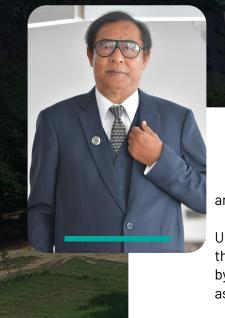




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Message From the President

Dear Rambhai Barni Rajabhat University Community and All Stakeholders,

Over the past four years, Rambhai Barni Rajabhat University has been firmly committed to implementing the United Nations' Sustainable Development Goals (SDGs) by integrating sustainable development concepts into all aspects of the university's core missions.

Our past performance has demonstrated remarkable progress, as reflected in the THE Impact Rankings. In 2022, the university participated in the assessment of 7 goals, achieving a score of 38.7 points. This was followed by continuous improvement in 2023, expanding to 8 goals with a score of 47.6 points. In 2024, we further extended our operations to cover 12 goals, achieving an impressive score of 61.8 points.

The university has implemented numerous significant initiatives, including curriculum development, research, transfer of science, technology and innovation to communities, network collaboration building, and environmental conservation promotion. We have particularly emphasized driving quality education (SDG 4) and partnerships for sustainable development (SDG 17) to achieve our goal of becoming a true university for local development.

On behalf of the university, I would like to express my gratitude to all faculty members, staff, students, and partners who have contributed to this success. I hope we will continue to advance our SDGs implementation to help create a sustainable future for Thai society and the global community.

Yours sincerely,

Waigoon Tongaram, Asst. Prof.

President



1 NO POVERTY



Eradicate all forms of poverty in all regions

In the 2023 academic year, there were 7,623 students, with 2,292 students receiving financial assistance. The university provides scholarships to support students from financially disadvantaged backgrounds. Information about scholarship applications for needy students was disseminated via the Student Development Office's Facebook page and the RBRU Student Loan Fund. Faculty advisors also supported and advised students in the scholarship application process.



Picture I: Goal 1 The university provides scholarships to support students from financially disadvantaged backgrounds.

The university aims to admit students from the lowest household income groups by providing scholarship services, such as the Student Loan Fund (SLF), scholarships for underprivileged students, or those from the lowest household income groups. Information about these opportunities is disseminated through the Facebook page "SLF.rbru," the new student orientation program, and the Student Development Office website.

Report on the Data and Graduation Rates of Scholarship Students for the 2023 Academic Year

For students from the lowest household income groups, the university encourages them to enroll in a study plan from the first to the fourth year to ensure they graduate as planned. If scholarship students continue their studies in the next academic year, the university provides guidance and counseling to help them graduate according to the established plan.

The university provides support to students in various areas to ensure their successful completion of higher education as follows:

1. Facilities

This includes transportation, sanitation, exercise areas, food, libraries, accommodations, and legal services.

2. Living Essentials

The university supports students in terms of living essentials by providing scholarships for Thai and international students from low-income households and offering health services related to disease prevention.



Picture 2: Goal 1 The university supports students health and privides disease prevention vaccination services.

The university has programs and initiatives to assist low-income students in the lowest 20% income group, ensuring their ability to graduate. These programs and initiatives are designed to support the 20% of students from the lowest household income group through activities that raise awareness and foster an entrepreneurial spirit. The goal is to enable students to generate income during their studies and inspire them to pursue business ventures, eventually becoming new entrepreneurs in the future. The university also invites student entrepreneurs to participate in business incubation programs across various fields. University students can join these programs free of charge, with no costs involved. These include:

1. Academic Flea Market and Music Festival Project 2. Academic Flea Market and Science Week Project



Picture 3: Goal 1 Academic Flea Market and Music Festival Project



Picture 4: Goal 1 Academic Flea Market and Science Week Project

The university collaborates with public and private sector entrepreneurs to promote recruiting students for part-time jobs during their studies, helping students earn additional income. The Student Development Office publicizes these part-time job opportunities through the Student Development Office's Facebook page, Rambhai Barni Rajabhat University.

There was a plan to assist students from impoverished countries by implementing a policy to exempt tuition fees and provide additional financial support for international students from low-income backgrounds who faced financial difficulties. These students, who demonstrate resilience and enthusiasm for learning the Thai language, include four students under the Memorandum of Understanding with Pu're University in Yunnan Province, People's Republic of China.

The university assists the local community in improving their financial status. It supports local businesses by providing knowledge or resources through mentoring systems, training, and assistance via university facilities. It also organizes the "Pathway to Wealth: Increase Income and Improve Quality of Life by Creating Careers" project, held for the second time in the 2023 fiscal year. This project is a continuation of the one held in 2022. Participants in the program learned about laundry product production, which they applied within their households, significantly reducing household expenses. Particularly, members of the Rungruang Munkong Housing Cooperative in Ko Kwang Subdistrict, Mueang District, Chanthaburi Province, showed interest in creating additional products, further increasing household income. In 2023, the university provided training to these cooperative members to extend their skills beyond household use into supplemental income-generating activities. They organized themselves into community groups to produce and sell products within the community, leading to increased income and improved living standards for cooperative members. This initiative continues to support the creation and distribution of products, enhancing local income and community life.

NO POWERTY



Picture 5: Goal 1 Picture 5: SDG 1 Pathway to Wealth: Increase Income and Improve Quality of Life by Creating Careers, Session 2

The 2023 GSB Youth Local Conservation Project

The university collaborates with the Government Savings Bank to organize the "GSB Youth Local Conservation Project," which aims to promote student learning and the application of modern knowledge in developing community products or services. The goal is to enhance quality, add value, and meet market demands. This initiative provides students with learning experiences, work processes, and opportunities to exchange knowledge with the community. It fosters an understanding of local lifestyles, identities, and indigenous wisdom while raising awareness of the importance of regional development. The project also supports community organizations in career development, income generation, and the continuation of local wisdom.



Picture 6: Goal 1 The 2023 GSB Youth Local Conservation Project

The university organizes training to improve students' access to essential services as part of the orientation and training program for new students in the 2023 academic year (Pink-Green Camp), which includes the following:

- 1. Adjusting and creating happiness within the university
 - 2. Student Loan Fund / Scholarships
 - 3. Activities for students
 - 4. Educational services process
 - 5. Discipline regulations
- 6. Team-building activities with mentors who guide students to various locations and facilities, such as shuttle service points and free drinking water stations in different buildings.



Picture 7: Goal 1 Pink-Green Camp: Students' Activities



Picture 8: Goal 1 Pink-Green Camp: Educational Services Process



Picture 9: Goal 1 Pink-Green Camp: Team-building activities with mentors who guide students to various locations and facilities, such as shuttle service points and free drinking water stations in different buildings

Suan Ban Kaew Social Enterprise

The Suan Ban Kaew Social Enterprise has built significant collaborations with various external organizations, aiming to develop capabilities and enhance operations in the social business sector. The enterprise has played a key role in promoting the "Patthawi Health Agriculture Community Business" by supporting the community in successfully registering as a "social enterprise group." Suan Ban Kaew Social Enterprise has helped address the challenges faced by the community, resulting in increased income from the sale of organic fruits to international markets. This success led the community to donate funds to support the Suan Ban Kaew Social Enterprise, demonstrating strong cooperation and sustainable development between the enterprise and the community.

Regional Private Sector Economic Development Plan

The Office of the Permanent Secretary of the Ministry of Higher Education, Science, Research, and Innovation organized a workshop on the "Regional Private Sector Economic Development Plan 2023-2027." The workshop guided the operational approach, plan formulation process, policy launch, and the private sector's perspective on creating the regional private sector economic development plan.

NO POWERTY

2 ZERO HUNGER



Research on Ending Hunger

Rambhai Barni Rajabhat University is an institution focused on local development, with an emphasis on supporting farmers in the region to develop agricultural productivity and food production. The university has set a policy of "Developing People" to address poverty and hunger, as well as reduce social inequality. The policy focuses on creating food security, improving the quality of nutrition, and promoting sustainable agriculture by providing farmers and food producers with access to lands, tools, and modern technologies that meet their needs.



Picture 1: Goal 2 Providing facilities, equipment, and knowledge to food producers at the Eastern Agricultural and Food Products Research and Innovation Development Center.

The university recognizes the importance of local farmers and food producers, with the Eastern Agricultural and Food Products Research and Innovation Development Center serving as a center for learning, support, consultation, and critical analysis services, such as testing the maturity of durians. This free service, provided since 2022, aims to issue certificates for farmers to ensure proper harvest timing, reduce food waste, and maintain the quality of agricultural products to meet standards.



Picture 2: Goal 2 Providing durian maturity analysis services using NIR (Near-Infrared) Spectrometry to evaluate the maturity of durian.



Picture 3: Goal 2 For the consultation services related to product quality, farmers send durian samples for maturity evaluation.

In 2023, the certificates were issued to farmers in Chanthaburi, Trat, and Rayong provinces. Additionally, consultation services on quality were provided to local food producers, along with serving as a learning and training center for 594 individuals interested in food-related topics at no cost to create awareness of sustainable food quality and safety.

University Policy for Food Security, Nutrition Promotion, and Sustainable Agricultural Development

The university has implemented measures to assist students facing food insecurity and hunger by providing scholarships. These scholarships aim to ensure that affected students have sufficient resources to access nutritious and affordable food. In the 2023 academic year, students with good conduct and financial need were selected to receive ongoing scholarships from various funding sources, such as Phra Phutthabat Phluang Foundation, Ajinomoto Foundation, Kasemsanti Fund, and Luang Por Wat Pak Nam Phasi Charoen Foundation with the aim of improving students' quality of life and ensuring access to diverse and nutritious food.



Picture 4: Goal 2 Granting Phra Phutthabat Phluang Foundation scholarships to students.

The university promotes access to healthy and affordable food and ingredients for students and staff. This includes the daily sale of fresh and chemical-free eggs, pesticide-free homegrown vegetables, as well as the processing of healthy food products. These activities are part of the learning center based on the Sufficiency Economy Philosophy, run by the Faculty of Agricultural Technology.



Picture 5: Goal 2 Fresh and chemical-free eggs are available for daily sale.

In addition, the university provides free drinking water for students and staff at 94 locations within the campus, totaling 154,525 liters throughout the year.



Picture 6: Goal 2 Free clean drinking water for students and staff at the university.

The Education System for Food Security, Nutrition Promotion, and Sustainable Agriculture.

In 2023, the university offered a course on soil-less plant cultivation, which included practical training in growing salad vegetables without soil using various systems, as well as practical training in mushroom cultivation—from producing mushroom spawn and opening mushroom caps to harvesting.

After completing the practical training in the course, students gather the products to sell to their peers at prices lower than the market price. Some of the products are taken home to prepare meals, which helps reduce food expenses. Additionally, this practice helps alleviate food shortages and enhances food security.



Picture 7: Goal 2 Soilless Cultivation

Social Engagement for Individuals Interested in Food, Nutrition Promotion, and Sustainable Agricultural Development.

The university recognizes the importance of access to and sharing of knowledge and skills related to technology and food safety. The Faculty of Agricultural Technology has organized numerous academic service programs in agriculture and aquaculture for farmers and food producers in the eastern region with no charge as follows:

The Agricultural Project Based on the Philosophy of Sufficiency Economy includes activities such as training on growing sunflower sprouts and chemical-free morning glory, economic mushroom production, and earthworm farming to further develop vermicompost production for household use.



Picture 8: Goal 2 Sunflower Sprout Cultivation

Additionally, Rambhai Barni Rajabhat University has organized activities and transferred knowledge to farmers and local food producers in the eastern region with no charge as follows:

The project on product development from heart to Ban Nam Chieo Tourism Community Enterprise (in its fourth consecutive year) involves training and knowledge transfer on product development for jams and processed fruits to local farmers and food producers. The project also covers packaging selection, label creation, and cost calculation to establish appropriate pricing strategies. It aims to increase income and raise the community product standards to enable the community to sustainably rely on themselves.



Picture 9: Goal 2 Faculty staff and students collaborate with local residents in product development.

The project on upgrading community enterprise to social enterprise (Pattawee Model Organic Farming Group) is a project in collaboration with Thai Beverage Public Company Limited. Its objectives are to develop social enterprises as role models and consultation centers in the eastern region, enhance the efficiency of community management models, and improve prototype community products such as Fang herbal drinks and Fang jelly sachets under the "Suan Ban Kaew" brand. The project aims to expand its impact, fostering sustainable income generation for the community.



Picture 10: Goal 2 Providing knowledge about creating social enterprises to local residents.



