505493979 05/24/2019

PATENT ASSIGNMENT COVER SHEET

Electronic Version v1.1 Stylesheet Version v1.2 EPAS ID: PAT5540783

SUBMISSION TYPE:	NEW ASSIGNMENT
NATURE OF CONVEYANCE:	ASSIGNMENT

CONVEYING PARTY DATA

Name	Execution Date
MATHIEU LOIC DUCOUSSO	05/22/2019
FREDERIC JENSON	05/22/2019
BASTIEN JACQUES CHAPUIS	02/26/2018
GUILLEMETTE DANIELLE JOELLE MARIE RIBAY	05/22/2019
LAURA TAUPIN	05/22/2019

RECEIVING PARTY DATA

Name:	SAFRAN
Street Address:	2 BOULEVARD DU GENERAL MARTIAL VALIN
City:	PARIS
State/Country:	FRANCE
Postal Code:	75015
Name:	COMMISSARIAT A L'ENERGIE ATOMIQUE ET AUX ENERGIES ALTERNATIVES
Street Address:	25 RUE LEBLANC BAT LE PONANT
City:	PARIS
State/Country:	FRANCE
Postal Code:	75015

PROPERTY NUMBERS Total: 1

Property Type	Number
Application Number:	16464192

CORRESPONDENCE DATA

Fax Number: (703)413-2220

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.

Phone: (703) 413-3000
Email: yleggitt@oblon.com
Correspondent Name: OBLON, ET AL.
Address Line 1: 1940 DUKE STREET

Address Line 4: ALEXANDRIA, VIRGINIA 22314

ATTORNEY DOCKET NUMBER: 522685US

PATENT 505493979 REEL: 049281 FRAME: 0230

NAME OF SUBMITTER:	YUKIKO LEGGITT	
SIGNATURE: /Yukiko Leggitt/		
DATE SIGNED:	TE SIGNED: 05/24/2019	
Total Attachments: 5 source=522685US-Assignment source=522685US-Assignment source=522685US-Assignment source=522685US-Assignment source=522685US-Assignment	5#page2.tif 5#page3.tif 5#page4.tif	

PATENT REEL: 049281 FRAME: 0231

As a below named inventor, I hereby declare that, I

Inventor Name	Complete Address
DUCOUSSO, Mathieu Łość	c/o Safran Aircraft Engines PI (AII), Rond-Point René Ravaud Réau 77550 MOISSY- CRAMAYEL France

(Hereinafter referred to as the Assignor) have made an invention entitled:

Title of invention (in English)	 		***************************************	***************************************	 		
	 	*******			 	*************	
Title of invention (in French)					 		
Title of invention (in French)		**************************************					

for which an application for Letters Patent has been filed in the following country:

Country	Filing Date	Serial Number
France	11/25/2016	1661518

The above-identified application(s) was/were made or authorized to be made by me.

I believe that I am the original inventor or an original joint inventor of a claimed invention in the application.

AND, WHEREAS,

Corporation Name	Complete Address
COMMISSARIAT A L'ENERGIE ATOMIQUE ET AUX ENERGIES ALTERNATIVES	25 Rue Leblanc Bat Le Ponant 75015 Paris France
SAFRAN	2 Boulevard Du Général Martial Valin, 75015 Paris, France

(Hereinafter referred to as the Assignee(s)) is/are desirous of securing the entire right, title, and interest in and to this invention in all countries throughout the world, and in and to the aforementioned applications for Letters Patent on this invention and the Letters Patent to be issued upon these applications;

NOW THEREFORE, be it known that for and in consideration of One EURO (£1.00) and other good and valuable consideration, the receipt and sufficiency of which from the Assignee[s] is hereby acknowledged, by these presents, I, the Assignor, have sold, assigned, transferred, and set over, and do hereby self, assign, transfer and set over unto the Assignee[s], its/their lawful successors and assigns, my entire right, title, and interest in and to this invention and these applications, and all divisions, and continuations thereof, and all Letters Patent that may be granted thereon, and all reissues thereof, and all replications for Letters Patent that may hereafter be filed for this invention in any country and all Letters Patent that may be granted on this invention in any country, and all extensions, renewals, and reissues thereof; and I hereby authorize and request the Commissioners of Patents (or other appropriate official whose duty is to issue patents) of the United States, Canada, and any other country, to issue Letters Patent for this invention to the Assignee[s], its/their successors and assigns, in accordance with the terms of this Assignment;

