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Silver Jubilee Conference on
Pulmonary Diseases
Under the Aegis of Indian Chest Society &
National College of Chest Physicians India



30th Nov - 3rd Dec 2023



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From the Desk of Organising Chairman & President ICS



Dr. R. Vijai Kumar
Organising Chairman NAPCON 2023 Hyderabad
President Indian Chest Society (ICS)

One of the greatest clinicians and a wonderful teacher I have always admired is Sir William Osler (1849-1919), who is credited with the concept of teaching medical students at the bedside and away from the classrooms as it was the practice earlier.

In this context I am reminded of a story which I have been narrating year after year to my students of pulmonary medicine, last more than 40 years. The story goes like this. Once upon a time there was a naughty boy who always liked to play and was not interested in school at all. His father decided to take him to the city and hand him over to his friend, who was a diamond merchant. The contract was for one year. On day one, the diamond merchant hands the boy a stone and goes on to tell him a story of an elephant. The days roll by, and the merchant tells the boy a new story every day, making sure a stone is given at the beginning of the story.

Two days to go, the boy ruminates what a waste of time it was, listening to the old man and missing all the fun with his friends in the village. On the last day as boy's father was expected to take him away, the merchant hands the boy a stone and was about to start the story. The boy shouts "master! this is not a diamond that you gave me today!" Well, the boy was playing with the pure diamond for 365 days imbibing the texture, weight and feel of it, and could make out the fake one given to him on the last day. The boy is now a diamond expert!

Medicine is no different. A medical student watching his professor for weeks, months and years will eventually imbibe the qualities and clinical skills to become an expert himself. Conferences like the NAPCON 2023 are important too, where teachers from nook and corner would come to share knowledge, giving an opportunity to learn newer knowledge, and make you become a better doctor. Knowledge comes from books but wisdom comes from teachers and one's own experiences.

As Sir William Osler himself had said "to study medicine without books is to sail an unchartered sea, but to study books alone, is not to go to sea at all"

Dr. R. Vijai Kumar

Organising Chairman NAPCON 2023 Hyderabad
President Indian Chest Society (ICS)

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Indian Journal of Respiratory Therapy
Vice Chair TB-Alert (India)

From the Organising Secretary's desk



Dr. Subhakar Kandi
Organizing Secretary
NAPCON 2023
Hyderabad

Dear Distinguished Colleagues & Honoured Participants

It is with great pleasure and enthusiasm that I extend my warmest welcome to all of you for the silver jubilee NAPCON 2023 Hyderabad, an intellectual forum which stands as a testament to our collective dedication in advancing the scientific frontiers in the pulmonary medicine.

As the Organizing Secretary, I am honoured to facilitate this convergence of minds where an empirical insights, rigorous research and scholarly discourses will share trajectory of our field.

I am glad to inform you that this conference is going to provide you an "Academic extravaganza" likes never before with 108 scientific sessions with diverse range of topics. I am delighted to inform you that for the first time in the history of NAPCON, more than 65 international faculty from around 25 countries and about 650 National experts would be sharing their knowledge, experience and innovations in the realm of pulmonary diseases to 2500 delegates approximately coming from nook and corner of the world.

I am fascinated by the interest shown by the postgraduates in submitting a record number of 1200 abstracts posing a challenge to the organisers and the reviewers to accommodate them.

This conference provides a unique opportunity for all of us to engage in insightful conversations, share ground breaking research findings, and foster collaborations that will contribute to the enhancement of patient care and the progression of pulmonary medicine. We have carved 25 preconference workshops. Please get ready to rock and roll as we dive into workshops that are cooler than the coolest. The interactive sessions that'll have you on the edge of your seat are expected to be more thrilling than a rollercoaster ride! As you peruse the pages of this souvenir, may it serve as a lasting moment of the knowledge shared, connections made, and memories created during this conference.

I hope you find inspiration and motivation to continue your pursuit of excellence in the field.

This isn't any other average conference; it's a full-blown extravaganza where we're mixing serious science with a dash of fun. Forget boring schedules, we're turning science into a party, and you're all VIP guests!



You can have great shopping experience at wide array of Gift shops from famous Pearls, exquisite Hyderabad Bangles to exquisitely elaborate malls comprising several international brand stores etc.

Hyderabad is going to offer a very special tourist experience with several heritage monuments, sprawling parks and many more attractions. An extensive daily trip to several tourist spots has been arranged to engage the spouses so that they too can rejoice the sojourn.

The best of all, of course is the delectable Hyderabad Biryani, mouth watering kebabs and unique delicacy called pattar ka ghosh to enhance your taste buds.

I express my profound gratitude to our esteemed speakers for their scholarly contributions in these intellectual endeavours. May this conference be a catalyst for new horizons, inspiring innovation and enduring contributions to the field of pulmonary medicine. I also take this opportunity to extend my heartfelt gratitude to our sponsors and partners for their unwavering support. Without your commitment the realization of this conference would remain an aspiration

Thanks for being the life of the party and making this scientific soiree unforgettable. Get ready to laugh, learn and party on like it's your favourite music festival.

Dr Subhakar Kandi
MD, FICS, FRCP(London), FRCP (Edin), FCCP (USA)
Organising Secretary
NAPCON 2023
Prof & Hod Pulmonary Medicine
Kamineni Academy Of Medical Sciences and Research Center
Global Governor American College of Chest Physicians
Treasurer- Indian Chest Society



Dr. Tamilisai Soundararajan



सत्यमेव जयते

**GOVERNOR
TELANGANA**

RAJ BHAVAN
Hyderabad - 500 041



MESSAGE

I express my appreciation upon learning of the forthcoming Silver Jubilee Conference on Pulmonary Diseases, scheduled to be convened from November 30, 2023 to December 3, 2023, at the Hyderabad International Convention Centre (HICC), Hyderabad under the auspices of the Indian Chest Society and the National College of Chest Physicians (India), denoted as NAPCON 2023.

The conference serves as a commendable platform for the interchange of knowledge and experiences within the medical community, with a particular emphasis on fostering engagement among the emerging generation of healthcare professionals. It is my hope that this national assembly will facilitate substantial dialogues, the reverberations of which shall extend to individuals afflicted by respiratory ailments residing in geographically remote regions.

The conference's overarching theme, "REGAINING LUNGS. RENEWING LIVES," serves as an evocative reminder of the imperative to safeguard our invaluable pulmonary organs, the lungs, not solely from the specter of formidable infections but also from the insidious influences of environmental pollution and perilous agents. This symposium is poised to augment public awareness concerning the criticality of preserving the health and vitality of our respiratory systems.

I also appreciate both the Indian Chest Society and National College of Chest Physicians (India) for orchestrating this significant conference. I extend my warm greetings to all the distinguished participants attending NAPCON 2023 in Hyderabad, and I ardently wish the conference a incredible triumph.

Dr. Tamilisai Soundararajan



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November 28, 2023



MESSAGE

The human breathing system is a sublime gift from Nature and symbol of life's interconnectedness.

The depth and rhythm of one's breath impacts both physical and mental well-being. Breath holds many secrets. Every inhalation brings us energy, and each exhalation purifies and relaxes. Life on our planet would naturally prosper if we could unlock the full potential of this intricate process.

The efforts of NAPCON 2023 to bring together brilliant minds in the pursuit of knowledge and improvement of respiratory health are commendable steps toward ensuring a healthier society.

Modern science stands to gain significantly by delving into the mysteries of breath and discovering holistic approaches to treat respiratory issues.

I am sure the National Pulmonary Conference will adopt and encourage an integrated perspective on the subject.

Blessings and Best wishes

-Gurudev Sri Sri Ravi Shankar



SHAILAJA RAMAIYER, I.A.S.
Principal Secretary to Government
Youth Advancement Tourism and
Culture Department
Government of Telangana

I congratulate Dr. Subhakar Kandi, the organizing Secretary of NAPCON for taking the mammoth initiative of choosing Hyderabad as the destination to organize NAPCON2023 (National Conference on Pulmonary Diseases). I am glad that this prestigious conference is hosting several national and international delegates from all over the world.

As the Principal Secretary for Tourism, Culture, Sports & Archeology Department, it gives me immense pleasure and honour to invite all of you to experience the ethos of the most alluring city, Hyderabad which is well known for its "Mehmaan Nawazi - exceptional hospitality to the guest".

I am glad to announce that the Tourism and Culture Department, Government of Telangana has taken an initiative to showcase our rich Telangana Culture through traditional dances by our artists at NAPCON 2023 apart from organizing city tours in and around Hyderabad to the visiting delegates.

After a day-long immersion in academic discussions, you will get to unwind and enjoy a grand gala dinner in the environs of the picturesque historical Qutubshahi monument the "**Taramati Baradari**".