Picture 11: Goal 2 RBRU Herb Short Herbal Drink





Picture 12: Goal 2 RBRU Herb Short Herbal Jelly

For product distribution channels, the university has the "University as a Marketplace" project, which collaborates and creates a circular economy network within the Rajabhat University network in the central region. Community products are displayed and sold at the university in the form of a University Supermarket. Additionally, digital marketing tools are used to connect local sellers with a broader customer base.



Picture 13: Goal 2 Suan Ban Kaew Shop at the University

ZERO HUNGER

3 GOOD HEALTH AND WELL-BEING



Policy

The university places a significant emphasis on fostering health and well-being among its students and staff. As part of this commitment, it provides primary healthcare services at its on-campus health clinic, addressing physical health, mental health, and reproductive health needs. These services are delivered by professional nurses and faculty members from the Faculty of Nursing and are available daily from 8:30 a.m. to 4:30 p.m. without charge. Reproductive health services offered to students include initial problem assessment, counseling, and advice on issues such as safe sexual practices and adolescent health. Referrals for hospital-based services are also facilitated when necessary. Furthermore, the university organizes various health service projects and activities for students and staff. In 2023, the university collaborated with the Chanthaburi Provincial Public Health Office to provide cervical cancer vaccinations (doses 1-3) to its students and staff. The Faculty of Nursing also launched the "Hope and Happy" program, facilitated by experienced faculty members, which offers mental health and reproductive health counseling. Consultations are available via online appointment systems, the LINE application, or in-person visits to designated counseling rooms, all provided free of charge.

Furthermore, the university implemented the "Enhance, Create, Happiness" initiative to advance societal well-being. This program includes educational activities for leaders, administrators, faculty, and staff on the "Happy 8" framework for holistic well-being. Additionally, the "Art Within: Wings for the Heart" project was introduced, providing opportunities for administrators, faculty, and staff to incorporate art-based

methods into their professional lives, promoting both mental and physical health. To align with its goal of being a smoke-free institution, the university has revised its smoking policies. In 2023, the previous 2021 regulations were updated to include electronic cigarettes, reinforcing its commitment to protecting non-smokers and creating a healthier campus environment. In the area of physical fitness, the university actively supports initiatives aimed at enhancing the quality of life through exercise. It provides access to sports facilities and exercise spaces for students, staff, and community members, free of charge. This initiative aligns with national health policies that aim to promote a stronger and healthier population, empower communities, and encourage individuals to take an active role in maintaining the health and well-being of themselves and their families.



Picture 1: Goal 3 The university health clinic providing cervical cancer vaccinations to students and staff.



Picture 2: Goal 3 Hope and Happy



Picture 3: Goal 3 Nursing house



Picture 4: Goal 3 The Art Project "Wings Within the Heart," fostering creativity and inspiration among executives, faculty members,

Research

The university actively promotes health research aligned with the challenges faced by Thai populations, local communities, and global society. In 2023, several studies were conducted and disseminated through national academic journals. These studies addressed key topics such as enhancing health literacy among the elderly, preparing for the transition into an aging society, utilizing physical exercise as an intervention to alleviate depressive symptoms in adolescent females, alcohol consumption among youth, and smoking cessation among university students with tobacco dependence. Furthermore, the university engaged in an international collaborative research initiative with 12 countries, focusing on Family Adaptation in Families of Individuals with Down Syndrome. The findings from this project were published in an international peer-reviewed journal.

Research

Rambhai Barni Rajabhat University is committed to addressing the healthcare workforce shortage by offering a Bachelor of Nursing program to produce professional nurses who can support local and national health system sustainability. In the academic year 2023, there were 50 bachelor's degree students who graduated from the program. To align with national policies aimed at mitigating the healthcare workforce shortage and enhancing public health service capacity across all sectors, the Faculty of Nursing has increased its annual graduate output to 100 students.

Throughout the program, students participated in development activities designed to cultivate the identity and essential characteristics

of nursing professionals. For instance, the Volunteer Spirit for Nursing Students project fosters a sense of sacrifice, social responsibility, and environmental awareness among students—qualities fundamental to the nursing profession. Activities take place at the Kung Krabaen Bay Royal Development Study Center.

The university also supports initiatives to promote a smoke-free society. The RBRU United Against E-Cigarettes project raises awareness among students, trains peer leaders, and develops leadership and teamwork skills to help reduce and eliminate e-cigarette use on campus. This initiative extends to secondary school students in Chanthaburi Province through the Social Engineering Process at Wat Phlabphla School, aiming to prevent and reduce smoking in younger populations.

Additionally, the university continues its Breast Cancer Prevention and Awareness initiative, now in its second consecutive year. Organized by the Tanya Rak Breast Cancer Awareness Club, this project includes educational exhibitions and activities on self-screening techniques. Participants are encouraged to regularly monitor their breast health using QR code-based self-check records. Events are held on campus and in various locations throughout Chanthaburi Province.



Picture 5: Goal 3 Nursing Graduates of the Academic Year 2023.



Picture 6: Goal 3 The Social Engineering Project Against E-Cigarettes.



Picture 7: Goal 3 Tanya Rak Club Students Organizing Activities for Breast Cancer Awareness and Screening.

Participation

Rambhai Barni Rajabhat University has committed to the sustainable development of local communities in all aspects. In the healthcare domain, the university collaborates with local communities to implement projects that cater to the health needs of all population groups and age ranges. The Faculty of Nursing has partnered with the Chanthaburi Provincial Prison to develop the quality of life of inmates in the New Era context. This initiative aims to promote health literacy and access to healthcare services while preparing inmates for a better quality of life both during their incarceration and after their release. Activities include health screenings for COVID-19, behavior modification to reduce disease transmission, depression screening, psychiatric care for inmates with mental health issues, mammogram services for female inmates at risk of breast cancer, diabetes and hypertension screening, and health risk assessments (e.g., weight measurement, pulse check, waist circumference, and body mass index evaluation). The program also provides tuberculosis risk counseling and health behavior modification.

For elderly care, the university has implemented a project to develop health data for elderly individuals at the Chanthaburi Elderly Care Home. This includes screening for cardiovascular disease risks, vision and hearing assessments, and the evaluation of daily living capabilities. The findings inform the development of practical care guidelines to promote elderly health and independence in daily activities. Additionally, the university has introduced a health promotion program for elderly individuals in Khao Wongkot Subdistrict using integrative medicine to enhance self-care and sustainable health management within the community. The Health Literacy Community project aims to improve health outcomes for all age groups, focusing on quality of life, risk reduction, and the prevention of chronic diseases. This initiative promotes healthy behaviors and aims to reduce illness and death caused by non-communicable diseases.

Finally, the university focuses on enhancing the quality of life for the residents of Ban Imui, Nong Chim Subdistrict, Laem Sing District, Chanthaburi Province. The "Waste to Income" project encourages proper waste sorting and disposal to improve hygiene and reduce disease transmission. The project also fosters the development of locally-produced recycled products, maximizing the use of waste materials for community benefit.



Picture 8: Goal 3 The Quality of Life Development Project for Inmates in Chanthaburi Province in the New Era.



Picture 9: Goal 3 The Health Data Development Project for Elderly Residents at the Chanthaburi Elderly Care Home.



Picture 10: Goal 3 The Health Promotion Project for Elderly Individuals Using Integrative Medicine.

4 QUALITY EDUCATION



Rambhai Barni Rajabhat University is a higher educational institution for local development that focuses on raising the quality of education with a research mission to improve the quality of education.

The university established policies to enhance learning accessibility, promote education for local youth, and encourage individuals of all ages to pursue lifelong learning. The details are as follows:

Research to Enhance the Quality of Education

Rambhai Barni Rajabhat University supported research which aim to advance educational practices with financial assistance from both internal and external sources, sharing the results with the public to enable stakeholders to apply them in raising educational standards. In the academic year 2023, the university published 26 research projects related to educational quality development in the TCI database: 18 projects focused on lifelong education (72%), 4 on education reform (16%), and 3 on education policy (12%).



Picture 1: Goal 4 Development of Education Quality and Its Dissemination in the Database

Research to Enhance the Quality of Education

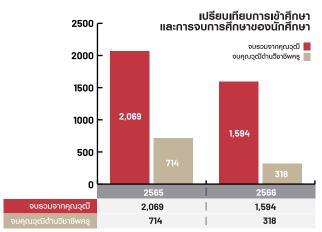
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Formulation of Learning Access Policies Aligned with the Principles of Education for All and Aimed to Expand Opportunities, Along with the Production and Development of Teachers for Managing Education at All Levels

RBRU considered, but did not discriminate against, variations in gender, immigrant status, physical abilities, race, and religion when developing a strategy for lifelong learning accessibility linked to inclusive learning management for all. The university also established educational policies allowing students with diverse mental and physical challenges to attend classes alongside regular students. Furthermore, it waived special fees for international students participating in cooperative projects (MOUs) and implemented an educational management strategy enabling international

The institution prioritized educating teachers and significantly improving educational standards within the community. The Faculty of Education, as the primary unit responsible for these operations, collaborated with other university faculties to produce qualified graduates at both the bachelor's and graduate levels. At the bachelor's degree level, the university offered programs in various teaching fields, including early childhood education, special education, physical education, social studies, English, Thai language, mathematics, computer science, general science, biology, chemistry, physics, and music.

In the 2023 academic year, a total of 1,594 students graduated, including 381 with teaching qualifications. Of these, 369 were bachelor's degree graduates (23.14%, a decrease from previous years), and 12 were graduate-level degree holders (0.75%, an increase from previous years). In comparison, the total number of graduates in the 2022 academic year was 2,069, with 714 holding teaching qualifications—700 at the bachelor's level (33.83%) and 14 at the graduate level (0.67%).



Picture 2: Goal 4 Comparison of Student Enrollment Across All Professional Qualifications and Graduation Rates of Teacher Qualification Students

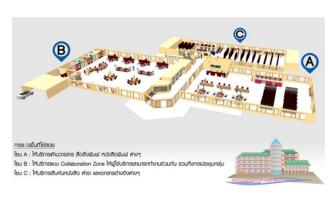
Research to Enhance the Quality of Education

Rambhai Barni Rajabhat University provided education to youth in its service area, ensuring equal opportunities for access to higher education. This commitment has been reflected in the university's tuition fees, which have been set at reasonable rates considering current living costs. To further support students, the university has established fair and appropriate tuition policies, along with an education loan fund and scholarships for those with limited financial resources. These initiatives aimed to reduce the financial burden on

students' families. In the 2023 academic year, the university offered a diverse range of 61 academic programs, including 51 undergraduate programs, 8 master's programs, and 2 doctoral programs. Local youth could select programs that aligned with their interests and abilities. All programs met rigorous academic standards and were accredited by relevant professional councils.

A total of 1,995 new students enrolled across all programs, comprising 1,715 undergraduate students in regular programs (85.98%), 208 undergraduate students in special programs (10.42%), and 72 graduate students (3.60%). Among these, 1,046 students, or 52.43%, were first-generation students, now benefiting from expanded educational opportunities.





Picture 3: Goal 4 Public Learning Resources for Both University Members and External Individuals

Engagement in Promoting Lifelong Learning for Individuals of All Ages

Rambhai Barni Rajabhat University has been actively involved in various activities to promote lifelong learning for individuals of all ages. The university implemented the following programs in the 2023 academic year to meet the diverse needs of service users across all areas.

1) Public Learning Resources: In collaboration with its graduate production programs, the university provided support materials, learning resources, and opportunities for individuals of all ages to access learning facilities at no cost. It opened its learning resources as public spaces, offering local communities access to various resources, including libraries, tools, equipment, media technologies,

QUALITY EDUCATION

physical spaces, and online resources. Additionally, the university supported lifelong learning for non-students by offering free online courses through the MOOC (Massive Open Online Course) platform. Participants who fulfilled the prerequisites for each course were awarded certificates upon completion. In addition, the Information System for Collaborative Learning Management through Online Social Media: This system was free for external individuals and provided access to resources such as e-books and online videos. It also supported online presentations to encourage users to read and pursue further studies. Additionally, external individuals could freely use the university's facilities, including the infirmary, Sakdidej Sports Stadium, outdoor sports fields, the fitness center, and the campus shuttle bus service.

2) Public Activities for Lifelong Learning: These activities aimed to promote learning among students, youth, and the public with an interest in science and innovation. The university organized the following initiatives:

2.1) Regional National Science Week Project was held under the theme "Bioeconomy, Circular Economy, Green Economy (BCG)." This project features science open-house exhibitions and workshops. The activities were free of charge and took place on December 18-19, 2023, at Rambhai Barni Rajabhat University.

