

Report

Project to develop an efficient, safe, standardized pig production system and management, and process products to create added value from pork for a stable career

Development of sow management and efficient of productivity on farm safety and standard to create career security project is an integrated project that comprises teaching, researching and academic services in the term of social engagement. The farm members at Walailak demonstration community are targeted. The team is collaborations between Dr. Krittika Kabploy, project leader, School of Agricultural and Food technology and the center for academic services Walailak University, Department of Livestock Development and Department of Agricultural Extension shared knowledge to farmer. In this year, Swine Farming Community Enterprise joined the exchange knowledge and discuss in importance topics for improved the operation of the group and promoted farm into swine farming standard.

On September 2023 – August 2024, this project focused on increasing income of Swine Farming Community Enterprise. We are produced chilled boar semen such as landrace breed, large-white breed and duroc breed both of purebred and crossbred. In addition, the group and the researcher have planned training. Boar semen quality evaluation, artificial insemination (AI) technique and swine reproductive system disease due to the evaluation of boar semen for measures of fertility is an important component to success with artificial insemination. While measures of semen fertility are not highly related to fertility outcomes such as farrowing rate and litter size, use of poor quality semen with poor motility and increased abnormalities is associated with reduced fertility. As a result, the essentials for semen quality includes the basics for overall assessment of the ejaculate and the more specific measures for sperm cell concentration, motility, and percentage of normal sperm cells. It is these measures that are used to determine the number of fertile sperm cells that go into a dose of semen. Most ejaculates are expected to

fall into the normal ranges for mature, healthy boars that are greater than 6 months of age (mature at 10 month of age) and are collected 1 to 2 times a week with at least 3 days of rest between collections. Good quality of boar sperm is white or light-yellow color, total volume of ejaculate is 200-400 mL., normal sperm more than 85% and motile sperm more than 80% The concentration is an essential measure of total sperm cells in the ejaculate. This measure is important for determining the number of doses and how many sperm (motile and normal) will be in each dose. It's measure by using hemacytometer and computer assisted semen analysis (CASA).

Furthermore, the members of community enterprise participated in a training session making fermented pork and fried shredded pork. It helps the group to earn more income than just selling piglets and also adds value to pork products.

The project of “Development of sow management and efficient of productivity on farm safety and standard to create career security” was helping to achieve the Sustainable Development Goals (SDGs) in the areas of

- **No Poverty:** This project was conduct to improved sow performance that was importance to keep the cost of producing piglets to a minimum to enable to maximize profitability at sale.
- **Zero Hunger:** Pork and pork products represent an importance part of the diet in the world. Good farm management is one of more practice to produce the quality of pork and pork products for consumer.
- **PARTNERSHIPS FOR THE GOALS:** This project focus on the collaboration between farm, the discussion and exchange data to enhance performance of Swine Farming Enterprise Group to create career security. Furthermore, the member of Swine Farming Enterprise Group