

Seed disinfection and rice nursery technology of organic rice

Jeb-Fang Chen*¹, Ching-Tien Shih¹, Hsuan-Ying Yu², Cheng-Zu Pan³,
Ta-Chi Yang⁴, Dah-Pyng Shung⁵, Peng Huang⁶

Associate Researcher, Section of Crop Environment, Hualien DARES., COA.,
Executive Yuan¹

Deputy Technician, Hualien Farm, Veterans Affairs Commission.²

Assistant Researcher, Section of Crop Improvement, Hualien DARES., COA.,
Executive Yuan³

Associate Researcher, Chief of Crop Environment Section, Hualien DARES.,
COA., Executive Yuan⁴

Associate Researcher, Chief of Crop Improvement Section, Hualien DARES.,
COA., Executive Yuan⁵

Director, Hualien DARES., COA., Executive Yuan⁶

*Corresponding author, E-mail: fang@mail.hdais.gov.tw

Abstract

Healthy seedling is a very important concept for reducing crop infestation by pests and diseases. To develop high-quality robust seedlings should take the seeds and soil disinfection because of the rice seedling disease is spread primarily by seed and soil. Therefore, rice seed and nursery soil would be comprehensive treated with hot water, non-pesticide materials and adding organic materials to prevent the rice seedling diseases to solve the organic cultivation of rice seedlings. HDARES successfully developed rice seed continuous hot water disinfection machine and organic rice cultivation nursery technology, nursery processing with

organic non-pesticide materials instead of chemicals for nursery soil and sowing. To comprehensive establish a set of rice organic cultivation nursery mode, can effectively prevent seedling diseases, it was transmit with the rice seeds, soil and rice husk. The farmers planted the quality healthy organic rice seedling, to reduce the use of pesticides and environmental pollution during the nursery period, and establish the consistent organic cultivation from the nursery to the field cultivation and harvesting.

Key words : organic rice, rice seed sterilization, nursery