

# HAMSTER – Collective AECM to restore habitats of the European Hamster in Alsace (France)

The collective AECM Hamster\_01 is implemented since the 2014-2020 CAP programming period. The association AFSAL (Farmers and Wild Animals in Alsace) is coordinating the cropping systems of about 140 farmers located in three different static protected areas (a total of approximately 8000 hectares), to favour the development of populations of the protected rodent specie *Cricetus cricetus* (European hamster). The association is under a 5-years contract and benefits from a financial envelope from the CAP that is allocated among the farmers engaged in the measure based on their effort. An additional individual result-based payment (bonus) was introduced in 2018.



## Summary

The collective AECM Hamster\_01 was introduced in 2014 in the territorial Agri-Environment-Climatic Plan (PAEC) “Great Hamster of Alsace” (“Grand Hamster d’Alsace”) to protect the European Hamster in Alsace. Hence, the contract solution aims at encouraging the provision of a public good (remarkable biodiversity) for which the supply is limited to a specific geographical area. Since its implementation, ten territories spread among 3 eligible static protected zones contracted the measure. It represents about 140 farmers and 3000 ha. In addition to farmers, this scheme also involves various key stakeholders: the association AFSAL acting as an intermediary and regulator and in charge of allocating the public financial support among farmers; the Chamber of Agriculture of Alsace; the French Agency for Biodiversity (OFB); the Departmental Directorates of Territories (DDT) of the Bas Rhin and Haut Rhin Departments. The collective payment is conditioned to the implementation of crops and agricultural practices in favour of the survival of the European hamster on at least the targeted percent of the agricultural land of the territory. The individual “burrow premium” is conditioned to the identification of at least one hamster burrow on the agricultural plot.

### Objectives

1. Protect the habitats and populations of European hamster
2. Maintain the good functioning of the entire ecosystem associated with the specie



### Problem description

*Cricetus cricetus* is an umbrella indicator specie contributing to agricultural soil quality. In France, its presence is limited to a few municipalities in Alsace. Threatened by the development of maize cultivation and its reputation as an agricultural pest, it is classified in the list of endangered species and protected by the Habitats Directive since the early 1990s. Operations aiming at maintaining European Hamster populations were carried out since the late 1990s but failed to meet the objectives. Following a complaint submitted in 2006, the Court of Justice of the European Union convicted France in 2011 for its lack of effective protection. 2 individual agri-environmental measures supporting the implementation of crops and agricultural practices in favour of the European hamster were introduced during the 2007-2013 CAP programming period. However, the lack of spatial coordination of the operations limited their impact. Therefore, the National Hunting and Wildlife Bureau (today part of the French Agency for Biodiversity) and the Chamber of Agriculture of Alsace took the initiative of proposing a collective agri-environment-climate measure (AECM) in the territorial project of the 2014-2020 CAP programming period, in addition to 4 individual AECM. In order to encourage more farmers to get involved in this approach, an individual bonus designed as a “burrow premium” was introduced in 2018 to reward the land managers of the plots on which at least one European hamster burrow was identified.

### COLLECTIVE



Departmental Directorates of Territories → financial support transferred to an intermediary (AFSAL) → allocation to the farmers targeting a common objective (collective management)

### RESULT-BASED



Since 2018, measures Hamster\_01' : Identification of at least one European Hamster burrow on an eligible plot → bonus to the farmer.

*The eligibility to the result-based payment is conditioned to participation in the collective measure.*

### PUBLIC GOODS



Farmland biodiversity



Cultural heritage

## CONTRACT

Public-private :  
government – farmers  
association (AFSAL)



