



PROGRAM ПРОГРАММА БАҒДАРЛАМА

**3RD INTERNATIONAL SYMPOSIUM
ON THE FRONTIERS OF PLANT DIVERSITY CONSERVATION
RESEARCH IN THE PAN-THIRD POLE REGION
(PDCR 2025)**

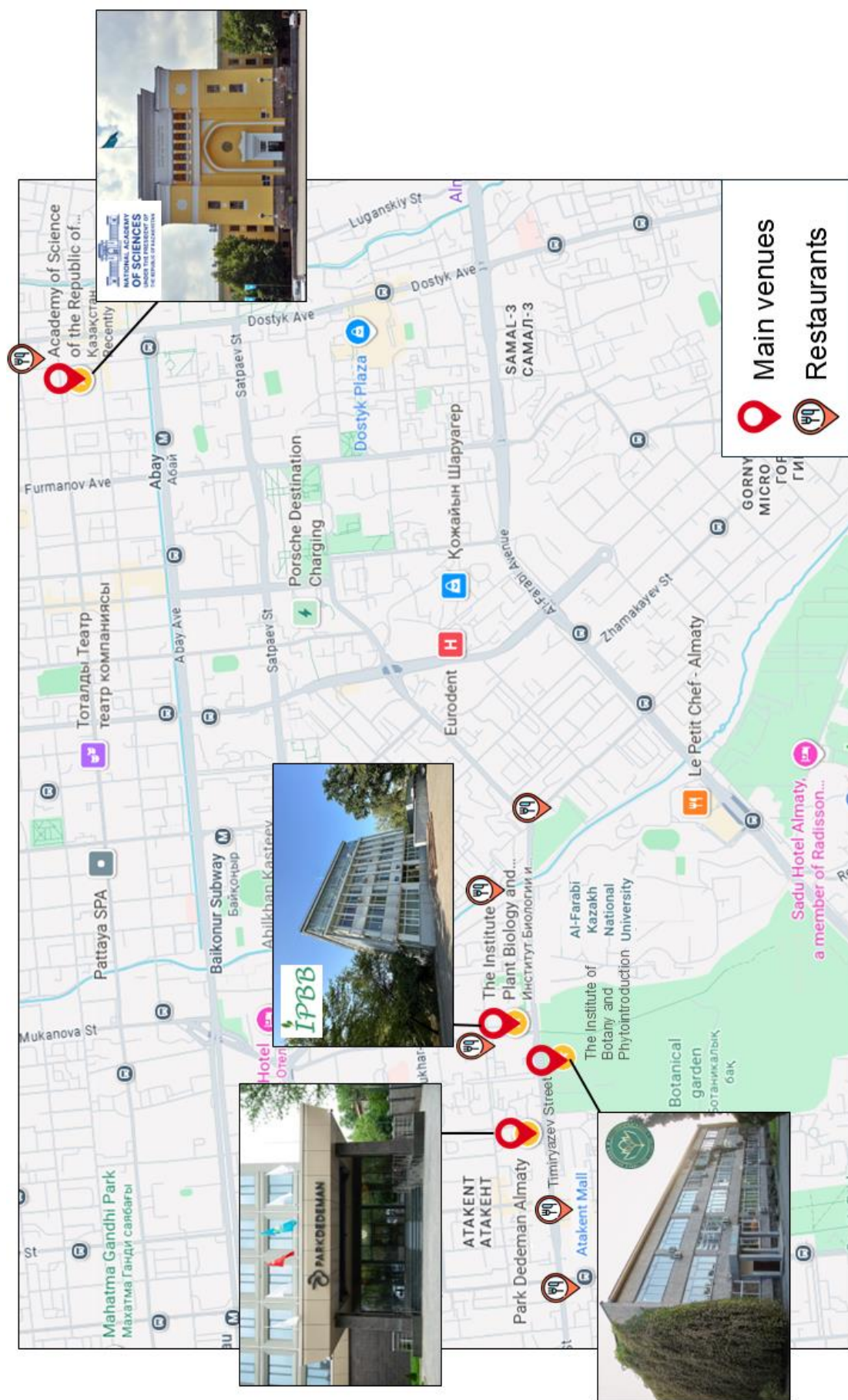
Almaty, Kazakhstan, August 26-29, 2025

**ӘЛЕМНІҢ ҮШІНШІ ПОЛЮСІНДЕГІ ӨСІМДІКТЕРДІҢ
АЛУАНТҮРЛІЛІГІН САҚТАУ ЖӨНІНДЕГІ ОЗЫҚ ЗЕРТТЕУЛЕР
БОЙЫНША 3-ШІ ХАЛЫҚАРАЛЫҚ СИМПОЗИУМ
(PDCR 2025)**