2.2) The 17th Rambhai Barni National Research Conference was organized under the theme "Research and Innovation for Quality-of-Life Development with the BCG Economic Model," This conference included keynote lectures via Zoom Cloud Meetings and on-site presentations at the university's main auditorium. The opening ceremony was broadcast live on the university's YouTube and Facebook channels, hosted by the Research and Development Institute. This free event, held on December 19, 2023, at the Chalerm Phra Kiat Building (Building 36), attracted over 200 registered participants.



Picture 4: Goal 4 Regional National Science Week 2023



Picture 5: Goal 4 The 17th Rambhai Barni National Research Conference

3) Professional Training Activities: Through the provision of professional training and lifelong learning, the university has organized activities that were open to the public and free of charge. Among these, two notable projects included:

1. The teacher competency development program for professional teachers, module 2, was organized by the Faculty of Education, Rambhai Barni Rajabhat University. This project aimed to facilitate the exchange of knowledge using the professional learning community (PLC) approach. The program served educational personnel in Chanthaburi, Rayong, and Trat provinces, under the jurisdiction of the following offices: Trat Primary Education Service Area Office 1 and 2, Chanthaburi Primary Education Service Area Office 1 and 2. Rayong Primary Education Service Area Office 1 and 2, Secondary Educational Service Area Office Chanthaburi Trat, and Secondary Educational Service Area Office Chonburi Rayong. The Faculty of Education collaborated with network partners to implement this program based on the needs of the Office of the Basic Education Commission and 38 other Rajabhat universities. The program aimed to enhance the competencies and potential of educational personnel through knowledge exchange within professional learning communities. A total of 524 participants, including administrators and active teachers, attended the development session held on December 2, 2023, at the Siri Rambhaibhan Auditorium, Rambhai Barni Rajabhat University.



Picture 6: Goal 4 Teacher Competency Development Program for Professional Teachers, Module 2



Picture 7: Goal 4 Following the Professional Learning Community Approach in Chanthaburi, Rayong, and Trat provinces.

2.The project on the development of teacher and educational personnel professional competency consisted of one project with three key activities, including efforts to enhance the quality of education in small schools under the Office of the Basic Education Commission (OBEC), Border Patrol Police Schools, and Education Fund Schools. Implemented continuously from 2019 to 2023, this five-year project has made significant progress through the following activities:

Activity 1: Development of teaching materials to enhance reading, writing, and critical thinking skills for primary school students.

Activity 2: Creation of storybooks and teaching materials to promote and instill moral and ethical values in primary school students.

Activity 3: Establishment of a cooperative network to improve education quality. The objectives of the project included developing the skills of teaching staff in small network schools, producing two sets of teaching materials to promote moral and ethical values, creating four sets of teaching materials to enhance literacy skills, and establishing a collaborative network to implement local development projects in the

university's service areas. A total of 103 participants took part in the project, which was held in the 8th-floor meeting room of the Faculty of Education Building 39, Rambhai Barni Rajabhat University.



Picture 8: Goal 4 Project on the Development of Teacher and Educational Personnel Professional Competency Establishment of a cooperative network for local development project implementation.



Picture 9: Goal 4 Project on the Development of Teacher and Educational Personnel Professional Competency Development of Thai language teaching materials for primary school students and the development of teaching materials promoting moral and ethical values.

4) External academic services involved applying academic knowledge to address the needs and challenges of local communities. Two notable projects have successfully contributed to solving problems and improving the quality of life in these communities:

1. Mathematics Conservation Camp has been continuously implemented since 2002 and remains a cornerstone of the university's academic outreach. In the 2023 fiscal year, five additional activities were organized (activities 160 to 164). The project aimed to instill positive attitudes toward environmental conservation among participants, enhance students' skills in organizing educational activities, and enable them to apply mathematical knowledge in teaching. By fostering a deeper understanding of mathematics, the project benefited both students and teachers.

The activities took place from December 19, 2022, to July 22, 2023. A total of 13 schools participated, involving 1,403 students from grades 4 to 9, 68 teachers, and 212 student volunteers majoring in mathematics.







Picture 10: Goal 4 Mathematics Conservation Camp Project

2. Volunteer Power Project: Building Check Dams for the Community took place at the Khao Sam Phak Kham Community Forest, Nong Bua Village, Moo 9, Krachao Subdistrict, Nayaiam District, Chanthaburi Province. Approximately 40 students and youth volunteers participated in the activity, which aimed to construct check dams to retain moisture in the community forest. The project provided valuable learning opportunities for the youth, focusing on natural resource and environmental conservation. Three check dams were built using locally sourced bamboo for the structures, while sand was packed into sacks to form the barriers. This initiative proved highly beneficial to the community by helping prevent

forest fires, retaining moisture in the forest, and preventing trees from dying during the dry season.





Picture 12: Goal 4 Volunteer Power Project: Building Check Dams for the Community at Khao Sam Phak Kham Community Forest.

From the above information, it is evident that the quality education management at Rambhai Barni Rajabhat University is a proactive initiative addressing the needs of the local community. The university has designed educational programs with the overarching goal of fostering sustainable local development.







Achieve Gender Equality and Empower Women and Girls

Rambhai Barni Rajabhat University has been committed to supporting female students in representing the university at regional and national sports competitions. Furthermore, the university encouraged female students to act as representatives for various organizations and communities, promoting collaboration with external agencies. The details are as follows:

1. The 49th Thailand University Games Qualifying Round for the Central Region was held at Kanchanaburi Rajabhat University from November 13 to 17, 2023. A total of 82 athletes represented the university, 21 of whom were female athletes, accounting for 25.60%.



2. The 49th Thailand University Games Grand Event was held at Kasetsart University, Kamphaeng Saen Campus, from January 27 to February 5, 2024. A total of 32 athletes represented the university, 15 of whom were female athletes, accounting for 46.87%.





3. The 32nd Rajabhat University Central Region Games (Buasai Games), held at Valaya Alongkorn Rajabhat University under the Royal Patronage in Pathum Thani Province from April 22 to 26, 2024, featured a total of 108 athletes, 28 of whom were female athletes, accounting for 25.92%.



4. The university nominated a female student to participate in the selection process for the Royal Award at the higher education level for the academic year 2023 (with only one nominee allowed). The student received the Royal Award at Phra Nakhon Si Ayutthaya Rajabhat University.



In addition, the university has also supported female students to participate in activities with various organizations as representatives of the university, as follows:



The "Volunteer Spirit for Check Dam Building and Forest Conservation" project had a total of 193 student participants, of which 148 were female students, accounting for 76%.





The "Law Lovers: Building Bonds Between Seniors and Juniors" project had a total of 139 student participants, 103 of whom were female students, accounting for 74%.





The "Sharing Smiles: Transferring Knowledge from Seniors to Juniors" project had a total of 160 student participants, 134 of whom were female students, accounting for 83.75%.





The "Sangkor for Coastal Marine Resource Conservation" project had a total of 200 student participants, 137 of whom were female students, accounting for 68.50%.







The "Unite to Save the World" project had a total of 166 student participants, 123 of whom were female students, accounting for 74.10%.





The "NBI - For the Juniors" project had a total of 76 student participants, 56 of whom were female students, accounting for 73.68%.





The "Landscaping the Ban Suer Kok Community" project had a total of 180 student participants, 116 of whom were female students, accounting for 64.44%.





The "Together We Go, Sharing Kindness for Society" project had a total of 130 student participants, 116 of whom were female students, accounting for 89.23%.







The "Landscaping and Volunteer for the Community" project had a total of 134 student participants, 80 of whom were female students, accounting for 59.70%.





The "Dream Weaving: Sharing Kindness from Senior to Junior in Accounting" project had a total of 1,340 student participants, 112 of whom were female students, accounting for 83.53%.







The "Volunteer for Developing Bang Chan Temple School" project had a total of 132 student participants, 97 of whom were female students, accounting for 73.48%.



Proportion of Senior Female in 2023

Rambhai Barni Rajabhat University has a policy to support the development of staff potential, regardless of gender. In 2023, the university employed 244 female academics out of a total of 414, accounting for 58.94%. This figure demonstrated the university's recognition of the importance of equality in personal status and its commitment to encouraging women to take on roles in the administration of universities, faculties, and various departments, allowing them to showcase their potential in different fields without discrimination or obstruction.



Proportion of Women Receiving Degrees Year: 2023

In the academic year 2023, Rambhai Barni Rajabhat University offered undergraduate programs for regular students, focusing on the proportion of female graduates receiving their degrees in 2024. The calculation aimed to determine the number of female students who completed their education, divided by the total number of students, with weight given to three fields: STEM, Medicine, and Arts, Humanities, and Social sciences. The collected data included a total of 1,427 graduates, with 1,099 in the STEM field (which integrates Science, Technology, Engineering, and Mathematics) and 738 in Arts, Humanities, and Social Sciences. Of the total, 1,269 graduates were female, accounting for 88.87%.

It demonstrated that the proportion of female graduates who completed their education, received their degrees, and been recognized as alumni of Rambhai Barni Rajabhat University was exceptionally high.



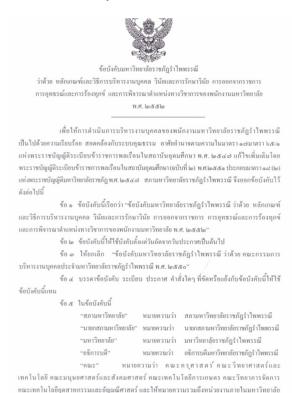
Measuring the progress of women. **Policy of Non-discrimination Against** Women in 2023

In 2023, Rambhai Barni Rajabhat University established policies to create jobs and career opportunities for all genders without discrimination against women. This included equitable recruitment practices, providing opportunities for the exercise of voting rights in the election of university council members, and allocating funds for the development of both academic and support staff. These funds were intended for further education, training, seminars, study visits, and academic conferences, as well as for the continuous presentation of academic work and innovations.



Maternity and Paternity Policies in 2023

According to the Law on Social Security and Rambhai Barni Rajabhat University Regulations Regarding Criteria and Methods for Personnel Management, Disciplines and Discipline Conservation, Retirement from Government Service, Appeal, Complaints, and Consideration of Academic Positions of University Personnel (No. 2), B.E. 2558 (2015), both academic and support personnel are eligible to take up to 90 days of maternity leave, as well as receive up to 45 days of pay from the Social Security Office.



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In 2023, projects were developed with female participation, including a counseling program where women played a key role in organizing the project. Additionally, at least 10% of the participants in the project were female students.

The university project "Hope and Happy" provided counseling services to alleviate stress and support mental well-being, offered by faculty members from the Department of Psychiatry and Mental Health. This service was available to both staff and students of Rambhai Barni Rajabhat University. The initiative was a collaboration between the Faculty of Nursing and the Department of Mental Health, specifically the Mental Health Center 6. Activities included mental health education and initial mental health assessment using the Mental Health Check-in tool; more than 100 female participants took part through the following channel: (https://hopeandhappy.rbru.ac.th).





6 CLEAN WATER AND SANITATION



Ensure access to water and sanitation for all

Rambhai Barni Rajabhat University has established a systematic and effective mechanism to monitor and regulate water usage, ensuring compliance with sanitation principles to mitigate the impacts of water pollution. The institution also prioritizes water conservation communication efforts directed at its staff and students, while acting as a facilitator to engage local communities in the sustainable utilization of water resources. The framework for implementation comprises the following key components:

1. Policy on Water Conservation and Usage
Rambhai Barni Rajabhat University
has implemented a water conservation policy aimed
at ensuring equitable access to water resources
for both domestic and consumption purposes.
Within the university premises, clean water is
supplied through a production process that
adheres to established sanitation standards.



Picture 1: Goal 6 a water treatment plant on a university campus, aligning with Goal 6 of sustainable development.



Picture 2: Goal 6 The equipment used in the university's water treatment process, in alignment with Goal 6 of sustainable development.

Rambhai Barni Rajabhat University has ensured the provision of clean and safe drinking water that meets potable water quality standards certified by the Food and Drug Administration (FDA, Thailand). Free access to such water is available within university buildings. The university has also demonstrated a commitment to water conservation through the following tangible measures:

1.1 Environmental Policy Review and Public Awareness The university reviews and updates its environmental policies regularly, implements these policies in practice, and disseminates sustainable water conservation knowledge to the public.

1.2 Hygienic Sanitation Facilities Clean water is provided in restrooms under proper sanitation conditions. The university has installed water-saving fixtures that ensure 100% elimination of open defecation.

