

Pulmonary, Allergy & Critical Care Medicine

January 2014

Inpatient Service

ICU Green

1-13 Surya Bhatt, MD
14-31 Gerald Belopolsky, MD

Fellow
Angel Brown, MD

ICU Gold

Steve Stigler, MD

Fellow
Allen Moseley, MD

ICU Red

1-13 John Lazenby, MD
14-31 Michael Brown, MD

No Fellow

6-South

Tracy Luckhardt, MD

Fellow
Pilar Acosta Lara, MD

Cystic Fibrosis

1-13 Veena Antony, MD
14-31 James Johnson

Fellow
Pilar Acosta Lara, MD

UHC

Wissam Jaber, MD

Fellow
Matthew Fain, DO

Transplant/ALDS

Inpatient
1-13 Joseph Barney, MD
14-31 Enrique Diaz, MD
Fellow— Aida Venado, MD
Outpatient
1-13 Enrique Diaz, MD
14-31 Keith Wille, MD
Fellow— Aida Venado, MD

VAC/VAICU

Mark Dransfield, MD

VAC Fellow
Hitesh Batra, MD

VAICU Fellow
Krittika Teerapuncharoen, MD

Procedure/EBUS

Procedures—
Nirmal Sharma, MD

MET Fellow
Teja Kulkarni, MD

PFT
John Kennedy, MD
Nirmal Sharma, MD

DIVISIONAL CONFERENCES	2
PUBLICATIONS	3-7
ANNOUNCEMENT CONGRATULATIONS	8-10
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Research & Electives

Walt Doty, MD
Joshua Morrison, MD
Sunad Rangarajan, MD

Cliff Courville, MD
Jeffrey Garner, MD
John Williams, MD

January Pulmonary & Critical Care Conferences

Thurs., Jan. 2nd	CANCELLED		
Fri., Jan. 3rd	CANCELLED		
Mon., Jan. 6th	Multidisciplinary Chest Conf "Case Discussions"	Dr. John Williams	Noon—1:00pm FOT 180
Tues., Jan. 7th	Journal Club	Dr. Cliff Courville	Noon—1:00pm THT 428
Thurs., Jan. 9th	ILD Conference	Drs. de Andrade & Tracy Luckhardt	7:30—8:30 am THT 428
Thurs., Jan. 9th	Critical Care Grand Rounds	Dr. Dale Needham	Noon—1:00 pm Finley Conference Room
Fri., Jan. 10th	Core Lecture Series "Occupational Lung Disease Mesothelioma"	Dr. Nirmal Sharma	Noon—1:00pm THT 428
Mon., Jan. 13th	Faculty Meeting	Drs. Victor Thannickal & James Johnson	Noon—1:00pm Finley Conference Room
Tues., Jan. 14th	Research Conference		Noon—1:00pm THT 428
Thurs., Jan. 16th	ILD Conference	Drs. de Andrade & Tracy Luckhardt	7:30—8:30 am THT 428
Thurs., Jan. 16th	Pulmonary & CCM GRs	Dr. Assem Ziady	Noon—1:00 pm Finley Conference Room
Fri., Jan. 17th	Critical Care Case Conference "ICU Case Discussions"	Drs. Allen Moseley & Angel Brown	Noon—1:00pm THT 428
Mon., Jan. 20th	No Conference	MLK—UAB Holiday	
Tues., Jan. 21st	ALDS & Lung Transplant Conf "Case Discussions"	Dr. Keith Wille	7:30—8:30 am THT 428
Tues., Jan. 21st	Pulmonary Case Conference "Case Discussions"	Dr. Mint Teerapuncharoen	Noon—1:00pm THT 428
Thurs., Jan. 23rd	ILD Conference	Drs. de Andrade & Tracy Luckhardt	7:30—8:30 am THT 428
Thurs., Jan. 23rd	Pulmonary & CCM GRs "Developing and Fostering Mentorships"	Dr. William Bailey	Noon—1:00 pm Finley Conference Room
Fri., Jan. 24th	Critical Care Case Conference "ICU Case Discussions"	Drs. Allen Moseley & Angel Brown	Noon—1:00pm THT 428
Mon., Jan. 27th	Research Conference		Noon—1:00pm THT 428
Tues., Jan. 28th	Pulmonary M&M	Dr. Steve Stigler	Noon—1:00pm THT 428
Thurs., Jan. 30th	ILD Conference	Drs. de Andrade & Tracy Luckhardt	7:30—8:30 am THT 428
Thurs., Jan. 30th	Pulmonary & CCM GRs	Dr. David Stoltz	Noon—1:00 pm Finley Conference Room
Fri., Jan. 31st	Critical Care Case Conference	Drs. Allen Moseley & Angel Brown	Noon—1:00pm THT 428