Our Telangana weavers from Pochampali will display their beautiful handmade sarees, which will give an opportunity to spouses of the delegates and faculty, to indulge in local shopping. Hyderabad is also famous for its Pearls and Lac Bangles.

The delegates can also explore the City of Hyderabad, which is both "Gloriously old & glamorously new" and experience both - the Deccani Tahazib as well as, the Vibrant and World Class IT & Bio-tech, Medical & MICE facilities. Hyderabad is considered one of the safest cities in the country and takes pride in its clean & green initiatives.

Of course, without the delectable Hyderabadi Biryani, mouthwatering kebabs and unique delicacy called Pattarkaghosh to enhance your taste buds, you truly would not have tasted Hyderabad!

I strongly believe that this conference is not only going to provide faculty and delegates from all over the world an intense academic platform but also an opportunity to explore the wonders of Telangana's vibrant culture and rich heritage.



Once again, I welcome you and your family to Hyderabad and hope that your excellent academic deliberations will be complemented with an unforgettable experience of the warmth & hospitality of Telangana, I welcome you all once again to "Telangana - The Heart of the Deccan".



SHAILAJA RAMAIYER, IAS.,
PRINCIPAL SECRETARY TO GOVERNMENT



FROM THE DESK OF SCIENTIFIC COMMITTEE CHAIRMAN



Dr. Randeep Guleria
Chairman Scientific Committee

Dear Esteemed Colleagues and Participants,

It is with great pleasure and enthusiasm that I extend my warmest welcome to each one of you to the Souvenir of the National Conference on Pulmonary Diseases (NAPCON). As the Chairman of the Scientific Committee, I am honored to be a part of NAPCON 2023, an event that brings together experts, researchers, and practitioners in the field of pulmonary medicine.

Our collective commitment to advancing knowledge, sharing insights, and fostering collaboration has made this conference a cornerstone in the realm of pulmonary diseases. This year's silver jubilee gathering promises to be an exciting and intellectually stimulating experience, offering a platform for the exchange of cutting-edge research, innovative ideas, and best practices in the field.

The diverse array of topics and presentations featured in the conference reflects the breadth and depth of our shared dedication to improving respiratory health. From the latest advancements in diagnostic techniques to groundbreaking therapeutic approaches, the conference will provide a comprehensive overview of the current landscape of pulmonary medicine.

I encourage all participants to be actively engaged in the discussions, workshops, and networking opportunities available throughout the event. Your contributions, insights, and perspectives are invaluable in shaping the future of pulmonary healthcare by fostering an environment of open dialogue and collaboration; we can collectively address the challenges in our field and work towards innovative solutions.

I look forward to fruitful discussions, meaningful interactions, and the advancement of knowledge that will undoubtedly arise from this gathering. I wish the National Conference on Pulmonary Diseases (NAPCON) 2023 at Hyderabad be a source of inspiration, learning, and camaraderie for all.

See you all at Hyderabad!

Best regards,
Dr. Randeep Guleria
Chairman Scientific Committee
NAPCON, Hyderabad





**Dr. Gautam Bhagat
President,**

National College of Chest Physicians India (NCCP-I)

From NCCP (I) President's Desk

Dear esteemed colleagues,

I hope this message finds you well. As the President of our cherished society, it is with great pleasure and anticipation that I extend my heartfelt wishes for the success of our upcoming annual national conference, a highlight of our calendar year..

Our society has always been a beacon of knowledge and progress and this conference is a testament to our commitment to furthering our mission. It brings together the best and brightest minds in our field to exchange ideas and insights that will shape the future.

I believe that this year's conference will be a resounding success, further strengthening our bonds, fostering innovations and promoting positive changes in our field. I want to extend my heartfelt gratitude to the organizing committee, speakers and all the members who have been working tirelessly to make it all possible. I have no doubt that the event will be an unforgettable experience and I eagerly await the knowledge and inspiration that will emerge from it.

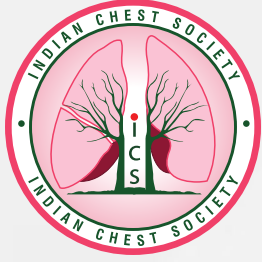
I encourage each one of you to actively participate, engage in meaningful discussions and make the most of this incredible opportunity. Let us leverage the collective wisdom and expertise gathered here to contribute to the growth of our society and community at large.

Wishing you all a fruitful, enlightening and successful NAPCON 2023. Let us inspire one another, learn from each other and leave this conference with a sense of achievement and purpose.

With warm regards,

**Dr Gautam Bhagat
President
National College Of Chest Physicians**





Deepak Talwar
Hon Secretary Indian Chest Society

From ICS Secretary's Desk

TO ALL MY DEAR PULMONARY MEDICINE FATHERNITY

NAPCON 23:

A joint conference of NCCP and ICS is around the corner and this mega event promises to bring the best of Pulmonary, Allergy, Sleep, Interventions and Critical Care Medicine in 4 days from 30 November - 03 December 2023 at Hyderabad.

I'm reminded of the famous saying....

"The only person who is educated is the one who has learned how to learn ...and change."
~Carl Rogers

which itself testifies the wisdom of our respiratory societies to bring change by education and continuous learnings. NAPCON has always been our conference to meet national and international participants and take-home deep knowledge with us thereby enhancing our clinical skills to improve patient outcomes.

Medley of International & National experts:

Three days of power packed NAPCON -23 program promises to fill gaps in our understandings in each and every sphere of 'Pulmonology'. I believe what Albert Einstein said,

'Intellectual growth should commence at birth and cease only at death.'

I am going to be there and lets enjoy the feast of information in all aspects of 'Pulmonary Medicine' besides opportunity of working with like-minded friends and colleagues.

Needless to add, we will have time to enjoy in the evenings with rich cultural programs from Telangana and Andhra Pradesh an tickle our tase buds with Hyderabad cuisine.

See you all at NAPCON 23 and lets make it successful as never before.

Dr. Deepak Talwar
Director & Chairman
Metro Center Respiratory Diseases



Prof. Dr. S. N. Gaur
Secretary, National College of Chest Physicians (India)

From NCCP (I) Secretary's Desk

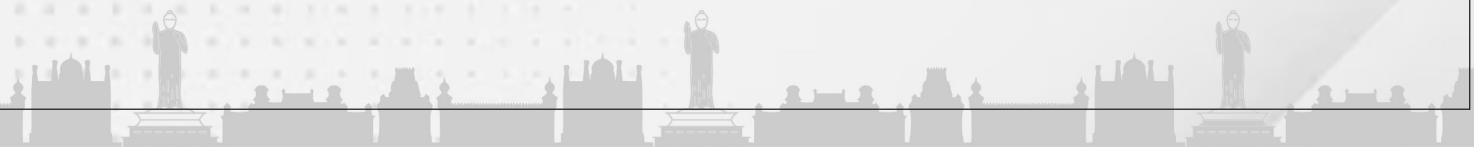
The Indian Chest Society and National College of Chest Physicians (India) have this year entrusted Dr. R. Vijaikumar, Organizing Chairman and Dr. Subhakar Kandi as Organizing Secretary to host the biggest annual national conference of the specialty of Pulmonary Medicine – i.e. 25th NAPCON - 2023 at Hyderabad, under the aegis of Indian Chest Society and National College of Chest Physicians (India), which is scheduled from November 30 to Dec., 03, 2023 at Hyderabad International Convention Centre, Hyderabad, with 25 workshops (being silver jubilee of NAPCON) on the first day at different institutions of Hyderabad. The main Conference will have Guest Lectures, Symposia, Honored Lectures, Debates on Controversies, Panel Discussions, and Meet the Professor sessions on recent advances in Pulmonary Medicine, Critical Care and Sleep Medicine to provide update on relevant topics concerning the specialty of Pulmonary Medicine. We will have 4 Orations from National College of Chest Physicians India and 4 from Indian Chest Society and one Lifetime Achievement Award from each ICS and NCCP(I) as well as Young Scientist Award sessions and Fellowship Awards of both associations.

I am happy to inform you that all the last twenty four NAPCONs were grand success, appreciated by the members as well as the foreign faculty/delegates. I am sure that the same spirit will continue and we will have more and more participation in future conferences. As in past, we are expecting a good number of foreign faculties in NAPCON-2023 from ACCP, ATS, APSR, Srilanka, Nepal and Bangladesh Respiratory societies as well as delegates from neighboring countries.

