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## Book of Abstracts



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**Agroforestry management to maximize ecosystem services provided by soils**

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Agroforestry systems have shown promising advantages in providing a number of key ecosystem services and many of them are directly linked with the soil compartment, such as fertility maintenance, carbon sequestration, erosion and landslide mitigation, fungi/bacteria-borne pest control, preservation of soil habitats etc. Today, managing a multifunctional agroforestry system has been a key quest for both researchers and practitioners. This is a challenging issue as it covers multiple disciplines stretching from biophysical to socio-economical domains. For this goal, this work will present a framework encompassing and highlighting some key issues on the multifunctionality of agroforestry systems, at both temperate and tropical conditions, with a focus on ecosystem services involving belowground functions.

Bibliographical metrics based evidences will be presented showing the state-of-the-art and knowledge gaps in R & D on multifunctionality of worldwide agroforestry. Roadmap and emerging methodologies for optimisation of our management for promoting such multifunctionality are proposed and discussed.

**Keywords:** Agroforestry, ecosystem services, multifunctionality, optimisation.