

# Memorandum of Understanding

## BETWEEN

**CIRAD, Centre de Coopération Internationale en Recherche Agronomique pour le Développement**, an Etablissement Public à caractère Industriel et Commercial (EPIC), having its registered office located at 42 rue Scheffer, 75116 PARIS, France, registered in the Paris Trade and Companies Register, under number 331 596 270, and duly represented by Ms. Elisabeth Clavier de Saint Martin, in her capacity as Chief Executive Officer and by a mandate by Dr. Francois Roger, Resident Regional Director for Continental Southeast Asia,

referred to hereinafter as "**CIRAD**",

## AND

**Faculty of Natural Resources, Prince of Songkla University**, a leading public university, committed to academic excellence, reputable research and innovation from Thailand, having its registered office located at 15 Karnjanavanich Road, Hat Yai, Songkhla 90110, Thailand. The Faculty of Natural Resources is duly represented by Assoc. Prof. Dr. Chaiyawan Wattanachant, in his capacity as Dean,

hereinafter referred to as "**FNR-PSU**",

hereinafter referred to individually as the "**Party**" and collectively as the "**Parties**",

## WHEREAS:

**CIRAD** is the French agricultural research and international cooperation organization working for the sustainable development of tropical and Mediterranean regions.

**CIRAD** works in partnership to build knowledge and solutions and invent resilient farming systems for a more sustainable, inclusive world. It mobilizes science, innovation and training in order to achieve the Sustainable Development Goals. Its expertise supports the entire range of stakeholders, from producers to public policymakers, to foster biodiversity protection, agroecological transitions, food system sustainability, health (of plants, animals and ecosystems), sustainable development of rural territories, and their resilience to climate change. CIRAD works in

some fifty countries on every continent, thanks to the expertise of its 1,650 staff members, including 1,140 scientists, backed by a global network of some 200 partners. As such, it supports French scientific diplomacy operations.

**PSU** is a leading university, committed to academic excellence, reputable research, and innovation. **FNR-PSU** prepares students and learners through innovative learning methods, and it commits itself to educate students and learners to the key principles of Sustainable Development and their applications in multiple domains. **FNR-PSU** trains learners and students to apply such key principles both at the university and in real-life environments. PSU aims to closely support students along with a lifelong learning approach.

**CIRAD and FNR-PSU** have decided to jointly implement activities aiming at renovating the training system intended for the managers of perennial crop plantations - and possibly a wider audience - at the national level in **Thailand** (hereinafter "the **Project**", described in Appendix 1-B). The Parties agree to disclose the **Results** arising out of the **Project** in accordance with the confidentiality rules agreed between the **Parties**.

The **Project** is part of a broader initiative entitled: TALENT - Renovating Training Systems for Sustainable Plantation Landscapes in South-East Asia (hereinafter "**TALENT**" or "the **Program**", described in Appendix 1-A). This **Program** is partly supported by a grant from the Agence Française de Développement to CIRAD, under FEXTE Agreement n°CZZ2693, covering the years 2021 to 2026. A dedicated contract document between AFD and CIRAD defines the framework of this collaboration.

The implementation of the present Memorandum of Understanding between **CIRAD and FNR-PSU** shall be effective on condition the FEXTE agreement between **CIRAD** and AFD is properly executed. In the event of any difficulty in the implementation of the CIRAD-AFD agreement, **CIRAD** undertakes to inform **FNR-PSU** as soon as possible.

#### **THE FOLLOWING IS HEREBY AGREED:**

#### **PRELIMINARY ARTICLE. DEFINITIONS**

**Background:** means technical and/or commercial and/or scientific information and knowledge and/or any other type of information, in any form whatsoever, that can be protected or not, and/or whether protected or not under intellectual property, as well as all rights relating thereto, belonging to a **Party** or held by them before the date of entry into force of the Agreement and/or developed or acquired by the Party outside the scope of the **Project**.

**Agreement:** means the present Memorandum of Understanding (**hereinafter MoU**), its Appendices and any amendment.

**Confidential Information:** means all information and/or data, in any form and of any nature whatsoever, shared between the **Parties** in whatever form, on whatever media and by any means, designated or deemed to be such during negotiations and/or performance of the Agreement.

**Results:** means technical and/or scientific information and knowledge and/or any other type of information, whether protected or not, whether it can be protected or not under intellectual property, developed or acquired jointly by the Parties as part of the **Project** and arising directly out of work carried out in the context of the **Agreement**.

**Know-how:** means technical knowledge or skill, transferable and not immediately publicly accessible.

## ARTICLE 1. PURPOSE

The purpose of the present **Memorandum of Understanding** is to describe the terms and conditions under which **CIRAD** and **FNR-PSU** will collaborate to contribute to the achievement of the Project.

**CIRAD** and **PSU** will make every effort to ensure that this collaboration works smoothly, in accordance with the obligation of means incumbent upon them.

## ARTICLE 2. DURATION

Notwithstanding the date of signature, the present **MoU** takes effect **as of January 1<sup>st</sup>, 2022 until December 31<sup>st</sup>, 2026**.

Such initial term may be extended by written agreement of all the **Parties**, specifying in particular the technical and financial modalities of the extension.

The expiry or termination of the **MoU** shall not affect the stipulations of the following Articles: "Confidentiality and Publication", "Ownership of Results", "Protection of Results", "Use of Results", "Exploitation of Results", "CIRAD Mandate", for as long as the rights attached to the Results remain in force.