[Int J Chron Obstruct Pulmon Dis.](#) 2013;8:581-9. doi: 10.2147/COPD.S53619. Epub 2013 Nov 22.

Noninvasive positive pressure ventilation in subjects with stable COPD: a randomized trial.

[Bhatt SP](#), [Peterson MW](#), [Wilson JS](#), [Durairaj L](#).

Author information

Division of Pulmonary, Critical Care, and Occupational Medicine, Department of Internal Medicine, Roy J and Lucille A, Carver College of Medicine, University of Iowa Hospital, Iowa City, IA, USA.

Abstract

BACKGROUND:

The use of domiciliary noninvasive positive pressure ventilation (NPPV) in stable chronic obstructive pulmonary disease (COPD) with chronic hypercapnic respiratory failure has yielded variable effects on survival, quality of life, and dyspnea. We hypothesized that use of NPPV in stable COPD and partial pressure of carbon dioxide (PaCO₂) <52 mmHg might result in improvement in quality of life and dyspnea.

METHODS:

Thirty patients with stable COPD (forced expiratory volume in the first second <50% predicted and PaCO₂ <52 mmHg) were prospectively randomized to receive domiciliary NPPV (bilevel positive airway pressure, 15/5 cm H₂O) or usual therapy for 6 months. Measurements were made at baseline, 6 weeks, 3 months, and 6 months. Primary outcomes were quality of life as assessed by the Chronic Respiratory Disease Questionnaire (CRQ), and dyspnea as measured by the Transitional Dyspnea Index (TDI).

RESULTS:

Fifteen subjects in the NPPV arm and 12 controls completed all the study visits. At 6 weeks and 3 months, the NPPV arm showed significant improvement in TDI total score. However, this effect persisted only in the TDI-Task at 6 months (P=0.03). NPPV use was associated with a small improvement in the CRQ-Mastery domain (0.6 versus -0.1, P=0.04). The arterial partial pressure of oxygen (PaO₂) in the control arm worsened over the period of the study, whereas it remained stable in the NPPV arm (change -7.2 mmHg versus +2.1 mmHg, respectively, P=0.02).

CONCLUSION:

NPPV resulted in a small improvement in quality of life indices in stable COPD patients with PaCO₂ <52 mmHg. Future larger studies will clarify the role of NPPV in this stable subgroup of patients with COPD.

KEYWORDS: chronic obstructive pulmonary disease, noninvasive, normocapnia, ventilation
PMID: 24293994 [PubMed - in process] PMCID: PMC3842217

[Eur Respir J](#). 2013 Dec 5. [Epub ahead of print]

Pulmonary MMP-9 activity in mechanically ventilated children with RSV disease.

[Kong MY](#), [Clancy J](#), [Peng N](#), [Li Y](#), [Szul T](#), [Xu X](#), [Oster R](#), [Sullender W](#), [Ambalavanan N](#), [Blalock JE](#), [Gaggar A](#).

Author information

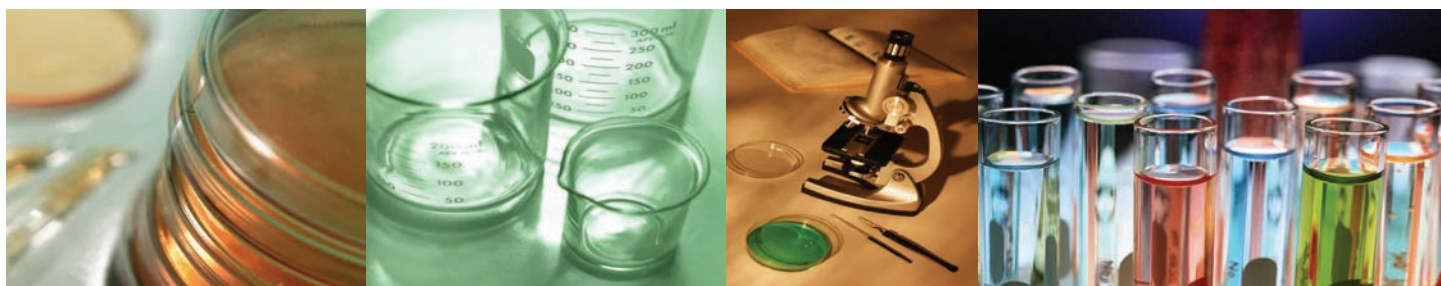
University of Alabama at Birmingham, ACC 504, 1600 7th Ave South, Birmingham, AL, 35233.

