

PATENT ASSIGNMENT COVER SHEET

Electronic Version v1.1
 Stylesheet Version v1.2

EPAS ID: PAT5956060

SUBMISSION TYPE:	NEW ASSIGNMENT	
NATURE OF CONVEYANCE:	ASSIGNMENT	
CONVEYING PARTY DATA		
	Name	Execution Date
	JEROEN LOWIE	07/01/2015
RECEIVING PARTY DATA		
Name:	CNH INDUSTRIAL BELGIUM NV	
Street Address:	LEON CLAEYSTRAAT 3A	
City:	ZEDELGEM	
State/Country:	BELGIUM	
Postal Code:	8210	
PROPERTY NUMBERS Total: 1		
	Property Type	Number
	Application Number:	16577611
CORRESPONDENCE DATA		
Fax Number:	(717)355-3107	
<i>Correspondence will be sent to the e-mail address first; if that is unsuccessful, it will be sent using a fax number, if provided; if that is unsuccessful, it will be sent via US Mail.</i>		
Phone:	717-355-4954	
Email:	barb.macmaster@external.cnhind.com	
Correspondent Name:	PATRICK M. SHELDRAKE	
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ATTORNEY DOCKET NUMBER:	53013-1	
NAME OF SUBMITTER:	BARBARA A. MACMASTER	
SIGNATURE:	/Barbara A. MacMaster/	
DATE SIGNED:	02/11/2020	
Total Attachments: 7		
source=53013_assign_Lowie#page1.tif		
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DECLARATION AND ASSIGNMENT AGREEMENT

This declaration and assignment agreement is entered into between:

Thomas Mahieu of Vleeshouwerstraat 26 6C, 9000 Ieper, Belgium,

Bart M.A. Missotten of Heidestraat 14, 3020 Herent, Belgium,

Frederik Tallir of Schoorlingstraat 1, 8600 Esen (Diksmuide), Belgium,

("CNH Inventor(s)") and

Bart Lenaerts of Molenblookstraat 15, 3690 Zutendaal, Belgium,

("Outside Inventor(s)") and

Jeroen Lowie of Vannekenstraat 2, 8020 Oostkamp, Belgium

("Student") and

CNH Industrial Belgium nv of Leon Claeyssstraat 3A, 8210 Zedelgem, Belgium, ("Entitled Owner").

CNH Inventor(s) and Outside Inventor(s) and Student herewith declare(s) he/she believes that he/she is the original inventor or an original joint inventor of an invention ("Invention") claimed in the Belgian Patent Application ("Application") filed on November 24, 2015 with application number BE2015/5761 and entitled "**Monitoring system for an agricultural harvester and agricultural harvester**". The Application is based on the invention disclosures entitled "**Active Residue Spreading Sensing And Control With Multi-Echo Ultrasonic Sensors**" and "**Active Residue Spreading Sensing And Control With Radar Device**" submitted to the Entitled Owner under internal reference numbers **53013-C-15-ZED** and **53131-C-15-ZED**.

CNH Inventor(s) herewith confirm(s) that he/she made the Invention while being in the employ of Entitled Owner, in the execution of his/her normal duties and/or tasks assigned to him/her.

Bart Lenaerts herewith confirms that he made his contribution to the Invention in the execution of his normal duties and/or tasks assigned to him by the Entitled Owner in the context of a) the Employment Agreement that he entered into with **Katholieke Universiteit Leuven** of Minderbroedersstraat 8A, 3000 Leuven, Belgium, and b) the ARC Project Agreement drawn up on 18 June 2015 that said **Katholieke Universiteit Leuven**, represented by **KU Leuven RESEARCH & DEVELOPMENT**, entered into with the **Entitled Owner**. By virtue of said Employment and Service Framework Agreements the sole right and interest in and to any invention made by **Bart Lenaerts** during his service for the Entitled Owner should belong to the latter.