AND, I HEREBY covenant that I have the full right to convey the interest assigned by this Assignment, and I have not executed and will not execute any agreement in conflict with this Assignment;

AND, I HEREBY further covenant and agree that I will communicate with the Assignee[s], its/their successors and assigns, any facts known to me respecting this invention, testify in any legal proceedings, sign all lawful papers when called upon to do so, execute and deliver any and all papers that may be necessary or desirable to perfect the title to this invention in said Assignee[s], its/their successors or assigns, execute all divisional, continuation, reissue, and re-examination applications, make all rightful oaths and generally do everything possible to aid the Assignee[s], its/their successors and assigns, to obtain and enforce proper patent protection for this invention in any country, it being understood that, irrespective of whether I am in the employ of the Assignee[s] or its/their affiliates, any expense incident to the performance of the obligations of the present paragraph shall be borne by the Assignee[s], its/their successors, and assigns.

This Assignment agreement is effective as of the earliest filing date mentioned above.

AND, I/WE HEREBY acknowledge that any willful false statement made in this declaration is punishable under 18 U.S.C. 1001 by fine or imprisonment of not more than five (5) years, or both.

IN TESTIMONY WHEREOF, I HAVE SIGNED:

Date	Place	inventor Name & Signature	Witness Name & Signature	
22 May 2019	daremporr	DUCOUSSO, Mathieu Loic	Nexualive Consons July.	
		anne finns		•••••

PATENT

REEL: 049281 FRAME: 0232

As a below named inventor, I hereby declare that, I					
inventor Name		Complete Address			
JENSON, Frédéric		c/o Safran Aircraft CRAMAYEL France	c/o Safran Aircraft Engines Pi (AJI), Rond-Point René Ravaud ~ Réau 77550 MOISSY- CRAMAYEL France		
(Hereinafter referred to as the Assignor) have made a	in invention e	ntitled:			
Title of invention (in English)					
Title of Invention (in French)					
			*		
for which an application for Letters Patent has been fi	iled in the folio	owing country:			
Country	iling Date		Serial Number		
France 1	1/25/2016		1661518		
the shows identified applicational was how a made a	r neithmeinne i	a ha mada huwu			
he above-identified application(s) was/were made o	somenzed to	o de made by me.			
believe that I am the original inventor or an original j	joint inventor	of a claimed inventio	n in the application.		
and, whereas,					
F					
COMMISSARIAT A L'ENERGIE ATOMIQUE ET AUX	Complete i	Aggress			
ENERGIES ALTERNATIVES	25 Rue Let	olanc Bat Le Ponant 7	S015 Paris France		
SAFRAN	2 Boulevar	d Du Général Martia	Valin, 75015 Paris, France		
	-				
<u> </u>		***************************************			
Hereinafter referred to as the Assignee(s)) is/are des vorld, and in and to the aforementioned applications	irous of secur for Letters Pa	ing the entire right, t tent on this invention	itle, and interest in and to this invention in all countries throughout the and the Letters Patent to be issued upon these applications;		
ufficiency of which from the Assignee[s] is hereby a screby sell, assign, transfer and set over unto the Ass and these applications, and all divisions, and continua faim priority on these of such applications, and all a latent that may be granted on this invention in an	acknowledged signee[s], its/tl tions thereol, pplications for y country, an ial whose dut	, by these presents, heir lawful successor and all Letters Paten r Letters Patent that id all extensions, rer by is to issue patents	O (£1.00) and other good and valuable consideration, the receipt an i, the Assignor, have sold, assigned, transferred, and set over, and of a and assigns, my entire right, fitle, and interest in and to this invention it that may be granted thereon, and all reissues thereof, and all rights to may hereafter be filled for this invention in any country and all Letter sewals, and reissues thereof; and I hereby authorize and request the of the United States, Canada, and any other country, to issue Letter e with the terms of this Assignment;		
AND, I HEREBY covenant that I have the full greement in conflict with this Assignment;	I right to convo	ey the interest assign	ed by this Assignment, and I have not executed and will not execute an		
especting this invention, testify in any legal proceeds ecessary or desirable to perfect the title to this inven xamination applications, make all rightful paths and inforce proper patent protection for this invention in	ngs, sign all la rtion in said As I generally do I any country,	wful papers when ca asignee[s], its/their so everything possible it being understood	e Assignee(s), its/their successors and assigns, any facts known to milled upon to do so, execute and deliver any and all papers that may buccessors or assigns, execute all divisional, continuation, reissue, and roto aid the Assignee(s), its/their successors and assigns, to obtain an that, irrespective of whether I am in the employ of the Assignee(s) cesent paragraph shall be borne by the Assignee(s), its/their successor		
This Assignment agreement is effective as o	of the earliest I	filing date mentioned	above.		
AND, I/WE HEREEY acknowledge that any water final more than five (5) years, or both.	vilifui false sta	tement made in this	declaration is punishable under 18 U.S.C. 1001 by fine or imprisonmen		
I TESTIMONY WHEREOF, I HAVE SIGNED:			٨		