## ARTICLE 3. COORDINATION, PLANNING, MONITORING AND EVALUATION

### 3.1 Persons

The dedicated personnel which are responsible for monitoring the present **MoU** and for **coordinating the execution of the proposed activities** are:

- **for CIRAD:** Prof. Alain RIVAL
- **for FNR-PSU:** Assoc. Prof. Dr. Chaiyawan Wattanachant

The Parties will keep each other informed of any change among TALENT Partners coordinators.

### 3.2 Yearly work plan execution and reporting

The **Parties** agree to consider that the activity years, as planned in the work plan, will start on June 1<sup>st</sup> and end on May 31<sup>st</sup>, so that it corresponds to a full academic year in all Universities of the four South-East Asian countries participating in TALENT. Therefore, by exception, the year 1 will start on the date the MoU takes effect on, as described in Article 2, and it will end on May 31<sup>st</sup>, 2022.

Every year, the **Parties** will agree on a planning of activities, which will be implemented during the following year. In this aim, two months before the end of each Project execution year, dated on the 31<sup>st</sup> of May each year, the parties will jointly draw up a Progress Report which describes the progress achieved over the period under consideration.

The **Parties** agree to set up a bilateral Project Operating Committee to jointly review this report and draw the planning of activities for the following year, in line with the progress achieved.

All along the execution of the Project, additional meetings between **CIRAD** and **FNR-PSU**, physically or *via* videoconference, can also take place upon request, either by **FNR-PSU** or by **CIRAD**.

### 3.3 Monitoring, evaluation and technical audit

The Parties agree that a number of indicators will be systematically collected regarding each training, a list of which is presented in Appendix 3 of this MoU.

The results of these assessments will fuel a permanent evaluation of the progress made, so that the work plan and the methodologies of training can be adjusted when needed.

**FNR-PSU** consents to host temporary technical audit assignments carried out by the funding body of the Program, namely Agence Française de Développement. During such technical audits, **FNR-PSU** undertakes to provide all evidence to the auditor, upon reasonable request.

## ARTICLE 4. FINANCIAL PROCEDURES

4.1. The Parties acknowledge that a national indicative budget has been attributed for implementing the activities of the TALENT Program in Thailand.

Within this national budget frame, in order to implement the **Project** activities:

- **FNR-PSU** undertakes to contribute to an indicative maximum amount of **80,000 €** (excluding taxes) in cash or in kind as its own contribution;  
AND
- **Cirad** undertakes to contribute in cash within an indicative maximum amount of **235,620 €** (excluding taxes) for a series of activities that **FNR-PSU** will implement, provided said activities are mentioned in the list of planned activities described in Appendix to the Agreement;  
AND

- **Cirad** also undertakes to contribute to an indicative maximum amount of **76,800 €** (excluding taxes) in kind as its own contribution.

4-2. In performance of the present MoU, **CIRAD** and **FNR-PSU** will agree on a yearly detailed work plan to be achieved jointly in the coming year, and on the indicative budget allocated to said yearly actions, within the general budget for **Thailand**. This programme and its attached budget will be detailed in a yearly **Letter of Agreement** signed by **both Parties**.

The successive Letters of Agreement will cover the periods as defined in Article 3 of the present **MoU**.

Payments related to the implementation of the **Letters of Agreement** will only be done by CIRAD to PSU upon submission of the planned deliverables **and** upon presentation of duly issued invoices.

Shall any tax or levy apply on these payments, **FNR-PSU** will take charge of such expenses.

## **ARTICLE 5. CONFIDENTIALITY AND PUBLICATION**

### **5.1 Confidential information**

Each **Party** undertakes not to publish or disclose in any way whatsoever Confidential Information belonging to the other **Party**. Said undertaking will remain in force for five (5) years after the expiry or termination of the **Agreement**.

The **Parties** will no longer be bound by the undertakings in this Article 5.1 if they can prove that the **Confidential Information**:

- was publicly available prior to its disclosure or after said disclosure in the absence of any breach of this **Agreement** ;
- was received from a third party in a lawful manner;
- was already in their possession before the **Agreement** was concluded;
- was developed independently and in good faith by members of their staff that did not have access to the **Confidential Information**;
- was disclosed by virtue of a Court decision;
- was used or disclosed with the written authorization of the **Party** to which it relates.

### **5.2 Communication of Results**

The **Parties** undertake to contribute to the visual identity of the **Program** through the use of a common style guide for any publication or communication intended for the public and linked to the **Project**.

The **Parties** agree, unless otherwise requested by the funding body (*Agence Française de Développement*), to indicate in publications or communications linked to the **Project**, that the **Project** is supported by *Agence Française de Développement* through the **Program**. **The Parties**

undertake to append the AFD logo on the front page of any document that will be produced within **the Project**.

Any communication or publication must also state that it is the sole responsibility of the author and that the *Agence Française de Développement* is not responsible for any use that may be made of the information contained in this communication or publication.

Any draft publication or communication relating to the **Results** produced by either **Party** must, throughout the duration of the **Agreement** and for six (6) months following its expiry or early termination, be authorized in writing by the other **Party** that will make known their decision within a maximum duration of two (2) months as from the request. After said period and in the absence of a response, authorization shall be deemed to have been granted.

The other **Party** may delete or amend any details where disclosure might infringe the protection and/or industrial and commercial exploitation of the **Results**. Such deletions or amendments must not reduce the scientific value of the publication.

If information contained in the publication or notice is to be the subject of protection under industrial property, one of the **Parties** may delay publication or issue of notice for a maximum period of eighteen (18) months as from the request for publication or notice made by the other **Party**.

Such publications and notices must state the participation of each **Party** in the **Project**, except where requested otherwise by the **Party** involved.