Алматы, Қазақстан, 26-29 тамыз 2025 жыл

**3-ИЙ МЕЖДУНАРОДНЫЙ СИМПОЗИУМ
ПО ПЕРЕДОВЫМ ИССЛЕДОВАНИЯМ ПО СОХРАНЕНИЮ
РАЗНООБРАЗИЯ РАСТЕНИЙ В ТРЕТЬЕМ ПОЛЮСЕ МИРА
(PDCR 2025)**

Алматы, Казахстан, 26-29 августа 2025 года



Organizing Committee

International organizing committee – IOC:

Chairman: **Academician Yerlan Turuspekov** (National Academy of Sciences of the Republic of Kazakhstan under the President of the RK (NAS RK), Almaty, Kazakhstan; Institute of Plant Biology and Biotechnology (IPBB), Almaty, Kazakhstan)

Deputy Chairman: **Academician Hang Sun** (Kunming Institute of Botany, Chinese Academy of Sciences (CAS), China)

Deputy Chairman: **Academician Tojibaev Sh. Komiljon** (Institute of Botany, Uzbekistan Academy of Sciences (UAS), Tashkent, Uzbekistan)

Deputy Chairman: **Prof. Gulnara Sitpayeva** (Institute of Botany and Phytointroduction (IBPh), Almaty, Kazakhstan)

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Prof. Weibang Sun (Kunming Institute of Botany, CAS, China)

Prof. Nikolai Friesen (University of Osnabrueck, Botanical Garden, Osnabrück, Germany)

Prof. Gabor Sramko (University of Debrecen, Debrecen, Hungary)

Prof. Dmitriy Sokoloff (Faculty of Life Sciences, Tel Aviv University, Tel Aviv, Israel)

Prof. Meruert Kurmanbayeva (al-Farabi Kazakh National University, Almaty, Kazakhstan)

Prof. Marcin Nobis (Jagiellonian University, Krakow, Poland)

Prof. Hyeok Jae Choi (Changwon National University, Changwon, Republic of Korea)

Prof. David E. Boufford (Harvard University Herbaria & Libraries, USA)

Assoc. Prof. Yusupov Ziyoviddin (Institute of Botany, UAS, Uzbekistan)

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PhD Elmira Sametova (IBPh, Almaty, Kazakhstan)

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PhD Zhanna Almanova (NAS RK, Almaty, Kazakhstan)

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PhD Alibek Zatybekov (IPBB, Almaty, Kazakhstan)

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Daniyar Yerbolatov (IPBB, Almaty, Kazakhstan)

Alan Ibraimov (IPBB, Almaty, Kazakhstan)

Alexandr Gulin (IPBB, Almaty, Kazakhstan)

Program of the Symposium PDCR 2025

August 26, 2025

Venue: *National Academy of Sciences of the Republic of Kazakhstan under the President of the Republic of Kazakhstan, Almaty, Shevchenko street, 28*

08:00-13:00 *Registration*

09:00-13:00 The Workshop on the development of the Central Asia Network for the study of plant biodiversity in the region (within the framework of the Symposium)

Language: Russian with translation to English; optional attendance for participants from non-Central Asian countries

Moderator: Yerlan Turuspekov

10:00-10:30 *Opening ceremony of the Workshop*

Greetings from the Academician A.K. Kurishbayev (President of the National Academy of Sciences of the Republic of Kazakhstan)

10:30-10:50 **Yerlan Turuspekov**

National Academy of Sciences of the Republic of Kazakhstan under the President of the RK (NAS RK), Almaty, Kazakhstan;

Institute of Plant Biology and Biotechnology, Almaty, Kazakhstan

“ORGANIZATIONAL ASPECTS OF CENTRAL ASIAN NETWORK FOR STUDY AND PRESERVATION OF FLORA”

10:50-11:10 **Komiljon Tojibaev**

Institute of Botany UAS, Tashkent, Uzbekistan

“TWO SHORTFALLS THAT BESET LARGE-SCALE KNOWLEDGE OF PLANT DIVERSITY IN CENTRAL ASIA”

