

慢性腎臓病患者の食事療法用低たんぱく米導入のための普及・実証事業 株式会社バイオテックジャパン(新潟県)

フィリピン国の開発ニーズ

- 慢性腎臓病患者の増加による、国の医療費負担の低減。
- 急増が予想される腎臓病患者への食生活のケア。

普及・実証事業の内容

- フィリピン稲作研究所へ低たんぱく加工米製造装置を設置、製造技術の移転を行いフィリピン米を原料とする低たんぱく米を製造。
- 現地病院患者へ低たんぱく米提供を行い、現地の嗜好に合わせた製品を開発。
- 食事療法ハンドブック、低たんぱく食レシピブックの作成、現地ワークショップの開催等をとおして、普及展開案を検討。

提案企業の技術・製品

相手国実施機関:フィリピン稲作研究所
事業期間:2016年1月~2018年2月



植物性乳酸菌による
米の低たんぱく化技術

ー 植物性乳酸菌を使用し原料米のたんぱく質含有量を低減することが可能。

ー 3000株以上の乳酸菌株を保有し、日本米のみでなく、インディカ米(長粒米)、玄米、小麦などの多様な穀物での乳酸菌処理技術を持つ。

フィリピン国側に見込まれる成果

- 低たんぱく米製造技術を活用した国産米の高付加価値化。
- 低たんぱく米を導入した適切な食事療法の普及により、腎臓病進行が抑制。

日本企業側の成果

現状

- インディカ米(長粒米)を原料とする低たんぱく米製造技術を確立。
- 現地法人を設立し、現地での低たんぱく米の製造・販売事業を展開中。

今後

- 病院へのプロモーション活動を継続するとともに、医師・栄養士への普及を図る。

Verification Survey with the Private Sector for Disseminating Japanese Technologies for Low Protein Rice for Dietary Therapy of Chronic Kidney Disease in Philippines

Biotech Japan Corporation, Niigata, Japan

Concerned Development Issues in the Philippines

- Suppressing health care cost which is predicted to increase due to the increasing number of chronic kidney disease (CKD) patients in the Philippines
- Supporting the dietary habits of patients with CKD which is rapidly increasing

Implemented Activities in the Survey

- Produce low protein rice with Philippine rice by providing necessary equipment and transferring manufacturing know-hows to Philippine Rice Research Institute
- Develop low protein rice which suits Philippine peoples' taste by providing them to CKD patients in the Philippines
- Develop future business plan, by revising diet therapy guide books and recipe books and holding dissemination seminar

Proposed Products/Technologies



Low protein rice processing technology utilizing plant origin lactic acid bacteria

- Enabling protein content reduction of rice using plant lactobacillus
- Possessing over 3000 strains of plant origin lactic acid bacteria, the lactic acid bacteria fermentation technology can be applied to many kind of grains like Indica varieties (long grain rice), brown rice and wheat as well as Japonica varieties

Survey Overview

Name of Counterpart: Philippine Rice Research Institute
Survey duration: 1/2016 ~ 2/2018
Survey Area: Muñoz, Manila

Impact on the Concerned Development Issues in the Philippines

- Increase additional values to Philippine rice, utilizing the technology for manufacturing low protein rice
- Suppresses increase of the number of CKD patients by disseminating of the proper low protein rice diet therapy among the patients

Outcomes for Biotech Japan Corporation

Current progress

- Establish the technology which manufactures low protein rice fitting local taste from Indica variety (long grain rice)
- Start manufacturing and sales business of the low protein rice by establishing the local subsidiary in the Philippines

Future prospects

- Attempt dissemination of low protein rice among doctors, dieticians and nutritionists, as well as to continue promotion activities to hospitals