Dr. R. Vijaikumar and Dr. Subhakar Kandi along-with his team members have put in their best efforts to organize this conference as physical conference in a manner to make it really a most memorable academic event commemorating 25th (silver jubilee) napcon On behalf of the National College of Chest Physicians (India) and on my personal behalf, I thank Dr. R. Vijaikumar, Organizing Chairman, Dr. Subhakar Kandi, Organizing Secretaries and other members of the Organizing Committee for their sincere efforts and hard work, as well as Dr. Randeep Guleria, Chairman, Scientific Committee for drafting an attractive state-of-the-art scientific programme for NAPCON 2023. I am positive that the event will be a grand academic feast, and will be remembered by all.

I welcome you all to NAPCON-2023 at Hyderabad and wish the conference grand success.

Dr. S. N. Gaur, Secretary, NCCP (I)



From Souvenir committee



Dr K Dayanand
Chairman
Souvenir Committee

Greetings from the Souvenir Committee of NAPCON 2023

It is with immense pleasure and anticipation that we extend our warmest welcome to all as we embark on an exceptional journey through the realms of Pulmonary medicine at the NAPCON 2023.

We are thrilled to curate a memorable souvenir. Your presence and expertise are the cornerstones of this event, and we are honoured to have you contribute to the success of NAPCON 2023.

The Silver Jubilee NAPCON 2023 is also special – there are a few books due for release during the conference. We are glad to bring chapters from two books namely Lung Oscillometry and Tuberculosis Simplified: The complete handbook. We thank the authors of both the books for their consent.

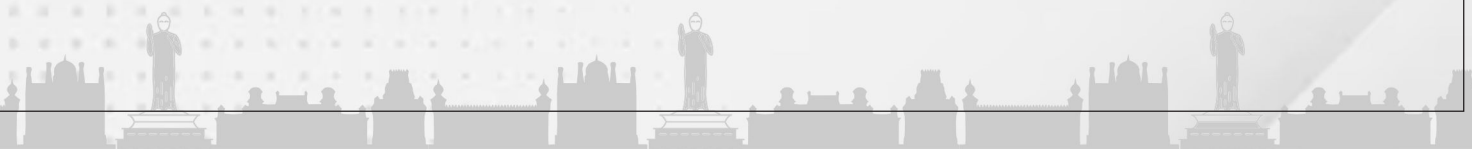
We thank all the Oration speakers for providing the write up of their talk included in the souvenir.

These contributions will be the heartbeat of this commemorative publication, ensuring that the memories and insights from this event resonate for years to come.

We invite you to be an integral part of the NAPCON legacy by sharing your knowledge, experiences, and perspectives.

Welcome to Hyderabad

The Souvenir Team



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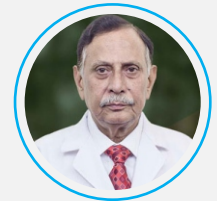
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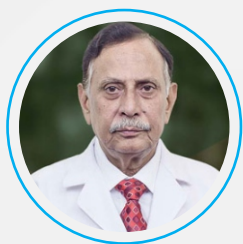
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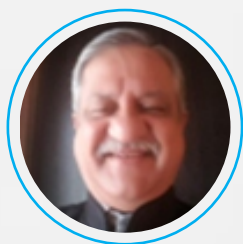
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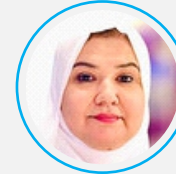
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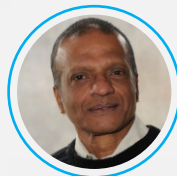
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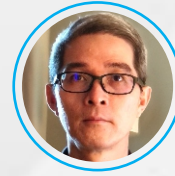
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DR. RAKESH GODARA
DR. RAKESH KODATI
DR. RAKHI LUDAM
DR. RAMAKANT DIXIT
DR. RAMAKRISHNA

DR. RAMAKRISHNA REDDY
DR. RAMASWAMY
DR. RAMESH CHANDRA SAHU
DR. RAMESH SUNDRANI
DR. RAMESH TUKARAM BHARATE
DR. RAMNIWAS
DR. RANDEEP GULERIA
DR. RANGANATH
DR. RATNAKAR
DR. RAVI K DOSI
DR. RAVI KUMAR
DR. RAVICHANDAK
DR. RAVICHANDRA
DR. RAVINDRA SARNAIK
DR. RAVINDRANATH
DR. RC SAHOO
DR. REKHA BANSAL
DR. REKHA PARAMESWARI
DR. RENNIS DAVIS
DR. RESHMI NAIR
DR. RICHA GUPTA
DR. RICHA MITTAL
DR. RISHAB KACKAR
DR. RISHI KUMAR SHARMA
DR. RITISHA BHATT
DR. RK DEWAN
DR. RMPL RAMANATHAN
DR. ROHIT VADALA
DR. S BALAMURUGAN
DR. S K AGARWAL
DR. S K AVASTHI
DR. S K JINDAL
DR. S K KATIYAR
DR. S K PATHAK
DR. S K SARKAR
DR. S K SHARMA
DR. S N GAUR
DR. S SANTHAKUMAR
DR. S SURYA PRAKASH
DR. S V SIVA PRASAD REDDY
DR. SACHIN BALIYAN
DR. SACHIN D
DR. SACHIN KUMAR
DR. SADHANA Y
DR. SAI PRAVEEN HARNATH
DR. SAILENDRA
DR. SAIMUDDIN MOHAMMED
DR. SAJITH KESAVAN
DR. SAKET SHARMA
DR. SALIL BHARGAV
DR. SAMEER ARBAT
DR. SAMIR SAHU
DR. SANDEEP ATTAWAR
DR. SANDEEP GUPTA
DR. SANDEEP JADAV
DR. SANDEEP KATIYAR
DR. SANDEEP MITTAL
DR. SANDHYA NAIR
DR. SANGEETA SHARMA
DR. SANJAY KUMAR
DR. SANJAY THANKUR
DR. SANJEEV MEHTA - MEPOLIZUMAB
DR. SANJEEV NAIR
DR. SANJEEV SINGHAL
DR. SANJEEV SINHA
DR. SANKAR DUVVURI

DR. SANTOSH KUMAR
DR. SATEESH CHANDRA
DR. SATHISH CHANDRA
DR. SATISH CHANDRA REDDY
DR. SATYA PADMAJA
DR. SAURAB KARMAKAR
DR. SAURABH MAJI
DR. SAURABH MITTAL
DR. SAVITA JINDAL
DR. SENTHIL D
DR. SENTHIL RAJAPPA
DR. SHAILENDRA CHAKRAVARTHY
DR. SHALINI TYAGI
DR. SHASHIBHUSHAN
DR. SHEETU SINGH
DR. SHEILA N MYATRA
DR. SHEKAR KUNAL
DR. SHIKA JINDAL GUPTA
DR. SHIPRA ANAND
DR. SHITAL PATIL
DR. SHIVALINGASWAMY S
DR. SHIVANSHU RAJ GOYAL
DR. SHONE P JAMES
DR. SHUBRANSHU
DR. SHUVRANU G
DR. SHWETA BANSAL
DR. SHYAMAL SARKAR
DR. SHYLENDRA
DR. SINDHOORA RAWUL
DR. SK CHHABRA
DR. SK MADHUKAR
DR. SN GUPTA
DR. SNEHAL JADHAV
DR. SOMNATH DAS
DR. SONAM SOLANKI
DR. SONIA DALAL
DR. SOURABH PAHUJA
DR. SRIKANT
KASHINATMALEGAONKAR
DR. SRIKANTA J T
DR. SRIKANTH
DR. SRIKANTH
DR. SRIKANTH GOUD
DR. SRIKANTH KRISHNAMURTHY
DR. SRIKAR DARISETTY
DR. SRINIVAS RAJAGOPALA
DR. SRINIVAS REDDY
DR. SRINIVAS SAMAVEDAM
DR. SRIVATSA LOKESHWARAN
DR. SRYMA
DR. SUBBA NAIDU
DR. SUBBA RAO P
DR. SUBBA RAO S
DR. SUBHAKAR KANDI
DR. SUBIN AHMED
DR. SUBIN KUMAR DEY
DR. SUDANSHU KALRA
DR. SUDARSHAN POTHAL
DR. SUDHA KANSAL
DR. SUDHEENA
DR. SUDHEER TALE
DR. SUDHEERA N
DR. SUDHIR PRASAD
DR. SUDIN KOSHY
DR. SUDIP GHOSH
DR. SUHAIL N