11:10-11:30 **Gulnara Sitpayeva**

Institute of Botany and Phytointroduction, Almaty, Kazakhstan

“THE STUDY OF POLYMORPHIC GENERA OF FLORA IN THE CENTRAL ASIAN REGION FOR PRESERVATION AND SUSTAINABLE USAGE”

11:30-11:50 **Lazkov Georgy**

Institute of Biology, National Academy of Sciences, Bishkek, Kyrgyzstan

“FLORA OF SOUTHERN MACROSLOPE OF SUSSAMYR MOUNTAIN RANGE”

11:50-12:10 **Bakohodzha Bobozoda**

Institute of Botany, Plant Physiology and Genetics, National Academy of Sciences of Tajikistan, Dushanbe, Tajikistan

“BIODIVERSITY OF THE GENERA *SCUTELLARIA* AND *SALVIA* (LAMIACEAE) IN TAJIKISTAN”

Co-author: Bobokalonov Q.

12:10-12:30 Anna Ivashchenko

Institute of Zoology, Almaty, Kazakhstan

“CONSERVATION AND STUDY OF WILD TULIPS OF SOUTHERN KAZAKHSTAN”

12:30-12:50 *Memorandum signing Ceremony of the Network*

12:50-14:30 *Lunch (all participants of Symposium)*

14:30-17:00 Visiting the Institute of Plant Biology and Biotechnology (IPBB) and the Institute of Plant Botany and Phytointroduction (IBPh; the Main Botanical Garden)

17:00-21:00 *Welcome reception for Symposium participants*

August 27, 2025

Plenary Session (in English)

Venue: Hotel Park Dedeman, Almaty, Timiryazev Street, 67 A

08:00-09:00 *Registration*

09:00-09:30 *Opening ceremony of the symposium*

1. Greetings from the Academician A.K. Kurishbayev (President of the National Academy of Sciences of the Republic of Kazakhstan)
2. Greetings from the Academician Hang Sun (Kunming Institute of Botany, Chinese Academy of Sciences, China)
3. Greetings from the Academician Tojibaev Sh. Komiljon (Institute of Botany, Uzbekistan Academy of Sciences, Tashkent, Uzbekistan)

09:30-13:00 *Plenary session I (25 minutes per talk)*

Moderators: Komiljon Tojibaev, Yerlan Turuspekov

09:30-09:55 Zhekun Zhou

Xishuangbanna Tropical Botanical Garden, Kunming, China

“HETEROGENEOUS OCCURRENCE OF EVERGREEN BROAD-LEAVED FORESTS IN EAST ASIA: EVIDENCE FROM PLANT FOSSILS”

10:00-10:25 Bo Song

Kunming Institute of Botany CAS, Kunming, China

“MULTIFUNCTIONALITY OF FLORAL BRACTS IN SOUTHWESTERN MOUNTAINOUS REGION OF CHINA”

10:30-10:55 Gabor Sramko

University of Debrecen, Debrecen, Hungary

“TRACING THE EVOLUTIONARY LEGACY OF THE EURASIAN STEPPE: A MOLECULAR PERSPECTIVE FROM EUROPE”

11:00-11:20 Coffee break

11:20-11:45 Nikolai Friesen

University of Osnabrück, Osnabrück, Germany

“THE GENUS *ALLIUM* IN ASIA - AN ENCYCLOPEDIA OF SPECIATION SYSTEMS”

11:50-12:15 Wei-Bang Sun

Kunming Institute of Botany CAS, Kunming, China

“PLANT SPECIES WITH EXTREMELY SMALL POPULATIONS AND SPECIFICATIONS FOR ESTABLISHING THE CONSERVATION LIST”

12:20-12:45 Alexander Sennikov

University of Helsinki, Helsinki, Finland

“FLORA OF UZBEKISTAN PROJECT: RESULTS OF THE INITIAL PHASE AND FUTURE RESEARCH DIRECTIONS”

12:45-13:00 Alina Korovkina

Life Sciences, Qiagen, Vienna, Austria

“QIAGEN: MOLECULAR BIOLOGY METHODS IN PLANTS BIOTECHNOLOGY”

13:00-14:00 Lunch

14:00-19:00 Plenary session II (25 minutes per talk)