Jeroen Lowie herewith confirms that he made this contribution to the Invention while working as a master student/trainee in the service of the Entitled Owner, and agrees that the sole right and interest in and to any invention made during his service for the Entitled owner should belong to the latter.

CNH Inventor(s) and Outside Inventor(s) and Student herewith confirm that, by virtue of the agreements mentioned above and/or his/her contract of employment and/or the Laws of Belgium and/or the present agreement the entire right, title and interest in and to the Invention and any and all applications for patent and patents granted therefor in any and all countries, including all divisions, reissues, continuations, reexaminations, inventor's certificates, and extensions therefor, and all right of priority resulting from the filing of the Application are rightfully assigned to Entitled Owner.

CNH Inventor(s) and Outside Inventor(s) and Student agree(s) to communicate to Entitled Owner, its representatives, successors or assigns all facts known to him regarding the Invention, whenever requested, and to testify in any legal proceeding, sign all lawful papers, execute all divisional, continuing, reexamination, and reissue applications, and make all rightful oaths and generally do everything to aid said Entitled Owner, its successors, assignees, and representatives to obtain and enforce proper patent protection for the Invention.

In testimony whereof the Inventor(s) has/have caused this Agreement to be effective on this 24th day of November, 2015.

Date: _____

Signature of Inventor
Thomas Mahieu

ASSIGNMENT

(continued)

Date: _____

Signature of Inventor
Bart M.A. Missotten

Date: _____

Signature of Inventor
Frederik Tallir

Date: _____

Signature of Inventor
Bart Lenaerts

Date: _____

Signature of Inventor
Jeroen Lowie

Date: _____

Signature on behalf of Entitled Owner
Wilfried Gunst – General Counsel IP
Authorized Signatory for CNH Industrial Belgium nv

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The University of Ghent, a public institution with legal personality, with its registered offices at 9000 Ghent, Sint-Pietersnieuwstraat 25, known under enterprise number 0248.015.142 and represented by Prof. Dr. Anne De Paepe, acting in her capacity of dean of the University of Ghent (hereinafter referred to in short as "UGhent")

Student	[handwritten] Jeroen Lowie (hereinafter referred to as the "Student")
Physical address	[handwritten] [illegible] 2 8020 Oostkamp

Company	[handwritten] CNH Industrial Belgium N.V. (hereinafter referred to as the "Company")
Description	[handwritten] Léon Claeystraat 3A 8210 Zedelgem

Master thesis	[handwritten] Automation of the distribution of crop residues (“Master thesis”)		
Education	[handwritten] Industrial Sciences: Electrical engineering - Automation		
Start date	[Handwritten] 07/01/2015	End date	[handwritten] 06/30/2016
UGhent Department	[handwritten] EA 19	Supervisor Company:	

With a view to obtaining a Master's degree at the University of Ghent, the Student will conduct scientific research in the context of the Master's thesis.

The company is interested in this research and wishes to support the Student's research.

The role of UGhent is limited to supervising the Student. UGhent does not provide services to the Company under this Agreement.

This Agreement includes this signature sheet, the General Terms and Conditions, the Technical Annex and any additional attachments described in the Technical Annex. The General Terms and Conditions take precedence over the Technical Annex (and any additional attachments) should their provisions conflict.

By signing this signature sheet, the parties confirm that they are aware of and agree with the General Terms and Conditions and the content of all annexures.

This Agreement replaces all written and verbal agreements that the parties have previously entered into with regard to its subject matter and is the sole and complete agreement between the parties in this regard.

On behalf of the Company		On behalf of the University of Ghent	
Signature	[signature]	Signature	
Name:	Dr. B. [illegible]	Name:	Prof. Dr. Anne De Paepe
Position:	[illegible]	Position:	Dean
Date:		Date:	
The Student		UGhent Promoter	
Signature Preceded by handwritten indication: "read and approved"	[signature]	Signature	[signature]
Name:	Jeroen Lowie	Name:	[illegible] Johannes Cottyn
Date:	06/15/2015	Position:	Lecturer
		Date:	06/15/2016

GENERAL TERMS AND CONDITIONS - MASTER'S THESIS

1. Definitions

"Background (knowledge)": information, techniques, know-how, software and materials - irrespective of the form or medium in which they are communicated or stored - including any relevant intellectual property rights, made available by or for the party that owns or has rights to it before or after the Start Date as indicated on the signature sheet of this Agreement, with the intention of using it in the implementation of the Project.