DR. SUHAIL NELIYATHODI
DR. SUHSMITA ROYCHOUHDARY
DR. SUJATA SARADA
DR. SUJEET RAJAN
DR. SUKESH RAO
DR. SUMA
DR. SUMALATHA C
DR. SUMIT MITTAL
DR. SUNANDA
DR. SUNIL KUMAR K
DR. SUNNY VIRDI
DR. SUPRADIP GHOSH
DR. SUPREET BATRA
DR. SUPRIYO SARKAR
DR. SURAJ VARMA
DR. SURENDER KAHYAP
DR. SURENDER REDDY K
DR. SURENDRA KUMAR
DR. SURESH KOOLWAL
DR. SURESH KUMAR P
DR. SURESH RAMASUBBAN
DR. SURESH RAO
DR. SURESH RAPRATHY
DR. SURESH S
DR. SURINDER KUMAR
DR. SURYA KUMARI
DR. SURYANARAYANA NAIDU
DR. SUSHANT MESHARAM
DR. SUSHIL JAIN
DR. SUSMITA KUNDU
DR. SWADIP MISHRA
DR. SWETHA SETHI
DR. SYAMAL SARKAR
DR. T K JAYALAKSHMI
DR. T MANMADHA RAO

DR. T. MOHAN KUMAR
DR. TALHA SAAD
DR. TANMAY JAIN
DR. TANUSHREE GEHLOT
DR. TAPASWI KRISHNA
DR. TARUSHREE SHARMA
DR. TEJAS SURI
DR. THIRUPPATHI
DR. THOMAS GEORGE
DR. THOMAS VADAKKAN
DR. TINKU JOSEPH
DR. TRINATH DASH
DR. TRIPAT DEEP SINGH
DR. U C OJHA
DR. U P S SIDHU
DR. UDAY KAKODKAR
DR. UGANDHAR BHATT
DR. UJJWAL PARAKH
DR. UMA DEVRAJ
DR. UMA MAHESWARI
DR. UMA SHANKAR
DR. UMANG C SHAH
DR. UNMIL SHAH
DR. UNNI R BABY
DR. V K ARORA
DR. V K JAIN
DR. V K SINGH
DR. V V RAO
DR. V. NAGARJUNA MATURU
DR. VAISHALI GAIKWAD
DR. VAMSI KRISHNA
DR. VAMSI KRISHNA MOOTHA
DR. VARUN RAJPAL
DR. VED PRAKASH
DR. VEEROTTAM TOMAR

DR. VENKAT RAMAN KOLA
DR. VENKAT RAMANAPRASAD
DR. VENKATESWARLU
DR. VENU
DR. VENU GOPAL P
DR. VENUGOPAL JAGANNATHAN
DR. VIDUSHI RATHI
DR. VIDYA NAIR
DR. VIJAY HADDA
DR. VIJAY KUMAR C
DR. VIJAY TYAGI
DR. VIJIL RAHULAN
DR. VIKAS MARWAH
DR. VIKAS MITTAL
DR. VIKAS OSWAL
DR. VIKAS PILANIYA
DR. VIKRAM JAI
DR. VIMI VARGHESE
DR. VINOD JANGID
DR. VINOD JOSHI
DR. VINOD KUMAR
DR. VINOD KUMAR VISWANADAN
DR. VINY KANTROO
DR. VIPIN VARKEY
DR. VIPUL KUMAR
DR. VISHAL CHITIKESHI
DR. VISHAL CHOPRA
DR. VISHNU
DR. VISHNU SHARMA
DR. VITRAG SHAH
DR. VIVEK P
DR. VIVEK SINGH
DR. VRUSHALI KHADKE
DR. YUGANDHAR
DR. YUGAVEER
DR. YUVARAJAN



WORKSHOPS

S.No.	Workshop Name	Venue
1	Tuberculosis In 2023	State TB Training and Demonstration Centre, Metropillar 1011 & 1012, Beside Govt. General and Chest Hospital, Erragadda, Hyderabad
2	Respiratory Care For Respiratory Therapy	NIMS,TRAUMA 5th floor,Auditorium
3	Bronchoscopy For Peripheral Pulmonary Lesions	Yashoda Hospital, 5th floor [Hi-tech City]
4	Thoracic Imaging Master Class	The Plaza Hotel, Hyderabad
5	Thoracic Ultrasound	5th floor (Auditorium), KIMS Hospitals, Gachibowli
6	Allergy And Immunotherapy	Aster Prime Hospital Ameerpet,Hyderabad
7	Advanced Polysomnography	Continental Hospital, Hyderabad
8	Advanced Lung Function Test	Yashoda Hospital,[Hi-tech City]
9	Non-Invasive Ventilation	Sleep Therapeutics, Filmnagar
10	Pulmonary Rehabilitation	Apollo Hospital Jubilee Hills Hyderabad
11	Paediatric Bronchoscopy	KIMS Hospital, Kondapur
12	Basic BRONCHOSCOPY Workshop	AIG HOSPITALS ,GACHIBOWLI
13	Medical Thoracoscopy	YASHODA HOSPITAL,SECUNDERABAD
14	Lung Tx And ECMO	Block III, 15th oor (Auditorium), KIMS Hospitals, Secunderabad
15	ICU Bronchoscopy	YASHODA HOSPITALS ,MALAKPET
16	Cryo Applications	YASHODA HOSPITALS SOMALIGUDA
17	EBUS TBNA - Linear	AUDITORIUM YASHODA HOSPITALS
18	Rigid Bronchoscopy	AIG HOSPITALS ,GACHIBOWLI
19	Managing Advanced Lung Diseases	Kumudini Devi Hospice, Pain Relief and Palliative Care Society, Inside Sivananda Rehabilitation Home Opp Pillar No. 789, Kukatpally, Hyderabad, Telangana, 500072
20	Severe Asthma	Star Hospital Financial District [Hyderabad]
21	Objective Structured Clinical Examination	8th floor Auditorium,KIMS- SUNSHINE Hospital Begumpet
22	Ventilator Graphics And Critical Care	Apollo Hospitals, Jubilee Hills
23	Basic Pulmonary Function	Prathima Hospitals, Kukatpally, Hyderabad

SCIENTIFIC PROGRAMME GRID

	PLEURA	Light Blue
	ILD	Light Green
	SLEEP	Pink
	CRITICAL CARE	Light Orange
	INTERVENTIONS	Red
	PAH AND VASCULAR DISEASES	Grey
	ASTHMA and BRONCHIECTASIS	Yellow
	COPD	Purple
	PNEUMONIA	Green
	TUBERCULOSIS AND NTM	Dark Orange
	MISCELLANEOUS	White
	LUNG CANCER	Dark Grey

DAY 1	CHARAKA HALL	FISHMAN HALL	LAENNEC HALL
Session 1 (8:30-9:30)	Diagnostics in ILD: The current concepts and the way forward (SYMPOSIUM)	Hot & New in Asthma (Sympo- sium)	Know your TB tests (SYMPOSIUM)
Session 2 (9:30 -10:30)			
Session 3 (10:30 – 11:30)	ALLERGEN TESTING AND IMMUNOTHERAPY	LUNG TRANS- PLANTION IN INDIA – SUCCESS STORIES (LISTEN FROM THE EXPERTS)	PLEURODESIS AND FIBRINOLYSIS (TRIBATES)
Session 4 (11:30 – 12:30)			
Session 5 (12:30- 1:30)	Latent Tuber- culosis and TB Vaccine	PNEUMONIA AND CONSOLIDATION	Advances in Interventional Pulmonology
Session 6 (2:00 – 3:00)			
Session 7 (3:00 – 4:00)	CLEVELAND CLIN- IC SYMPOSIUM	Case based MDD on Early stage lung cancer (MULTI DISCI- PLINARY DISCUS- SION)	(MULTI DISCI- PLINARY DISCUS- SION) Phenotyping OSA (How and Why) - SYMPOSIUM
Session 8 (4:00- 5:00)			
Session 8 (4:00- 5:00)	SMALL AIRWAY DISEASE	Interventions for OAD (SYMPSO- SIUM)	Molecular diagnos- tics for pneumonia (MIXED BAG)



DAY 1	KILLIAN HALL	PAINTAL HALL	OSLER HALL
Session 1	HOT AND NEW IN COPD (SYMPOSIUM ON COPD)	Asthma - How I do it in my practice?	What you should know - Old meets the new
(8:30-9:30)			
Session 2	Interstitial Lung disease (The Essentials)	Tubercular pleural effusion: Guidelines and controversies (EXPERT PANEL DISCUSSION)	AFTERMATH OF TUBERCULOSIS – THE LIFE AFTER TUBERCULOSIS (SYMPOSIUM)
(9:30 -10:30)			
Session 3	ICS ORATION 1 & 2		
(10:30 – 11:30)			
Session 4	Pneumothorax: Case based panel discussion.	HYPERSENSITIVITY PNEUMONITIS: ALL YOU NEED TO KNOW	MANAGEMENT OF COPD: Panel discussion
(11:30 – 12:30)			
Session 5	UNDERSTANDING MANAGEMENT OF COPD (PANEL DISCUSSION)	Non invasive respiratory support	NEUROMUSCULAR DISEASES (SYMPOSIUM)
(12:30- 1:30)			
Session 6	ICS ORATION 3 & Key Note lecture (Dr. Atul Mehta)		
(2:00 – 3:00)			
Session 7	Management of Pulmonary Hypertension (The concepts and the way forward)	Pneumonia in immunocompromised subjects and challenges (MDD)	CENTRAL Airway Obstruction (Case based panel discussion)
(3:00 – 4:00)			
Session 8	Approach to a case of Bronchiectasis(Case based Panel discussion)	Immune check point inhibitors and lung cancer (Panel discussion)	Nebulization practices in India
(4:00- 5:00)			

