

Abstract

The current demand for rice globally is higher than production. In Kenya the deficit of rice is met through importation. Regardless of the high demand the production of rice in Kenya is very low despite the introduction of NERICA which is a high yielding rain fed rice species. This study sought to identify the spatial distribution of NERICA adopters in Imenti North Sub County and determining the factors influencing adoption and intensity of adoption in the study area. Questionnaires were administered to 355 randomly sampled farmers. A GPS was used to take coordinates of the sampled farmers. Data was analysed using nearest neighbor index (NNI) and double hurdle model (probit and truncated regression). The revealed showed NERICA adopters were randomly distributed in the study area. Age, size of the household head, level of education, membership to agricultural organization, access to extension services, access to credit, agricultural training, access to seeds from the local markets, off-farm income, land size ownership, distance to rice miller and crop farm size were found to have a statistical significance influence on adoption of NERICA in the study area. While household size, membership to agricultural organization, access to extension services, access to credit, agricultural training, land size and farm size influenced the intensity of adoption of NERICA. Adoption and intensity of adoption of NERICA can be encouraged by sensitizing the farmers to join agricultural related organization and encouraging farmers to seek for extension services. Provision of, credits and agricultural training to farmers may encourage them to adopt farming of NERICA. Installing of rice millers in the study area may be a key factors in encourage more farmers to adopt and increase the intensity of adoption of NERICA in Imenti North Sub County.