If the **Results**, and in particular **Know-how**, were likely to be the subject of industrial exploitation in secret or subject to special confidentiality measures, the Parties will determine the following by mutual agreement as part of a secret technical agreement:

- the portion of Results to constitute said secret technical agreement and which consequently cannot be published;
- the content of information that will not form part of the secret technical dossier and which may be published or communicated to third parties.

The content of the secret technical agreement may only be disclosed with prior written authorization from the other **Party** or where the **Know-how** has become publicly accessible.

### 5.3 Exceptions

The present **Article** shall not form an obstacle:

- either to the obligation incumbent upon each of the persons participating in the **Project** to submit a work report to their organization, insofar as such communication does not constitute disclosure within the meaning of industrial property legislation;
- or to *viva voce* examinations of researchers whose scientific work is related to the subject of the **Agreement**, such examinations being organized behind closed doors wherever this is necessary to guarantee, in compliance with university regulations in force, the confidentiality of certain **Results**.

## ARTICLE 6. OWNERSHIP OF BACKGROUND AND RESULTS

### 6.1 Ownership of Background

Each **Party** shall retain full ownership of their **Background**.

The communication of **Background** by one **Party** in performance of the **Agreement** may not under any circumstances be deemed to bestow, expressly or implicitly, any property rights upon the other **Party** receiving it.

### 6.2 Ownership of Results

The **Parties** are making a substantial investment in the **Project** and are jointly at the origin of the various **Results** subject to copyright and/or *sui generis* rights regarding educational content and material produced as part of the **Project**. They will thus be co-holders of intellectual property rights and will disclose said **Results** under their joint names.

The personal contributions of each author will be the subject of rights assignments to the benefit of the **Party** under whose authority the author is placed to allow for their exploitation, in particular if the contributions are exploited separately from the collective work in which they are participating. Each **Party** will be separately responsible for said assignments.

## ARTICLE 7. PROTECTION and EXPLOITATION OF RESULTS

7.1 The **Parties** acknowledge that the **Results** are meant to being shared for educational purposes within the framework of the TALENT Program. As such, the **Parties** are free to use the **Results**, freely of charge, for research and educational purposes exclusively, either for their own activities or with third parties.

In particular, the **Parties** shall use, freely and free of charge, the e-learning materials, for educational purposes, quoting both **Cirad** and the **TALENT Program**, each time such materials are used. No modification shall be made that would alter the original scientific and technical information provided through these materials. The **Parties** are free to use the **Results** of the **Project** for a period of five (5) years following the date of termination of the Project.

7.2. If need be, the **Parties** will meet to decide on the policy to be implemented in terms of protecting and exploiting **Results** and, where appropriate, the persons authorized to register intellectual property rights and/or protection of the **Results**.

Moreover, if the **Results** were likely to be the subject of protection and/or industrial and/or commercial exploitation, the **Parties** undertake:

- to ensure that co-ownership regulations and/or a joint exploitation agreement stating conditions for exploitation be drawn up as quickly as possible and prior to any industrial and/or commercial exploitation;
- to ensure that the names of the inventors//registrants are stated, unless the persons concerned object thereto;

- to act with due diligence to ensure that their respective staff, cited as inventors//registrants, provide all signatures and fulfil all formalities necessary for the registration, maintaining in force and defence of said intellectual property rights;
- to each deal with the remuneration of their own inventors//registrants.

The terms for such exploitation will be stated in the co-ownership agreement.

**7.3.** The Parties acknowledge that **CIRAD** has, as part of its mandate on Development, in any case, a right to grant non-exclusive exploitation licences at preferential conditions that may go as far as being free of charge, to its partners in the Global South.

**7.4.** **FNR-PSU** undertakes to share with **CIRAD**, with full transparency, any commercial arrangements that would be set up for the organisation and implementation of initial or continuing training, as well as the elements of construction of these prices. The **Parties** undertake to share the amount of fees charged for specific curricula, if such curricula arise from the **Project** activities, as well as the factors that have been taken into account for determining the amount of said training fees.

## ARTICLE 8. USE & EXPLOITATION OF BACKGROUND

### 8.1 Use of Background

In accordance with the stipulations on confidentiality and subject to third-party rights, each **Party** will make available to the other **Party**, free of charge, during the performance of the **Project**, their **Background** insofar as the latter is necessary to the performance of the **Project**.

### 8.2. Exploitation of Background

If exploitation of the **Results** requires the exploitation of **Background**, held partly or wholly by one **Party**, the latter will make every effort, subject to third-party rights, to promote such exploitation. If need be, the conditions of use for rights to exploit **Background** will then be established in a contract on an *ad hoc* basis.

## ARTICLE 9. TERMINATION

**9.1.** If there is a change in the economic, political or social context leading to an imbalance in the **Agreement** or difficulties likely to call into question the performance of the **Agreement**, the **Parties** undertake to inform each other and will make every effort to perform their contractual obligations. If it is impossible for one **Party** to perform their contractual obligations as a result of such new context, the **Parties** will meet to take into account the new context in the relationship between the Parties and will, if appropriate, amend the **Agreement** if the situation obliges them to do so.

**9.2.** However, the **Agreement** may be terminated by one of the **Parties** in the event of serious or repeated non-performance by the other **Party** of one or more of the substantive obligations contained in its various clauses. Such termination will only become effective three (3) months after



the sending by the complainant **Party** of a registered letter with request for return receipt setting out the reasons for the complaint, unless, within said period, the defaulting **Party** has fulfilled their obligations or provided the proof of a hindrance following an event of force majeure.