HALL (DAY 1 - 1 ST DECEMBER 2023)			
TIMING	TOPIC	SPEAKER / PANELIST	CHAIRPERSON
ILD SESSIONS			
08:30am-09:30am	Session 1: Diagnostics in ILD: The current concepts and the way forward (Symposium)		
08:30am-08:45am	Clinical Diagnosis of ILD: An art not to be forgotten !	Dr Basantha Hazarika	Dr Manoranjan Dash
08:45am-09:00am	HRCT in ILD : Case based learning	Dr Gayatri	Dr Sushant Mesharam
09:00am-09:15am	Autoimmune markers in ILD: Making sense of it	Dr Lisa Rajasekar	Dr Mahesh Mishra
09:15am-09:30am	Biomarker and genetics in diagnosing and prognosticating ILD	Dr DP Dwivedi	Dr Jeena
ASTHMA SESSIONS			
09:30am-10:30am	Session 2: Allergen Testing and Immunotherapy (Symposium)		
09:30am-10:00am	Allergen testing in Asthma: When, how and why ?	Dr P K Vedanthan (USA)	Dr Garg Dr S N Gaur Dr A B Singh Dr Naveen Arora
10:00am-10:15am	Immunotherapy for Asthma: When and how?	Dr Raj kumar	
10:15am-10:30am	Precision medicine in allergy: Tailoring treatment based on in-vitro test results	Dr M K Gupta	
ICS ORATION 1 & 2			
10:30am-11:30am	Session 3:		
10:30am-11:00am	KJR Murthy Oration Award Diagnostic Thinking in Respiratory Medicine: A Systematic Approach	Dr Ashfaq Hasan	Dr Dhruva Chaudhary Dr Chandrakant Tarke Dr Ravindra Sarnaik

11:00am-11:30am	O A Sharma Oration Award Tuberculosis!!! Past, Present & Future	Dr Vikas Oswal	Dr Jaikishan Dr Richa Gupta Dr Subhakar Kandi
ACCP SYMPOSIUM			
11:30am-12:30pm	Session 4:		
11:30am-11:50am	Recent Practice changing articles - Critical care	Dr Kalpalatha Guntupalli (USA)	Dr Kalpalatha Guntupalli (USA)
11:50am-12:10pm	Recent Practice changing articles - ILD-Pulmonary HTN	Dr Namita Sood (USA)	
12:10pm-12:30pm	Recent Practice changing articles - Asthma	Dr Sandhya Khurana (USA)	
TUBERCULOSIS & NTM SESSIONS			
12:30pm-01:30pm	Session 5: Latent Tuberculosis & Tubercular vaccines		
12:30pm-12:45pm	Diagnosing latent & subclinical tuberculosis (how, why & when?)	Dr Kranti Garg	Dr Rajiv Garg
12:45pm-01:00pm	Treating Latent Tuberculosis Infection – concept & evidence.	Dr Poulomi Chatterjee	Dr Shailendra Chakravarthy
01:00pm-01:15pm	Vaccines in tuberculosis: Is it the primetime?	Dr Padma Priyadarshini	Dr K Venkateswara Rao
ICS ORATION 3 & Key Note Lecture			
02:00pm-03:00pm	Session 6:		
02:00pm-02:30pm	C V Ramakrishnan Oration Award Post-tuberculosis lung disease: An overlooked entity	Dr Deependra Kumar Rai	Dr. R. Vijai Kumar Dr. Deepak Talwar
02:30pm-03:00pm	Key Note Lecture	Dr Atul C Mehta (USA)	Dr. P R Mohapatra

CLEVELAND CLINIC SYMPOSIUM			
03:00pm-04:00pm	Session 7:		
03:00am-03:20pm	Echocardiogram is never enough for diagnosing pulmonary hypertension	Dr Hani Sabbour (UAE)	Dr Atul C Mehta (USA)
03:20pm-03:40pm	COPD-Sleep Apnea: Overlap Syndrome	Dr Loutfi Aboussouan (USA)	Dr Subhakar Kandi
03:40pm-04:00pm	Molecular diagnostics of Lung Cancer by EBUS TBNA	Dr Atul C Mehta (USA)	Dr Sai Charan
MISCELLANEOUS SESSIONS			
04:00pm-05:00pm	Session 8: Small Airway Disease		
04:00pm-04:15pm	Burden and Causes of Small Airway Disease	Dr Richa Mittal	Dr Sanjeev Singhal
04:15pm-04:30pm	Small Airway Disease - Diagnostic Challenges	Dr Nitesh Gupta	Dr Guduri Srinivas
04:30pm-04:45pm	Targeting Small Airway Disease – How to do in practice ?	Dr Partha Sarathi Bhattacharya	Dr H Paramesh
04:45pm-05:00pm	Small Airway Disease following chemical exposure ?	Dr Mostafa Ghanei (Iran)	
KEYNOTE LECTURES			
05:00pm-05:30pm	Clonal Lymphoproliferative disorders - An overview	Dr Venerino Poletti (Italy)	Dr Phani Kumar



FISHMAN HALL (DAY 1 - 1 ST DECEMBER 2023)			
TIMING	TOPIC	SPEAKER / PANELIST	CHAIRPERSON
ASTHMA SESSIONS			
08:30am-09:30am	Session 1: Hot and New in Asthma (Symposium)		
08:30am-08:45am	Newer biologics in severe asthma: A glimpse into the future	Dr M S Barthwal	Dr Ramesh Chandra Sahu
08:45am-09:00am	Newer diagnostics in Asthma	Dr Deepak Talwar	Dr S Balamurugan
09:00am-09:15am	Newer inhalers and smart inhalers	Dr Theerasuk (Thailand)	Dr P Sukumaran
09:15am-09:30am	Once daily inhaler therapy - Is it the way forward?	Dr Suresh S	Dr Tapaswi Krishna
LUNG TRANSPLANTATION			
09:30am-10:30am	Session 2: Lung Transplantation in India – Success Stories (Listen from The Experts)		
09:30am-09:50am	<p>Panel Discussion: Challenges faced by lung transplantation teams in India and how to overcome these</p> <p>Moderator: Dr Apar Jindal</p> <p>Panellists: Dr Sandeep Attawar, Dr Balasubramonium K R, Dr Arvind Kumar, Dr.Said Isse (UAE), Dr Harish Seetamraju (USA)</p>		
Sharing our experience over the years and success stories Inspiring others to save lives			
09:50am-10:00am	A. Experience sharing : Team KIMS	Dr Vijil Rahulan	
10:00am-10:10am	B. Experience sharing : Team Yashoda	Dr Vimi Varghese	
10:10am-10:20am	C. Experience sharing : Team Medanta	Dr Mohan Venkatesh	
10:20am-10:30am	D. Experience sharing : Team MGM	Dr Apar Jindal	



ICS ORATION 1 & 2			
10:30am-11:30am	Session 3:		
10:30am-11:00am	KJR Murthy Oration Award Diagnostic Thinking in Respiratory Medicine: A Systematic Approach	Dr Ashfaq Hasan	Dr Dhruva Chaudhary Dr Chandrakant Tarke Dr Ravindra Sarnaik
11:00am-11:30am	O A Sharma Oration Award Tuberculosis!!! Past, Present & Future	Dr Vikas Oswal	Dr Jaikishan Dr Richa Gupta Dr Subhakar Kandi
CRITICAL CARE SESSIONS			
11:30am-12:30pm	Session 4: ARDS - What is new?		
11:00am-11:45am	Diagnosis of ARDS- controversies and recommendations	Dr Lalit Singh	Dr Suresh Rao
11:45am-12:00pm	Prone position in ARDS (Awake & Extended Prone)- when and how I do it?	Dr Pavan Reddy	Dr Sunanda
12:00pm-12:15pm	Phenotyping and precision medicine in ARDS	Dr Harjit Dumra	Dr K L Mohanty
12:15pm-12:30pm	Right ventricle in ARDS	Dr Srinivas Rajagopala	
INFECTIOUS DISEASES SESSIONS			
12:30pm-01:30pm	Session 5: Pneumonia and Consolidation (Talks And Panel Discussion)		
12:30pm-12:45pm	Approach to a case with Non-resolving Pneumonia?	Dr Dushanta Magadedara (Srilanka)	Dr A Sai Kumar Dr TLN Swamy
12:45pm-01:00pm	Approach to Cavitory Lung disease?	Dr D P Singh	Dr Rakesh Bhargava