1.3 Campaigns for Responsible Water Usage The university conducts campaigns to promote mindful water consumption, such as displaying signs in restrooms with messages like: "Water is a finite resource; use every drop wisely."

1.4 IoT(Internet of Things)-Integrated Water Management The university has developed and installed IoT-enabled systems for controlling water gates using three-phase motors. This system is integrated with surveillance technologies, including CCTV monitoring, to oversee water levels from upstream to downstream.



Picture 3: Goal 6 The IoT-controlled water gate system on a university campus, representing Goal 6 of sustainable development.

1.5 Development and Restoration of Green Spaces The university undertakes initiatives to develop and restore green spaces on campus by planting drought-tolerant plants of diverse species, such as Takian trees (Hopea odorata) and Krapak Inthanin trees (Lagerstroemia spp.). These efforts aim to enhance biodiversity and promote a sustainable, eco-friendly environment within the university premises.



Picture 4: Goal 6 A tree-planting day activity featuring the selection of drought-tolerant tree species.

Furthermore, Rambhai Barni Rajabhat University has initiated the Green Office project to drive and implement the management of wastewater from its sources, ensuring its quality adheres to effluent standards. This includes both onsite treatment and Septic tank.

1.6 The process of reusing wastewater from the building through drainage pipes that direct the water to the oxidation pond for sedimentation, allowing it to be recycled for the maintenance of plants and lawns on campus.



Picture 5: Goal 6 a natural sedimentation pond used for wastewater treatment.



Picture 6: Goal 6 The use of a vacuum truck to collect and retrieve water for irrigation purposes within the university

1.7 Continuous monitoring of the raw water quality in the water supply system and wastewater from buildings is conducted in accordance with university regulations to prevent water pollution.

1.8 The installation of oil and grease traps has been implemented to treat wastewater generated from culinary activities within the buildings. Additionally, wastewater management from academic buildings is carried out through onsite treatment systems, specifically septic tanks. These measures are designed to effectively control and treat wastewater, ensuring that it meets environmental standards and minimizes pollution before being discharged or reused. This system enhances the university's sustainability efforts by managing wastewater from both food preparation areas and educational facilities.

$2. \ Research \ on \ was tewater \ treatment$

Rambhai Barni Rajabhat University has developed research initiatives aimed at controlling wastewater from its sources. One such research project focuses on the treatment of dye wastewater from reed mat production using chitosan in the form of sheets. This research seeks to find an effective and sustainable method for treating wastewater contaminated with dyes, utilizing chitosan as a bio-based material that can absorb and remove

harmful substances from the water, thereby improving the quality of the effluent and reducing environmental impact.

3. Instruction and Participation in community for water management

Rambhai Barni Rajabhat University has integrated teaching and learning in the Community Development program to manage water resources in collaboration with the university and local communities. This approach encourages participation in water management and fosters community engagement. The outcomes of this initiative are presented in two primary forms:

3.1 Community-based participation in managing water quantity, with a focus on water management for the community and sustainable conservation of headwater areas. Key projects include the "Volunteer Energy to Build Dams for the Community" project, which took place at the Khao Samphu Kham Community Forest, Ban Nong Bua, Moo 9, Krachao Subdistrict, Nayai Am District, Chanthaburi Province. This project aims to conserve water resources and improve the community's resilience against environmental challenges.



Picture 7: Goal 6 The "Volunteer Energy to Build Dams for the Community" project, located in Krachao Subdistrict, Nayai Am District, Chanthaburi Province

3.2 Participation in water quality management involves key activities such as the collaborative monitoring and analysis of water quality in sources used for consumption by the Sai Khao Subdistrict Administrative Organization, located in Sai Khao Subdistrict, Soi Dao District, Chanthaburi Province, from 2022 to 2024. This initiative aims to ensure that water sources meet the necessary standards for safe drinking water, contributing to the overall health and well-being of the local population. The project emphasizes community involvement in maintaining water quality and supporting sustainable water management practices.



Picture 8: Goal 6 The collaborative water quality monitoring in water sources within Sai Khao Subdistrict, Soi Dao District, Chanthaburi Province

Additionally, there was a collaboration with external agencies to organize forums for gathering feedback on the outcomes of the operations under the "Support for National Development and Public Assistance Project" by the Royal Thai Army Headquarters focuses on monitoring and evaluating the effectiveness of various water-related initiatives. These include the provision of RO (Reverse Osmosis) drinking water systems in child development centers, village water supply projects, and water source development initiatives in the areas of Dan Chumphon and Chang Thun Subdistricts in Bo Rai District, Trat Province, as well as Huai Raeng Subdistrict in Mueang District, Trat Province. The goal is to assess the impact of these projects, ensure the sustainability of water resources, and improve access to clean drinking water for local communities.



Picture 9: Goal 6 A tree-planting day activity featuring the selection of drought-tolerant tree species.



AFFORDABLE AND CLEAN ENERGY



Policy

Rambhai Barni Rajabhat University has followed a policy that aligns with Sustainable Development Goal 7 (SDG 7) on accessible clean energy for all, focusing on developing energy efficiency in buildings and reducing unnecessary energy use. The university has set measures for renovations and constrution of new buildings to pass energy-saving standards, select environmentally friendly construction materials and light-colored reflective colors to help reduce heat absorption. There has also been a plan to arrange green spaces in the units and use natural light to reduce lighting energy inside the building.



Picture 1: Goal 7 Energy Management Report 2023

To raise awareness of greenhouse gas emission reduction, the university has organized a project to provide knowledge on carbon sequestration assessment in forest ecosystems, aiming to achieve Net Zero Emission. In 2023, students and staff in this project learned about greenhouse gas emissions and how to reduce the impact of their daily activities.







Picture 2: Goal 7 Net Zero Project

In addition, the university focused on campaigning and promoting energy reduction, such as setting appropriate air-conditioning on-off times, adjusting temperatures according to seasons, and using fans with natural light during the day, as well as using organic fertilizers instead of chemical fertilizers and planting trees to absorb carbon dioxide in areas around the university.

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Picture 3: Goal 7 Greenhouse Gas Emissions

In an aspect of energy reduction, the university has developed a Green Office plan that controls the use of electrical appliances and lighting by encouraging people to turn off lights when not in use and to clean light bulbs regularly. It also campaigns for staff and students to cooperate in reducing energy consumption through behavioral changes and creating environmental awareness.



Picture 4: Goal 7 Greenhouse Gas Certificate

To align with its goals for carbon neutrality, the university has also stopped or reduced its investments in fossil fuel-based industries such as coal and fuel, and joined the Net Zero campus network.

Research

Rambhai Barni Rajabhat University has researched clean and affordable energy to support the Sustainable Development Goals (SDG 7). One of the important research projects was the "Solar-powered Water Oxygenation System for Agriculture", which has developed a water oxygenation system using solar energy. This system used a DC electric motor to control the propeller's rotation that receives power from the solar panels, which can increase the amount of oxygen in the water efficiently. The most effective time was at noon, which increased the oxygen in the water from 6.25 mg/L to 9.35 mg/L.



Picture 5: Goal 7 Solar-powered Water Oxygenation System for Agriculture

Education

Rambhai Barni Rajabhat University has organized energy studies focusing on efficient energyuseaccordingtotheSDG7goalofAffordable and Clean Energy. The Faculty of Industrial Technology offers a major in energy technology, aiming to develop graduates who possess the knowledge and skills to transfer energy technology to the community. There have also been academic service projects, such as the development of electric lawn mowers for local communities, which help reduce fuel energy use, reduce pollution, and promote the use of clean energy. This project not only reduces energy costs but is also environmentally friendly.



Picture 6: Goal 7 Electric Lawn Mower

Participation

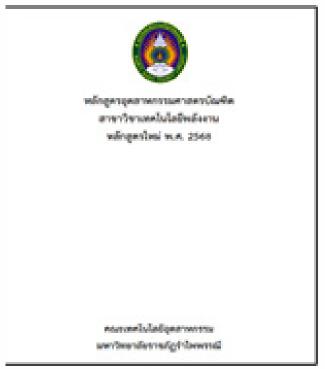
Rambhai Barni Rajabhat University has continuously engaged in the community to promote the sustainable use of clean energy accessible to all, in alignment with SDG 7, especially in terms of reducing carbon emissions and the application of renewable energy. The university has committed to using 100% renewable energy both inside and outside the university. One of the highlight projects was to create an electric lawn mower that can be manually pushed for the community of Ramphan Subdistrict, Tha Mai District, Chanthaburi Province. This lawn mower was designed to reduce the use of chemicals and fuel, allowing farmers to effectively manage weeds in the garden furrows, reduce environmental and air pollution, and save on operating costs in the long run.

Solar Panel (W)	Q'Ty	kWh/day 0.51	kWh/year 186.15
15	10	0.51	186.15
20	10	0.68	248.2
50	7	1.19	434.35
16	24	1.31	476.54

Picture 7: Goal 7 Solar LED Energy Usage

In addition to developing clean energy technologies, the university also played a role in disseminating knowledge about energy and energy conservation to local communities through academic service projects that present technologies and practices for reducing energy use efficiently, which communities can apply to their daily lives and agriculture. For example, organizing community workshops to provide advice

on the efficient use of renewable energy, such as solar cells, and solar power systems, and reducing carbon emissions. There has also been research on alternatives for using renewable energy and energy management that are appropriate for agricultural areas, which are the foundation of the community economy in Chanthaburi Province.



Picture 8: Goal 7 Solar LED Energy Usage

The university has also installed solar rooftop systems and used solar LED lamps throughout the university to reduce energy consumption from carbon sources and promote the use of clean energy within the community and local areas, resulting in energy savings and reduced operating costs. In addition, it has promoted the creation of low-carbon innovations in new business groups that support low-carbon technologies to stimulate an economy that is environmentally friendly and a sustainable source of labor.

The participation in the community of Rambhai Barni Rajabhat University has also covered cooperation with local agencies to transfer technologies and knowledge that are beneficial to reducing carbon emissions and using sustainable energy, such as cooperation with sub-district administrative organizations, educational institutions, and agricultural community groups to develop innovations that are appropriate for community needs. In addition, the university supported the integration of clean energy knowledge into teaching and research projects at the tertiary level, focusing on creating

innovations that can effectively solve energy and environmental problems, both academically and practically in the community.

Rambhai Barni Rajabhat University therefore played an important role in promoting the use of clean, renewable energy and focusing on creating sustainable energy at the local level. Such operations that reach out to the community not only support energy conservation and greenhouse gas emissions reduction, but also help improve the quality of life of local communities, reduce costs, and promote a good environment for living and farming.



AFFORDABLE AND CLEAN ENERGY

9 INDUSTRY, INNOVATION AND INFRASTRUCTURE



Bureau of Assets and Income, Rambhai Barni Rajabhat University (RBRU) is one of the departments in university that plays an important role for driving sustainable development through supporting research innovation development and creating new businesses from knowledge generated within the university. Especially, in the context of the area in Chanthaburi Province. The university acts as an intermediary in linking resources from both the education sector and the community to develop infrastructure that is in line with the Sustainable Development Goals (SDGs) where SDG 9 related to industry, innovation, and infrastructure.

Policy for Sustainability: Driving Innovation to Generate University Income

Bureau of Asset and Income, RBRU has a policy for sustainability in providing reserve income for university through promoting research and creating new innovations. One of the important strategies is to support companies that are separated from university as "University spin-off". University spin-off means that the registered companies established to exploit intellectual property originate from university. These registered companies must be established for at least 3 years and still in operation.



Picture 1: Goal 9 Working with Local Entrepreneurs "Nai Jam brand"

RBRU has a policy for sustainability in driving innovation to generate income for the university through the University Business Incubator (UBI), which is responsible for appointing consultants for business operations. As well as developing the quality of various products to expand into business that can grow in both domestic and international markets. During 1st January -29th December 2023, UBI has continuously operated with the results 1) Rabbit Chan brand, registered on September 20th, 2019 which operated a business of processed Mapeed product, and 2) Nai Jam brand, registered on August 2nd, 2017 which operated a business of seasoning product from fermented fish. Both companies are still in operation onwards and the sales growth have been grown more than 600,000 baht per year. The brands are accepted by levels.



