NAME Venkataramana K. Sidhaye		POSITION TITLE Associate Professor, Pulmonary and Critical Care			
Professional Preparation	1				
INSTITUTION AND LOCATION	DEGRE (if applica	- I VE	AR(s)	FIELD OF STUDY	
Northwestern University, Evanston, IL	BS	1991	-1995	Biomedical Engineering	
Northwestern University Medical School, Chicago, IL	MD	1994	-1998	Medicine	

#### (b) Appointments

2016-current: Associate Professor, Division of Pulmonary and Critical Care Medicine, Dept. of Medicine, Johns Hopkins

2009-2016: Assistant Professor, Division of Pulmonary and Critical Care Medicine, Dept. of Medicine, Johns Hopkins

2006-2008: Instructor, Division of Pulmonary and Critical Care Medicine, Dept. of Medicine, Johns Hopkins 2002-2006: Postdoctoral Fellow, Laboratory of Dr. Landon King, Associate Professor of Medicine and Biological Chemistry, Johns Hopkins 1998-2001: Internal Medicine Residency, Northwestern University 2002-2006: Fellow, Division of Pulmonary and Critical Care Medicine, Dept. of Medicine, Johns Hopkins 2001-2002: Chief Residency, Instructor, Department of Medicine, Northwestern University

# (c) Selected peer review publications

- 1. <u>Brune KA</u>, Ferreira F, <u>Mandke P, Chau E</u>, Aggarwal NR, D'Alessio FR, Lambert AA, Kirk G, Blankson JM. Drummond MB, Tsibris AM, **Sidhaye V**. "HIV impairs lung epithelial integrity and enters the epithelium to promote chronic lung inflammation" PLoSOne 2016 Mar 1; 11(3):e0149679. doi: 10.1371/journal.pone.0149679
- 2. **Sidhaye VK**., Chau E, Srivastava V, Sirimalle S, Balabhadrapatruni C, Aggarwal NR, D'Alessio FR, King LS "A novel role for aquaporin-5 in enhancing microtubule polymerization" *PLoS One* 2012;7(6):e38717.
- 3. Chau E, Galloway JF, Nelson A, Breysse PN, Wirtz D, Searson PC, **Sidhaye VK** "Effect of modifying quantum dot surface charge on airway epithelial cell uptake in vitro." Nanotoxicology. 2012 Aug 20
- 4. **Sidhaye VK**, Chau E, Breysse PN, King LS "Septin-2 mediates airway epithelial barrier function in physiologic and pathologic conditions." American Journal of Respiratory Cell and Molecular Biology. epub September 24, 2010
- 5. **Sidhaye, V.K**, Schweitzer K, Caterina, M.J, Shimoda, L, King, L.S, "Shear stress regulates AQP5 and airway epithelial barrier function." Proc.Natl.Acad.Sci (USA) 2008 Mar 4:105(9):3345-3350.

#### Other publications

- 6. Leggett K, Maylor J, Undem C, Lai N, Lu W, Schweitzer K, King LS, Myers AC, Sylvester JT, **Sidhaye V**, Shimoda LA." Hypoxia-induced migration in pulmonary arterial smooth muscle cells requires calcium-dependent upregulation of aquaporin 1." Am J Physiol Lung Cell Mol Physiol. 2012 Aug 15;303(4):L343-53.
- 7. FR D'Alessio, K Tsushima, NR Aggarwal, DC Files, BT Garibaldi, JV Rodriguez, **VK Sidhaye**, SP Reddy, PM Hassoun, MT Crow, LS King. "Resolution of experimental lung injury by Monocyte-derived inducible nitric oxide synthase (iNOS) "J Immunol. 2012 Sep 1;189(5):2234-45
- 8. Hansel NN, **Sidhaye V**, Rafaels NM, Gao L, Gao P, Williams R, Connet JE, Beaty TH, Mathias RA, Wise RA, King LS, Barnes KC. Aquaporin 5 polymorphisms and rate of lung function decline in chronic obstructive pulmonary disease. *PLoS ONE*, epub November 2010
- 9. **Sidhaye, V.K**, Guler, A.D., Schweitzer, K.S., D'Alessio, F., Caterina, M.J., King, L.S., "TRPV4 regulates aquaporin-5 abundance under hypotonic conditions" Proc.Natl.Acad.Sci (USA) 2006 Mar 21;103(12):4747-52
- 10. **Sidhaye, V.K**, Hoffert, J. D., and King, L. S. "cAMP has distinct acute and chronic effects on aquaporin-5 in lung epithelial cells" J Biol Chem 280:3590-3596, 2005

### (d) Synergistic Activities

1. Associate Fellowship Program Director, Pulmonary and Critical Care Medicine. Involved in training, organization and running of the fellowship program in our division at Johns Hopkins, with a primary role in

oversight of the research education and experience of fellows in the division.

- 2. Associate Director of the Physician-Scientist Pathway, Johns Hopkins School of Medicine Osler Residency Program. Involved in the recruitment, retention, and training of physician-scientists amongst residents in Internal Medicine at Johns Hopkins University School of Medicine. p program in our division at Johns Hopkins, with a primary role in oversight of the research education and experience of fellows in the division.
- 3. Involved in the NIH sponsored Short-term training program to increase diversity in health-related research (R25 HL084762) as a research mentor.

## (e) Collaborators & Other Affiliations

Collaborators and Co-Editors.

Aggarwal, N, NIH.

Biswal, S; Blankson, J; D'Alessio, F; Kirk, G; Robinson, D; Johns Hopkins University.

Drummond, MB; University of North Carolina

Koval, M Emory University; Sopori, M Lovelace Institute

Graduate and Postdoctoral Advisors.

Agre, Peter and King, Landon, Johns Hopkins University

Post-doctoral Advisees/Mentees (total 6)

7/10-6/12 Sonali Bose, MD, Assistant Professor, Johns Hopkins Division of Pulmonary and Critical Care

Medicine

7/11-6/12 Srinivas Sirimalle, MD, private practice, San Diego, CA, shared publication: OR 14

7/13-present Kieran Brune, MD, post-doctoral fellow, Johns Hopkins Pulmonary and Critical Care Medicine,

shared publication: OR 27, RA 1

7/14-present Corrine Kliment, MD, PhD, post-doctoral fellow, Pulmonary and Critical Care Medicine

#### Thesis committees

1/17/11 Saumendra Bajpai, The Mechanics of Cell-Cell and Cell-Stroma Interactions during cancer

progression in human cells. Department of Chemical and Biomolecular Engineering Defense

Panel Member