AEGIS
General introduction

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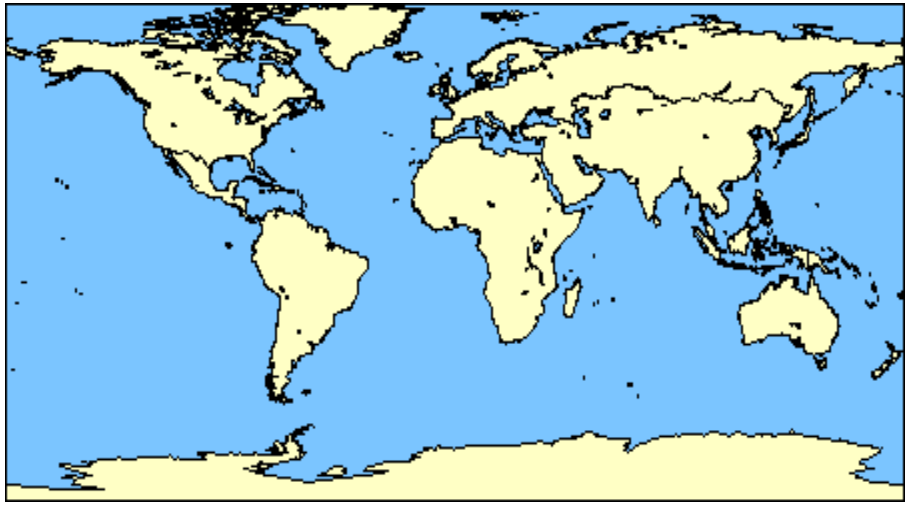
Content of presentation

1. Some historical facts
2. Establishment, milestones and key components of AEGIS
3. Perceived benefits of AEGIS
4. Foreseen conservation responsibilities AEGIS member countries/institutions
5. Foreseen responsibilities of WGs
6. The European Collection
7. AQUAS – development of a quality management system
8. EUROGENEBANK Project
9. Suggested way forward

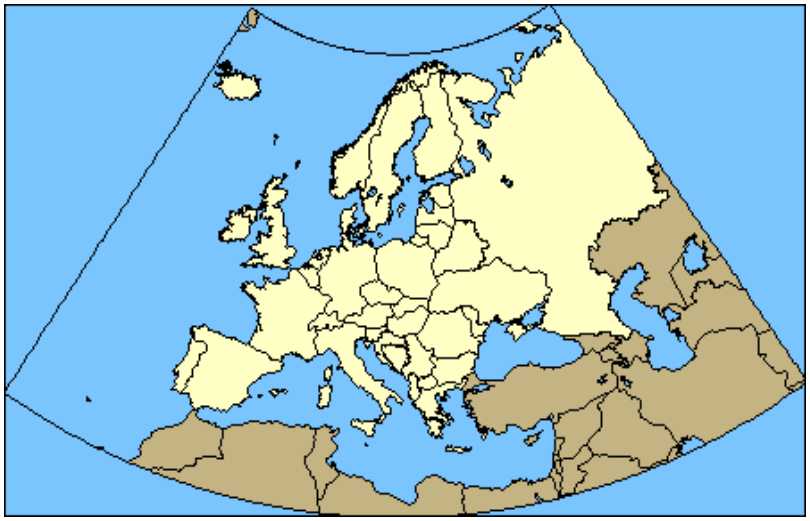
Background ECPGR

- Worldwide



- 1,750 genebanks/collections
- Approx. 7 million accessions
- Estimated 2 million unique
- Example: approx. 25,000 Allium accessions (SoW Report II)

- Europe



- App. 625 genebanks/germplasm coll.
- > 2 million accessions
- 30-40% unique (estimate)
- Example: approx. 13,000 Allium accessions; held in 32 genebanks in 20 countries

Some historical facts

ECPGR:

- Reported difficulties in PGR maintenance:
  - ✓ lack of long-term conservation facilities
  - ✓ insufficient safety-duplication
  - ✓ regeneration backlogs
  - ✓ inhomogeneous quality of material
- Discussed options for sharing conservation responsibilities in Europe already in 1998
- SC decided in 2003 to initiate an integrated European genebank system feasibility study (4 model crops, incl. vegetatively propagated *Allium* and Brassicas) in 2004
- Since June 2009 AEGIS exists legally

Model Crops

- **Seed propagated** material – annual
- Annex I crops of ITPGRFA

- ***Avena***

selfing

- ***Brassica***

outcrossing

- **Vegetatively propagated** material – biennial and perennial
- Non Annex I of ITPGRFA

- ***Allium (Veg. propag.)***

- ***Prunus***

Establishment and milestones of AEGIS

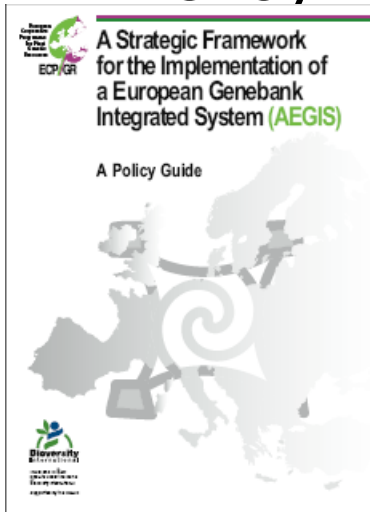
1. ECPGR SC decision to prepare for implementation of AEGIS in 2006
2. ECPGR Secretariat to coordinate; AEGIS Coordinator appointed
3. Feasibility studies for 4 model crops conducted
4. Strategic framework policy guide agreed (2008)
5. Memorandum of Understanding (MOU) developed and sent for signature to all ECPGR member countries in 1st half of 2009 (next presentation)
6. Currently 14 countries have signed MOU

