



BOOK OF ABSTRACTS

First Legume Society Conference
2013: A Legume Odyssey

9-11 May 2013, Novi Sad, Serbia

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Book of Abstracts

Editors:
Aleksandar Mikić
Diego Rubiales
Vuk Đorđević

International Legume Society
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Getting the message out: grow, use, feed and eat legumes

Some aspects of *amaizing* annual legumes

Sanja Mikić¹, Aleksandra Nastasić¹, Aleksandar Mikić¹, Mira Milisavljević²

¹*Institute of Field and Vegetable Crops, Novi Sad, Serbia*

²*University of Belgrade, Institute of Molecular Genetics and Genetic Engineering, Belgrade, Serbia*

Intercropping maize (*Zea mays* L.) with annual legumes is distributed throughout the world, mostly in subtropic and tropic regions of Africa, Asia and South America, including warm season legumes cowpea (*Vigna unguiculata* (L.) Walp.), pigeonpea (*Cajanus cajan* (L.) Huth), common bean (*Phaseolus vulgaris* L.) and soybean (*Glycine max* (L.) Merr.). Numerous studies of maize/legumes intercropping underline its role in soil erosion control, weed and pests management, water use efficiency, light distribution and use, nutrient availability and uptake, and more efficient use of land (LER>1). Exudates from maize stimulate nodulation biomass production of legumes, whereas maize uptake N stimulates nitrogen fixation in conditions of competition for N. In temperate regions, cool season legumes can be intercropped with maize, where different sowing dates and growth dynamic allow different temporal and spatial use of environmental resources. Such intercrops are grown on smaller areas in developing countries, while in China it is practiced on larger scale, especially with pea (*Pisum sativum* L.). In Serbia and other Balkan countries, intercropping maize with annual legumes is present in many regions, especially on small fields and in gardens. It is mostly common bean, faba bean (*Vicia faba* L.) and chickpea (*Cicer arietinum* L.) that are sown between the rows of maize. Local farmers consider this practice beneficial for both components, with maize providing a kind of shelter or support for a legume and a legume filling the space between the maize rows and fighting weeds. Both components are harvested by hand, making the issue of concurring the times of sowing and harvesting irrelevant. Intercropping maize and legumes diversifies agriculture production, increases yield stability and productivity and reduces the risks of pest and disease outbreaks.

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In the rich world of global agriculture, diverse legumes can play key roles to develop environment-friendly production, supplying humans and animals with the products of high nutritional value.

The Legume Society was initiated in 2011 with two primary missions. One of them was to treasure the rich legume research tradition of the European Association for Grain Legume Research (AEP), with emphasis on carrying out its the triennial legume-devoted conferences. Another one is to fulfill a long-term strategy of linking together the research on all legumes worldwide, from grain and forage legumes pharmaceutical and ornamental ones and from the Old World to the Americas.

We do anticipate that the First Legume Society Conference will be a unique and genuine contribution to our common goals: to promote the legume research and all its benefits into all spheres of the society, linking science with stakeholders and decision-makers, and to demonstrate how an efficient, useful and firm network of the legume researchers of the world is possible and sustainable.

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