The exercising of this termination option does not release the defaulting **Party** from fulfilling the obligations entered into up to the date of effect of the termination, subject to any damages suffered by the complainant **Party** as a result of the early termination of the **Agreement**.

9.3. The **Agreement** shall be terminated if one **Party** is the subject of protective measures, receivership or judicial liquidation, following formal notice sent to the court-appointed liquidator, subject to the provisions of L.622-13, L.631-14, L.641-11-1-III of the French Code of Commerce.

The **Agreement** will also be terminated if the activities of one or more of the Parties are closed down, wound up or in the event of its voluntary winding-up.

#### ARTICLE 10. RESTITUTION

In the event of expiration or earlier termination of the **Agreement**, the Parties undertake to return to each other, within one (1) month, all documents and other materials shared in performance of the **Agreement**, and may not retain any copies or reproductions.

#### ARTICLE 11. INTUITU PERSONAE

The **Agreement** has been concluded *intuitu personae*. Consequently, neither **Party** shall be authorized to transfer all or part of the rights and obligations arising out of the **Agreement** without prior written authorization from the other **Party**.

If there is a restructuring of the capital of a **Party**, or a merger, sale or other transformation leading to a change in the *intuitu personae* nature of said **Party** taken into account in concluding the **Agreement**, the other **Party** shall have the option to terminate the Agreement within three (3) months as from the time at which the **Party** was made aware thereof. Such termination will only become effective one (1) month after the sending by the remaining **Party** of its decision by registered letter with request for return receipt.

#### ARTICLE 12. OUTSOURCING

Only natural or legal persons bound to a **Party** by a contractor agreement under which they carry out part of the work that is the subject of the **Agreement** and/or provide supplies in accordance with specifications that are specific to the Project shall be considered to be subcontractors of a **Party**.

Neither **Party** may outsource part of the work entrusted to them in performance of the **Agreement** without prior written authorization from the other **Party**. Each **Party** retains sole liability in respect

of the other **Party** and third parties for proper performance by their subcontractor of services entrusted to the latter.

Each **Party** shall impose upon the third-party subcontractor the obligations required for compliance with the provisions of the Agreement, in particular the obligations related to confidentiality.

Each **Party** undertakes in particular to take, under the outsourcing agreement, all necessary measures to acquire or be granted the intellectual property rights for results obtained by the third-party subcontractor, so as not to limit the rights entrusted to other **Party** under the **Agreement**.

### **ARTICLE 13. STAFF**

Under the **Agreement**, if either **Party's** staff, being paid by their employer, should need to work on the other **Party's** premises, they must comply with the terms and conditions of employment in force on the host premises and in particular with the provisions relating to secrecy, the organization of work, health and safety, and technical instructions concerning equipment used. However, such staff remain under the supervision of their employer.

Hence each **Party** will continue to be responsible, in respect of staff that they pay, for all employers' social security and tax obligations and to exercise in their regard all administrative and management prerogatives (grading, promotion, disciplinary measures, etc.). The host institution will provide the employer with all relevant information upon request.

The **Parties** will cover their respective staff for employment-related accidents and occupational diseases without prejudice to any claims against third parties that might be liable.

### **ARTICLE 14. LIABILITY AND INSURANCE**

#### **14.1. Liability**

Each **Party**, for their part, will bear all consequences for the civil liability that they incur under ordinary law as a result of any damage caused to a third party during work carried out in completing the **Project** under the **Agreement**.

The **Agreement** excludes any joint and several liability between the **Parties** in respect of third parties.

#### **14.2. Insurance**

Each **Party** declares that they have taken out an insurance policy or are insured by the State, or are acting as their own insurer to cover the consequences of their civil liability being incurred as a result of damage that might arise in performance of the **Agreement**.

Generally, each **Party** will be responsible for any insurance imposed by the law and which is necessary for their activities, in particular as regards employment-related accidents and occupational diseases, without prejudice to any claims against third parties that might be liable.

Each **Party** will ensure that the insurance policies necessary to cover any damage caused by third-party staff hosted on the premises of either **Party** in performance of the **Agreement** have been subscribed.

#### 14.3. Use of hardware and equipment

Hardware and equipment made available by one **Party** to the other under the **Agreement** shall remain the property of such **Party** that will be responsible for the corresponding insurance.

Consequently, each **Party** will bear the costs of damage suffered in performance of the **Project** by hardware, installations and tools that they own, including hardware entrusted to the other **Party** and test equipment, even if the other **Party** is liable for damages excepting serious or wilful misconduct by the latter.

Each **Party** undertakes to make normal use with all reasonable care of the hardware and equipment supplied. They will carry out maintenance thereof and ensure that the hardware is handled only by persons with sufficient skills, knowledge, experience and aptitude, in a context that is adapted to the nature of the hardware. If hardware or equipment is jointly purchased to carry out the **Project** or funded by one **Party**, the **Parties** must determine which **Party** will be the owner thereof and be responsible for insuring it.

#### 14.4. Use of knowledge

The **Parties** recognize that **Background**, Results or any other **Confidential Information** communicated by one **Party** to the other **Party** in performance of this **Agreement** is communicated as is, without any guarantees of any sort.

The following are expressly excluded: any guarantees relating to commercial and/or industrial exploitation of the **Results**, their safety, or their compatibility or compliance with a specific use, freedom from error or defects or dependency on third-party rights.

Such **Background**, **Results** and **Confidential Information** are used by the **Parties** under the **Agreement** at their respective sole cost and risk and, therefore, neither **Party** may have recourse against another **Party**, or any of their subcontractors, or their staff, for any reason whatsoever and in any respect whatsoever, as a result of the use of such **Background**, **Results** and **Confidential Information**.