inventor Name & Signature

JENSON, Frederic

Date

22 May 2019

Place

Châteaufort

PATENT REEL: 049281 FRAME: 0233

Witness Name & Signature

GHIBAUDO, Olivier

As a below named inventor, I hereby declare that, I

inventor Name	Complete Address
CHAPUIS, Bastien Jacques	c/o Safran Aircraft Engines PI (AiI), Rond-Point René Ravaud – Réau 77550 MOISSY- CRAMAYEL France
(Hereinafter referred to as the Assignor) have made	an invention entitled:
Title of Invention (in English)	
Title of Invention (in French)	

for which an application for Letters Patent has been filed in the following country:

Country	Filing Date	Serial Number
The state of the s		
France	11/25/2016	1561518

The above-identified application(s) was/were made or authorized to be made by me.

Thefleve that I am the original inventor or an original joint inventor of a claimed invention in the application.

AND, WHEREAS.

Corporation Name	Complete Address
COMMISSARIAT A L'ENERGIE ATOMIQUE ET AUX ENERGIES ALTERNATIVES	25 Rue Leblanc Bat Le Ponant 75015 Paris France
SAFRAN	2 Boulevard Du Général Martial Valin, 75015 Paris, France

(Hereinafter referred to as the Assignee[s]) is/are desirous of securing the entire right, title, and interest in and to this invention in all countries throughout the world, and in and to the aforementioned applications for Letters Patent on this invention and the Letters Patent to be issued upon these applications;

NOW THEREFORE, be it known that for and in consideration of One EURO (£1.00) and other good and valuable consideration, the receipt and sufficiency of which from the Assignee(s) is hereby acknowledged, by these presents, I, the Assignor, have soid, assigned, transferred, and set over, and do hereby self, assign, transfer and set over unto the Assignee(s), its/their lawful successors and assigns, my entire right, title, and interest in and to this invention and these applications, and all divisions, and continuations thereof, and all Letters Patent that may be granted thereon, and all reissues thereof, and all reissues thereof, and all reissues thereof, and all letters Patent that may be granted on this invention in any country, and all extensions, renewals, and reissues thereof, and I hereby authorize and request the Commissioners of Patents (or other appropriate official whose duty is to issue patents) of the United States, Canada, and any other country, to issue Letters Patent for this invention to the Assignee(s), its/their successors and assigns, in accordance with the terms of this Assignment;

AND, I HEREBY covenant that I have the full right to convey the interest assigned by this Assignment, and I have not executed and will not execute any agreement in conflict with this Assignment:

ANO, I HEREBY further covenant and agree that I will communicate with the Assignee[s], its/their successors and assigns, any facts known to me respecting this invention, testify in any legal proceedings, sign all lawful papers when called upon to do so, execute and deliver any and all papers that may be necessary or desirable to perfect the title to this invention in said Assignee[s], its/their successors or assigns, execute all divisional, continuation, relissue, and re-examination applications, make all rightful paths and generally do everything possible to aid the Assignee[s], its/their successors and assigns, to obtain and enforce proper patent protection for this invention in any country, it being understood that, irrespective of whether I am in the employ of the Assignee[s] or its/their affiliates, any expense incident to the performance of the obligations of the present paragraph shall be borne by the Assignee[s], its/their successors, and assigns.