01:00pm-01:30pm	Case Based Panel discussion (Pneumonia Mimics and Non-resolving pneumonia):		
	Moderator: Dr Yusuf Dar Panellists: Dr Sonam Spalgis, Dr Viswanath Gella, Dr Abhinash Paul Dr Fathima Zehra R (UAE)		
	Case 1: CAP mimics Case 2: Non resolving pneumonia Case 3: Atypical pneumonia	Case Presenter: Dr Gayathri Devi H J Case Presenter: Dr Neetu Jain Case Presenter: Dr Kadli Shirish Kumar	
ICS ORATION 3 & Key Note Lecture			
02:00pm-03:00pm	Session 6:		
02:00pm-02:30pm	C V Ramakrishnan Oration Award Post-tuberculosis lung disease: An overlooked entity	Dr Deependra Kumar Rai	Dr. R. Vijai Kumar Dr. Deepak Talwar
02:30pm-03:00pm	Key Note Lecture	Dr Atul C Mehta (USA)	Dr. P R Mohapatra
LUNG CANCER SESSIONS			
03:00pm-04:00pm	Session 7: Case based MDD on Early stage lung cancer (Multi Disciplinary Discussion)		
	Moderator: Dr Senthil Rajappa Panellists: Dr Nasser Yusuf, Dr Deepak Koppaka, Dr Mujeeb Rehman, Dr Rakesh Godara		
	Case 1 : Incidentally diagnosed lung nodule	Dr Sonam Solanki	
	Case 2 : A resectable but inoperable lung cancer	Dr Vishal Chitikeshi	
	Case 3 : Symptomatic lung mass	Dr S A Rafi	

INTERVENTIONAL PULMONOLOGY SESSIONS

04:00pm-05:00pm	Session 8: Interventions for Obstructive Airway Diseases (Symposium)		
04:00pm-04:15pm	Interventions for Bronchial asthma: Role in the era of biologics	Dr Vikas Pilaniya	Dr Ramesh Tukaram Bharate
04:15pm-04:30pm	Interventions for chronic bronchitis: A new ray of hope for a neglected entity?	Dr Pratibha Gogia	Dr Saurabh Maji
04:30pm-04:45pm	BLVR in COPD - Focus on Bronchoscopic Thermal Vapor Ablation	Dr Amit Dhamija	Dr Hidayat Hussain
04:45pm-05:00pm	Management of EDAC and TBM: What is the role of an interventional pulmonologist?	Dr Karan Madan	



LAENNEC HALL (DAY 1 - 1 ST DECEMBER 2023)			
TIMING	TOPIC	SPEAKER / PANELIST	CHAIRPERSON
TB & NTM SESSIONS			
08:30am-09:30am	Session 1: Know your TB tests (SYMPOSIUM)		
08:30am-08:50am	Xpert MTB and LPA	Dr Manoj Agarwal	Dr Thomas George
08:50am-09:10am	Gene sequencing	Dr Anirvan Chatterjee	Dr Snehal Jadhav
09:10am-09:30am	Therapeutic Drug Monitoring	Dr Padma Priyadarshini	Dr Rajendra Thakhar
PLEURA SESSIONS			
09:30am-10:30am	Session 2: Pleurodesis and Fibrinolysis (Debates)		
09:30am-10:00am	Loculated effusions – Fibrinolysis vs Adhesiolysis vs Surgical decortication Debate Referee: Dr Sandeep Katiyar	Dr Nitin Jain Dr Prince James Dr Manjunath Bale	
10:00am-10:30am	Chemical Pleurodesis vs IPC based approach for malignant pleural effusion Debate Referee: Dr Sanjeev Nair	Dr Avik Ghoshal (UK) Dr Mahendran Chetty (UK)	
ICS ORATION 1 & 2			
10:30am-11:30am	Session 3:		
10:30am-11:00am	KJR Murthy Oration Award Diagnostic Thinking in Respiratory Medicine: A Systematic Approach	Dr Ashfaq Hasan	Dr Dhruva Chaudhary Dr Chandrakant Tarke Dr Ravindra Sarnaik
11:00am-11:30am	O A Sharma Oration Award Tuberculosis!!! Past, Present & Future	Dr Vikas Oswal	Dr Jaikishan Dr Richa Gupta Dr Subhakar Kandi

LUNG CANCER SESSIONS			
11:30am-12:30pm	Session 4: Screening of Lung Cancer		
11:00am-11:45am	Lung cancer screening a decade after the NSLT	Dr Manoj Meena	
11:45am-12:00pm	Risk prediction models for lung cancer screening – utility	Dr Anshu Punjabi	
12:00pm-12:30pm	Panel Discussion: Implementation of lung cancer screening program in India – Challenges and directions Moderator: Dr D Behera Panellists: Dr K B Gupta, Dr Suman K Das (UK), Dr Kumar Doshi, Dr R K Panda		
INTERVENTIONAL PULMONOLOGY SESSIONS			
12:30pm-01:30pm	Session 5: Advances In Interventional Pulmonology		
12:30pm-12:45pm	Mediastinal node biopsy - The new frontier	Dr Tie Siew Teck (Malaysia)	Dr Ajmal Khan
12:45pm-01:00pm	Biodegradable stents: Role in benign airway stenosis	Dr Tinku Joseph	Dr Satish Chandra
01:00pm-01:15pm	Fire and Ice in Paediatric bronchoscopy	Dr Sarabon Tahura (Bangladesh)	Dr Vaishali Gaikwad
01:15pm-01:30pm	Cryotherapy in IP - The evolving landscape	Dr Haytham Sami (Egypt)	
ICS ORATION 3 & Key Note Lecture			
02:00pm-03:00pm	Session 6:		
02:00pm-02:30pm	C V Ramakrishnan Oration Award Post-tuberculosis lung disease: An overlooked entity	Dr Deependra Kumar Rai	Dr. R. Vijai Kumar Dr. Deepak Talwar
02:30pm-03:00pm	Key Note Lecture	Dr Atul C Mehta (USA)	Dr. P R Mohapatra

SLEEP SESSIONS			
03:00pm- 04:00pm	Session 7: Phenotyping OSA - How and Why? (Symposium)		
03:00pm- 03:20pm	Phenotypes of OSA – Mechanisms	Dr Kavita	Dr Uma Maheswari
03:20pm- 03:40pm	Identifying phenotypes based on sleep study	Dr Uma Devraj	Dr Nalini Nagella
03:40pm- 04:00pm	Therapeutic implications of phenotyping OSA	Dr J C Suri	Dr S Subba Rao
INFECTIOUS DISEASES SESSIONS			
04:00pm- 05:00pm	Session 8: Molecular diagnostics for pneumonia		
04:00pm- 04:20pm	Rapid molecular diagnosis of viral and bacterial pneumonia and Anti-microbial resistance detection	Dr Parul Mrigpur	
04:20pm- 05:00pm	Molecular diagnostics for pneumonia - Is it needed?: (Pro-Con Debate) Debate Referee: Dr Ankit	Dr Alladi Mohan-Pro Dr Milind Baldi- Con	



KILLIAN HALL (DAY 1 - 1 ST DECEMBER 2023)			
TIMING	TOPIC	SPEAKER / PANELIST	CHAIRPERSON
COPD SESSIONS			
08:30am-09:30am	Session 1: Hot and New in Copd (Symposium)		
08:30am-08:45am	Emerging Phenotypes and Endotypes: How is it important for a clinician?	Dr P A Mahesh	Dr Dharam Pal Bansal
08:45am-09:00am	New concepts in COPD: Early COPD, Pre-COPD, PRISM and Dysanapsis.	Dr SK Chhabra	Dr Vinod Kumar Viswanathan
09:00am-09:15am	A Different Point of View: Looking beyond the lungs in COPD.	Dr R. Vijai Kumar	Dr Suresh Raparthy
09:15am-09:30am	Biomass Exposure and COPD: Prevalence and relevance in India	Dr Debraj Jash	Dr. S Senthil kumar
ILD SESSIONS			
09:30am-10:30am	Session 2: Interstitial Lung disease - The Essentials		
09:30am-09:45am	Bronchoalveolar lavage in ILD: A neglected entity	Dr Gopal Chawla (UK)	Dr B Vijay Bhaskar
09:45am-10:00am	Transbronchial cryo lung biopsy: Learn from experts	Dr Sameer Arbat	Dr Gautam Bhagat
10:00am-10:15am	Progressive Pulmonary Fibrosis - Definition and Management	Dr Sujeet Rajan	Dr George D Souza
10:15am-10:30am	Anti fibrotics in ILD - The current understandings	Dr Viny Kantroo	Dr Jithin