### ARTICLE 15. ENTIRETY OF THE CONTRACT

The **Agreement**, its **Appendices** and any amendment represent all undertakings entered into by the **Parties** in the context defined in the introduction.

The **Agreement** cancels and replaces agreements and documents, both written and verbal, that have been established and exchanged over the negotiation period and having the same purpose. However, its existence will not affect rights and obligations resulting from contracts concluded previously between the **Parties** the purpose of which is distinct from that of the **Agreement**.

#### **ARTICLE 16. INVALIDITY OF A CLAUSE**

The nullity of one or more stipulations of the **Agreement** shall not lead to the annulment of the whole **Agreement**, except where the nullity of said stipulation makes the **Agreement** incompatible with the **Parties'** intention on the day of its signature.

If one of these clauses should be annulled, the **Agreement** will be pursued in the absence of the measure annulled. If it is necessary for the performance of the **Agreement**, the **Parties** will meet as soon as possible to negotiate in good faith a new clause to replace the annulled clause, by an amendment, making every effort to observe the **Parties'** joint intention as it existed on the day of signature of the **Agreement**.

#### **ARTICLE 17. APPLICABLE LAW**

The present **Agreement** is subject to French and Thai laws and regulations, respectively.


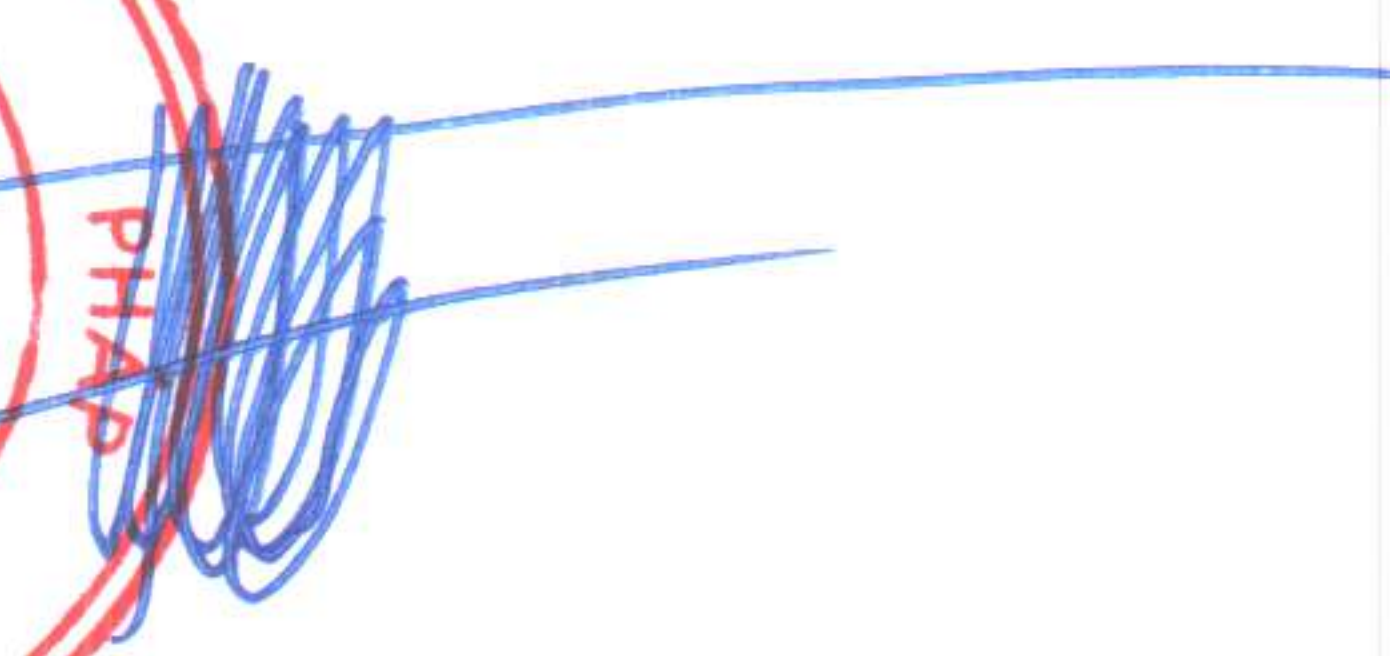
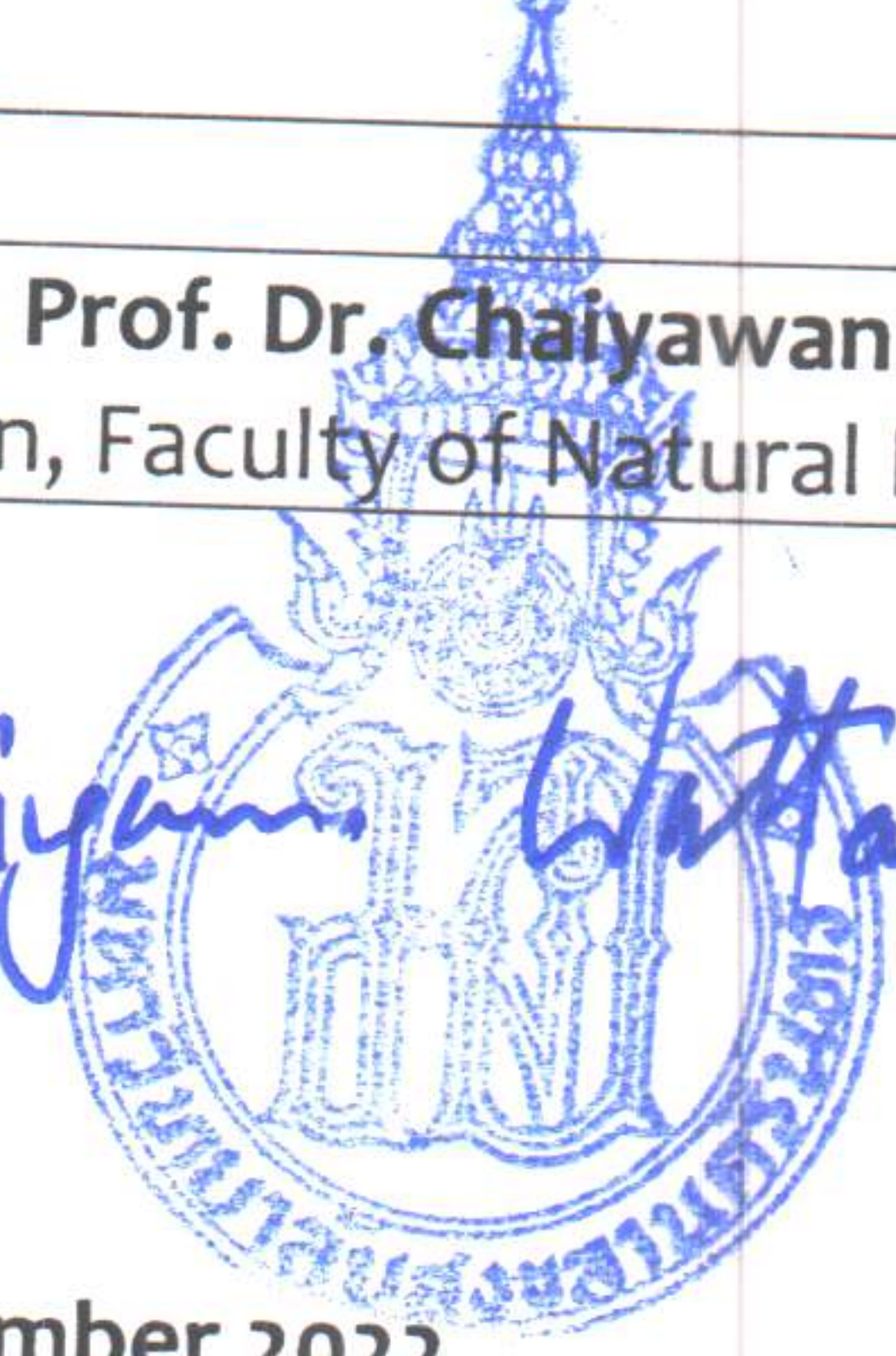