Abstract

RSV infection is a potent stimulus for airway epithelial expression of MMP-9, and MMP-9 activity in vivo is a predictor of disease severity in children with RSV-induced respiratory failure (RSV-RF). Human airway epithelial cells were infected with RSV A2 strain, and analysed for MMP-9 and tissue inhibitor of metalloproteinases-1 (TIMP-1, a natural inhibitor of MMP-9) release. In addition, endotracheal samples from children with RSV-RF and controls (non-RSV pneumonia and non-lung disease controls) were analysed for MMP-9, TIMP-1, human neutrophil elastase (HNE) and myeloperoxidase (MPO) activity. RSV infection of airway epithelia was sufficient to rapidly induce MMP-9 transcription and protein release. Pulmonary MMP-9 activity peaked at 48 hours in infants with RSV-RF compared to controls. In the RSV group, MMP-9 activity and MMP-9:TIMP-1 ratio imbalance predicted higher oxygen requirement and worse Paediatric Risk of Mortality scores. Highest levels of HNE and MPO were measured in the RSV cohort but unlike MMP-9, these neutrophil markers failed to predict disease severity. These results support the hypothesis that RSV is a potent stimulus for MMP-9 expression and release from human airway epithelium, and that MMP-9 is an important biomarker of disease severity in mechanically ventilated children with RSV lung infection.

PMID: 24311764

[PubMed - as supplied by publisher]



[J Biol Chem.](#) 2013 Dec 6;288(49):35428-36. doi: 10.1074/jbc.M112.426866. Epub 2013 Oct 22.

miR-125a-5p Regulates Differential Activation of Macrophages and Inflammation.

[Banerjee S](#), [Cui H](#), [Xie N](#), [Tan Z](#), [Yang S](#), [Icyuz M](#), [Thannickal VJ](#), [Abraham E](#), [Liu G](#).

Author information

From the Department of Medicine, University of Alabama at Birmingham, Birmingham, Alabama 35294 and.

Abstract

Macrophage activation is a central event in immune responses. Macrophages undergoing classical activation (M1 macrophages) are proinflammatory, whereas alternatively activated macrophages (M2 macrophages) are generally anti-inflammatory. miRNAs play important regulatory roles in inflammatory response. However, the manner in which miRNAs regulate macrophage activation in response to different environmental cues has not been well defined. In this study, we found that M-BMM macrophages (M2) express greater levels of miR-125a-5p than do GM-BMM macrophages (M1). Stimulation of macrophages through TLR2 and TLR4 but not through TLR3 enhanced miR-125a-5p expression. Up-regulation of miR-125a-5p after TLR2/4 activation requires the adaptor MYD88 but not TRIF. Overexpression of miR-125a-5p diminished M1 phenotype expression induced by LPS but promoted M2 marker expression induced by IL-4. In contrast, knockdown of miR-125a-5p promoted M1 polarization and diminished IL-4-induced M2 marker expression. We found that miR-125a-5p targets KLF13, a transcriptional factor that has an important role in T lymphocyte activation and inflammation. KLF13 knockdown had similar effects on M1 activation as did miR-125a-5p overexpression. In addition, miR-125a-5p regulates phagocytic and bactericidal activities of macrophages. Our data suggest that miR-125a-5p has an important role in suppressing classical activation of macrophages while promoting alternative activation.

KEYWORDS:

Inflammation, KLF13, Kruppel-like Factor (KLF), Macrophage Polarization, Macrophages, MicroRNA, Phagocytosis, Toll-like Receptors (TLR)

PMID: 24151079 [PubMed - in process] PMCID: PMC3853290



[Biogerontology](#). 2013 Dec;14(6):609-15. doi: 10.1007/s10522-013-9451-6. Epub 2013 Aug 9.