This Assignment agreement is effective as of the earliest filing date mentioned above.

AND, I/WE HEREBY acknowledge that any willful false statement made in this declaration is punishable under 18 U.S.C. 1001 by fine or imprisonment of not more than five (5) years, or both.

IN TESTIMONY WHEREOF, I HAVE SIGNED:

Date	Piace	inventor Name & Signature	Witness Name & Signature
FOMOBOR.	Porton Land	CHAPUIS, Bastien Jacques	MESNIL, Olivier Jour
26,200	many many	V. Chennis	
inner in the property of the principle of the transfer of the second of	8		are established

As a below named inventor, I hereby declare that, I

inventor Name		Complete Address		
RIBAY, Guillemette Danielle Joelle A	vlarie	7 avenue Gafois 92340 BOURG LA REINE France		
	Hereinafter referred to as the Assignor) have made an invention entitled:			
Title of Invention (in English)				
Title of Invention (in French)				
for which an application for Letters Patent has been filed in the following country:				
Country	Filing Dote	Serial Number		
France	11/25/2016	1661518		

The above-identified application(s) was/were made or authorized to be made by me.

I believe that I am the original inventor or an original joint inventor of a claimed invention in the application.

AND, WHEREAS,

Corporation Name	Complete Address
COMMISSARIAT A L'ENERGIE ATOMIQUE ET AUX ENERGIES ALTERNATIVES	25 Rue Leblanc Bat Le Ponant 75015 Paris France
SAFRAN	2. Boulevard Ou Général Martial Valin, 75015 Paris, France
	<u> </u>

(Hereinafter referred to as the Assignee(s)) is/are desirous of securing the entire right, title, and interest in and to this invention in all countries throughout the world, and in and to the aforementioned applications for Letters Patent on this invention and the Letters Patent to be issued upon these applications;

NOW THEREFORE, be it known that for and in consideration of One EURO (£1.00) and other good and valuable consideration, the receipt and sufficiency of which from the Assignee[s] is hereby acknowledged, by these presents, i, the Assignor, have sold, assigned, transferred, and set over unto the Assignee[s], its/their lawful successors and assigns, my entire right, title, and interest in and to this invention and these applications, and all divisions, and continuations thereof, and all Letters Patent that may be granted thereon, and all reissues thereof, and all rights to claim priority on these of such applications, and all applications for Letters Patent that may hereafter be filled for this invention in any country and all Letters Patent that may be granted on this invention in any country, and all extensions, renewals, and reissues thereof; and I hereby authorize and request the Commissioners of Patents (or other appropriate official whose duty is to issue patents) of the United States, Canada, and any other country, to issue Letters Patent for this invention to the Assignee[s], its/their successors and assigns, in accordance with the terms of this Assignment:

AND, I HEREBY covenant that I have the full right to convey the interest assigned by this Assignment, and I have not executed and will not execute any agreement in conflict with this Assignment;

AND. I HEREBY further covenant and agree that I will communicate with the Assignee(s), its/their successors and assigns, any facts known to me respecting this invention, testify in any legal proceedings, sign all lawful papers when called upon to do so, execute and deliver any and all papers that may be necessary or desirable to perfect the title to this invention in said Assignee(s), its/their successors or assigns, execute all divisional, continuation, reissue, and re-examination applications, make all rightful paths and generally do everything possible to aid the Assignee(s), its/their successors and assigns, to obtain and enforce proper patent protection for this invention in any country, it being understood that, irrespective of whether I am in the employ of the Assignee(s) or irs/their affiliates, any expense incident to the performance of the obligations of the present paragraph shall be borne by the Assignee(s), its/their successors, and assigns.