Moderators: Zhekun Zhou, Ziyoviddin Yusupov

14:00-14:25 Gulnara Sitpayeva

Institute of Botany and Phytointroduction, Almaty, Kazakhstan

“ASSESSMENT OF THE CURRENT SPECIES DIVERSITY OF THE FLORA OF ARID AND SUBARID TERRITORIES OF KAZAKHSTAN”

14:30-14:55 Shukherdorj Baasanmunkh

Changwon National University, Changwon, South Korea

“TRACING OUR JOURNEY THROUGH MONGOLIA’S FLORA: ACHIEVEMENTS AND ONGOING RESEARCH”

15:00-15:25 Alexander Rudov

Institute of Botany, Yerevan, Armenia

“CONSERVING ENDEMIC ALMOND SPECIES IN EASTERN AFGHANISTAN - A FIELD REPORT”

15:30-15:55 Denis Sandanov

Institute of General and Experimental Biology, Ulan-Ude, Russia

“PLANT DIVERSITY AND ITS CONSERVATION IN RUSSIA: SHIFTING FROM THE NATIONAL TO THE REGIONAL SCALE”

- 16:00-16:25 Zhijun Li**
College of Life Science and Technology, Tarim University, Aral, China
 “GENETIC DIVERSITY AND CORE COLLECTION
 CONSTRUCTION OF *POPULUS EUPHRATICA* ACROSS
 CHINA, KAZAKHSTAN, AND UZBEKISTAN”
 Co-authors: Gai Z., Zhai J., Muhatai G., Shamekova M., Sapakhova
 Z., Zhambakin K., Turdiyev T., Khizat S., Jurakulov K., Xujamov
 J., Mamarasulova N., Raissova N., Dulatbay Y., Yelekesheva M.
- 16:30-16:50 Coffee break**
- 16:50-17:15 Jianguo Chen**
Kunming Institute of Botany CAS, Kunming, China
 “INCREASED DIVERSITY BY CUSHION PLANTS
 ENHANCES ALPINE ECOSYSTEM FUNCTIONING AND
 STABILITY”
- 17:20-17:45 Jing Yang**
Kunming Institute of Botany CAS, Kunming, China
 “POLLINATION BIOLOGY STUDIES TO PSESP”
- 17:50-18:15 Ziyoviddin Yusupov**
Institute of Botany UAS, Tashkent, Uzbekistan
 “TREE OF LIFE: UZBEKISTAN”
- 18:20-18:45 Yerlan Turuspekov**
Institute of Plant Biology and Biotechnology, Almaty, Kazakhstan
 “MOLECULAR TAXONOMY OF SELECTED PLANT
 GENERA OF KAZAKHSTAN”
- 18:45-19:00 Anastasia Shnyreva**
Bio-Rad Laboratories, Moscow, Russia
 “DIGITAL PCR AND ITS APPLICATION TO PLANT BIOLOGY”

August 28, 2025

Oral and Poster Sessions (*in English*)

Venue: Hotel Park Dedeman, Almaty, Timiryazev Street, 67 A

- 09:00-13:00 Working Session I: The study and preservation of plant
 biodiversity (15 minutes per talk)**
Moderators: Weibang Sun, Gulnara Sitpayeva
- 09:00-09:15 Lei Cai**
Kunming Institute of Botany CAS, Kunming, China
 “CONSERVATION GENOMIC AND GENETIC
 ADAPTABILITY OF *OREOCHARIS MILEENSIS*, A PSESP IN
 THE KARST REGION”