"Intellectual Property (rights)": patents, trademarks, cultivation rights, designs, rights to databases, software, copyrights, topographies of semiconductors and applications relating to the aforementioned, as well as any similar rights recognized in any relevant legal order, together with all legal claims relating to the infringement of the aforementioned rights; Intellectual Property does not include the copyright on Publications;

"Knowhow": technical information (including but not limited to information relating to inventions, discoveries, concepts, methods, models, research, development and testing procedures, the results of experiments, testing and testing, production processes, techniques and specifications, data relating to quality controls, analyzes and reports), which is not in the public domain and is not subject of Intellectual Property;

"Agreement": this Agreement, including all its annexes and any amendments;

"Project": the research within the framework of the Student's Master's thesis;

"Publication/ Publishing": the publication of a summary, article or paper in, among other things, books, magazines, websites or electronic libraries, or their public presentation at lectures, conferences or seminars;

"Results": Know-how, materials and information identified in the implementation of the Project, put into practice or described or generated and as reported;

"Confidential Information": the Background Knowledge or other information that is either disclosed in writing by one party to another and designated as confidential, or communicated verbally in a confidential manner and its confidential nature was confirmed in writing at the latest within a period of ten calendar days from publication;

2. The Project

- 2.1. With regard to UGhent, the scope of this Agreement is limited to the research activities of the research group of the Promoter(s) and their scientific staff.
- 2.2. The Student will implement the Project to the best of his ability, without, however, giving guarantees regarding the achievement of specific results. The Student only enters into a resource commitment in that regard.
- 2.3. The Student will regularly report to UGhent regarding the progress of the Project as well as the results achieved. At the end of this Agreement the Student will send a final report on the progress of the Project as well as on the results achieved to UGhent and to the Company.

3. Financial and material compensation or contribution

- 3.1. Unless otherwise specified in the Technical Annex to this Agreement, no financial or material compensation or contributions from the Company or UGhent are provided.

4. Background knowledge, Results and Intellectual Property Rights

- 4.1. This Agreement has no effect whatsoever on the rights to Background Knowledge that continue to belong to the party that contributes it to the Project or its licensor(s). Under this Agreement, no rights of use are permitted, or assumed to be permitted, except those expressly described therein.
- 4.2. The parties allow each other a free, non-exclusive right to use each other's Background knowledge for the sole purpose of implementing the Project. The parties are not permitted to grant rights of use to third parties on each other's Background knowledge.
- 4.3. The Results will belong exclusively to the Company, which can freely decide at its own account and expense to take all steps to register the intellectual property on the Results and/or to maintain appropriate protection thereof.

If the Company submits a patent application, the names of any inventors (students) of UGhent will be stated. The Student shall give the Company any reasonable support with regard to its registration and/or protection of intellectual property on the Results.

5. Publication

- 5.1. During the period of confidentiality as set out in Article 6, the party wishing to Publish (the "Publishing Party") will communicate, in writing, all details of any intended Publication regarding the Project, at least thirty calendar days before the date of submission for Publication. The other party may, by means of a reasoned written notice to the Publishing Party (the "Statement of Objection"):

- (a) prevent the publication of its Confidential Information;
- (b) have the Publishing Party postpone the proposed Publication for a maximum period of four months from the receipt of the Statement of Objection if, in the reasonable estimation of the other party, this delay is required to obtain patent or other protection for its Background Knowledge or of its Results that are the subject of the Publication, or
- (c) prevent the publication of its Results if it would disproportionately damage its legitimate interests.