**Contract conclusion:**  
Written agreement



**Payment mechanism:**  
incentive payments

**Length of contract in  
scheme:**  
5 years

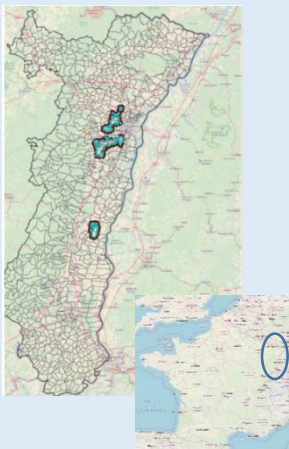


**Start of the program:**  
2013  
**End:** still running

*Note: Farmers can enter  
a new AECM contract as  
long as a collective  
measure targeting the  
European hamster is  
proposed under the  
framework of the CAP*

## LOCATION

### FRANCE



Protection areas concerned  
with the agricultural measures  
to restore habitats for the  
European Hamster

Source : Alsace Chamber of  
Agriculture, Bas-Rhin DDT,  
AFSAL, 2020

## Data and Facts - Contract

**Participation:** In 2019, 137 farmers participated in the program, 112 in 2018, 123 between 2013 and 2015. The area of implementation is located in the region Alsace, France. 9 territories signed a 5-years contract between 2013 and 2015. 10 territories were under contract in 2018. The surface areas engaged range between 60 and 520 ha, representing a total of 2560 ha in 2015 and 2700 ha in 2019.

**Involved parties:** Since 2013, the farmers willing to participate in the collective AECM must join the AFSAL association. Farmers sign a contract with the association in which they commit to implement the requirement specifications and participate in the group meetings planning the cropping systems of the territory. In particular, each farmer commits to dedicate each year a share of their agricultural land to hamster-friendly crops so that the territory reaches its targeted objective. The AFSAL represents the farmers of a territory, applies for the financial aid and commits that the requirement specifications of the AECM will be fulfilled at the territorial level. The Departmental Directorates of Territories (DDT) monitors compliance and transfers the money to the association.

### **The benefits for the farmers/ for the association:**

The collective contract solution presents several advantages for farmers :

- They receive a financial compensation for implementing new agricultural practices.
- The economic incentive is even greater since the introduction of the burrow premium.
- The risk is shared within the group of farmers.

For the AFSAL association, acting as an intermediary, it offers the opportunities of attracting more farmers (transaction costs are transferred from the farmers to the association), communicating and supporting in a more efficient way, and increasing environmental results through more spatially coordinated operations. Moreover, their good knowledge of the local context allows for a better targeting of actions and payments (proportional to individual efforts), and thus increases the efficiency of the scheme.

**The benefits for the Departmental Directorates of Territories (DDT):** This type of AECM is beneficial because it diminishes the transaction costs of the public authorities (instead of interacting with 140 farmers, the institution only deals with one intermediary).

### **Management requirements for farmers for the collective payment:**

- At least 26% of the total utilised agricultural area (UAA) of the collective zone declared must be dedicated to crops favourable to the European Hamster (winter cereals, alfalfa)
- A cover crop comprising a mix favourable to the European Hamster (sunflower, at least one legume and one grass or polygonacea) is implemented after a winter cereal harvest before the 1st of August on at least 50% of the total area dedicated to winter cereals.
- The harvest of plots of alfalfa larger than 0,5ha rotates from July 1st to October 15th on at least 50% of each plot, such that there is a continuous cover of 30 cm high.
- The UAA under alfalfa must not exceed 30% of the area dedicated to winter cereals. The collective organisation ensures that the repartition of the crops favourable to the European Hamster is made so that there is surface ratio of approximately 1 alfalfa for 5 winter cereals.
- The plots cannot be dedicated to alfalfa for more than 4 successive years.
- Cereal strips and unharvested alfalfa surfaces are in close proximity of 50% of the production blocks containing identified European Hamster burrows.

**Management requirements for farmers for the individual bonus:** The plot contains at least 1 European hamster burrow assessed during the yearly counting campaign.

**Controls/monitoring:** The DDT monitors the surfaces under hamster-friendly crops using the farmers yearly statements necessary to receive CAP aids, and communicates those elements to the Chamber of Agriculture of Alsace and the AFSAL.