#### **ARTICLE 18. DISPUTES**

In the event of a dispute relating to the validity, interpretation, performance, or termination of the **Agreement**, the **Parties** undertake, prior to any other recourse, to make their best efforts to find an amicable solution.

If the disagreement subsists, the case will be brought before the competent French or Thai Courts.

**SIGNATURES**

In two (2) original copies.

<p><b>CIRAD</b></p>	<p><b>FNR-PSU</b></p>
<p><b>Name:</b> Dr. Francois Roger</p>	<p><b>Name:</b> Assoc. Prof. Dr. Chaiyawan Wattanachant</p>
<p><b>Position:</b> Resident Regional Director</p>	<p><b>Position:</b> Dean, Faculty of Natural Resources</p>
  <p><b>Date:</b> 03/02/2023</p>	  <p><b>Date:</b> 15 December 2022</p>

## APPENDIX 1-A

### Description of the TALENT PROGRAM

#### RAISING AWARENESS AMONG PLANTATION MANAGERS IN SOUTHEAST ASIA THROUGH RENOVATED TRAINING SYSTEMS

#### FROM PLANTATION MANAGERS TO SUSTAINABILITY MANAGERS

The ASEAN region is home to the third largest basin of tropical rainforest (after the Amazon and the Congo Basin); it is also the world's leading producing region for palm oil, rubber and timber (for wood and pulp). In this zone, perennial plantations of all sizes are exploited, managed by public or private operators. The development of these farms and estates results in an increased pressure on ecosystems, particularly natural forests and peatlands.

Today, any manager who is in charge of a plantation or an agricultural cooperative is faced with questions about sustainability, and she/he must take decisions that will have consequences in the very long term. Indeed, the production cycle of a perennial plantation is *ca.* 20 years for palm and rubber, 10 to 20 years for hardwood, 5 to 10 years for fuelwood and pulp. Any planting design will have to manage the constraints and opportunities linked to the cohabitation between economic development of local populations, agricultural production and conservation of natural spaces. Likewise, the access to increasingly demanding export markets presupposes the establishment of certification of the origins and production practices that will be under the responsibility of the plantation manager.

Existing training - both initial (academic) and ongoing (vocational) - on the sustainable management of plantations and/or climate-smart agriculture must be adapted. Both will have to integrate new agroecological concepts (agroforestry, precision agriculture, biological control, soil health, fertility management, and climate change) and new tools (traceability, certification, life cycle analysis, environmental and social risk management).

#### RAISING AWARENESS ON SUSTAINABLE PLANTATIONS

The TALENT program (TrAining on LandscapE maNagement) supervised by Cirad with FEXTE funding from AFD (CZZ2693) aims to raise awareness among the managers (present and future) who are involved in decision-making in tree-crop plantations, and in the development of relevant policies on sustainable development issues.



