

Reverse auction pilot for forest ecosystem services in rural and peri-urban areas (habitat restoration)

This case study developed a reverse auction instrument for habitat protection measures to stimulate the generation of much needed forest ecosystem services in a densely populated region, Flanders.



Location: Flanders, Belgium

Type of business model:
Discriminatory price auction

Ecosystem services targeted:
Habitat restoration in forested hunting areas

Providers: Forest owners (habitat restoration)

Users: Hunters (Hubertus Vereniging Vlaanderen), public administration Flemish Agency for Nature and Forest (ANB)

Stakeholders consulted:
ANB, farmers (Boerenbond), hunters, private forest owners (Aanspreekpunt Privaat Beheer – Natuur en Bos), research partners

Context

Forests in Flanders are scattered and mostly small, and generally low on biodiversity supporting structures. Habitat restoration targets improvements to increase biodiversity protection and biodiversity potential in the forests. Restoration is particularly focussed on improving habitat conditions for species that can be hunted, leading to potentially bigger population of specific game species, and functioning as an umbrella (improving habitats for other, rarer endangered species).

Regulations and practices already exist, notably subsidies for environmentally-friendly practices in forestry. Recent legislation introduced an option to develop and implement land use management plans covering several types of land cover and multiple objectives targeting several ES. Management plans are developed between private owner and government agencies, and the regulatory setup includes a specifically adapted subsidy scheme. Forest owners are not obliged to have site-specific management plans, except for nature reserves and public-owned sites managed for nature conservation. The link between management planning and access to subsidies is important for this case study design.

Through the land use management plans and subsidy scheme, both forest owners and regulating agencies are familiar with regulation for ES in Belgium, and the presence of existing subsidies shows demand for ES is backed by some level of finance. It was possible to access a new source of funding to develop this innovative mechanism (IM) via the *Jachtfonds* established coincidentally with the start of SINCERE. This can be a long-term source of funding to meet societal demands for FES, if backed by the governing board of the fund.

Objective

- Test **reverse auctions** as a way to fund and stimulate the generation of much-needed FES (habitat restoration in forested hunted areas) and as alternative to subsidy schemes in a densely populated and urbanised region.
- Test if approach leads to more **cost-efficient use of limited financial resources** and supports initiatives considered important to relevant stakeholders and society as a whole.
- Implement reverse auction as part of two pilot projects targeting hunting areas. The innovative mechanism (IM) is a discriminatory **price auction for the restoration and improvement of forest habitats**, particularly game species.

→ Implementation

Targeting all of Flanders, reverse auction was implemented as a discriminative price auction, where landowners were asked to describe the actions and improvements proposed for a pre-set amount (choice between 5,000€, 10,000€ or 15,000€). A positive incentive was created and additional enabling information was provided.

↗ Outputs

- Enough bids were received to make final contracts (15) with landowners/managers for improvements in habitat quality. These bids did not require too much coordination and transaction costs were quite low.
- The instrument was similar to an auction-based version of existing flat rate schemes.



Outcomes

15 contracts were signed to make land management changes. While there is no counterfactual information available to provide evidence of future additionality, restrictions imposed by the contracts suggest that additional gains and habitat quality to the benefit of biodiversity will result from the action.



Impact

- The regulatory framework for implementation and the use of biological knowledge in designing the auction suggest that a net positive and additional impact will be achieved for habitat quality. As in the Danish reverse auction case, there is little reason to suspect on-property leakage.

↖ Upscaling potential

National geographical upscaling:

Focussing on a relatively large target area (Flanders as such) was successful. Restrictions in available funding and a low number of bids potentially limited the experiment. Potential for upscaling in Belgium depends on availability of financing. An assessment of cost-effectiveness relative to existing subsidies could be useful.

Upscaling to other schemes:

There are existing schemes in place, some of which are quite closely linked to the IM, so habitat reverse auction could potentially be upscaled to other schemes. If the ES are sufficiently homogenous, a first rejected price, as applied here, may be suitable. If heterogeneity is needed, a discriminatory pricing version may be better.

Upscaling in scope:

Coordination among participating actors prior to bidding is quite straightforward as interaction is between the auction holder (eg. government agency) and the landowner (bidder). This is a simple design which may be upscaled to other related ES schemes in Belgium and elsewhere. However, specific cases may imply a need to consider variants of the instrument.

Upscaling to other countries:

In many EU countries, regulatory frameworks allow landowners to be paid via conditional environmental protection subsidies, e.g. CAP. National regulations permitting, the basis for upscaling should be in place. Variations in ecological contexts, forest ownership and forest regulatory frameworks across countries may limit relevant FES supply, and if regulations already require high levels of biodiversity protection on public and/or private land, options for additional gains are reduced. The greatest potential for upscaling may be in countries where two conditions are fulfilled: i) current regulations allow forest owners to decide on management, and ii) private forest owners own a non-trivial part of biologically valuable forestland.

Further information

Case study coordinator: Alexander Therry, alexander.therry@vlaanderen.be

[Case study webpage](#)

Synthesis report: [D4.2 Synthesis report of the experiences and lessons learnt, situating them in the global experiences and knowledge](#)

Upscaling report: [D4.1 Assessing the upscaling potential of SINCERE IAs using a Theory of Change structure](#)

Explore more findings from SINCERE case studies: www.sincereforests.eu/resources/factsheets/



About SINCERE

Spurring INnovations for forest eCosystem sERVICES in Europe (SINCERE) is a four-year project to develop novel policies and new business models by connecting knowledge and expertise from practice, science and policy, across Europe and beyond.

This project has received funding from the European Union's H2020 research and innovation programme under grant agreement No 773702



icons by [Icons8](#)