- 09:15-09:30 Alexander Dubynin**
Institute of Botany and Phytointroduction, Almaty, Kazakhstan
 “WHAT THE CASE OF THE KAZAKH ENDEMIC
INCARVILLEA SEMIRETSCHENSKIA HAS TAUGHT US”
 Co-author: Epiktetov V.
- 09:30-09:45 Makhmudjanov Dilmurod**
Institute of Botany UAS, Tashkent, Uzbekistan
 “INSIGHTS INTO THE PHYLOGENY AND BIOGEOGRAPHY
 OF THE GENUS *EREMURUS*”
- 09:45-10:00 Akzhunis Imanbaeva**
Mangystau Experimental Garden, Aktau, Kazakhstan
 “KEY BOTANICAL AREAS AS A TOOL FOR THE
 CONSERVATION OF NATURAL FLORA OF THE WESTERN
 KARATAU MOUNTAINS IN THE DESERT CONDITIONS OF
 MANGYSTAU”
 Co-authors: Duissenova N., Mukhtubayeva S., Lukmanov A.,
 Orazov A.
- 10:00-10:15 Xiangguang Ma**
Kunming Institute of Botany CAS, Kunming, China
 “PARALLEL EVOLUTION AND CRYPTIC
 DIVERSIFICATION IN *ALLIUM* SECTION *SIKKIMENSIA*”
- 10:15-10:30 Ormon Sultangaziev**
Snow Leopard Foundation in Kyrgyzstan, Bishkek, Kyrgyzstan
 “MOLECULAR AND GENETIC RESEARCH OF TREE
 SPECIES IN KYRGYZSTAN”
- 10:30-10:45 Inom Juramurodov**
Institute of Botany UAS, Tashkent, Uzbekistan
 “A WORLDWIDE PHYLOGENY OF THE GENUS
HEDYSARUM”
- 10:45-11:00 Zhongshuai Gai**
*College of Life Science and Technology, Tarim University, Aral,
 China*
 “WHOLE-GENOME RESEQUENCING REVEALS
 SIGNATURE OF LOCAL ADAPTATION OF *POPULUS*”
 Co-authors: Long X., Chen Qiu, Sun J., Zhang X., Jiao P., Han X.,
 Song J., Wu Z., Li Z.
- 11:00-11:20 Coffee break**
- 11:20-11:35 Dilyara Gritsenko**
Institute of Plant Biology and Biotechnology, Almaty, Kazakhstan
 “TRANSCRIPTOMIC ANALYSIS OF *MALUS SIEVERSII*
 UNDER NATURAL CONDITIONS”

- Co-authors: Yanin K., Taskuzhina A., Kerimbek N., Pozharskiy A., Nizamdinova G.
- 11:35-11:50 Shyryn Almerekova**
Institute of Plant Biology and Biotechnology, Almaty, Kazakhstan
 “PHYLOGENETIC RELATIONSHIPS OF *TULIPA* AND *IRIS* SPECIES COLLECTED IN KAZAKHSTAN INFERRED FROM PLASTID GENOME SEQUENCES”
 Co-authors: Yermagambetova M., Turuspekov Y., Abugalieva S.
- 11:50-12:05 Dmitriy Sokoloff**
Tel Aviv University, Tel Aviv, Israel
 “DEVELOPMENTAL AND EVOLUTIONARY MORPHOLOGY IN *EPHEDRA* IN THE CONTEXT OF SEED PLANT EVOLUTION”
 Co-author: Ickert-Bond S. M.
- 12:05-12:20 Hee-Young Gil**
Korean National Arboretum, Pocheon, South Korea
 “PHYLOGEOGRAPHIC STRUCTURE AND GENETIC DIFFERENTIATION OF *TULIPA KOROLKOWII* (LILIACEAE), ENDEMIC SPECIES OF CENTRAL ASIA”
 Co-authors: Jeong HJ, Ha YH, Jang JE, Kim A., Tojibaev K., Lazkov G., Jang C-G., Choi HJ
- 12:20-12:30 Marina Khusnutdinova**
Institute of Plant Biology and Biotechnology, Almaty, Kazakhstan
 “BIODIVERSITY MAPPING OF *MALUS SIEVERSII* FORESTS IN SOUTHEASTERN KAZAKHSTAN USING GEOSPATIAL TOOLS”
 Co-authors: Taskuzhina A., Kerimbek N., Pozharskiy A., Nizamdinova G., Gritsenko D.
- 12:30-12:45 Hongwei Li**
Kunming Institute of Botany CAS, Kunming, China
 “THE CONSTRUCTION OF KUNMING NATIONAL BOTANICAL GARDEN”
- 12:45-13:00 Anton Vitovtov**
Scientific Advisor at Zalma Ltd., Almaty, Kazakhstan
 “MULTIOMICS IN SYSTEM BIOLOGY OF PLANTS: ADVANCES AND SOLUTIONS OF 10X GENOMICS”
- 13:00-14:00 Lunch**
- 14:00-18:00 Working Session II: The study and preservation of plant biodiversity (15 minutes per talk)**
Moderators: Alexander Rudov, Gabor Sramko
- 14:00-14:15 Tao Deng**
Kunming Institute of Botany CAS, Kunming, China

“PHYLOGENETIC STRUCTURE IN PLANT ASSEMBLAGES
ALONG ELEVATIONAL GRADIENTS”

14:15-14:30 Alma Kokhmetova

Institute of Plant Biology and Biotechnology, Almaty, Kazakhstan

“GENETIC DIVERSITY ANALYSIS OF PERSIAN WALNUT
(*JUGLANS REGIA* L.) GENOTYPES FROM SOUTHERN AND
SOUTHEASTERN KAZAKHSTAN”

Co-authors: Nurzhuma M., Kumarbayeva M., Keishilov Z.,
Bakhytuly K., Bolatbekova A., Mukhametzhanov K.