ICS ORATION 1 & 2			
10:30am-11:30am	Session 3:		
10:30am-11:00am	KJR Murthy Oration Award Diagnostic Thinking in Respiratory Medicine: A Systematic Approach	Dr Ashfaq Hasan	Dr Dhruva Chaudhary Dr Chandrakant Tarke Dr Ravindra Sarnaik
11:00am-11:30am	O A Sharma Oration Award Tuberculosis!!! Past, Present & Future	Dr Vikas Oswal	Dr Jaikishan Dr Richa Gupta Dr Subhakar Kandi
PLEURA SESSIONS			
11:30am-12:30pm	Session 4: Pneumothorax: Case based panel discussion		
	Moderator: Dr Md Munavvar (UK) Panellists: Dr Rakesh Panchal (UK), Dr Kowshik Muthuraja, Dr Rishi Kumar Sharma Dr Pradip Dabhi, Dr Ashish Tandon		
11:00am-11:45am	Primary spontaneous Pneumothorax (First episode)	Dr Kanishka Kumar	
11:45am-12:00pm	Primary spontaneous Pneumothorax (Second episode)	Dr Rohit Vadala	
12:00pm-12:15pm	Secondary Pneumothorax	Dr Pratibh Prasad	
12:15pm-12:30pm	Iatrogenic/ Traumatic pneumothorax	Dr Ratnakar	
COPD SESSIONS			
12:30pm-01:30pm	Session 5: Understanding Management of COPD		
12:30pm-12:45pm	GOLD 2023 classification: How is it different & what are its implications?	Dr Lancelot Pinto	

12:45pm-01:30pm	PANEL 2: COPD overlap syndromes: Case based panel discussion Moderator: Dr Amita Athavale Panellists: Dr Narthanan, Dr Ravindra Sarnaik, Dr K P Suraj Dr M Anand		
	COPD - OSA (Overlap Syndromes) COPD - Asthma Overlap COPD - ILD (CPFE) COPD - Bronchiectasis	Case presenters: Dr Satya Padmaja Dr Shivanshu Raj Goyal Dr Priyank Jain Dr Sudheer Tale	
ICS ORATION 3 & Key Note Lecture			
02:00pm-03:00pm	Session 6:		
02:00pm-02:30pm	C V Ramakrishnan Oration Award Post-tuberculosis lung disease: An overlooked entity	Dr Deependra Kumar Rai	Dr. R. Vijai Kumar Dr. Deepak Talwar
02:30pm-03:00pm	Key Note lecture	Dr Atul C Mehta (USA)	Dr. P R Mohapatra
PULMONARY HYPERTENSION SESSIONS			
03:00pm-04:00pm	Session 7: Management of Pulmonary Hypertension (The concepts and the way forward)		
03:00pm-03:15pm	Management of Group 1 Pulmonary Hypertension	Dr Lakshmi Narasimhan	Dr P S Shankar
03:15pm-03:30pm	Management of Group 2 Pulmonary Hypertension	Dr B K Sastry	Dr P K Agarwal
03:30pm-03:45pm	Management of Group 3 Pulmonary Hypertension	Dr Aparna (Nepal)	Dr Parthiv Mehta
03:45pm-04:00pm	Management of Group 4 Pulmonary Hypertension	Prof Abdullah M Aldalaan (Saudi Arabia)	Dr V V Rao

BRONCHIECTASIS SESSIONS			
04:00pm-05:00pm	Session 8: Approach to a case of Bronchiectasis (Case based Panel discussion)		
	Moderator: Dr Arjun Khanna Panellists: Dr Pradyut Waghray, Dr Gaurav Singhal, Dr Harish Kumar, Dr Shone P James, Dr Jaffer Basheer, Dr Midhun Manohar		
04:00pm-04:15pm	Case 1 : Bilateral bronchiectasis – Common Variable Immuno Deficiency	Dr Sudanshu Kalra	
04:15pm-04:30pm	Case 2 : Bilateral bronchiectasis – Primary Ciliary Dyskinesia	Dr Vikas Mittal	
04:30pm-04:45pm	Case 3 : Bilateral bronchiectasis – Cystic Fibrosis	Dr Shalini Tyagi	
04:45pm-05:00pm	Case 4 : Localized bronchiectasis – Sequestration	Dr Monisha Silla	



PAINTAL HALL (DAY 1 - 1 ST DECEMBER 2023)			
TIMING	TOPIC	SPEAKER / PANELIST	CHAIRPERSON
Session : Asthma			
08:30am-09:30am	Session 1: Severe Asthma: How I do it in my practice?		
08:30am-08:45am	How do I manage a case of mild asthma?	Dr Arjun Khanna	Dr S K Agarwal
08:45am-09:00am	How do I manage a case of T2 high severe asthma?	Dr Ashok Rajput	Dr S K Awasthi Dr. Uday krishna
09:00am-09:15am	How do I manage T2 low severe asthma?	Dr Sandeep Mittal	Dr. Tipparapu Karthik
PLEURA SESSIONS			
09:30am-10:30am	Session 2: Tubercular pleural effusion: Guidelines and controversies (Expert Panel Discussion)		
	Moderator: Dr Sanjeev Nair Panellists: Dr Veerottam Tomar, Dr HJ Singh, Dr Trinath Dash, Dr Giriraj Bomma Dr Niranjana Dissanayake (Srilanka)		
ICS ORATION 1 & 2			
10:30am-11:30am	Session 3:		
10:30am-11:00am	KJR Murthy Oration Award Diagnostic Thinking in Respiratory Medicine: A Systematic Approach	Dr Ashfaq Hasan	Dr Dhruva Chaudhary Dr Chandrakant Tarke Dr Ravindra Sarnaik
11:00am-11:30am	O A Sharma Oration Award Tuberculosis!!! Past, Present & Future	Dr Vikas Oswal	Dr Jaikishan Dr Richa Gupta Dr Subhakar Kandi



ILD SESSIONS			
11:30am-12:30pm	Session 4: Hypersensitivity Pneumonitis: All You Need to Know		
11:30am-11:45am	Diagnosing Hypersensitivity Pneumonitis: Radiology, Serology and Histopathology	Dr Bodhika Samarasekara (Srilanka)	Dr Ghulam Hassan
11:45am-12:00pm	Dissecting the HP guidelines: Indian context	Dr Sheetu Singh	Dr Athul Francis
12:00pm-12:15pm	Management of HP: Pharmacological and non pharmacological	Dr SK Madhukar	Dr Madhusudhan
12:15pm-12:30pm	MDD- Case Based Panel discussion: Moderator: Dr Prasanna K Thomas Panellists: Dr RC Sahoo, Dr Kapil Iyer, Dr Neeraj Sharma, Dr Arnab Saha Dr Charul Dabral, Dr Khushboo Pilonia		
	Case 1: Fibrotic HP Case 2: Non Fibrotic HP	Case Presenter: Dr Sandeep Katiyar Case Presenter: Dr. Meghana Subhash	
CRITICAL CARE SESSION			
12:30pm-01:30pm	Session 5: Non invasive respiratory supports- When, What and How To Use?		
12:30pm-12:45pm	Monitoring and management of patient ventilator dyssynchrony on NIV	Dr Sateesh Chandra	Dr Khusrav Bajan
12:45pm-01:00pm	Predicting failure in patients on NIV and HFNC	Dr Pavan Kumar Singh	Dr Rajendra
01:00pm-01:30pm	Debate HFNC vs NIV in Acute Denovo Hypoxemic Respiratory Failure Going with the high flow!! Are we justified ?? Debate Referee: Dr Mohan Rao, Dr Chandana Reddy	Dr Vijay Hadda (Yes) Dr Samir Sahu (No)	Dr Chandana Dr Mohan Rao

