

# Unraveling the Potential of Spontaneous Forest Establishment for Improving Ecosystem Functions and Services in Dynamic Landscapes (SPONFOREST)

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BiodivERsA COFUND Call (2015-2016)

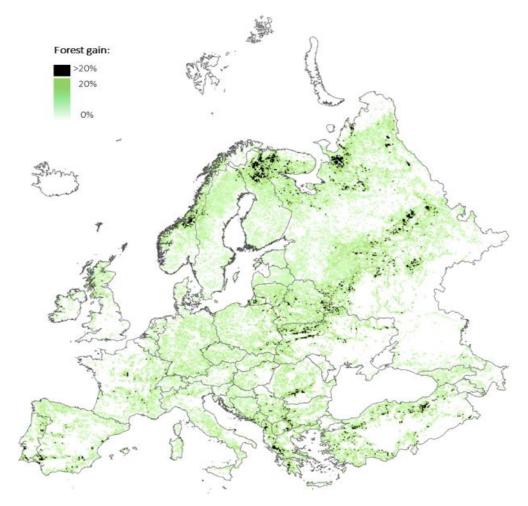


Europe is the only region of the world with a positive net change in forest area during the last 25 years.

In this period **forest area in Europe has increased by 17.5 million hectares** 

(almost half of the area of Italy).



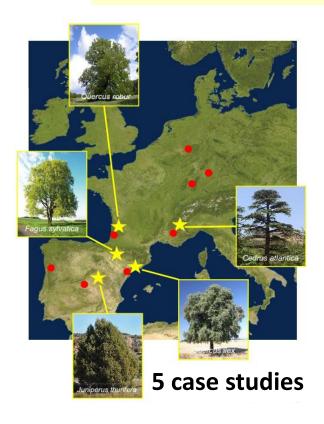


Palmero-Iniesta et al. (unpubl.)





**SFE**: cost-efficient and politically feasible tool for reinforcing forest networks in fragmented rural landscapes

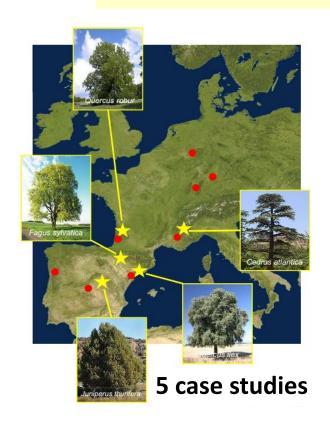








**SFE**: cost-efficient and politically feasible tool for reinforcing forest networks in fragmented rural landscapes



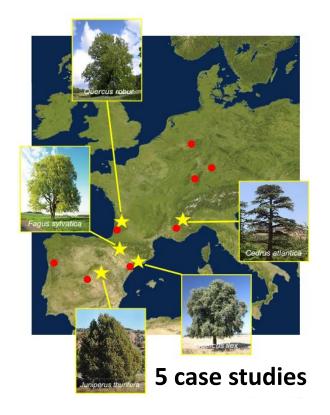
- 1) How do new forest patches establish?
- 2) Which consequences has the establishment process for their character and functioning?
- 3) Which ecosystem services do they provide?
- 4) How are they perceived and managed by local societies and political governance systems?

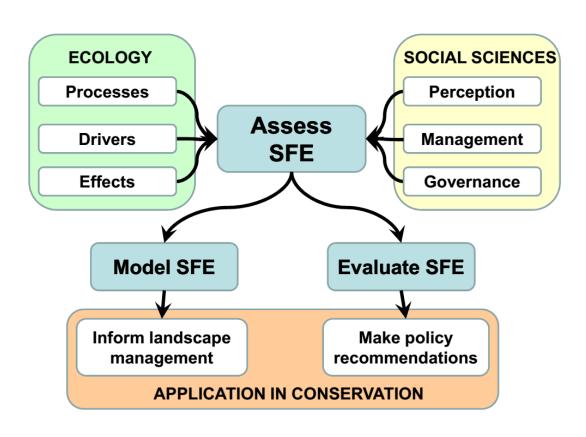






**SFE**: cost-efficient and politically feasible tool for reinforcing forest networks in fragmented rural landscapes







#### **CONSORTIUM**





Partner 1: BIOGECO (INRA)

Funding: ANR

Partner 2: URFM (INRA)

Funding: ANR

Partner 3: CRFAF

Funding: MINECO

Partner 4: MNCN (CSIC)

Funding: MINECO

Partner 5: CIBIO (ICETA)



Funding: FCT

Partner 6: Univ. Hohenheim



Funding: DFG

Sub-contracted partners

Partner 6a: European Forest Institute

Partner 6b: Unique Forestry & Landuse

Funding: DFG

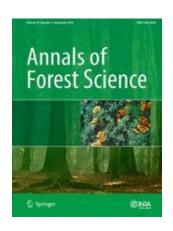
Funding: DFG



### **SCIENTIFIC OUTPUTS**



- New forests show a distinct functioning (e.g. legacy effects).
- > Their perception greatly depends on the socio-economic context.
- They are generally not considered as a landscape element of its own and underlie a disparate management and governance.



"Establishment of second-growth forests in human landscapes: ecological mechanisms and genetic consequences"

"Managing forest regeneration and expansion at a time of unprecedented global change"





# SOCIETAL / POLICY OUTPUTS





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- > Their perception greatly depends on the socio-economic context.
- They are generally not considered as a landscape element of its own and underlie a disparate management and governance.

## GENETIC RESOURCES THE KEY TO ADAPTATION OF FORESTS TO GLOBAL CHANGE



BiodivERsA Policy brief



Joint policy workshop "Genetic resources: the key to forest adaptation to global change" (Brussels, 2019)





## **ACKNOWLEDGEMENTS**

