14:30-14:45 Moldir Yermagambetova

Institute of Plant Biology and Biotechnology, Almaty, Kazakhstan

“COMPARATIVE PLASTID GENOME ANALYSIS OF
SALTWORTS (*SALSOLA*, *XYLOSALSOLA*, *CAROXYLON*, AND
PYANKOVIA) FROM KAZAKHSTAN”

Co-authors: Turuspekov Y., Osmonali B., Abugalieva S.,
Almerekova S.

14:45-15:00 Meruert Kurmanbayeva

al-Farabi Kazakh National University, Almaty, Kazakhstan

“ASSESSMENT OF THE CURRENT STATUS AND
RESTORATION STRATEGIES OF THE ENDANGERED, RARE
SPECIES *RHEUM WITTROCKII* LUNDSTR. IN THE
CONDITIONS OF THE ZAILIYSKY ALATAU”

15:00-15:15 Svetlana Kushnarenko

Institute of Plant Biology and Biotechnology, Almaty, Kazakhstan

“CRYOBIOTECHNOLOGIES: TOOLS FOR PRESERVATION OF
PLANT GERMPLASM IN KAZAKHSTAN”

Co-authors: Rymkhanova N.K., Manapkanova U.A., Romadanova
N.V., Turdyev T.T., Rakhimbaev I.R.

15:15-15:30 Nina Terletsкая

Institute of Genetics and Physiology, Almaty, Kazakhstan

“STRATEGY FOR CONSERVING AND DEVELOPING
PROSPECTIVE MEDICINAL AND VETERINARY PLANT
RESOURCES IN KAZAKHSTAN AMID CLIMATE CHANGE”

Co-authors: Kudrina N.O., Salnikov V.G., Gemejiyeva N.G.,
Manabayeva S.A., Shadenova E.A., Adekenov S.M.

15:30-15:45 Maxim Patrin

LLC Phenomika, Moscow, Russia

“REVIEW OF MODERN SOLUTIONS FOR DIGITAL
PHENOTYPING AND MULTISPECTRAL ANALYSIS OF
PLANTS AND AGRICULTURAL PRODUCTS”

15:45-16:05 Coffee break

- 15:45-16:45** *Poster session*
- 16:45-17:00** **Ulzhan Manapkanova**
Institute of Plant Biology and Biotechnology, Almaty, Kazakhstan
 “GENETIC DIVERSITY AND POPULATION STRUCTURE IN WILD PRUNUS SPECIES OF KAZAKHSTAN AND UZBEKISTAN”
 Co-authors: Rymkhanova N., Beshko N., Satekov Y., Kushnarenko S.
- 17:00-17:15** **Aisha Taskuzhina**
Institute of Plant Biology and Biotechnology, Almaty, Kazakhstan
 “COMPREHENSIVE ANALYSIS OF THE MICROBIAL COMMUNITIES AND GENOMIC DIVERSITY OF *MALUS SIEVERSII* IN KAZAKHSTAN”
 Co-authors: Kerimbek N., Makhambetov A., Mendybayeva A., Gritsenko D.
- 17:15-17:45** *Closing ceremony of the Symposium*
- 18:00-21:00** Galla-dinner

August 29, 2025

- 09:00-13:00** Visiting the mountain resort Shymbulak
- 13:00-14:00** Lunch
- 14:00-17:00** Sightseeing of Almaty

August 29-30, 2025

Sattelite Workshop

- 10:00-14:00** **Denis Sandanov**
Institute of General and Experimental Biology, Ulan-Ude, Russia
 Satellite seminar “CONTEMPORARY METHODS FOR THE ANALYSIS AND PREDICTION ON SPECIES DISTRIBUTION”

POSTER SESSION

- 1 **Alikhanova A.**^{1,2}, Yermagambetova M.¹, Almerikova S.¹, Turuspekov Y.¹
¹ *Institute of Plant Biology and Biotechnology, Almaty, Kazakhstan*
² *Al-Farabi Kazakh National University, Almaty, Kazakhstan*
 DISTRIBUTION OF THE RARE *IRIS KUSCHAKEWICZII* B. FEDTSCH.
 SPECIES AND POPULATION STRUCTURE USING MICROSATELLITE
 MARKERS

