04-08-2008



3.31-08

103495270

EET

U.S. Department of Commerce Patent and Trademark Office Attorney Docket No. 08350.7509

3.30		100 100210			rney Docket	No. 08350.7509
To the Director of the U.S. Pa Please record the attached o				Mail Stop A	Assignment R	decordation Servic
Name of conveying parties:				Name and address of receiving party:		
Wade J. ROBEL			Name:	Caterpillar Inc	<b>;</b> .	
Additional name(s) of conveying	g party(ie:	s) attached?   Yes   No	Internal	I Address:		
3. Nature of conveyance	<b>)</b> :	•	Street A	Address: 100	N.E. Adams S	treet
		Merger	City:	Peoria		
Security Agreement		Change of Name	State:	IL	Zip Code:	61629
Joint Research Agreement		Government Interest Assignment	Additio	nal name(s) & Add	ress(es) attach	ned?
Executive Order 9494, Confirmatory License		Other:		☐ Yes		
Execution Date: March 31,	2008					
<ul> <li>Application number(s) the application: March</li> <li>A. Patent Application Number (s)</li> </ul>	h 31, 2008	number(s): If this document is be	В.	Patent Number(s		
	Ac	dditional numbers attached?	☐ Yes	⊠ No		
5. Name and address of concerning document			6.	1		nd patents involved:
Name: Christopher P. Isaac		(202) 408-4000	7.	Total fee (37 CFF		
Internal Address: FINNEGAN & DUNNER		RSON, FARABOW, GARRETT		Enclosed (Pl overpaymen	ease charge of t to deposit ac	deficiency or credit scount 06-0916)
Street Address: 901 New Y		ue, N.W.		Authorized t	to be charged	to deposit account
City: Washington, I	D.C.					
State:	Zip:	20001-4413	8.	Deposit Account	No.: <u>06-0916</u>	
9. Statement and signat	ure.					of the origins
To the best of my knowledge a	ınd belief,	the foregoing information is true	and corre	ct and any attache	d copy is a tru	e copy of the ong
document.	<i>a</i>	430 0		04/01/2008 SZEWDI	E1 00000056 1	2078416
Signed:	llon	Knowler		R4 FC:8021		2 <u>008 <sub>48.</sub>99 gp</u> Date
	8)	Clifford D. Crowder, Reg. No. 5				
Tot	al number	of pages including cover sheet,	attachme	nts and documents	: 3 	

6/2007

PATENT REEL: 020780 FRAME: 0409

SOLE/JOINT INVENTION (Worldwide Rights) Attorney Docket No. 08350.7509-00 Client Ref. No. 07-509

## **ASSIGNMENT**

WHEREAS I/We, the below named inventor(s), [hereinafter referred to as Assignor(s)], have made an invention entitled:

## SYSTEM FOR RECOVERING ENGINE EXHAUST ENERGY

for which I/We executed an application for United United States Letters Patent on, 20,			ed an application for
WHEREAS, Caterpillar Inc., a corporation Peoria, IL 61629-6490 (hereinafter referred to as and to this invention in all countries throughout the this invention and the Letters Patent to be Issued	n of Delaware whose posi s Assignee), is desirous of ne world, and in and to the	t office address is 100 N f securing the entire righ	t, title, and interest in
NOW THEREFORE, be it known that for other good and valuable consideration the receip have sold, assigned, transferred, and set over, at lawful successors and assigns, my/our entire right No, filed (if any), and this ap Patent of the United States which may be granted basis of the above provisional application (if any) all applications for Letters Patent which may here Patent which may be granted on this invention in and I/We hereby authorize and request the Commof any foreign country whose duty it is to issue pathis invention to Assignee, its successors and assignee.	at of which from Assignee ind do hereby sell, assign, ant, title, and interest in and application, and all divisions dithereon, and all reissues, as well as all rights to claracter be filed for this inversion foreign country, and amissioner of Patents and Tatents on applications as of	is hereby acknowledged transfer, and set over under the tothis invention, provise, and continuations there is thereof, and all rights the train priority on the basis and in any foreign court all extensions, renewals of the Unite described above, to issu	I, I/We, as Assignor(s), nto the Assignee, its sional application Serial eof, and all Letters to claim priority on the of this application, and atry and all Letters, and reissues thereof; d States and any official e all Letters Patent for
AND, I/WE HEREBY covenant that I/We and I/We have not executed and will not execute	have the full right to conve any agreement in conflict	ey the interest assigned with this Assignment;	by this Assignment,
AND, I/WE HEREBY further covenant and Assignee, its successors and assigns, any facts it proceeding, sign all lawful papers when called up necessary or desirable to perfect the title to this it divisional, continuation, and reissue applications, Assignee, its successors and assigns, to obtain a and any foreign country, it being understood that the Assignee, its successors and assigns.  IN TESTIMONY WHEREOF, I/We have it	known to me/us respecting oon to do so, execute and nvention in said Assignee, make all rightful oaths an and enforce proper patent any expense incident to the any expense incident to any expense incident to the any expense incident to any expense expense incident to any expense incident to an	g this invention, and test deliver any and all pape , its successors or assig id generally do everythin protection for this inven	tify in any legal ers that may be ens, execute all ng possible to aid tion in the United States
1. FULL NAME OF SOLE OR FIRST ASSIGNOR	ASSIGNOR'S SIGNATURE	inf	DATE 3/3//2008
Wade J. ROBEL  ADDRESS 3603 N. Highridge Drive, Peoria, IL 61614		CITIZENSHIP USA	
Listing of Inventors Continued on Page 2 hereof  Yes  No			

Page 1 of 1

SOLE/JOINT INVENTION (Worldwide Rights) Attorney Docket No. 08350.7509-00 Client Ref. No. 07-509

1. WITNESS NAME Charles E. Avery Jr.	WITNESS SIGNATURE	3-31-08
ADDRESS 5103 N. Rothmore De		CITIZENSHIP U.S.
Pearso IL 61615		
2. WITNESS NAME	WITNESS SIGNATURE	DATE
Steve Hurd	WITNESS SIGNATURE	DATE 31 Mar 08 CITIZENSHIP
Steve Hurd	Stuffen	31 Mar 08

PATENT REEL: 020780 FRAME: 0411

**RECORDED: 03/31/2008**