

<b>PATENT ASSIGNMENT COVER SHEET</b>
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<b>SUBMISSION TYPE:</b>	NEW ASSIGNMENT
<b>NATURE OF CONVEYANCE:</b>	ASSIGNMENT
<b>CONVEYING PARTY DATA</b>	
<b>Name</b>	<b>Execution Date</b>
KYLE ROOD	09/12/2012
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<b>PROPERTY NUMBERS Total: 1</b>	
<b>Property Type</b>	<b>Number</b>
<b>Application Number:</b>	15563490
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<b>ATTORNEY DOCKET NUMBER:</b>	52553-170195
<b>NAME OF SUBMITTER:</b>	STEVEN M. RITCHEY
<b>SIGNATURE:</b>	/steven m. ritchey/
<b>DATE SIGNED:</b>	10/24/2017
<b>Total Attachments: 3</b>	
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source=fully executed 13UMC002 Kyle Rood assignment#page3.tif	

## ASSIGNMENT

WHEREAS, **Kyle Rood**, an individual, a citizen of the United States of America, having a residential address of 544 Pioneer Drive, Saint Peters, Missouri 63376 ("Assignor"), has contributed to the invention of subject matter related to and, all or a portion of which, is disclosed, described and/or claimed in UM Invention Disclosure No. 13UMC002 entitled "Photoacoustic flow cell for identification of rare analytes in suspension" for which a patent application(s) may be filed ("Application");

WHEREAS, **The Curators of the University of Missouri**, a public corporation of the State of Missouri having a principal place of business at 316 University Hall, Columbia, Missouri 65211, U.S.A. ("Assignee"), is desirous of acquiring Assignor's entire right, title and interest in and to said subject matter including rights to any and all invention(s), said Application, and any and all Letters Patent that might be granted upon or otherwise stem therefrom; and

WHEREAS, pursuant to Assignor's assignment obligations under the Collected Rules and Regulations § 100.020, Assignor desires to convey any and all rights that Assignor has or might have in the aforementioned subject matter, invention(s), said Application and said Letters Patent to Assignee and Assignor requests that any ambiguities in this document be construed in favor of such conveyance.

NOW, THEREFORE, to all whom it may concern, be it known that, in consideration of Assignor's past and continued employment with and use of Assignee's funds and facilities, Assignor's assignment obligations and royalty-sharing rights under the Collected Rules and Regulations § 100.020, the sum of \$1.00 in-hand paid, and other good and valuable consideration, the receipt and sufficiency of which are hereby acknowledged, Assignor hereby assigns, transfers and conveys (or confirms any prior such conveyance as the case may be) to Assignee, Assignor's entire right, title and interest within the United States, its territories and possessions, and all foreign countries, in and to: said subject matter, said invention(s) and any and all improvements thereto, said Application, and any and all Letters Patent that may be granted therefor in any country; any and all derivative or continuing applications including any and all divisionals, continuations, continuations-in-part, extensions, renewals, and reissues

## ASSIGNMENT

thereof; any and all applications for patents or similar legal protection that may hereafter be filed for said invention(s) in any country; all patents or similar legal protection that may be granted for said in any country and all extensions, renewals and reissues thereof or legal equivalent thereof.

Assignor hereby authorizes and requests the Director of the United States Patent and Trademark Office, and any official of any other country whose duty it is to issue patents or similar legal protection on said invention(s), to issue patents or similar legal protection for said invention(s) to Assignee, the same to be held by Assignee for its own use and benefit, to the full end of the term for which said patents or similar legal protection are or may be granted, as fully and entirely as the same would have been held and enjoyed by Assignor had this assignment not been made.

Assignor hereby further agrees, upon the request of Assignee, to execute any and all applications for divisionals, continuations and/or continuations-in-part for said invention(s) or improvements thereto and any supplemental oath or declaration relating thereto, and any applications for the reissue or extension of any patent that may be granted upon said Application that Assignee may deem necessary or expedient. Assignor agrees to supply Assignee with all information that may be material to the patentability of said invention(s) and to cooperate with Assignee and its representatives in preparing arguments in support of patentability. Assignor further agrees that, in the event said invention(s), said Application or any patents issued thereon becomes involved in an interference, upon request of Assignee, Assignor will cooperate to the best of its ability with Assignee in preparing the preliminary statement and giving and producing evidence in support thereof. Assignor also agrees that, in the event any patent issued from said invention(s) or said Application becomes involved in litigation, upon request of Assignee, Assignor will cooperate to the best of its ability with Assignee in producing evidence in support thereof. Assignor hereby agrees to perform, upon such request, any and all affirmative acts to obtain said patents or similar legal protection, and vest all rights therein in Assignee as fully and entirely as the same would have been held and enjoyed by Assignor if this assignment had not been made. Assignor hereby irrevocably appoints the President of Assignee, or the President's designee, as Assignor's attorney-in-fact with authority to execute for Assignor and on Assignor's behalf any and all assignments, applications, or other instruments and documents required to be