In addition, there are periodic field inspections (random checks) in accordance with the usual monitoring operations of the CAP. Farmers are monitored individually based on their annual management plan that is transferred to the DDT. The administration can then check the repartition of the actions within a group of farmers. Before allocating the "burrow bonus" payments, the DDT undertakes an administrative control followed by a field check.





**Conditions of participation:** The AECM is implemented in priority in the territory of the Agri-Environmental Plan « Great Hamster in Alsace » (the 3 static protected zones and their associated support zones). The integration of plots of the support zones is possible if they are continuous to others already under the measure, and if most of the plots of the territory under contract is in a static protected zone. Moreover, it is required that local representatives agree for the undertaking of release operations of hamster individuals if necessary. Regarding territories where the European hamster is absent, the measure can still be implemented if release operations are organised and accepted by local representatives. Moreover, once a farmer subscribes to the collective AECM, he can no longer contract other compensatory measures specific to the European hamster protection (cumulating public measures or public and private measures is impossible).

**Funding/Payments:** The financial envelope comes from the national funds (top-up) of the French Ministry of Agriculture and Food (MAA) with 35% of co-funding from the EU. The 5-years budget depends on the percentage of favourable crops targeted by each group of farmers. The minimum corresponds to 452€/ha/year for the territory for a target of 26%, and the maximum to 520 €/ha/year for a target of 40%. Moreover, farmers are compensated for participating in planning and information meetings (132€/year/farmer). The burrow bonus corresponds to 255,67€/plot with at least one burrow. The AECM animation is funded by the National Action Plan.

**Risk/uncertainties of participants:** The main uncertainty for farmers is the variation of opportunity costs (in particular the price volatility of maize, winter cereals and alfalfa). There are also uncertainties regarding compliance of the management requirements by all farmers and the environmental impacts of the operations (in particular whether or not farmers will be eligible for a burrow bonus).

**Links to other contractual relationships:** It is not possible to enter the collective AECM while being still under another (private or public) contract targeting the European hamster protection.



## Context features

**Landscape and climate:** The Alsace region is dominated by urban areas that were particularly expanded in the 90s. While the agricultural sector contributes relatively little to the economy, it is known for presenting a high performance. Alsace is particularly famous for its wine industry and is also a significant producer of cereals (10% of French cereals). The region benefits from strategic geographical assets favouring exportations: the Rhine river and its central location relative to the European market. The territories eligible to the collective AECM Hamster\_01 are located in the Alsace plain, characterized by homogeneous landscapes with large open fields and a relatively flat topography. The largest European water table feeds numerous rivers and streams that contribute to maintain a few humid and wooded areas. An important development of road infrastructures fragmented landscapes and had negative impacts on biodiversity and the survival of some naturally occurring species. The climate is semi-continental, characterized by cold and dry winters, and hot and sunny summers. The average temperature is 11°C. The Vosges mountains generate a Foehn wind from west to east resulting in low precipitation levels. The Alsace region presents a high diversity of soil types.

**Farm structure:** The average farm size of the territories of the case study is around 48ha. The plots are relatively small and fragmented in the northern and central areas (1.25 ha on average). In the southern area, the average plot size is larger (2.7 ha). Most farms grow field crops and their cropping systems are dominated by maize (it corresponded to 60 to 65% of the territory UAA in 2013). There are also some mixed crops and livestock farms. The agronomic quality of soils is considered good. Agricultural practices have significantly evolved in the last 40 years with negative consequences for the European hamster survival. A special feature of this territory is that farms commonly exchange plots on a yearly basis, what limits incentives for contracting individual AEM during 5-years.

## SUCCESS OR FAILURE?



The contract solution can be considered as successful as the number of European hamster individuals kept increasing since 2014 and farmers maintain their participation. There were 123 farmers involved in the program between 2013-2015, 112 farmers in 2018 and 137 farmers in 2019. The surface of the three areas engaged range between 60 and 520 ha, representing a total of 2560 ha in 2015 and 2700 ha in 2019.

### Reasons for success:

- Economic incentives high enough
- Significant involvement of local actors and institutions
- Spatial coherence of the operations

### SWOT analysis