Picture 2: Goal 9 University Business Incubator Support Spin-off Entrepreneur "Rabbit Chan brand"

Creative research: The power of knowledge to create products that meet the needs of the future

Research and product development are one of the key elements of sustainability at the university and community level. This indicator reflects the university's ability to generate new research revenue from the industrial and commercial sectors to academic staff. RBRU has conducted research and product development in many areas, including being a consultant for adding value to local resources products. One of the important results is the research on the development of herbal soda drink products under the brand of "RakZ'a" which has several herbs derived from sappan, star gooseberry, stevia and others as ingredients for health products. The operation period was during 4th September – 30th November 2023 under the supervision of the Eastern Agricultural and Food Innovation Research and Development Center. RBRU provides the advice for the Eastern Elephant Conservation and Forest Conservation Community Enterprise Group and received budget for product research and development of 55,000 baht. RakZ'a has been accepted by consumers both domestical and international levels.



Picture 3: Goal 9 Herbal soda drink products under the brand of "RakZ'a"

Moreover, the Eastern Agricultural and Food Product Innovation Research and Development Center collaborated with Thai Durian Quality Co., Ltd. to develop pasteurized durian products under research and development process. The developed product from durian which is durian in pods can increased shelf life with unique form, safe for consumers and less amount of microorganisms. The operation was carried out during 1st – 30th May 2023 and receiving budget for product research and development of 30,000 baht.



Picture 4: Goal 9 Pasteurized durian products under research and development process

Another outstanding creative research project is to develop metal weaving machines by applying the production process of Chanthaburi mat weaving handicrafts at Samet Ngam Village, Development Institute of Thailand (Public Organization) as a hiring cost for consultant to conduct the project of 700,000 baht. The result of the project is not only helps create new innovations but also preserves the identity and local culture of Chanthaburi province.





Picture 5: Goal 9 Field Work Study to Develop Metal Weaving Machines

Education for the Future: Academic Personnel and Their Role in Creating **Innovation**

RBRU has a total of 376 academic personnel. They work in a variety of disciplines, each with a role in supporting research and product development. They have been divided into 208 STEM academic staffs, 32 Medical academic staffs, and 136 Arts, Humanities and Social Sciences academic staffs. In addition, academic personnel in the STEM field , including the Faculty of Agricultural Technology, Faculty of Education, Faculty of Industrial Technology, Faculty of Computer Science and Information Technology and Faculty of Science and Technology which play an important role in driving industrial and commercial research. Meanwhile, academic personnel in the medical field, namely the Faculty of Nursing, play an important role in creating innovations related to healthcare and improving the quality of life of people in the community for sustainability. Moreover, personnel in the fields of Arts, Humanities, and Social Sciences also participate in promoting education and research related to culture and local communities, resulting in balanced development in both economic and social aspects.

Community participation, cooperation for sustainable development

RBRU emphasizes the participation between the university and the community in Chanthaburi Province through various projects that focus on improving the quality of life of people in the community, as well as research on local products. The participation between the university and the local community towards sustainable development can be classified as follows:

Participation between universities and communities at the creative research level

RBRU has collaborated with the Eastern Elephant Conservation Community Enterprise to develop herbal soda drink product under the brand name "RakZ'a" using herbs that can generally be found in local area such as Fang, Chamuang and Stevia. This collaboration is not only helps generate income for the community, but also preserves and promote natural resources cultivation.RakZ'ahasbeenacceptedbyconsumers both domestical and international levels.





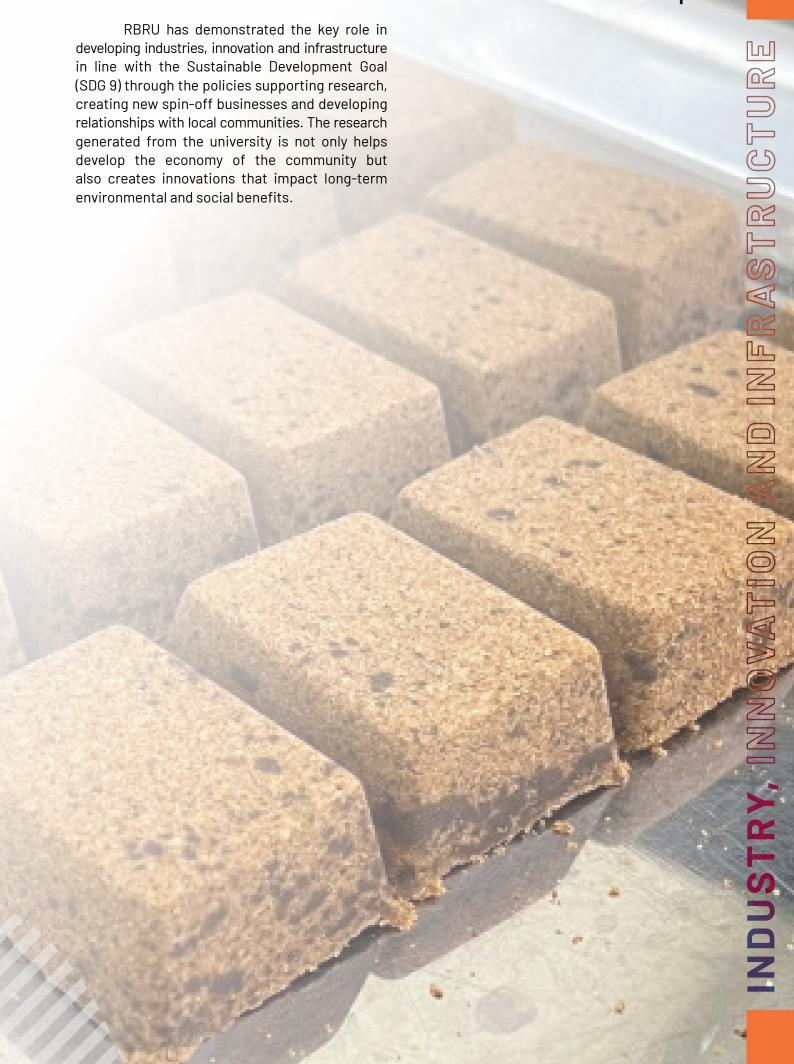
Picture 6: Goal 9 Field Work in Eastern Elephant Conservation Community Enterprise Area

Participation between universities and communities at the policy level for sustainability

RBRU has participated in promoting local community businesses through the development of the "Rabbit Chan" brand, which operated a business of processed Mapeed product, andalso the development of the "Nai Jam" brand, which operated a business of seasoning product from fermented fish. Two brands above have been developed from intellectual property by conducting research within the university. Participitation is linked to university policies that support the potential of the community and is elevated to a company as university spin-offs. The obvious results of generating income with sales expansion of more than 600,000 baht per year have proved the better quality of local community.



Picture 7: Goal 9 Nai Jam brand's Fermented fish Factory



11 SUSTAINABLE CITIES AND COMMUNITIES



Public access to building

On February 14th, 2000, the Rambhai Barni Rajabhat Institute (later Rambhai Barni Rajabhat University) invited the Royal Monument of Queen Rambhai Barni of the reign of King Rama VII to be enshrined on a pedestal on the side of the Palace (Gray Building) in the area of Suan Ban Kaew Palace. Later, local residents and those of neighboring provinces have been able to visit these sites, free of charge, at any time.



Public access to libraries

The Central Library of Rambhai Barni Rajabhat University has offered a variety of services that distribute information free of charge to both the public and members as follows:

1) information services that can be accessed by the public 24 hours,

 information services for any research from the university network that only members can access 24 hours.



Public access to museum

"Suan Ban Kaew Palace" served as the residence of Her Majesty the Queen Rambhai Barni, the Queen of the reign of King Rama VII, in Chanthaburi Province. At present, it is the location of Rambhai Barni Rajabhat University and the Queen Rambhai Barni Museum. The museum showcases personal belongings of Her Majesty the Queen Rambhai Barni and has welcomed visitors free of charge. The university has also provided complimentary tour guide services.



Public access to green spaces

Rambhai Barni Rajabhat University hosted a Science for Life, Environment, and Society BCG camp in the university's resource conservation forest area. The camp provided 120 elementary and lower secondary students with hands-on learning experiences related to biodiversity, environmental conservation, and green area awarenesses within the university campus. The students engaged in five educational activity stations

Participation in Arts, Culture, and Intangible Heritage

The Faculty of Humanities and Social Sciences of RBRU offered teaching in the Department of Music Education. The department hosted activities that supported and promoted art, culture,

intangible heritage, and local arts. The activities of the Music Department during 2023 were as follows:

- May 3rd, the band participated in a music and traditional performance competition for a royal trophy from HRH Princess Maha Chakri Sirindhorn, a prestigious cultural event.
- May 12^{th} 13^{th} , 2023, the "Wang Suan Ban Kaew" music ensemble from the Faculty of Humanities and Social Sciences, Rambhai Barni Rajabhat University, performed at the "The Lost Recipe" event, celebrating Chanthaburi's heritage.
- December 4th, the university's orchestra played "Music in the Garden H.M. Song: MHESI played Father's song" in the honor of His Majesty the King Rama IX.
- December 6th, the university's wind orchestra played at the opening ceremony of the 19th National Youth Volleyball Championship (39th year).
- December 19th, the RBRU Wind Philharmonic performed at the 17th National Academic Conference at Rambhai Barni Rajabhat University.
- December 20th, Thai music ensemble played during the floral tribute ceremony of the 119th anniversary of H.M. Queen Rambhai Barni.
- December 21st, the RUBRU Saxophone Ensemble performed at the Somdet Phra Nang Chao Ramphai Phannee Day event.



Preservation and Conservation of Cultural Heritage

Rambhai Barni Rajabhat University, presented research on arts and culture at the 3rd National Conference and 13th International Conference of the Thai University Art and Culture Network, as well as the 4th International Creative Art Presentation. This event, themed "Borderless Multiculturalism: Promoting Nationally, Creating Globally," was held at Ayutthaya City Park, Phra Nakhon Si Ayutthaya Province.



Sustainable practices targets

Rambhai Barni Rajabhat University set sustainability travel goals under the university announcement regarding energy, resources, and environmental management for the year 2023. This included organizing document transportation services, encouraging carpool using university vans, promoting the use of bicycles or walking, opting for alternative energy vehicles, and providing shuttle services for students and the public within the university. These initiatives contributed to the evaluation of the university's 2023 energy management targets, fostering sustainable practices for the future.

Promote sustainable commuting

Rambhai Barni Rajabhat University has implemented a policy to promote sustainable travel, encouraging the use of bicycles or walking and advocating for taking the stairs instead of elevators, the university announcement regarding energy, resources, and environmental management for the year 2023. The Office of Arts, Culture, and Community Development promoted sustainable travel by providing electric bicycles for touring Wang Suan Ban Kaew and surrounding areas within the university.

Allow remote working

After the outbreak of the COVID-19 pandemic, Rambhai Barni Rajabhat University has continued to implement remote work and distance learning practices (University Announcement No. 0429/2022). The university allowed various forms of remote work.

Affordable housing for employees

Rambhai Barni Rajabhat University provided accommodation services for employees according to the criteria and regulations established by the university's accommodation management committee for the allocation of housing and residences to staff within a specified timeframe.

Affordable housing for Students

Rambhai Barni Rajabhat University provided accommodations for students at very low prices. The dormitories were as follows: Dormitory 2: up to 3 students together/room, and Dormitory 4: up to 4 students together/room. These could serve students and made it convenient to go to classes.







Pedestrian priority on campus

Rambhai Barni Rajabhat University has been committed to promoting a safe environment on campus by painting new crosswalks throughout the university to reduce the risk of accidents and enhance the safety of pedestrian.





Local authority collaboration regarding planning and development

Rambhai Barni Rajabhat University recognized the importance of having housing as a crucial factor for living, along with financial support and various benefits to enhance the quality of life. Therefore, the university collaborated with external agencies, including government sectors and well-known individuals in the local community of Chanthaburi, such as Associate Professor Dr. Pichanee Bodharamik.

Planning development – new build standards

The university issued an announcement regarding energy, resources, and environmental management for the year 2023 which was in line with the construction of buildings under sustainability standards, including material selection, color choice, and the use of natural light to replace energy consumption, thereby promoting sustainability in building construction.

Building on brownfield sites

Rambhai Barni Rajabhat University placed great emphasis on construction within the university. The university had a 5-year green university development plan (2017-2021). According to item 2 of the plan, the university established a policy for constructing buildings, constructing new buildings replacing aging structures. As a result, the university developed construction areas such as residential buildings and a golf driving range.