Mechanistic links between aging and lung fibrosis.

[Thannickal VJ](#).

Author information

Division of Pulmonary, Allergy and Critical Care Medicine, Department of Medicine, University of Alabama at Birmingham, 429 THT, 1900 University Blvd., Birmingham, AL, 35294-0006, USA, vjthan@uab.edu.

Abstract

Our understanding of the biology of aging has advanced significantly in recent years. This has resulted in the recent formulation of the "hallmarks of aging" that include genomic instability, telomere attrition, epigenetic alterations, loss of proteostasis, deregulated nutrient sensing, mitochondrial dysfunction, cellular senescence, stem cell exhaustion, and altered intercellular communication. Idiopathic pulmonary fibrosis (IPF) is a progressive and fatal lung disease that results from the accumulation of scar tissue in the lungs of affected individuals. IPF is a disease of aging that most commonly affects human subjects older than 60 years of age. While progress has been made in elucidating key pathological processes in IPF, the relationship of these processes to those that occur during aging are not well defined. In this review, we explore existing and emerging paradigms in the pathogenesis of IPF in light of the recently defined hallmarks of aging.

PMID: 23929205 [PubMed - in process]

PMCID: PMC3852192

[Available on 2014/12/1]



[BMJ Open](#). 2013 Dec 23;3(12):e004140. doi: 10.1136/bmjopen-2013-004140.

Sputum PGP is reduced by azithromycin treatment in patients with COPD and correlates with exacerbations.

[O'Reilly PJ](#), [Jackson PL](#), [Wells JM](#), [Dransfield MT](#), [Scanlon PD](#), [Blalock JE](#).

Author information Division of Pulmonary, Allergy and Critical Care Medicine, Lung Health Center, University of Alabama at Birmingham, Birmingham, Alabama, USA.

Abstract

RATIONALE:

Proline-glycine-proline (PGP), a neutrophil chemoattractant derived from the enzymatic breakdown of collagen, is elevated in sputum of patients with chronic obstructive pulmonary disease (COPD) and may contribute to disease progression. Whether sputum levels of PGP respond to therapy for COPD or predict outcomes is unknown.

OBJECTIVES:

We conducted a study ancillary to a multicenter trial of the efficacy of azithromycin treatment for 1 year in preventing COPD exacerbations to test whether sputum levels of PGP were altered by treatment or associated with exacerbation frequency.

METHODS:

We collected remnant sputa from trial participants and assayed them in a blinded fashion for PGP, myeloperoxidase and matrix metalloproteinase (MMP)-9 and for the ability to generate PGP from collagen *ex vivo*. Once the parent trial was unblinded, the results were correlated with use of azithromycin or placebo and exacerbations in participants.

RESULTS:

Azithromycin treatment significantly reduced sputum levels of PGP and myeloperoxidase in patients with COPD, particularly with increased duration of therapy. We found no difference in sputum MMP-9 or PGP generation between participants taking azithromycin or placebo. Sputum PGP levels were highest around the time of an exacerbation and declined with successful treatment.

CONCLUSIONS:

These data support a role for PGP in the airway and parenchymal neutrophilic inflammation that drives COPD progression and exacerbations, and provide new information on the anti-inflammatory properties of macrolides. PGP may have potential as a target for novel anti-inflammatory therapies in COPD and as a biomarker for clinical trials.

KEYWORDS:

PGP PMID: 24366582 [PubMed]



30th Annual Trainee Research Symposium
Wednesday, March 5, 2014

Abstract Deadline Friday, January 31, 2014

All Department of Medicine trainees (PGY 1-3; Fellows PGY 4-7; MD and PhD post-doctoral scholars and graduate students with DOM mentors) are encouraged to compete in the **30th Annual Trainee Research Symposium**.

Submit a one-page abstract describing your original basic or clinical research.