Establishment and milestones of AEGIS

7. Agreement on development of AQUAS; discussion paper
8. Agreement on requirements and criteria to select MAAs (details in later presentation)
9. Competitive Small Grant Scheme launched (to facilitate establishment/operation process); 17 proposals received.
10. Topic on AEGIS included in FP7 Research Infrastructure Call; proposal being developed, coordinated by ECPGR Secretariat; unique opportunity to move faster forward with AEGIS!

Key components of AEGIS

1. A Strategic Framework for the Implementation of a European Genebank Integrated System - A Policy Guide
2. Formal agreement with countries (MOU) and institutions within countries (Associate Membership) – i.e. 14
3. European Collection (contains identified and agreed MAAs for each crop; in public domain; readily available) (to be developed)
4. Technical and operational quality standards (to be developed)



Key components of AEGIS

5. Quality management system (reporting; monitoring; capacity building) (to be developed)
6. EURISCO as information portal for European Collection (to be further developed)

35*. AEGIS Status **(AEGISSTAT)**

The coded status of an accession with regard to the European Genebank Integrated System (AEGIS).

Provides the information, whether the accession is conserved for AEGIS.

0 – not part of AEGIS

1 – part of AEGIS

If the AEGIS status is unknown, the field stays empty

7. Dedicated AEGIS website (existing version being revised)

Perceived Benefits of AEGIS

- Improved **collaboration** between countries
- **Cost efficient** conservation activities
- **Reduced duplication** of germplasm material
- Improved **quality standards**
- Increased **effectiveness in regeneration**
- Facilitated **access to and availability** of germplasm
- Improved **security of germplasm** through safety-duplication
- Improved **sharing of knowledge and information**

AEGIS and the European Collection

- European Collection will consist of dispersed accessions (MAAs), i.e. a virtual European genebank
- Through signing the MOU countries accept responsibilities for long-term conservation and availability of EA, and to
- conserve/manage according to quality standards
- Conservation/management strategies for each crop are prepared by respective Crop WG/NCG and approved by SC
- Details on process of identifying MAAs etc. in later presentation

AQUAS – AEGIS quality system

Development of a quality management system, including technical and common operational standards, reporting, monitoring and certification

- Discussion paper endorsed by SC; on the AEGIS website (has been distributed)
- Agreed timeframe and process as well as responsibilities for its development
- Further “fine tuning” in EUROGENEBANK Project
- More details will be given tomorrow

EUROGENEBANK Project

- Topic on PGR Centres included in FP7 Work Programme 2010 Call on “Research Infrastructures” – Support to existing research infrastructures – Integrating Activities
- Up to 10 million Euro and 4 years project
- Bioversity (i.e. ECPGR Secretariat) was asked to coordinate project proposal preparation
- Submission deadline 3 December 2009

1. Decided to place EUROGENEBANK Project squarely within AEGIS framework
2. Build on strength and existing capacity

EUROGENEBANK Project

3. Include key elements (i.e. MOU, AQUAS, European Collection, etc) that agreed upon by ECPGR Steering Committee
4. Many of you will get/are involved, somehow!
5. Create Project as “independent” entity, but manage interface with wider ECPGR community well
6. Get outputs from Project to all genebanks
7. Note: This Project is intended to boost implementation process of AEGIS, it does not remove or replace responsibilities already assigned!
8. We are not sure that it will be funded! →

   Let us continue implementation process and if additional money gets available the process will be faster!

EUROGENEBANK: Agreed WPs

WP1: Project Management (Bioversity)

WP2: Communication and policy dissemination (Bioversity)

WP3: European e*x situ* conservation and use knowledge base (CRI)

WP4: Creating the European Collection (Graminor)

WP5: Designing C&E procedures and infrastructure (BLE)

WP6: Capacity building (Bioversity)

WP7: Upgrading PGR information management and interfaces (CGN)

EUROGENEBANK: Agreed WPs

WP8: Access to European PGR Catalogue (Bioversity)

WP9: Developing operational and technical standards (MTT)

WP10: Designing the quality management system (MTT)

WP11: Creating knowledge to support rationalization (INRA)

Suggested way forward

- To advocate importance of AEGIS at home
- To share the thinking of establishing an integrated European genebank system with colleagues/bosses
- Make sure that all relevant vegetable genebanks/collections in your country are aware / become Associate Members of AEGIS
- Discuss how to assist in implementation of AEGIS:
  - at national level (e.g. provision of data to EURISCO; availability to include accessions in the system) and
  - at WG level (refinement of criteria, quality guidelines, monitoring system, conservation workplans)
- Seek contact with relevant WP Leaders or Task managers of EUROGENEBANK Project

Thank you for your attention!