13 CLIMATE ACTION



Policy and Management

Rambhai Barni Rajabhat University has a policy to support the greenhouse gas reduction plan based on the 2019 greenhouse gas emissions report for Chanthaburi Province. The university, driven by the RBRU Carbon Neutrality Committee, has drafted a policy announcement on carbon neutrality and joined the Net Zero Campus network. The university has submitted the 2023 energy management report to the Department of Alternative Energy Development and Efficiency (DEDE), Ministry of Energy, and has provided data on energy use related to the university's greenhouse gas emissions to the website https://netzerocampus.org. In 2023, the university's total energy consumption was 17,184 gigajoules (GJ), with 15,841 GJ sourced from electricity and 1,343 GJ from fuel.

In addition, the university is working to install low-carbon energy sources and has initiated a solar energy project, utilizing 4.84 GJ of clean energy from solar LED lamps. The university organized the project "Assessing the Above-Ground Carbon Sequestration Potential of Forest Ecosystems to Achieve Net Zero Emissions" to educate students and staff about greenhouse gas emissions.



Picture 1: Goal 13 The University's solar energy development project



Picture 2: Goal 13 Assessing the above-ground carbon sequestration potential

Research and Innovation

The university staff from the Department of Physics and General Science, Faculty of Science and Technology, joined an international conference on climate change, focusing on "Comparing Climate Change Effects on the Occurrence of Wild Fires in Western Australia and Thailand,"

Teaching and Outreach

The Academic Services Office of Rambhai Barni Rajabhat University, in collaboration with Arsa Life Design Co., Ltd., has developed lessons for the general public to learn about and understand Low Emission Support Scheme (LESS) assessment and basic Carbon Footprint, enabling them to apply the knowledge they have gained in their daily lives.



Picture 3: Goal 13 E-learning course on the LESS (Low Emission Support Scheme) program and introduction to carbon footprints

Additionally, the Faculty of Science and Technology at Rambhai Barni Rajabhat University has organized a teacher development project that uses coral as a foundation for learning about the sea and coast. This project was supported by additional funding from AGC Vinythai Public Company Limited, the Coral Conservation Foundation, and the Chanthaburi Provincial Education Office.



Picture 4: Goal 13 KTeacher development program using the concept of learning from corals

Community Participation

The university has participated in activities focused on developing, restoring, and addressing water source issues in collaboration with heads of relevant government agencies, local administrative organization executives, and civil society representatives. Cooperative planning, discussion, and preparation have been underway to develop, restore, and resolve water source problems at the Dao Rueang Chaloem Phrakiat Canal, particularly concerning the drainage channels and recurring flooding in low-lying areas.

Additionally, the university, in collaboration with the Department of Mineral Resources, has monitored floods and landslides occurring in the Chanthaburi Province area to prevent and alleviate public disasters.



Picture 5: Goal 13 Project by the Sufficiency Economy Center to address drainage channels and recurring flooding in low-lying areas

14 LIFE BELOW WATER



Policy and Management

The university has implemented policies for the sustainable use of resources and required internal departments to use sustainably harvested raw materials from aquatic ecosystems in food preparation on campus. Moreover, the university offered classes on responsible fishing and safe, environmentally sustainable aquaculture, focusing on developing food products from aquatic animals to add value. These classes were operated and managed by faculty members, including those from the Sufficiency Economy Learning Center and the Eastern Agricultural and Food Products Research and Innovation Development Center in the Faculty of Agricultural Technology.

For water quality management, the university has established water quality quidelines and standards for discharges to maintain water quality and protect aquatic ecosystems as well as human health and welfare. The Eastern Agricultural and Food Products Research and Innovation Development Center, under the Faculty of Agricultural Technology, has implemented guidelines for treating and discharging wastewater that have been certified and accepted into the laboratory safety information management system of the National Research Council of Thailand (NRCT). In addition, the Office of the President has conducted wastewater quality inspections by collecting wastewater samples from various areas within the university and sending them to an external laboratory for analysis.

For plastic waste reduction, the university has action plans, continuously implemented by the Green Office since 2015, with the goals of reducing waste generation and promoting environmental sustainability. One of the important projects was the "RBRU Waste Bank" project,

operated by the Office of the President, which included key activities such as waste separation for reuse and value addition, as well as supporting the purchase of each type of waste. In the year 2023, the university was able to separate and utilize various types of waste amounting to 7,077 kilograms, which included 897 kilograms of plastic waste. It is estimated that this effort reduced carbon dioxide emissions by a total of 19,544 kg CO2 over the year. In addition, the university collaborated with relevant networks to operate the "Ocean for Life" project, which included the management of marine waste.



For marine pollution reduction, the university has a policy focused on the prevention and reduction of all types of marine pollution, particularly pollution from land-based activities. University personnel have implemented this policy by integrating it with research and academic services. Examples of related research papers include "Microplastic Contamination in the Chanthaburi Estuarine Ecosystem, Eastern Part of Thailand" and "Water Pollution Influencing Contamination of Vibrio Bacteria in the Coastal Aquaculture Area of Chanthaburi and Trat Provinces." Additionally, the university's faculty and students actively participated in regular

LOW WATER

beach cleaning activities to protect the ecosystem and support marine conservation.

The university has plans to minimize physical, chemical, and biological alterations, including through the master plan of Plant Genetic Conservation Project under the Royal Initiation of Her Royal Highness Princess Maha Chakri Sirindhorn (RSPG) - in the fifth phase, which implemented ecosystem conservation projects, such as watershed forest conservation, and coral reef projects. Additionally, the university has conducted a wastewater quality monitoring project under the Green Office initiative to prevent impacts on aquatic ecosystems both within and around the university.

For watershed management, the university has applied watershed management strategies to research projects focused on biodiversity in water sources, such as those in the master plan of Plant Genetic Conservation Project under the Royal Initiation of Her Royal Highness Princess Maha Chakri Sirindhorn (RSPG) - in the fifth phase in the seventh year. Moreover, the university has collaborated with 26 ASEAN university networks to study and plan the management of wetland areas in the region, particularly in the Mekong River basin, including monitoring the impacts of climate change.

Research and Innovation

The university supported teachers and researchers in producing research on monitoring and maintaining aquatic ecosystems, particularly those that are threatened. Examples of relevant research included "Microplastic Contamination in the Chanthaburi Estuarine Ecosystem, Eastern Part of Thailand" and "Water Pollution Influencing Contamination of Vibrio Bacteria in the Coastal Aquaculture Area of Chanthaburi and Trat Provinces." The university also collaborated with partner networks to implement the "Ocean for Life" project, which focused on six main activities: marine waste management, planting and restoring mangrove forests to serve as nurseries for aquatic animals, developing animal breeding centers, establishing conservation area boundaries, increasing habitat for marine animals, and supporting research on Ocean Health and Biodiversity Monitoring.

For aquatic ecosystem damage prevention in the marine tourism industry, the university has initiated projects that use technology to sustain the marine environment. The Faculty of Science and Technology has organized the project of rehabilitating coral reefs and developing learning resources. This activity involved placing two types of buoys: yellow egg-shaped buoys to mark the boundaries of the coral reef, and red buoys for mooring boats, preventing anchors from tour boats and fishing boats from damaging the coral reefs around Koh Mak and Koh Kood in Trat Province. The placement of these buoys was supported by the Department of Marine and Coastal Resources and the Coral Conservation and Restoration Network. The operation covered a distance of 200 meters to protect the coral reef area and was found to effectively reduce potential damage to the reefs.

The university has conducted research on observing, monitoring, and inspecting the health of aquatic ecosystems. Examples of research papers published in national and international academic journals included "Microplastic Contamination in the Chanthaburi Estuarine Ecosystem, Eastern Part of Thailand" and "Water Pollution Influencing Contamination of Vibrio Bacteria in the Coastal Aquaculture Area of Chanthaburi and Trat Provinces." The university also collaborates with relevant networks to implement the "Ocean for Life" project. The main activity focused on Ocean Health and Biodiversity Monitoring.

Education

The university has organized courses, projects, and community outreach activities focused on educating the community about freshwater ecosystems, tailored to the needs and participation of local residents. Some examples include: "A Study on the Prevention of Erosion of Chanthaburi River Banks in the Area of Tha Luang Subdistrict, Makham District, Chanthaburi Province," "A Sculpture Design to Enhance the Landscape and Develop it into a Tourist Area: A Case Study of Bueng Public Park in Front of Tha Chang Municipality, Tha Chang Subdistrict, Mueang District, Chanthaburi Province," "A Floating Solar Water Pumping System for Foundation Farmers at the Household Level," and "A Wireless-Controlled Solar Drip Irrigation System Prototype for Remote Agricultural Areas." In addition, the university has organized the project "Promoting Local Environmental Research" through the GLOBE Program (Global Learning and Observations to Benefit the Environment). The activities included

both lectures and hands-on education for local youth on the study of water quality and biodiversity in freshwater ecosystems.

The university has promoted a student club project titled "Gen A Volunteers as Community Changemakers." This initiative involved volunteer activities focused on "Volunteer Power: Building Weirs for the Community" in the Khao Sampao Kham community forest in Chanthaburi Province, to promote the conservation of water and community forests. The university has also organized projects and community outreach activities aimed at educating both local and national communities about fisheries management and sustainable water tourism. Since 2018, the university has continually provided education through the Blue Swimming Crab Bank project to fishing communities along the eastern coast on effectively restoring the population of Blue Swimming Crabs and other economically important aquatic species, as well as promoting sustainable fisheries management and conservation-based tourism for sustainability. In addition, the university has promoted a research project to develop creative tourism in Bang Sa Kao Subdistrict, Chanthaburi Province, with a focus on promoting environmentally friendly, community-based tourism.



Moreover, the university collaborated with relevant networks to implement the project "Ocean for Life," which focused on six main activities: marine trash management, planting and restoring mangrove forests to serve as nurseries for aquatic animals, developing aquatic animal breeding centers, establishing conservation area boundaries, increasing habitats for marine animals, and supporting research in Ocean Health & Biodiversity Monitoring.

In addition, the university has developed various courses and projects about maintaining water resources. For example, courses on maritime zones and national maritime interests have been

added to the general education curriculum for students in all undergraduate majors. Additionally, the university has developed good practices for restoring coral reef ecosystems through a project focused on creating networks for coral rehabilitation and developing learning resources. The Faculty of Science and Technology at Rambhai Barni Rajabhat University, in collaboration with the Provincial Education Office, has organized a teacher development project that uses coral as a foundation for learning about marine and coastal ecosystems and has developed a training manual to serve as guidelines for the management of water resources.

Community Participation

The university has continually provided education on raising awareness about the impacts of overfishing, illegal fishing, ecosystem destruction from the use of marine resources, and environmentally responsible practices through the Blue Swimming Crab Bank project to 41 fishing communities along the eastern coast. This included campaigns to avoid catching aquatic animals that are carrying eggs, not capturing or exploiting animals smaller than their reproductive size, and using appropriate, non-destructive fishing gear. Moreover, these two projects have continually provided activities for local youth to ensure the sustainability of the results in the future. In addition, the university partnered with key networks to roll out the "Ocean for Life" project, which encompasses six key activities: marine trash management, planting and restoring mangrove forests to serve as nurseries for aquatic animals, developing aquatic animal breeding centers, establishing conservation area boundaries, increasing habitats for marine animals, and supporting research in Ocean Health & Biodiversity Monitoring.



The university has begun a project that focused on creating networks for rehabilitating coral reefs and developing learning resources. The Faculty of Science and Technology has organized a teacher development project that uses coral as a foundation for learning about the sea and coast. This project aimed to establish and develop networks for coral reef restoration, as well as to disseminate knowledge gained from research and innovations in coral restoration for teaching and learning at the school level, and to share this knowledge with the community. A program was implemented for coral conservation and restoration in marine and coastal areas continuously affected by human activities, such as the cultivation and restoration of corals in Trat Province and other locations like Koh Sichang, Koh Phayam, and Koh Khai. Furthermore, the university has collaborated with network partners across all sectors to strengthen the community by jointly establishing guidelines for the conservation and restoration of coral reefs appropriate to the local context. This effort resulted in the Koh Mak community in Trat Province receiving a world-class award, ranking 2nd in the 2023 Green Destinations Story Awards for management and rehabilitation. Moreover, the university collaborated with relevant networks to implement the project "Ocean for Life" to sustainably develop coastal resources and the marine environment.

