▪ Geospatial Technology and Information Management (Digital Twin, BIM, 3D Spatial Web Services)</li> <li>▪ The Vision of Spatial Technology</li> </ul>

## V. Organizers

National Cartographic Center (<http://ncc.gov.ir/>) will organize the workshop with the collaboration of the Secretariat of ECO (<http://eco.int/>).

VI. Point of Contact	
<p><b>Dr. Ali Soltanopur</b> Secretary of ECO Geomatics Committee <i>Tel (Office): +98-21-66071144</i> <i>(Cell phone): +98-912-3161022</i> <i>E-mail: asoltanopur@yahoo.com</i></p>	<p><b>Ms. Maryam Sadeghi</b> Head of International Cooperation Office <i>Tel (Office): +98-21-66071113</i> <i>Tel (Cell phone): +98-912-6494329</i> <i>E-mail: Maryam1355sadeghi@gmail.com</i></p>
<p><b>Mr. Fuad Farzalibeyov</b> Director for Energy, Minerals, and Environment of ECO Secretariat  <i>Tel : +98(21)22831733-34</i>  <i>Email: Farzalibeyov@eco.int</i></p>	<p><b>Mr. Nurlan Darimov</b> Program Officer ECO Secretariat, Tehran <i>Email: darimov@eco.int.</i> <i>Whatsapp No. +20 128 993 9551</i></p>

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SCANNED & INDEXED

TIME 10.48 DATE 27/8/24

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