- 5.2. A valid Statement of Objection contains a precise and motivated request for amendments deemed necessary. If an objection is thus raised, the parties will consult on how they can get over the grounds for the objection as quickly as possible (for example, by adapting Publication or protecting relevant Background Knowledge or Results). The objection to the Publication will not be unreasonably maintained if the appropriate measures are taken after the consultation. Any Statement of Objection must be made within a period of **fifteen calendar days** from the date of receipt of the draft Publication. If the Publishing Party does not receive a Statement of Objection within that period, it is free to make the relevant Publication.

- 5.3. Whether or not a Notice of Objection was communicated in time, the defense of the thesis will be able to proceed if UGhent takes the necessary measures to ensure that the confidentiality deemed necessary is observed. UGhent will make the necessary arrangements with the Company for this.

6. Confidentiality

- 6.1. During this Agreement and for a period of three years after its expiry, the parties will not disclose or make use of the other party's Confidential Information, except for the implementation of the Project.
- 6.2. The parties will only disclose Confidential Information to employees, appointees or contractors to the extent that this is necessary for the implementation of the Project. The parties will exercise reasonable care in the selection of these persons and will ensure that they respect the secret nature of the Confidential Information in accordance with the confidentiality obligations of this Agreement.
- 6.3. However, the obligations to maintain confidentiality and limited use of Confidential Information do not apply to the receiving party to the extent that it can prove that the information concerned:
- (a) was already known before the commencement of the Project not to be bound by any obligation to secrecy;
 - (b) is (has become) known to the public without any failure to comply with the obligations under this Agreement or any other obligation of confidentiality;
 - (c) has been obtained by the receiving party from a third party under circumstances from which the receiving party could not reasonably deduce that this third party acted contrary to a confidentiality obligation;
 - (d) was developed completely independently by the receiving party without making use of the Confidential Information;
 - (e) was made public by virtue of a legal requirement, a court order, or an order from a competent authority, and the party that was required to disclose has informed his co-contractor of this obligation, as well as the information he has obliged to disclose; or
 - (f) was released for publication by the other party.
- 6.4. The parties do not act in breach of a commitment to confidentiality or limited use of Confidential Information by Publishing it to the extent that they have complied with the procedure described in Article 5.
- 6.5. The parties are not permitted to use each other's name or logo for promotional or publicity purposes without express written permission. Any other communication related to this Project, including the Publications, will refer to cooperation with the other party in accordance with current practice (regarding scientific publications).

7. Liability

- 7.1. The Student cannot be considered as an employee or appointee of UGhent or the Company; the latter cannot therefore be held liable in any way for the proper execution of this Agreement by the Student.
- 7.2. When visiting the Company, the Student will correctly comply with the safety regulations that are brought to him by Company.
- 7.3. The parties do not guarantee that the content or use of Background Knowledge or Results provided by themselves, their employees or students does not infringe or give rise to the rights of third parties.
- 7.4. None of the parties are liable for the use made by the other party of, or the confidence placed in, the Background knowledge, Results, advice or information provided in relation to a Result.
- 7.5. UGhent has a civil liability insurance policy to cover its own liability. UGhent has also taken out the necessary insurance policies to cover civil liability resulting from an error on the part of the Student. UGhent, its insurer and the Student waive redress against the Company and the person in charge of the Company, but only in the absence or after exhaustion of the guarantees of any liability policy taken out by the person(s) responsible. On the other hand, the Company and the person responsible for the Company, as well as their insurer, waive recourse against UGhent, its insurer and the Student, but only in the absence or after exhaustion of the guarantees of any liability policy taken out by the person or persons responsible.

- 7.6. The liability of the parties towards each other, which originates in this Agreement, the Project or Results will never include indirect damage (including loss of profit, loss of income, data, business or other opportunities), even if the party initiating the claim informed its co-contractor in advance of the possibility of such damage, or that the co-contractor could have foreseen these losses.