- 2 **Almerikova S.**, Yermagambetova M., Abugalieva S., Turuspekov Y.
Institute of Plant Biology and Biotechnology, Almaty, Kazakhstan
 PHYLOGENETIC INSIGHTS INTO *JUNIPERUS* L. SPECIES OF
 KAZAKHSTAN FROM SEQUENCES OF NUCLEAR RIBOSOMAL ITS
 AND PLASTID GENOME

- 3 **Amalova A.**¹, Yessimbekova M.², Turemuratova S.^{1,3}, Gulin A.¹, Anuarbek
 Sh.¹
¹ *Institute of Plant Biology and Biotechnology, Almaty, Kazakhstan*
² *Kazakh Research Institute of Agriculture and Plant Industry, Almalyk,
 Kazakhstan*
³ *Al-Farabi Kazakh National University, Almaty, Kazakhstan*
 STUDY OF THE *AEGILOPS* L. SPECIES OF KAZAKHSTAN

- 4 **Bobokhujayev Sh.U.**¹, Sanamyan M.F.¹, Abdukarimov Sh.S.^{1,2}, Uralov J.S.¹,
 Rustamov A.B.¹
¹ *National University of Uzbekistan named after Mirzo Ulugbek, Tashkent,
 Uzbekistan*
² *Center for Genomics and Bioinformatics of the Academy of Sciences of the
 Republic of Uzbekistan, Tashkent, Uzbekistan*
 FEATURES OF ELIMINATION, GENETIC DIFFERENCES AND
 ABSENCE OF TRANSMISSION OF SUBSTITUTION CHROMOSOMES
 IN COTTON *G.BARBADENSE* L./*G.HIRSUTUM* L. HYBRIDS OF
 DIFFERENT BACKCROSS GENERATIONS

- 5 **Dao Zhi-Ling**
*Yunnan Key Laboratory for Integrative Conservation of Plant Species with
 Extremely Small Populations, Kunming Institute of Botany, Chinese Academy
 of Sciences*
 INVESTIGATION AND CONSERVATION OF PSESP IN THE QINGHAI-
 XIZANG PLATEAU

- 6 **Dimeyeva L.A.**, Islamgulova A.F., Permitina V.N., Ussen K., Iskakov R.T.,
 Imanalinova A.A., Kaliev B.Sh.
Institute of Botany and Phytointroduction, Almaty, Kazakhstan
 SOIL AND VEGETATION COVER OF THE FOREST BELT ON THE
 NORTHERN SLOPE OF THE KUNGEI ALATAU RIDGE (NORTHERN
 TIEN SHAN): SPATIO-TEMPORAL DYNAMICS AND MANAGEMENT
 STRATEGY UNDER CLIMATE CHANGE

- 7 **Gemejyeva N.G.**, Grudzinskaya L.M.
Institute of Botany and Phytointroduction, Almaty, Kazakhstan

