

**PCT REQUEST**

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<b>0</b>	<b>For receiving Office use only</b>	
0-1	International Application No.	PCT/US20/31373
0-2	International Filing Date	04 May 2020 (04.05.2020)
0-3	Name of receiving Office and "PCT International Application"	RO/US
<b>0-4</b>	<b>Form PCT/RO/101 PCT Request</b>	
0-4-1	Prepared Using	ePCT-Filing for data package download Version 4.7-SNAPSHOT MT/FOP 20200428/1.1
<b>0-5</b>	<b>Petition</b>	
	The undersigned requests that the present international application be processed according to the Patent Cooperation Treaty	
0-6	Receiving Office (specified by the applicant)	United States Patent and Trademark Office (USPTO) (RO/US)
0-7	Applicant's or agent's file reference	320903-2160
<b>I</b>	<b>Title of Invention</b>	<b>ATOMIC-TO-NANOSCALE MATTER EMISSION/FLOW REGULATION DEVICES AND METHODS</b>
<b>II</b>	<b>Applicant</b>	
II-1	This person is	Applicant only
II-2	Applicant for	All designated States
II-4	Name	THE BOARD OF TRUSTEES OF THE UNIVERSITY OF ILLINOIS
II-5	Address	352 Henry Administration Building 506 South Wright Street Urbana, Illinois 61801 United States of America
II-6	State of nationality	US
II-7	State of residence	US
<b>III-1</b>	<b>Applicant and/or inventor</b>	
III-1-1	This person is	Inventor only
III-1-3	Inventor for	All designated States
III-1-4	Name (LAST, First)	SUBRAMANIAN, Arunkumar
III-1-5	Address	Office of Technology Management University of Illinois at Chicago 1853 W. Polk Street, (Mail Code 682) Chicago, Illinois 60612 United States of America

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<b>IV-1</b>	<b>Agent or common representative; or address for correspondence</b> The person identified below is hereby/ has been appointed to act on behalf of the applicant(s) before the competent International Authorities as:	<b>Agent</b>
IV-1-1	Name	<b>THOMAS HORSTEMEYER LLP</b>
IV-1-2	Address	<b>Attn.: Daniel J. SANTOS 3200 Windy Hill Road SE Suite 1600E Atlanta, Georgia 30339 United States of America</b>
IV-1-3	Telephone No.	<b>+1-770-933-9500</b>
IV-1-4	Facsimile No.	<b>+1-770-951-0933</b>
IV-1-5	e-mail	<b>docketing@thomashorstemeyer.com</b>
IV-1-5(a)	E-mail authorization The receiving Office, the International Searching Authority, the International Bureau and the International Preliminary Examining Authority are authorized to use this e-mail address, if the Office or Authority so wishes, to send notifications issued in respect of this international application:	<b>as advance copies followed by paper notifications</b>
IV-1-6	Agent's registration No.	<b>40,158</b>
<b>V</b>	<b>DESIGNATIONS</b>	
<b>V-1</b>	<b>The filing of this request constitutes under Rule 4.9(a), the designation of all Contracting States bound by the PCT on the international filing date, for the grant of every kind of protection available and, where applicable, for the grant of both regional and national patents.</b>	
<b>VI-1</b>	<b>Priority claim of earlier national application</b>	
VI-1-1	Filing date	<b>02 May 2019 (02.05.2019)</b>
VI-1-2	Number	<b>62/842,259</b>
VI-1-3	Country or Member of WTO	<b>US</b>
<b>VI-2</b>	<b>Priority claim of earlier national application</b>	
VI-2-1	Filing date	<b>13 May 2019 (13.05.2019)</b>
VI-2-2	Number	<b>62/846,892</b>
VI-2-3	Country or Member of WTO	<b>US</b>
<b>VI-3</b>	<b>Priority document request</b> The International Bureau is requested to obtain from a digital library a certified copy of the earlier application(s) identified above as item(s), using, where applicable, the access code(s) indicated:	<b>VI-1 Access code: 8745 VI-2 Access code: 8046</b>
<b>VI-4</b>	<b>Incorporation by reference :</b> where an element of the international application referred to in Article 11(1)(iii)(d) or (e) or a part of the description, claims or drawings referred to in Rule 20.5(a) is not otherwise contained in this international application but is completely contained in an earlier application whose priority is claimed on the date on which one or more elements referred to in Article 11(1)(iii) were first received by the receiving Office, that element or part is, subject to confirmation under Rule 20.6, incorporated by reference in this international application for the purposes of Rule 20.6.	

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<b>VII-1</b>	<b>International Searching Authority Chosen</b>	<b>United States Patent and Trademark Office (USPTO) (ISA/US)</b>	
<b>VIII</b>	<b>Declarations</b>	Number of declarations	
VIII-1	Declaration as to the identity of the inventor	-	
VIII-2	Declaration as to the applicant's entitlement, as at the international filing date, to apply for and be granted a patent	-	
VIII-3	Declaration as to the applicant's entitlement, as at the international filing date, to claim the priority of the earlier application	-	
VIII-4	Declaration of inventorship (only for the purposes of the designation of the United States of America)	-	
VIII-5	Declaration as to non-prejudicial disclosures or exceptions to lack of novelty	-	
<b>IX</b>	<b>Check list</b>	Number of sheets	Electronic file(s) attached
IX-1	Request (including declaration sheets)	<b>4</b>	✓
IX-2	Description	<b>47</b>	✓
IX-3	Claims	<b>10</b>	✓
IX-4	Abstract	<b>1</b>	✓
IX-5	Drawings	<b>27</b>	✓
IX-6a	Sequence listing part of the description (also to be used for the purposes of international search)	-	-
IX-7	TOTAL	<b>89</b>	
	<b>Accompanying Items</b>	Paper document(s) attached	Electronic file(s) attached
IX-8	Fee calculation sheet	-	✓
<b>IX-20</b>	<b>Figure of the drawings which should accompany the abstract</b>	<b>8</b>	
<b>IX-21</b>	<b>Language of filing of the international application</b>	<b>English</b>	
<b>X-1</b>	<b>Signature of applicant, agent or common representative</b>	<b>/Daniel J. Santos, Reg. No. 40,158/</b>	
X-1-1	Name	<b>THOMAS HORSTEMEYER LLP</b>	
X-1-2	Name of signatory	<b>Daniel J. SANTOS</b>	
X-1-3	Capacity (if such capacity is not obvious from reading the request)	<b>Patent Attorney for Applicant</b>	

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10-1	Date of actual receipt of the purported international application	04 May 2020 (04.05.2020)
10-2	Drawings:	
10-2-1	Received	
10-2-2	Not received	
10-3	Corrected date of actual receipt due to later but timely received papers or drawings completing the purported international application	
10-4	Date of timely receipt of the required corrections under PCT Article 11(2)	
10-5	International Searching Authority	ISA/US
10-6	Transmittal of search copy delayed until search fee is paid	

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11-1	Date of receipt of the record copy by the International Bureau	
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