8. Duration and termination.

- 8.1. The Agreement takes effect on the Start Date as indicated on the signature sheet. If this Agreement is signed after the Start Date, it will apply retroactively. This Agreement ends automatically and by operation of law on the End Date as indicated on the signature sheet.
- 8.2. Either party may terminate this Agreement, with immediate effect, by means of a registered letter, in the event that the defaulting party still fails to fulfill its obligation within a period of **ten calendar days** after a first notice of default:
- (a) by UGhent, the Company and the Student, in the following cases:
 - 1. a serious violation of this Agreement or of the applicable regulations
 - 2. misconduct or bad faith
 - (b) by UGhent and the Company in the following cases:
 - 1. unauthorized absence of the Student
 - 2. when the normal execution of the Agreement has become definitively impossible
 - (c) by UGhent and the Student when the physical or psychological health of the Student is at risk.
- 8.3. The provisions that by their nature survive the duration of the Agreement remain in full force after the duration, or the termination of this Agreement.

9. General

- 9.1. **Transfer:** a party may not transfer its rights and obligations under this agreement in whole or in part without written permission from its co-contractor(s). Such permission will not be unreasonably denied or delayed.
- 9.2. **No agency:** nothing in this Agreement creates, implies or proves any form of joint venture between the parties, nor any form of mandate or agency. The Parties do not have the authority to make statements or enter into commitments on behalf of each other.
- 9.3. **Formalities:** Each party shall perform the acts and sign each document at the reasonable request of its co-contracting party to allow the latter to implement this Agreement.
- 9.4. **Amendments:** every amendment to this Agreement must be expressly agreed in writing and signed by the legal representatives of the parties.
- 9.5. **Competent court and applicable law:** The courts of the judicial district of Ghent will be exclusively competent to take cognizance of any dispute relating to or following the implementation and/or interpretation of this Agreement, with the exception that the Parties can institute proceedings for interim relief in any jurisdiction. This Agreement is governed by Belgian law, with the exception of its provisions of international private law.

TECHNICAL ANNEX - MASTER'S THESIS

Master thesis	
<i>Describe the assignment/ research within the context of the Master's thesis</i> [handwritten] Measurement of the distribution of the crop residues. The dusty conditions make the detection of the crop residues challenging. Radar, ultrasonic and infrared sensors] will be tested to measure this distribution process. After a successful detection it is the intention that the distribution process will be checked, as such that the crop residues are distributed as uniform as possible over the field.	
Timing and deadlines	
Initial field tests: 08/07/2015	first processing of the results of the field tests : 10/2015
Literature study : 12/2015	2 nd series field tests 02/2016 final conclusions: 05/2015
Financial and/or material contributions anticipated	
Not applicable	
Possible Extra Annexures	
risk-analysis + work post sheet	

Notifications - Company		Notifications - UGhent	
Name	[illegible]	Department	TechTransfer
Department	Innovation	Address	p/a Sint-Pietersnieuwstraat 25 B-9000 Ghent Belgium
Address	Léon Claeystraat 3A 8210 Zedelgem	Telephone	0032 9 264 30 30
Telephone	050 25 24 66	E-mail	contracten@ugent.be
E-mail	[illegible]		

Invoicing (if applicable)			
Name			Important: a copy (cc) of all communication should be sent to the e-mail address of the promoter as indicated below.
Department			
Address			
		Promoter - UGhent	
		Name	Cottyn Johannes
		Department	EA 19
		Telephone	056 / 241 [illegible]
		E-mail	Johannes.cottyn@ugent.be



CERTIFICATION OF TRANSLATOR'S COMPETENCE

I, Massimo Gaido, as Managing Partner of Lingua Pros, LLC, hereby certify that the attached is a complete and accurate translation into English of the Dutch document: Overeenkomst Masterproef Jeroen Lowie.pdf, and that the translation was provided by a professional translator that is competent in both English and Dutch to render such translation.

Massimo Gaido
Managing Partner