REVIEW AND PERSPECTIVES OF RESEARCH ON RESOURCE
POTENTIAL OF MEDICINAL PLANTS OF MOUNTAIN SYSTEMS IN
KAZAKHSTAN

- 8 **Ibraimov A.**, Almerekova S., Abugalieva S.
Institute of Plant Biology and Biotechnology, Almaty, Kazakhstan
COMPLETE PLASTOME SEQUENCE OF *ALLIUM MICRODICTYON*
PROKH. AND ITS CHARACTERISTICS
- 9 **Ishmuratova M.Yu.**, Zhanayeva M.B., Levaya Ya.K., Aitkulov A.M.,
Tleukenova S.U., Gavrilkova E.A.
Karaganda Buketov University, Karaganda, Kazakhstan
ASSESSMENT OF THE CONTENT OF BIOLOGICALLY ACTIVE
SUBSTANCES IN *RIBES NIGRUM* FRUITS OF KARAGANDA REGION
FLORA
- 10 **Islamgulova A. F.**, Povetkin R. D.
Institute of Botany and Phytointroduction, Almaty, Kazakhstan
INFORMATION-ANALYTICAL SYSTEM FOR ACCOUNTING
BOTANICAL DIVERSITY: AN APPROACH BASED ON THE EXAMPLE
OF THE WEST KAZAKHSTAN REGION
- 11 **Issayeva D.A.**
*Kostanay Regional University named after Akhmet Baitursynuly, Kostanay,
Kazakhstan*
IMPACT OF THE PYROGENIC FACTOR ON FOREST ECOSYSTEMS
AND THEIR RECOVERY
- 12 **Jamalova D. N.**, Kurbaniyazova G. T.
*Institute of Botany, Academy of Sciences of the Republic of Uzbekistan,
Tashkent*
BIOTECHNOLOGICAL AND MOLECULAR GENETIC FOUNDATIONS
OF CONSERVATION OF RARE AND MEDICINAL PLANTS
- 13 **Kerdyashkin A.V.**, Kurmantayeva A.A., Govorukhina S.A.,
Imanalina A.A.
Institute of Botany and Phytointroduction, Almaty, Kazakhstan
STUDY OF SIBERIAN FIR COMMUNITIES IN ZHETYSU ALATAU
- 14 **Kubentayev S.A.**
Astana Botanical Garden, Astana, Kazakhstan
TULIPS (*TULIPA* L.) OF KAZAKHSTAN: SPECIES DIVERSITY,
TAXONOMIC ASPECTS, DISTRIBUTION AND CONSERVATION
- 15 **Kurbaniyazova G. T.**, Jamalova D. N.
*Institute of Botany, Academy of Sciences of the Republic of Uzbekistan,
Tashkent*
THE PHENOMENON OF ENDEMISM IN CENTRAL UZBEKISTAN:
MOLECULAR AND GENETIC INSIGHTS FROM THE NURATAU
MOUNTAINS
- 16 **Kurmantayeva A.A.**, Permitina V.N., Kerdyashkin A.V., Islamgulova A.F.,
Salmukhanbetova Zh.K.

Institute of Botany and Phytointroduction, Almaty, Kazakhstan
RARE PLANT COMMUNITIES OF SOUTH-EASTERN KAZAKHSTAN
MOUNTAIN SYSTEMS

- 17 **LUO Guifen**
Kunming Institute of Botany, Chinese Academy of Sciences
TISSUE CULTURE, RAPID PROPAGATION, AND *IN VITRO*
PRESERVATION OF *LILIUM MEDOGENSE*, A PLANT SPECIES WITH
AN EXTREMELY SMALL POPULATIONS ENDEMIC TO CHINA
- 18 **Mukan G.S.**, Sitpayeva G.T.
Institute of Botany of Phytointroduction, Almaty, Kazakhstan
CONSERVATION OF WILD FRUIT PLANT GENETIC DIVERSITY IN
KAZAKHSTAN
- 19 **Mursaliyeva V.K.**¹, Gemejiyeva N.G.², Mukhanov T.M.¹, Sarsenbek B.T.¹,
Algazy A.T.¹
¹ *Institute of Plant Biology and Biotechnology, Almaty, Kazakhstan*
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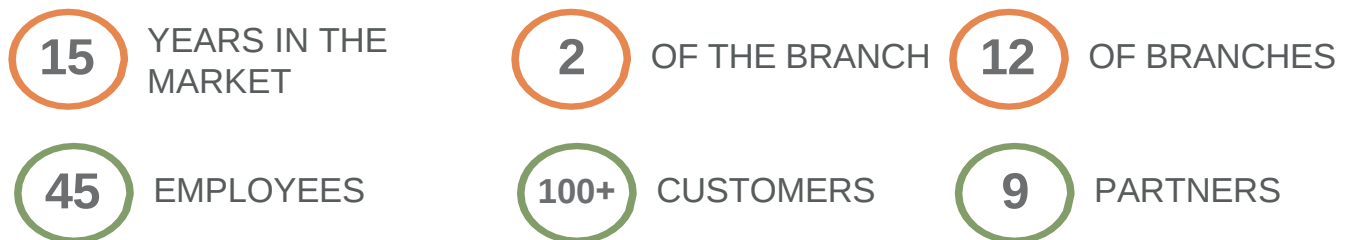
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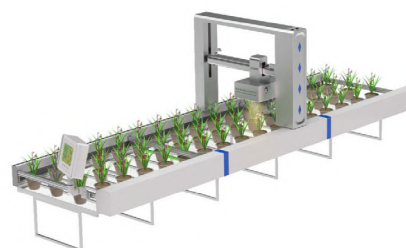
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