## Bringing together resource manager and academic expertise to survey the rare and elusive Pyrenean desman.

Frank D'amico\* $^1$  and Frédéric Blanc

<sup>1</sup>Laboratoire de Mathématiques et de leurs Applications de Pau (LMAP) – Université de Pau et des Pays de l'Adour – UMR CNRS 5142, France

## Abstract

Designing an appropriate and efficient ecological conservation monitoring program requires a well-developed partnership between people with different but complementary skills. When funds have been secured, resource managers and academics may engage in the labyrinth of constructing the program itself. Here we report on the collaborative approach we developed to build step by step the large scale spatially balanced Generalized Random Tessellation Stratified design used to tackle two main objectives of the National Action Plan for the Pyrenean Desman (Galemys pyrenaicus): i/ defining survey designs (Action no 2 of the Plan) and ii/ updating distribution map of the species in France (Action no 7). We further comment the mutual benefits gained from this effective collaboration between resource managers and scientists.

**Keywords:** GRTS, sampling design, large scale survey, conservation

<sup>\*</sup>Speaker