This Assignment agreement is effective as of the earliest filing date mentioned above.

AND, I/WE HEREBY acknowledge that any willful false statement made in this declaration is punishable under 18 U.S.C. 1001 by fine or imprisonment of not more than five (5) years, or both.

IN TESTIMONY WHEREOF, I HAVE SIGNED:

Date	Place	inventor Name & Signature	Witness Name & Signature
22 May 2019	Salay	RIBAY, Guillemotte Canielle Joelle Marie	CENTRACE HETTERNE

PATENT REEL: 049281 FRAME: 0235

As a below named inventor, I hereby declare that, I

inventor Name	Complete Address	
TAUPIN, Laura	Bat 18B, 60 rue Alfred de Musset 91400 ORSAY France	
(Hereinafter referred to as the Assignor) have made an invention e	stitled:	
Title of Invention (in English)		
Title of Invention (in French)		
for which an application for Letters Patent has been filled in the following country:		

Serial Number

1661518

The above-identified application(s) was/were made or authorized to be made by me.

I believe that I am the original inventor or an original joint inventor of a claimed invention in the application.

Filing Date

11/25/2015

AND, WHEREAS,

Country

France

Corporation Name	Complete Address
COMMISSARIAT A L'ENERGIE ATOMIQUE ET AUX ENERGIES ALTERNATIVES	25 Rue Leblanc Bat Le Ponant 75015 Paris France
SAFRAN	2 Boulevard Du Général Martial Valin, 75015 Paris, France

(Hereinafter referred to as the Assigned(s)) is/are desirous of securing the entire right, title, and interest in and to this invention in all countries throughout the world, and in and to the aforementioned applications for Letters Patent on this invention and the Letters Patent to be issued upon these applications;

NOW THEREFORE, be it known that for and in consideration of One EURO (CLO0) and other good and valuable consideration, the receipt and sufficiency of which from the Assignee[s] is hereby acknowledged, by these presents, i, the Assignor, have sold, assigned, transferred, and set over, and do hereby self, assign, transfer and set over unto the Assignee[s], its/their lawful successors and assigns, my entire right, title, and interest in and to this invention and these applications, and all divisions, and continuations thereof, and all Letters Patent that may be granted thereon, and all reissues thereof, and all rejissues thereof, and all rejissues thereof, and all letters Patent that may be granted on this invention in any country and all extensions, renewals, and reissues thereof; and I hereby authorize and request the Commissioners of Patents (or other appropriate official whose duty is to issue patents) of the United States, Canada, and any other country, to issue Letters Patent for this invention to the Assignee[s], its/their successors and assigns, in accordance with the terms of this Assignment;

AND, I HEREBY covenant that I have the full right to convey the interest assigned by this Assignment, and I have not executed and will not execute any agreement in conflict with this Assignment;

AND, I HEREBY further covenant and agree that I will communicate with the Assignee[s], its/their successors and assigns, any facts known to me respecting this invention, testify in any legal proceedings, sign all lawful papers when called upon to do so, execute and deliver any and all papers that may be necessary or desirable to perfect the title to this invention in said Assignee[s], its/their successors or assigns, execute all divisional, continuation, reissue, and reexamination applications, make all rightful paths and generally do everything possible to aid the Assignee[s], its/their successors and assigns, to obtain and enforce proper patent protection for this invention in any country, it being understood that, irrespective of whether I am in the employ of the Assignee[s] or its/their affiliates, any expense incident to the performance of the obligations of the present paragraph shall be borne by the Assignee[s], its/their successors, and assigns.

This Assignment agreement is effective as of the earliest filling date mentioned above.

AND, I/WE HEREBY acknowledge that any willful false statement made in this declaration is punishable under 18 U.S.C. 1001 by fine or imprisonment of not more than five (5) years, or both.

IN TESTIMONY WHEREOF, I HAVE SIGNED:

Date	Place	inventor Name & Signature	Witness Name & Signature
22 May 2019	Solay	TAUPIN, Laura	GARDAHAUT Audrey Pedricia
		a kanan	(1)

PATENT

REEL: 049281 FRAME: 0236

RECORDED: 05/24/2019