The Programme will provide practical research experience and opportunities for reflection and future-oriented perspectives. TALENT will seek to develop critical, analytical and integrative skills in order to propose innovative solutions to solve environmental, conservation and development issues in the ASEAN region.

It will also, through targeted training for the banking sector, provide access to financing for sustainable plantations, and thus stimulate their development.

The main objective of the partnership is to develop targeted training initiatives, which can contribute to the dissemination, over time and in the area, of good practices in terms of sustainable plantation management throughout the ASEAN.

To achieve this aim, the project potentially targets four ASEAN countries (namely Indonesia, Malaysia, Vietnam and Thailand), with a main anchoring in Indonesia, because this country is home to the headquarters of ASEAN, that of the local representation of Cirad, an AFD agency and an international forestry centre (CIFOR, based in Bogor).

In these countries, the local Cirad teams have identified four sectors (rubber, palm, timber, fuelwood and cellulose), around ten academic players and four target audiences (Masters students, managers from large plantations, managers of smallholder cooperatives and bank executives).

In addition to improving and enriching the existing Master or Undergraduate programs, the TALENT initiative also provides for the organization of thematic regional seminars and visits to sites of interest, making it possible to directly reach production operators (companies or cooperatives), financial actors (banks, credit organizations) and academic partners (academics, researchers, extension workers).

This feasibility study will be conducted by Cirad over 9 months, and will be endowed with a FEXTE funding of 200,000 euros. It will explore the modalities of implementing training activities in each of the four target countries, depending on their potential for perennial plantations, the training in place, the appetite of research and educational institutions, the character remarkable or innovative practices, the level of organization of small local growers, and the quality of the offer proposed by the financial actors involved.

Once the framework has been designed and the intervention program developed, it is planned to carry out activities over four academic years, mobilizing a financial envelope of 1 million euros from AFD. Based on a structured and sustainable training offer, and a structurally solvent demand for training, the project therefore appears to be a useful and shared catalyst, capable of offering adequate and lasting responses to currently unmet needs.

## DECISION MAKERS CONNECTED TO THE WORLD

One of the specific objectives of the TALENT Program is to create a network of decision-makers and trainers equipped with a solid knowledge of the fundamental principles of sustainability and supported by concrete R&D experience in the field.

The expected impact on the trainees' careers is enormous, as a wide range of opportunities are now available for trained executives, nationally and internationally, in governments, research, international organizations, and NGOs that participate in the design, implementation and management of projects on sustainable agriculture, forests or natural areas.

Regarding initial training, TALENT will prepare students to broaden their skills in sustainable agricultural and forestry development to respond to the economic, social and environmental challenges that are worsening due to climate change and globalization.

The TALENT program focuses on connecting training with environmental challenges recognized in international agreements (SDGs, Paris Conference).

The TALENT Program will build on the educational initiatives already in place in the region, with a clearly expressed wish to educate about the fundamental principles of sustainability in its three dimensions: ecological, social and economic. The project will focus on bringing new subjects into the training courses that are connected to major societal issues in the region.

The Program will provide existing courses with an in-depth look at the different concepts (Life Cycle Analysis, impacts of Land Use Change, wildlife management) and technical approaches (climate resilience, agroforestry systems).

The social analysis of the changes underway in the agricultural and forestry sectors is an integral part of this renewed teaching of agronomy and forestry organised under TALENT.

The main issues related to sustainable agricultural development (framed by the SDGs) will be approached from an interdisciplinary perspective.

With regard to vocational training, the Program will work in identifying the needs among various populations who are already active on plantations, namely: managers of large private plantations, managers of large cooperatives of small growers, and bank operators in charge of financing the agricultural sector. This involves designing professional modules, accessible to students and professionals, and offering new diploma qualifications and accreditations.

Finally, with regard to the general challenges of sustainable production and international marketing, it will be a question of identifying the themes of mutual interest, the public and private actors interested in these themes and of organizing regional workshops bringing together the stakeholders.

## RENOVATING EDUCATIONAL CONTENTS

In terms of academic training, the educational content of curricula will be revamped by:

1. **Adapting existing education programs in agriculture and forestry** (agronomy, genetics, cultural practices, integrated pest and disease control. The objective is to systematically integrate knowledge gained from the most recent research, in areas such as agroecology and agroforestry. Industry players and stakeholders from downstream subsectors (transformation, marketing, circular economy) will also be asked to participate in the training activities.



2. **Combining technical, economic and management sciences** (finance, natural resources, human resources) **into integrated training**;
3. **Giving a more significant place to new teaching subjects**, starting from the challenges brought by the major international agreements (Paris Agreements, SDGs, New York Declaration on Forests, Amsterdam Declaration). It is now of paramount interest to show how these recent agreements shape regional and national public policies, and how they ultimately condition the actions of practitioners on a daily basis (notably through sustainability certification). Educated plantation managers are - first and foremost - educated and informed citizen;
4. **Developing new teaching methodology**, based on active pedagogy and alternation between the field and the campus, as well as on the practice of tutored internships in plantations or in processing companies. TALENT will develop a remote learning tool, called e-TALENT, which will support the Program through the provision of updated and adapted educational resources. Such resources will be shared among partners of the TALENT Program.
5. **Offering continuing education courses** (Executive Masters) adapted to executives already working in large plantations or within small planters' cooperatives. This dimension makes it possible (i) to consider, on the one hand, rapid impacts on the ground, (ii) to ensure the financial sustainability of training for academic institutions and finally (iii) to ensure a theory-practice comparison during groupings between salaried executives and students.