Moreover, the university collaborated with local communities to invest effort in maintaining the shared aquatic ecosystems. For example, Rambhai Barni Rajabhat University has partnered with networks such as the Department of Marine and Coastal Resources, the Department of National Parks, Wildlife and Plant Conservation, and the Water Resources Research Institute of Chulalongkorn University. These organizations have expressed a willingness to collaborate on a project aimed at creating networks for coral reef rehabilitation to restore ecosystems in the areas around Koh Mak and the natural coastal zones of the Eastern region. In addition, the university collaborates with PTT Exploration and Production Public Company Limited, the Rayong Marine and Coastal Resources Office, the Krajae Subdistrict Municipality, and the Samphao Kwam Community Group to implement the "Ocean for Life" project through six main activities: marine waste management, planting and restoring mangrove forests to serve as nurseries for aquatic animals, developing animal breeding centers, establishing conservation area boundaries, increasing habitat for marine animals, and supporting research on Ocean Health and Biodiversity Monitoring.



15 LIFE ON LAND



Policy and Management

The university has established a policy to support the operational budget of the Sufficiency Economy Center within the Faculty of Agricultural Technology. This initiative aims to transfer agricultural knowledge and provide academic services that sustainably benefit the community. Activities include rice cultivation, vegetable and fruit tree planting, herbal and mushroom cultivation, food processing, fertilizer production, and livestock farming. The university also runs a project to conserve genetic resources of food crops, vegetables, and fruits within the Plant Genetic Conservation Area. Examples of conserved species include mushrooms, cardamom, bananas, durians, mangosteens, salaccas, chilies, limes, and Thai eggplants. These resources serve as a food source and a learning resource, integrated into the curriculum of various university programs and shared with external organizations.



Picture 1: Goal 15 Project of the Sufficiency Economy Center

In addition, the university has a policy for the sustainable use, conservation, and restoration of terrestrial ecosystems related to its operations, particularly forests, mountains, and dry areas. This policy, announced in 2023, includes actions under the 7th Plant Genetic Conservation Project

5-Year Master Plan (2023-2028). It focuses on conserving and utilizing protected forest areas and exploring and researching natural terrestrial ecosystems, including various types of forests, mountains, and dry regions. Furthermore, the university allocates project budgets for academic services and research initiatives to study local resources within these ecosystems.



Picture 2: Goal 15 Survey and research in the land ecosystem of the Plant Genetic Conservation Project (RSPG)

The university also monitors and classifies the status of living organisms in its 50-rai forest area according to the IUCN Red List. Notably, 74 bird species were identified in the forest, categorized as Least Concern (LC), and classified as protected wildlife under the Wildlife Preservation and Protection Act, B.E. 2562. The university researches the foraging behavior and distribution of these birds, such as the Black-crowned Night Heron (Gorsachius melanolophus), which primarily forages on the ground and is commonly found near water sources.



Picture 3: Goal 15 Monitoring and classifying the status of living organisms in the 50-rai forest area of the university according to the IUCN Red List

Regarding the protection of species on the Red List, it was noted that the protected forest area faces no threats from predators or human disturbances. The university has also studied the Purple Microchirita (Microchirita purpurea), an endemic plant species from Chanthaburi Province, classified as Endangered (EN). In 2023, the university researched to propagate and preserve the genetic material of the Purple Microchirita in a sterile environment using growth inhibition techniques.



Picture 4: Goal 15 Alien species in the area of the university

The university has further developed policies under the 7th Plant Genetic Conservation Project 5-Year Master Plan to reduce the impact of alien species within its areas. This includes actions such as removing water hyacinth, using nets to

prevent disturbances from pigeons, and surveying alien species in the protected forest areas, such as African giant snails, common mynas, bitter bushes, domestic cats, white lead trees, giant mimosa trees, and golden apple snails. The university also has a policy on plastic waste reduction, which includes sorting waste by type, designating appropriate disposal locations, managing each kind of waste, and maintaining a waste accounting system. Personal packaging is encouraged for consumption, and used plastic food containers should be rinsed before disposal in recycling bins to reduce single-use plastic.



Picture 5: Goal 15 Process on waste disposal covering hazardous materials

Additionally, the university collaborates with Advanced Wireless Network Co., Ltd. to establish a memorandum of understanding (MOU) as part of a community network focused on environmental issues, including the disposal of electronic waste under the "Thai People Without E-Waste" project.

Research and Innovation

Through the Plant Genetic Conservation Project, the university conducts activities to survey resources in a 50-rai forest area. These activities include surveying plant species, butterflies, and mushrooms and enhancing biodiversity by breeding the blue pansy butterfly and releasing it into the forest. The university also cultivates edible mushrooms and operates a plant tissue culture laboratory within the Faculty of Agricultural Technology. This laboratory propagates and conserves local plant genetic resources in a sterile environment, including native orchids and endemic species like the Purple Microchirita (Microchirita purpurea).

FE ON LAND



Picture 6: Goal 15 Breeding the blue pansy butterfly and releasing it into the forest area through the Plant Genetic Conservation Project.



Picture 7: Goal 15 A plant tissue culture laboratory for propagating and conserving local plant genetic resources in a sterile environment, such as native orchids, and releasing them into the forest area.

Additionally, the university offers academic services to students and the public for resource exploration and research. External surveys have been conducted on large mushrooms, reeds, local fish, and coffee in Chanthaburi Province, which are utilized for aquaculture, food processing, and academic services to the community. Furthermore, the university investigates the biodiversity of organisms in rubber tree plantations to gather data for assessing compliance with Forest Stewardship Council (FSC) standards. Meeting these standards will allow farmers to sell latex at higher prices, provided the areas remain undisturbed by species listed on the IUCN Red List.



Picture 8: Goal 15 Survey and research in Robusta coffee in Chanthaburi Province (Chanthaboon coffee)



Picture 9: Goal 15 Survey the biodiversity of organisms in rubber tree plantations project, Trat Province

Moreover, the university conducts research and innovation on sustainable agricultural land management. For example, research includes isolating endophytic actinomycetes from native durian varieties and studying their ability to inhibit human pathogenic bacteria. The university also emphasizes environmentally friendly agricultural practices by researching pathogenic fungi in chili fields in the Pong Nam Ron District of Chanthaburi, where disease outbreaks have occurred. This research includes identifying microorganisms found in vermicompost that can inhibit pathogenic fungi affecting chili plants and promoting farmers' use of vermicompost to reduce agricultural chemical inputs.



Picture 10: Goal 15 Researching pathogenic fungi in chili cultivation fields of farmers in the Pong Nam Ron District of Chanthaburi Province

Teaching and Outreach

The university supports the implementation of three tissue culture training courses: one on the propagation and development of "Net Muang" in a sterile environment, another on the propagation of local orchids in a sterile environment, and a practical biology techniques course focusing on tissue culture. These courses equip participants with the knowledge and skills to propagate plants using tissue culture techniques. Trainees

will learn to effectively apply their knowledge to increase plant numbers and use simple equipment for tissue culture nationally.



Picture 11: Goal 15 Training program on cultivating oyster mushrooms, offered to inmates at the Thung Benja Open Correctional Institution in Tha Mai District, Chanthaburi Province, to equip them with skills for employment after their release.

Additionally, the university organizes mushroom cultivation training programs through the Faculty of Science & Technology. One program, focused on cultivating oyster mushrooms, is offered to inmates at the Thung Benja Open Correctional Institution in Tha Mai District, Chanthaburi Province, to provide them with employment skills upon release.



Picture 12: Goal 15 Tissue culture training courses on the propagation of local orchids in a sterile environment and the practical biology techniques course (tissue culture).

The university also runs a project to plant sunn hemp to improve soil quality at the Sufficiency Economy Learning Center. Here, students gain hands-on experience in soil enrichment using green manure. Furthermore, the university conserves 50 rai of forest on campus, divided into four zones that serve as a local resource learning center. These zones include original forests, peat swamp forests, water sources, and plant conservation areas. The university has also assessed the forest's potential for

above-ground carbon sequestration to mitigate greenhouse gases. The findings indicate that the forest can store 6,571 tons of CO₂.



Picture 13: Goal 15 The Forest's Potential for Above-Ground Carbon Sequestration Project to mitigate greenhouse gases

Participation in the Local Community

The university collaborates with local communities to conserve and sustainably utilize terrestrial ecosystems. One example of this collaboration is with the Chang Toon Subdistrict Administrative Organization and Ban Chang Toon School, supported by the Bureau of Bioeconomy Development (BEDO), to implement a biodiversity bank project. This project includes surveying plant species based on local knowledge in the Kao Koh Choo community forest, establishing a bank plot for growing herbal plants with signage for each species, creating a deposit-withdrawal system for their use, processing food from plant species, and linking tourism routes in the Bo Rai District of Trat Province.



Picture 14: Goal 15 Biodiversity Bank Project of Herb's Chong.

Additionally, the university has formed a cooperation agreement between the Plant Genetic Conservation Project at Rajabhat University and the Song Phi Nong Subdistrict Municipality to strengthen the community's conservation efforts. This partnership involves surveying, collecting, and preserving plant genetic resources, creating a resource database, and providing academic services to the community.



Picture 15: Goal 15 A cooperation agreement between the Plant Genetic Conservation Project at Rajabhat University and the Song Phi Nong Subdistrict Municipality to strengthen the community's conservation of resources in the Song Phi Nong Subdistrict.

Furthermore, the university has organized academic service projects to expand local communities' opportunities in sustainable land management for tourism. One such project is the "Experiencing Attractive Chan Way of Life Project @ Chanthaburi Waterfront," which develops a community tourism route along the Chanthaburi riverside and establishes a community learning center to explore the lifestyle and history of the riverside community. Another initiative, the Conservation Tourism Development Project by the Baan Samphao Kwam Conservation Group, focuses on developing conservation tourism routes that benefit society and the promotion of shrimp paste products, created using local wisdom, under the brand "Samphao Kwam" in the Na Yai Am District of Chanthaburi.



Picture 16: Goal 15 "The Experiencing Attractive Chan Way of Life Project @ Chanthaburi Waterfront" Project



Picture 17: Goal 15 Conservation Tourism Development Project by the Baan Samphao Kwam Conservation Group



PEACE, JUSTICE AND STRONG INSTITUTIONS



Promote and support the election of representatives of students, lecturers and staff

Rambhai Barni Rajabhat University has organized an election of students and lecturers to promote and support the performance of duties in terms of social justice and the exercise of rights according to the rule of law in democratic governance.

In addition, there has been an election of students in both regular and special sections to serve as the president of the student organization, student president and student council president, which will be a component of the university promotion committee.

The Student Development Division has recruited volunteer students to organize the election of student representatives every academic year to allow students to participate in management in accordance with the principles of good governance



Picture 1: Goal 16 Election Results Student Organization President and Student Club President (Regular Program) Academic Year 2023

In addition, the Office of the President has elected lecturer representatives to serve as committee members, such as university council members from permanent lecturers



Picture 2: Goal 16 Election of Faculty Representatives to the University Council from Permanent Faculty

Student Clubs of Rambhai Barni Rajabhat University

Rambhai Barni Rajabhat University has permitted the formation of student clubs under the regulations on student activities, B.E. 2549 which stipulates the composition and acquisition of the student club committee and operates under the rules to have student clubs for the activities of students in each faculty, as well as providing opportunities for students to form clubs. All students have the freedom to choose clubs based on their interests. The university opens for club membership applications every academic year. Thousands of students are interested in joining the project







Picture 3: Goal 16 Pictures of the student club websites of each



Picture 3: Goal 16 Club Membership Application (Academic Year

Providing expert advice to the government sector

Providing advice and transferring knowledge to students in various schools in the Eastern region aims to enhance legal knowledge for students at all levels, focusing on creating awareness of rights and duties under the Constitution of the Kingdom of Thailand B.E. 2560, as well as helping to create a foundation of understanding about the law and living in society responsibly



Picture 5: Goal 16 Project for undergraduates educate juniors on legal knowledge for students at various levels.

Rambhai Barni Rajabhat University has organized a project on the control and prevention of non-communicable diseases in the community using interdisciplinary knowledge at a government hospital to develop knowledge and skills for the community based on the concept of public health integration and to create a working network between the university and the community on kidney rehabilitation based on the concept of public health integration. The participants will take this innovation to disseminate to the community. The university, hospital, and community have continued to collaborate in the work



Picture 6: Goal 16 Community Noncommunicable Disease Control and Prevention Project with interdisciplinary knowledge at government hospitals to develop knowledge and skills for communities and create a network of work among universities.

Providing services and education to policymakers and legislators

Rambhai Barni Rajabhat University organized an online training program on basic laws on administrative law and government procurement law. The program included discussions on administrative law, which is related to the government and the public, as well as discussions between lecturers and participants.