Abstract Link http://www.uab.edu/medicine/dom/images/RFA_and_Abstract_form.doc

58th Annual Tri-State Thoracic Society Case Conference
January 17-18, 2014
New Orleans, LA

First Year Fellows participate in consecutive case presentation with fellows from Alabama, Louisiana and Mississippi

Friday, January 17, 2014

10:00 am—11:30 am Onsite Registration/Exhibits Open

11:30 am—12:00 pm Lunch

12:00 pm—1:00 pm Keynote Address

1:00 pm—2:00 pm Alabama Case Presentations—UAB

1:00 pm—3:00 pm Alabama Case Presentation, University of South Alabama

3:00 pm—3:30 pm Exhibits and Social

3:30 pm—4:30 pm Mississippi Case Presentations, Univ. of Mississippi Medical Center

4:30 pm—5:30 pm Louisiana Case Presentations, Louisiana State University (New Orleans)

Saturday, January 18, 2014

7:30 am—8:30 am Tri-State Planning Meeting/Breakfast

8:30 am—9:30 am Louisiana Case Presentations, Louisiana State University (Shreveport)

9:30 am—10:30 am Louisiana Case Presentations, Tulane University (New Orleans)

10:30 am—11:00 am Exhibits and Break

11:00 am—12:00 pm Pulmonary Year End Review

12:00 pm—Complete Evaluations

12:30 pm—Adjourn

Campus Ride services will end January 3rd
 The Blazer Express will launch January 6th

This is a free service open to all UAB students, employees and authorized visitors. The Blazer Express will be a 24-hour weekday service starting at 5:30 am on Monday and ending at 5:30 am on Saturday.

Blue Route	Green Route	Gold Route	Silver Route	Purple Route	Orange Route
M-F 5am-7pm	M-F 7am-7pm	M-F 7am-7pm	M-F 2pm-7pm	M-F 7pm-12am	M-F 7pm 12am
Remote 1 Parking Remote 2 Parking	Campus Bookstore Lot 15N	West Pavilion 4th Avenue Deck	Remote 1 Parking Remote 2 Parking	Cooper Green Spain Rehab	Remote 1 Parking 12th St. Parking Deck
Remote 3 Parking Cooper Green	5th Ave. Deck Hillman Building	Hillman Building Kaul Genetics Bldg.	Remote 3 Parking Women & Infants Ctr	4th Avenue Deck Hillman Building	12th St. Parking Deck Hulsey Center
Spain Rehab Hillman Building	Kaul Genetics Bldg. Campus Rec. Ctr.	Holley-Mears Bldg. Five Points	Spain Rehab Cooper Green	Kaul Genetics Bldg. 9th Ave. Deck	UAB Child Care Ctr 9th Avenue Deck
Kaul Genetics Bldg. Lister Hill Library	Blazer Hall Rast Hall	Medical Towers Lot 15W		Rast Hall UAB Highlands	Webb Building Sch of Health Professions
Lot 5A Lot 15A	UAB Highlands Lot 15L; Lot 15D Lot 24; Chemistry Bldg.	Lot 15U		Lot 15L; Lot 15D Camp Hall Campus Rec Ctr	10th Ave. Deck Medical Alumni Bldg 6th Ave Deck; Lot 15N North Pavilion Children's Harbor Remote 2 Parking



BLAZER EXPRESS

For live bus tracking, route updates, and more visit uab.edu/blazerexpress



ABIM Board Certified Physicians



Pulmonary

Cliff Courville, MD

Walt Doty, MD

Allen Moseley, MD

Sunad Rangarajan, MD

Critical Care

Amanda Denham, MD

Brian Flanagan, MD

Jason Zolak, MD

Jennifer Trevor, MD

Marty Solomon, MD



Dr. Steven Rowe is a recipient of the **2014 Dean's Award for Excellence in Mentorship**

The *Dean's Award for Excellence in Mentorship* is awarded to full-time regular UAB faculty members who have demonstrated exceptional accomplishments as mentors of graduate students and postdoctoral fellows.



January 2014

Birthdays



Sun	Mon	Tue	Wed	Thu	Fri	Sat
			1 	2	3 Tambra Roberts	4
5	6 Jessy Deshane	7	8	9	10	11
12 Jennifer Trevor Louise Hecker	13	14 John Williams	15	16	17 Shaoning Jiang	18 James Johnson Yanping Liu Venus Roper
19	20	21	22 Karen Davidson	23	24	25
26	27 Michelle Spann	28	29	30 Michael Brown	31 Keith Wille	