## CONTINUING EDUCATION IS KEY

CIRAD is involved in several R&D projects in partnership with NGOs working on the ground (idh, Solidaridad, SNV) as well as associations of growers (SPKS in Indonesia). Such partnerships will be explored in order to identify the knowledge gaps to be filled and the priority areas for training.

This partnership with producers' organizers and the NGOs that support them not only will reach the target audiences at the heart of the training of trainers, but also enrich the teaching subjects of the Master by feedback through original and documented case studies.

Several training courses (ISP Malaysia, Sekolah Vokasi Bogor) already make use of work-study training, aimed at students already in working life (integrated professionals). The TALENT Program will specifically target these students in touch with the world of work, by offering them self-training tools adapted to their situation of geographical and professional isolation.

Learners from the banking sector, such as executives from involved ministries (such as Bappenas in Indonesia, or MPOB in Malaysia) seek to acquire an in-depth knowledge of the multiple contexts of settlement and trajectory of smallholder populations. This is an important gap to fill, in order to better manage agricultural and forestry risks as well as the environmental and social expectations of the international market. Smallholders constitute an important part of the production sector in the majority of value chains and they are often targeted by governments concerned with eradicating pockets of rural poverty.

The TALENT Program will specifically address these students in touch with the world of work and the decisions that result from a good understanding of the sector and the impacts of sustainable management in financial terms, standards/traceability and requirements for export... It will be necessary to design a series of self-training tools that trainees will use out of the classroom during their period of professional activity or during the courses adapted to their professional situation with appropriate monitoring by teachers. The private sector is the guarantor of the solvency of requests for continuing education and care must be taken to provide a format and content adapted to the request.

Each of the partner universities or training centres will sign a MoU which will associate them with CIRAD: this MoU will provide for the physical hosting of education and training, contributions from Partner universities and CIRAD.

## CROSSCUTTING CHALLENGES

For CIRAD, the challenge is to strengthen partnerships with academic operators (research centres and universities). For AFD as the funder, it is important to better understand the challenges of the sector and to identify possible financing opportunities.

It is also important to enable French diplomacy to provide constructive support for the improvement of practices and to show its involvement in issues related to sustainable development issues in the ASEAN region, by investing in training and skills of the future.

## APPENDIX 1-B

### THE PROJECT = PARTNERSHIP BETWEEN FNR-PSU & CIRAD WITHIN THE TALENT PROGRAM

Cirad and **FNR-PSU** share a long history of collaborative activities and projects, which started in 2022 with the signature of the MOU Agreement between CIRAD and **FNR-PSU** on 15 December 2022.

The Project provides **FNR-PSU** with adapted and adequate knowledge and tools in order to face the University's commitment in educating students and learners to the basic principles of sustainable plantation management and its applications on the ground.

**The Parties** undertake to make their best efforts to carefully monitor the training actions and assess their results, in both quantitative and qualitative terms, in the competences and capacities acquired by the learners and the students.

The educational objectives of the collaboration with **FNR-PSU** specifically refer to the domains of: Plantation Agriculture and Sustainable Development

The Project provides intellectual and financial support to the renovation of curriculum for the Master of Agricultural Development organised by **FNR-PSU** since 2021.

**From January 1st 2022 to December 31st 2026, the Project** mobilises several specific activities in partnership with **FNR-PSU**:

- Four (4) Summer schools (once a year)
- Eight (8) Workshops/ Vocational trainings (twice a year)
- Two (2) Conferences
- Sixteen (16) Field visits
- Curriculum Development (all year long)

## APPENDIX 2 – INDICATIVE BUDGET & FINANCIAL CONTRIBUTIONS OF THE PARTIES TO THE PROJECT

### COSTS for operating the Project in Thailand

Type of activity	Unit cost (€)	Quantity	Total cost (€)
Coordination mission (project leading team)	8844	8	70750
Curriculum Development	all year long		207020
Summer schools	44700	4	178800
Lifelong learning modules	2725	8	21800
e-learning	lumpsum		80392
Miscellaneous and unforeseen expenses	lumpsum		29408

### Funding of the Project in Thailand

Type of activity	Total cost	Cirad contribution	National partners contribution
Coordination mission (project leading team)	70750	30000	40750
Curriculum Development	207020	95529	111491
Summer schools	178800	98000	80800
Workshop/Vocational Training	21800	6800	15000
e-learning	80392	72091	8301
Miscellaneous and unforeseen expenses	29408	10000	19408
<b>TOTAL</b>	<b>588170</b>	<b>312420</b>	<b>275750</b>

## APPENDIX 3

### CAPACITY BUILDING ACHIEVEMENTS:

### LIST OF INDICATORS

The actions undertaken for capacity building with the support of TALENT will be carefully monitored, so that the execution of the Project, as well as its results, can fuel further changes and adaptations.

The following indicators have been selected to be systematically recorded throughout the Program:

- The number of students or staff (male/female) participating to each TALENT-supported activity (vocational education module, Summer School, MS AD module, workshop, conference, field visit).
- The number of trainees (male/female) registered through the partner University.
- The number of trainees (male/female) having successfully completed the module.
- For the Summer Schools, the number of registered students and learners, their academic origin or employing organisation, the involvement of other partner university and the number of students who completed the full module.
- The number of students and learners (male/female) having passed the evaluation test for TALENT-supported modules, and the distribution of the results.
- For each TALENT-supported module, the rate of unsatisfied or very satisfied learners.
- The number of students and learners (male/female) having experienced the e-learning activities (with University support).
- The number of students (male/female) enrolled in the Summer School.
- The number of continuing education (male/female) learners enrolled in the Summer School.

The present list of indicators can be adapted to each type of educational activity implemented with support from the TALENT Program.