PGR Management

Activities and Challenges from a European Perspective

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PGR Management – activities & challenges

- genetic diversity needs to be conserved and made available
  - *ex situ* in genebanks
  - on-farm in 'traditional' farms or gardens
  - *in situ* in nature reserves

PGR Management – activities & challenges

- PGR management activities in Europe
  - *ex situ*
    - ca. 1.4 million accessions in 400 public holdings
      - *in principle* available under SMTA (MLS material) or NP
      - documentation centralised in EURISCO
    - quality of management varies
  - on-farm (landraces)
    - very many NGO's with various sizes and backgrounds
      - representing local farmers and hobby growers
    - generally poor management and restricted access
    - strong public awareness activities
  - *in situ* (crop wild relatives)
    - based on national legislation and nature protection
    - hardly accessible

PGR Management – activities & challenges

- European challenges

national / European issues

  - coordination
    - players need to collaborate to be more effective
  - reliability
    - conservation needs to be reliable

once lost = lost for ever

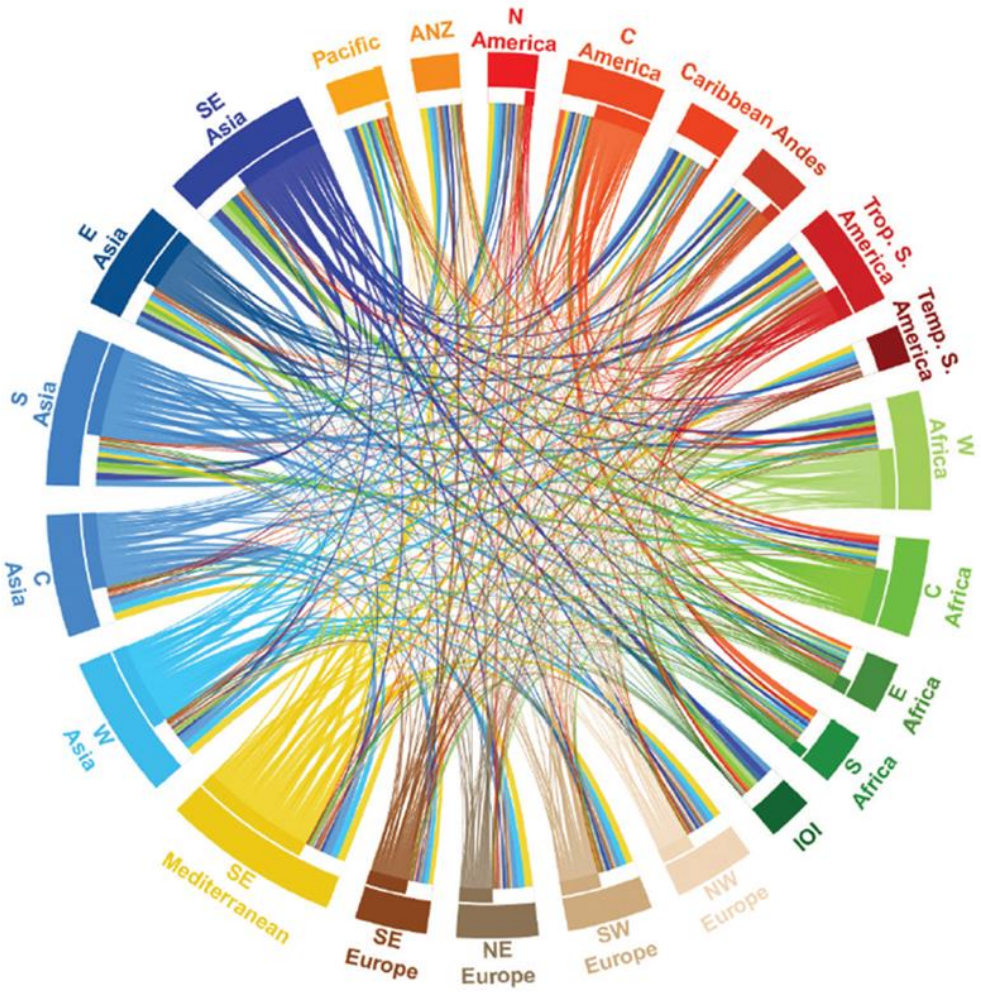
  - access

global issues

    - international policies complicate access
    - scientific and technological developments need to be used

PGR Management – activities & challenges

- PGR: very high global interdependence



Calories in regional food supplies and their origins

(Source: Khoury *et al.* 2015)

WAGENINGEN UR
For quality of life

PGR Management – activities & challenges

- options for collaboration EU - China
  - improve visibility of, and access to PGR
    - create 'windows' on each others PGR
      - mind the language
      - Genesys as potential platform
    - establish policy-environment that allows exchange
      - create trust by visits and collaborative projects
  - explore possibilities of genomics for genebanks (G4G)
    - characterise and analyse genebank collections
      - use of ~omics facilities
      - bioinformatics meets plant breeding and biosystematics
    - develop interfaces to support the use of PGR
      - based on use cases

Thank you for your attention !