Picture 7: Goal 16 Basic Law Training Project on Administrative Law and Government Procurement Law via Online System

Rambhai Barni Rajabhat University organized an operational project, a curriculum for developing teacher competence towards being a professional, under academic cooperation from 38 Rajabhat Universities. The objective is to develop and instill the spirit of being a teacher, develop one's potential according to the agreement on work development with skills in learning management according to community guidelines, including collecting data and monitoring progress in operations to comply with the agreement on work development (PA) which is consistent with professional competence





Picture 8: Goal 16 Operational Project, Teacher Competency
Development Curriculum to Professionalism under the Academic
Cooperation of 38 Rajabhat Universities (Model 1), Generation 1, 2

Participation in government research and organizing a forum to help the public

Rambhai Barni Rajabhat University organized a forum project on the management guidelines of the "Ruam Chan Ruam Jai" fund. This project was initiated by Phra Dhammawachiramedhi, the abbot of Hong Rattanaram Temple, who had the idea for Rambhai Barni Rajabhat University to collaborate with the Chanthaburi Provincial Police Office to organize a united Pha Pah Samaggi Project to contribute to the "Ruam Chan Ruam Jai" fund to help people in communities affected by the wild elephant problem to gain a common understanding of the management of the "Ruam Chan Ruam Jai" fund and the guidelines for helping volunteers to monitor wild elephants and disaster victims in Chanthaburi Province. In the ceremony, life insurance policies and items to support the work were presented to representatives of volunteers to monitor wild elephants and disaster victims in Chanthaburi Province



Picture 9: Goal 16 A Forum Project on the Management Guidelines of the "Ruam Chan Ruam Jai" Fund



17 PARTNERSHIPS FOR THE GOALS



Policies for Driving the Institution towards Sustainable Development 2023

Rambhai Barni Rajabhat University has announced key policies to drive the institution towards sustainable development, aligning with the 17 Sustainable Development Goals (SDGs) of the United Nations. These goals encompass a wide range of activities, including policymaking, research, innovation, teaching, and community engagement, all aimed at fostering peace and prosperity within society. One example of implementing these policies was the project to adapt wireless fencing for wild elephant warning systems in Ban Sub Ta Han, Thap Chang Subdistrict, Soi Dao District, Chanthaburi Province. This project was a collaboration between the Faculty of Computer Science and Information Technology at Rambhai Barni Rajabhat University, the Khun Song Subdistrict Administrative Organization, local community leaders, and the public. The primary objective was to address the issue of wild elephants encroaching on farmland, which directly impacted agricultural productivity and the livelihoods of local residents. The wireless fencing system monitored and prevented wild elephant intrusions. When intrusions occured, the system immediately alerted local residents and relevant officials. This innovation helped reduce damage to agricultural produce, enhanced safety, and increased income for local people. Rambhai Barni Rajabhat University has committed to developing projects and innovations that benefit local communities and society, contributing to the creation of a sustainable world.







Picture 1: Goal 17 On-site Installation of a Wireless Fencing System for Monitoring and Preventing Elephant Intrusions at Ban Subta Han, Thap Chang Subdistrict, Soi Dao District, Chanthaburi Province.

Collaboration with the Community through Research: The Blue Swimming Crab Bank Project

Rambhai Barni Rajabhat University has committed to fostering collaboration with the community through research and various beneficial projects. One of the most significant initiatives was the Blue Swimming Crab Bank Project, which began in 2018 and continues to this day. This project is a result of collaboration between the university, government agencies, private sectors, community enterprises, local leaders, and the public. The Blue Swimming Crab Bank plays a crucial role in marine resource conservation and promoting the community economy in the eastern region.

Currently, there are 41 Blue Swimming Crab Banks across Rayong, Chanthaburi, and Trat provinces. Beyond preserving the genetic diversity of blue swimming crabs, the banks have been developed into tourist attractions and learning centers for coastal and community lifestyles. For example, the Ban Nam Chieo Crab Bank has been transformed into a comprehensive learning center with the potential to attract educational tourists. This development has helped increase income and market opportunities for local communities.



Picture 2: Goal 17 Collaboration between the university, government agencies, private sectors, community enterprises, local leaders, and the public to establish the Blue Swimming Crab Bank.

Through its consistent and strong operations, the project has gained national recognition. The Ban Nam Chieo Blue Swimming Crab Bank received the 14th Thailand Tourism Awards (Kinnari Award) in 2023 for being an outstanding community-based tourism destination. This achievement resulted from close collaboration with government and private sectors to enhance the quality of tourism products and services to meet higher standards.

Additionally, the Blue Swimming Crab Bank Project received two Thailand Tourism Silver Awards in the following categories:

- 1. Learning & Doing Tourism Attractions
- 2. Community-Based Tourism The Blue Swimming Crab Bank Project of Rambhai Barni Rajabhat University serves as a prime example of using research to drive local development. It not only helps conserve natural resources but also improves the quality of life and income of local residents. At the same time, it creates sustainable learning centers and tourism destinations.



Picture 3: Goal 17 The Ban Nam Chieo Blue Swimming Crab Bank received the 14th Thailand Tourism Awards (Kinnari Award) in 2023.



Picture 4: Goal 17 Award for Learning & Doing Tourism Attractions Ban Nam Chieo Community Tourism Enterprise, Trat Province.



Picture 5: Goal 17 Award for Community-Based Tourism Attractions Ban Nam Chieo Tourism Group, Trat Province.

Education for SDGs towards Sustainable Development

Rambhai Barni Rajabhat University prioritizes the integration of education for sustainable development, offering courses that cover all 17 Sustainable Development Goals (SDGs). At the undergraduate level, the course "Royal Initiatives and Sustainable Development" is designed to explore the royal projects initiated by His Majesty King Bhumibol Adulyadej the Great, focusing on improving the quality of life and well-being of citizens. Students learn about the Philosophy of Sufficiency Economy and practical applications for personal and community development in alignment with the SDGs.

In the general education curriculum, the university offers courses related to sustainable development, such as "Integrated Humanities," "Green Citizenship," and "Psychology and Self-Development." These courses aim to raise awareness and equip students with skills in

sustainability and environmental conservation.

At the graduate level, the master's program in Governance and Sustainable Development Management features courses that emphasize sustainability through political dimensions, such as "Politics of Sustainable Development," "Green Politics," and "Ecological Political Theories," along with seminars on "Human Rights and Sustainable Management." Meanwhile, the Ph.D. program in Interdisciplinary Studies for Sustainable Development includes courses linked to SDGs, such as "Theories of Social Development and Change," "Alternative Technology and Local Development," and "Innovation for the Environment and Sustainable Development."

To promote lifelong learning, Rambhai Barni Rajabhat University offers online learning services via its website https://mooc.rbru.ac.th. This platform provides short courses suitable for learners of all ages, meeting the demands of digital era learning that is accessible anytime and anywhere.



Picture 6: Goal 17 Sufficiency Economy Center, Rambhai Barni Rajabhat University

Engagement with Local Communities and Academic Services for Society

Rambhai Barni Rajabhat University has implemented the Suan Ban Kaew Social Enterprise Project, focusing on developing social businesses in collaboration with various external organizations. The initiative aims to promote economic and social development while improving the quality of life in local communities. The main activities include:

1. Social Enterprise for Social Transformation, a non-degree course supported by the Ministry of Higher Education, Science, Research, and Innovation. This course enhances social entrepreneurship skills. It emphasizes empowering students and the public to understand how businesses can drive societal change.

- 2. Social enterprise training for NGOs offers training sessions and Memorandums of Understanding (MOUs) that have been organized to build the capacity of NGOs in social entrepreneurship.
- 3. Development of Suan Ban Kaew Jelly Fang Products, supported by the Central Region Social Innovation Driving Unit under the National Innovation Agency, creates innovative products to meet market demands.
- 4. Suan Ban Kaew Social Enterprise signed an MOU with Thai Beverage Public Company Limited (ThaiBev) pledging collaboration to sustain ongoing social enterprise activities, fostering the development of strong and sustainable social businesses.
- 5. Suan Ban Kaew Social Enterprise has assisted Ban Pathawi Community Health Enterprise in registering as a social enterprise group. This support has enabled the community to generate income from exporting organic fruits to international markets. In return, the community has donated funds to support the project, showcasing a strong and sustainable relationship.



Picture 7: Goal 17 The Opening Ceremony of the Social Enterprise for Change Program (First Cohort).



Picture 8: Goal 17 Signing Ceremony of the Memorandum of Understanding (MOU) between Rambhai Barni Rajabhat University and Civil Society Empowerment Institute and the Opening Ceremony of the Training Program on Enhancing Civil Society Organizations into Social Enterprises (Social Enterprise for CSO).



Picture 9: Goal 17 Monitoring the Progress of the Project to Enhance Fang-Based Products through Creative Economy Concepts.



Picture 10: Goal 17 The Signing Ceremony of the Memorandum of Understanding (MOU) between Rambhai Barni Rajabhat University and Thai Beverage Public Company Limited.



Picture 11: Goal 17 The Enhancement of the Agricultural Community Enterprise for health at Ban Pathawi towards Becoming a Social Enterprise (SE)

In addition, the university implemented the Youth Preserving the Community Project by the Gen A team of Rambhai Barni Rajabhat University, which focused on developing local communities in the area of sustainable tourism. This project was in collaboration with the Government Savings Bank and the Academic Services Office of the university to develop the Khao Sam Phao Kwam area in Nayaiam District, Chanthaburi Province, into a learning center for the cultivation of economically important aquatic species. The project has received a national royal award, and the faculty advisor, along with the Gen A team students, also received the National Award for

Dedication to Local Communities and Society.

Rambhai Barni Rajabhat University is, therefore, a leader in driving sustainable development to create benefits for both local communities and society at large.



Picture 12: Goal 17 The Development of Local Communities in the Area of Sustainable Tourism by the Khao Sam Phao Kwam Conservation Group, Nayaiam District, Chanthaburi Province.



Picture 13: Goal 17 The National Award for Project Advisor's Dedication to Local Communities and Society



Picture 14: Goal 17 The National Award for Students' Dedication to Local Communities and Society

SUSTAINABILITY REPORT 2023-2024

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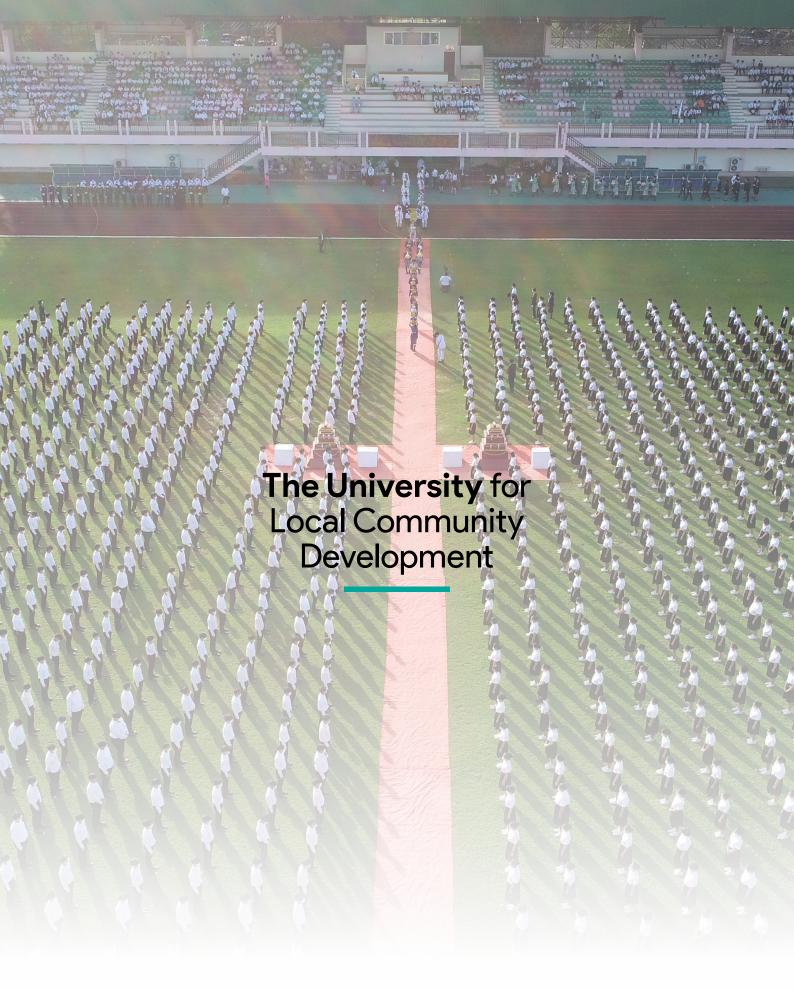
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