

SDG9

Industry, Innovation and Infrastructure

- University-Affiliated Companies
- Research Income Received from Industry and Commerce





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INDUSTRY, INNOVATION AND INFRASTRUCTURE

University-Affiliated Companies

Nakhon Si Thammarat Rajabhat University (NSTRU) is committed to advancing research that yields innovations and technologies aimed at solving problems and strengthening the capacity of local communities in concrete ways.

The university advances the sustainable development goals (SDGs) related to infrastructure, innovation, and industry. It also supports protection of intellectual property (IP) streaming from research outputs, demonstrating its capacity to transfer innovation for commercial and social use.





Notable Intellectual Property Achievements of Key Local Industry Groups:

- 1. Agricultural Machinery to Enhance "Khao Khai Mod Rin" (a Local Agricultural Identity Product of Hua Sai District):
 - Supported through 2020 funding from the Ministry of Higher Education, Science, Research, and Innovation (MHESI) the university developed specialized agricultural machinery for "Khao Khai Mod Rin" rice.
- Protected is secured under three petty patents, as follows:
 - Integrated Rice Milling Machine (Patent No. 24000)
 - Brown–White Rice Milling Machine (Patent No. 24001)
 - Rotary Mixing Paddy Grain Dryer (Patent No. 20521)
- Such innovations provide technological infrastructure that improves production efficiency, reduces losses, and preserves the quality of "Khao Khai Mod Rin" rice, in turn promoting the growth of the local agricultural industry.



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Notable Intellectual Property Achievements of Key Local Industry Groups:

2. Innovation for the Preservation and Development of "Yan Lipao" Handicrafts:

 Supported through research funding from the Program Management Unit for Area-Based Development (PMU-A) in 2021,

The university sought to resolve production challenges and improve the quality of Yan Lipao basketry products.

- Machinery Innovation (Solving Production Problems):
 - At present, three invention patents are pending, namely:
 - Yan Lipao Fiber Splitting and Smoothing Machine (Application No. 2101005051)
 - Rattan Smoothing Machine (Application No. 2101005050)
 - Yan Lipao Fiber Splitting Machine (Application No. 2101005052)
 - Such machines reduce manual labor, improve the uniformity of material quality, and increase production capacity, enabling local entrepreneurs to compete and grow in global markets.
 - Product Design Innovation (Upgrading to International Level):
 - Protected under six design patents for "Bag" designs (Patent Nos. 107488–107493), the portfolio enhances the contemporary character and global appeal of Yan Lipao products.





