

Ex situ in vivo gene banks in EUGENA

ERFP WG MEETINGS

19-20. MAY 2026

SASSARI, ITALY

Objectives

Extend the EUGENA network with ex situ in vivo gene banks

Promote their activities via the network

Facilitate collaboration with the in vitro gene banks to strengthen the conservation and sustainable use of AnGR in Europe.

Team

Ewa Sosin - Poland

Nina Svartedal – Norway

Sonsoles Zabala – Spain

Srdjan Stojanovic – Serbia

Tina Flisar – Slovenia

Edmondo Šuran – Croatia

Nuno Carolino – Portugal

Zhivko Duchevev - Bulgaria

Ex situ in vivo conservation

Conservation of a breed through maintenance of live animal populations not kept under normal management conditions (e.g. zoological parks and in some cases governmental farms) and/or outside of the area in which they evolved or are now normally found. There is often no clear boundary between in situ and ex situ in vivo conservation and care must be taken to describe the conservation objectives and the nature of the conservation in each case.

Current legislation

Ex situ in vivo is only mentioned in the legislation as a method of conservation

Few countries have a definition, e.g. Serbia:

The following methods may be used for the conservation of genetic reserves of domestic animals:

1. In situ – an active, dynamic approach involving the breeding of animals within traditional production systems where they originated or are currently raised;
2. Ex situ – an active approach involving conservation outside production systems where the breeds originated, and may include:
 - (1) In vivo – maintenance of animal populations under non-standard management conditions (e.g. zoos or research centers);

Current EUGENA definition

Genebank: A genebank for AnGR is a repository for ex situ conservation and sustainable use of AnGR held by a host institution authorized and/or recognized by a national authority to fulfil these tasks. A genebank may be constituted by one or more repositories (in vitro or in vivo) collaborating as a network.

What makes a facility an ex situ in vitro genebank

Key elements

1. Primary aim – Conservation
2. Long term commitment
3. Biosecurity
4. Official recognition

Not so important

1. Location
2. Ownership (better if Public)
3. Number of breeds
4. Number of animals

Proposal

Keep the current definition in EUGENA

Prepare a guidelines about recognition of ex situ in vivo genebank for EUGENA member