

On-job Training on the Pilot Central Asia Drought Information System for Kyrgyzstan

Beijing, China 06-10 May 2024

Background:

Among natural disasters, droughts get relatively less attention from policymakers, even though they have serious long-term socioeconomic impacts. Drought adversely affects sustainable development and exacerbates poverty for millions who depend on land as a source of livelihood. Asia has had the largest number of people globally affected by droughts in the past three decades. Many Central Asian countries suffer from frequently occurring droughts, which are related to water resource availability and management and result in crop failures and increase in food prices.

As a slow-onset disaster, the use of space technology and Geographic Information Systems (GIS) applications can be particularly effective in drought preparedness and impact mitigation. However, despite the significant progress achieved in this region, space technology and GIS applications continue to be underutilized, primarily because of the lack of capacity in terms of human, scientific, technological, organizational, and institutional resources.

The Central Asia Drought Information System (Pilot project) initiative, implemented by the United Nations Economic and Social Commission for Asia and the Pacific and sponsored by the Russian Federation, aims to address the "monitoring and prediction" component of the drought management cycle. The project's key objective is to strengthen the capacity of target Central Asian countries to use satellite data and geospatial information for effective drought monitoring and early warning so



that those countries can access the pilot drought information system. This capacitybuilding training is being organized to intensify building the pilot Central Asia drought information system, which contains the development of a conceptual framework of the system, a geoportal, a database, awareness and a digital drought map through research on model building, field data work and analysis.

This training continues events dedicated to operationalizing CADIS. Specifically, it aims to affirm that a regular drought analysis process has been established and further enrich CADIS with data-sharing capabilities.

Objectives:

- Build the capacity of experts at MES to generate high level reports using DroughtWatch
- Expose the experts to best practices on the use of DroughtWatch in the Asia and Pacific

Expected Outcomes

- Enhanced capacity of government staff tasked with disaster monitoring to operate and maintain the drought information system.
- Optimised configuration of hardware and software for the system operation at the premises of the Ministry of Emergency Situations of Kyrgyzstan.

Venue and Date/Time

06-10 May 2024

Venue: **Block A, 504 meeting room**, Aerospace Information Research Institute (AIR) with the Chinese Academy of Sciences (CAS)

Organizers

United Nations Economic and Social Commission for Asia and the Pacific (ESCAP) Aerospace Information Research Institute (AIR) with the Chinese Academy of Sciences (CAS) Ministry of Emergency Situations (MES) of Kyrgyzstan

Participating Countries

Kyrgyzstan



Provisional Programme

| Monday, 6 May 2024 | |
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| Time | Topics |
| 09:00-09:30 | Session 1. Opening of the On-job Training and Keynote Speeches Welcome address by AIRCAS |
| | Mr. Bolun Ning, Director of Bureau of International Cooperation, Chinese Academy of Sciences (CAS) Mr. Keran Wang, Chief of Space Applications Section, United Nations Economic and Social Commission for Asia and the Pacific (ESCAP) Ms.Mingmei Chen, Deputy Director of Department of International Cooperation, Aerospace Information Research Institute (AIRCAS), CAS Ms. Tolkun Ismailova, Chief Specialist, International Relations Department, Ministry of Emergency Situations of the |
| | Kyrgyz Republic (MES) |
| 09:30-10:00 | Group photo and coffee break |
| 10:00-11:40 | Keynote Speeches Emergency Satellites and Application in China by Ms. Suju Li, Director of Key Laboratory of Emergency Satellite Engineering and Application, Ministry of Emergency Management Earth observation for resilient agriculture by Dr. Bingfang Wu, AIRCAS Drought monitoring of Mongolia by Dr. Nana Yan, AIRCAS |
| 11:40-12:00 | Discussion |
| 12:00-13:00 | Lunch break |
| 13:00-15:00 | Session 2. Training: Introduction of drought monitoring with DroughtWatch software, Dr. Zonghan Ma, AIRCAS, China |
| 15:00-15:15 | Coffee Break |
| 15:15-17:00 | Practices with DroughtWatch software Tuesday, 7 May 2024 |
| Time | Topics |
| 09:00-10:15 | Session 3. Training: Downloading and pre-processing of drought monitoring satellite data , Dr. Nana Yan, AIRCAS, China |
| 10:15-10:30 | Coffee Break |
| 10:30-12:00 | Session 3. (continued) |

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| 12:00-13:00 | Lunch break |
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| 13:00-15:00 | Session 3. (continued) |
| 15:00-15:15 | Coffee Break |
| 15:15-17:00 | Session 3. (continued) |

Wednesday, 8 May 2024

| Time | Topics |
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| 07:00-10:15 | Session 4. Training: Application of drought monitoring in Kyrgyzstan using |
| | DroughtWatch software: Case study for Kyrgyzstan, Dr. Zonghan Ma, AIRCAS, |
| | China |
| 10:15-10:30 | Coffee Break |
| 10:30-12:00 | Session 4. (continued) |
| 12:00-13:00 | Lunch break |
| 13:00-15:00 | Session 4. (continued) |
| 15:00-15:15 | Coffee Break |
| 15:15-17:00 | Session 4. (continued) |

| Thursday, 9 May 2024 | | |
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| Time | Topics | |
| 09:00-10:15 | Session 5. Training: Drought prediction with DroughtWatch tools by Dr. Rui Li, | |
| | AIRCAS, China | |
| 10:15-10:30 | Coffee Break | |
| 10:00-12:00 | Session 5. (continued) | |
| 12:00-13:00 | Lunch break | |
| 13:00-15:00 | Session 5. (continued) | |
| 15:00-15:15 | Coffee Break | |
| 15:15-17:00 | Session 5. (continued) | |

| Friday, 10 May 2024 | | |
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| Time | Topics | |
| 09:00-10:15 | Session 6. Training: Drought analysis based on DroughtWatch monitoring | |
| | results by Dr. Zonghan Ma, AIRCAS, China | |
| 10:15-10:30 | Coffee Break | |
| 10:00-12:00 | Session 6. (continued) | |
| 12:00-13:00 | Lunch break | |



| 13:00-15:00 | Session 6. (continued) |
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| 15:00-17:00 | Closing |

For information, please contact: Mr. Hamid Mehmood Economic Affairs Officer Space Applications Section ICT and Disaster Risk Reduction Division, ESCAP Email: hamid.mehmood@un.org