ICS ORATION 3 & Key Note Lecture			
02:00pm-03:00pm	Session 6:		
02:00pm-02:30pm	C V Ramakrishnan Oration Award Post-tuberculosis lung disease: An overlooked entity	Dr Deependra Kumar Rai	Dr. R. Vijai Kumar Dr. Deepak Talwar
02:30pm-03:00pm	Key Note lecture	Dr Atul C Mehta (USA)	Dr. P R Mohapatra
INFECTIOUS DISEASES SESSIONS			
03:00pm-04:00pm	Session 7: Pneumonia in immunocompromised subjects and challenges (Multi Disciplinary Discussion)		
03:00pm-03:15pm	Pulmonary melioidosis in India - An Overview	Dr P R Mohapatra	
	Moderator: Dr Langewarkar Panellists: Dr Hari Priya, Dr Aditya Jindal, Dr Namitha R, Dr Vishnu		
03:15pm-03:30pm	Case 1 : CMV pneumonitis	Dr Abhinav Chaudhary	
03:30pm-03:45pm	Case 2 : PJP pneumonia	Dr Nanda Kishore	
03:45pm-04:00pm	Case 3 : Fungal pneumonia	Dr Narendra Narahari	
LUNG CANCER SESSIONS			
04:00pm-05:00pm	Session 8 : Immune check point inhibitors and lung cancer		
04:00pm-04:15pm	Immune Check Point Inhibitors Pneumonitis – Diagnosis and Management	Dr Jayakrishnan B (Oman)	
04:15pm-05:00pm	Panel Discussion: Immune Check Point Inhibitors in Lung Cancer Moderator: Dr Raghunadha Rao Panellists: Dr J K Saini, Dr Nikhil Ghadyalpatil, Dr Sudhir Prasad Dr Pankul Mangla, Dr Jayakrishnan B (Oman)		

OSLER HALL (DAY 1 - 1ST DECEMBER 2023)			
TIMING	TOPIC	SPEAKER / PANELIST	CHAIRPERSON
CRITICAL CARE SESSIONS			
08:30am-09:30am	Session 1: Old Meets The New- What You Should Know		
08:30am-08:45am	Chest X-ray in ICU- Importance & Interpretation	Dr G Ravindra Babu	Dr Nookaraju
08:45am-09:00am	Use of USG in the assessment of shock and respiratory failure	Dr Pralay Sarkar (USA)	Dr Prabhakar Rao
09:00am-09:15am	Helmet NIV- physiology, practical application and evidence for use	Dr Mrinal Sircar	Dr Sandeep Gupta
09:15am-09:30am	eCPR	Dr Prabhat Datta	Dr Manik
TUBERCULOSIS & NTM SESSIONS			
09:30am-10:30am	Session 2: Aftermath of Tuberculosis – The Life After Tuberculosis (Symposium)		
09:30am-09:45am	Post parenchymal Tubercular Bronchiectasis – Myth or Truth	Dr Sanjeev Sinha	Dr Rakhi Ludam
09:45am-10:00am	Chronic Pulmonary Aspergillosis - Incidence and Management	Dr Jairaj Nair	Dr Huliraj Narayanaswamy
10:00am-10:15am	Tubercular airway stenosis – Detection and management	Dr Arindam Mukharjee	Dr Subin Kumar Dey
10:15am-10:30am	TOPD - Relevance and Prevalence in India	Dr Nita Mech Basumatary	Dr Bhargav Prasad
ICS ORATION 1 & 2			
10:30am-11:30am	Session 3:		
10:30am-11:00am	KJR Murthy Oration Award Diagnostic Thinking in Respiratory Medicine: A Systematic Approach	Dr Ashfaq Hasan	Dr Dhruva Chaudhary Dr Chandrakant Tarke Dr Ravindra Sarnaik

11:00am-11:30am	O A Sharma Oration Award Tuberculosis!!! Past, Present & Future	Dr Vikas Oswal	Dr Jaikishan Dr Richa Gupta Dr Subhakar Kandi
COPD SESSIONS			
11:30am-12:30pm	Session 4: Understanding Management of COPD		
11:30am-12:00pm	PANEL 1: Management of stable COPD: Indian perspective. Moderator: Dr S K Jindal Panellists: Dr Susmita Kundu, Dr P S Shahajan, Dr Saurab Karmakar, Dr Azizur Rehman (Bangladesh), Dr Faisal Yunus (Indonesia), Dr Owaisi Tisekar		
12:00pm-12:30pm	PANEL 2: Management of COPD Exacerbation: Moderator: Dr P Sukumaran Panellists: Dr Deepak Chopra, Dr Arjun Suresh, Dr Jyothi Hatti Holi, Dr Mohammed Shameen, Dr Madhusmita Mohapatra		
MISCELLANEOUS SESSIONS			
12:30pm-01:30pm	Session 5: Neuromuscular Diseases (Symposium)		
12:30pm-12:45pm	Evaluation of NMD: When and how?	Dr B Jayprakash	Dr Narendra Khippal
12:45pm-01:00pm	Assessment of Diaphragmatic dysfunction	Dr Randeep Guleria	Dr Rahul Magazine
01:00pm-01:15pm	Domiciliary NIV in Chronic Respiratory Failure: From evidence to practice	Dr J C Suri	Dr Raj Bhagat
01:15pm-01:30pm	Assessment and Management of Ineffective cough	Dr Vikas Marwah	
ICS ORATION 3 & Key Note Lecture			
02:00pm-03:00pm	Session 6:		
02:00pm-02:30pm	C V Ramakrishnan Oration Award Post-tuberculosis lung disease: An overlooked entity	Dr Deependra Kumar Rai	Dr. R. Vijai Kumar Dr. Deepak Talwar
02:30pm-03:00pm	Key Note lecture	Dr Atul C Mehta (USA)	Dr. P R Mohapatra

INTERVENTIONAL PULMONOLOGY SESSIONS			
03:00pm-04:00pm	Session 7: Central Airway Obstruction (Case based panel discussion)		
	Moderator: Dr Sushil Jain Panellists: Dr Aravindran Alaga (Malaysia), Dr Rajesh Thomas (Australia) Dr Manu Chopra, Dr Jamsak T (Thailand), Dr Arda Kiani (Iran), Dr Bilal Bin Asaf		
03:00pm-03:15pm	Endotracheal growth with extrinsic compression	Dr Umang C Shah	
03:15pm-03:30pm	Carcinoid	Dr Srivatsa Lokeshwaran	
03:30pm-03:45pm	Multilevel TB stenosis	Dr Manas Mengar	
03:45pm-04:00pm	Obstructive stent granulation	Dr Loveleen Mangla	
MISCELLANEOUS SESSIONS			
04:00pm-05:00pm	Session 8: Nebulization Principles and Practices		
04:00pm-04:15pm	Re - appraisal of Indian guidelines of nebulization practise	Dr V K Singh	
04:15pm-04:30pm	Types of nebulizers - How to choose the best one for my patient	Dr P Arjun	
04:30pm-05:00pm	Panel discussion on nebulization guidelines in India Moderator: Dr S K Katiyar Panellists: Dr Avinash Nair, Dr Judo Vachaparambi, Dr (Col) Ajai Kumar, Dr Vikram Jain, Dr Ramesh Sundrani		



ROBERT KOCH HALL (DAY 1, 1st DECEMBER 2023)

TIMING	OP ID	TOPIC	PRESENTER
8:30am-10:30am	SESSION: 1 NAPCON AWARD		
OP 1- OP12			
8:30am-8:40am	OP 1	PREVALANCE OF OVERT AND CONCEALED CHRONIC RENAL IMPAIRMENT AND IT'S CORRELATION WITH CLINICOFUNCTIONAL PROFILE IN COPD PATIENTS	Dr Nidhi Sumedha
8:40am-8:50am	OP 2	OBSTRUCTIVE SLEEP APNEA: CORRELATION OF BRAIN NATRIURETIC PEPTIDE LEVELS WITH CARDIOVASCULAR DISEASES	Dr Nazia Uzma
8:50am-9:00am	OP 3	PREDICTION OF OUTCOME WITH BAP 65 SCORE AND DECAF SCORE IN PATIENTS OF ACUTE EXACERBATION OF CHRONIC OBSTRUCTIVE PULMONARY DISEASE [COPD]	Dr Syed Afreen
9:00am-9:10am	OP 4	A CROSS- SECTIONAL STUDY ON CORRELATION OF SERUM IGE LEVELS, ABSOLUTE EOSINOPHIL COUNT, NEUTROPHIL-LYMPHOCYTE RATIO WITH BODE INDEX IN COPD PATIENTS.	Dr A. Shruthi
9:10am-9:20am	OP 5	A LONGITUDINAL STUDY OF MANAGEMENT OF ADVERSE DRUG REACTIONS AND OUTCOME IN DRUG RESISTANT TUBERCULOSIS PATIENTS IN A TERTIARY CARE HOSPITAL IN HYDERABAD	Dr Jaswanthkumar
9:20am-9:30am	OP 6	A COMPARATIVE STUDY BETWEEN VIRTUAL BRONCHOSCOPY AND FIBREOPTIC BRONCHOSCOPY IN DIAGNOSIS OF LUNG LESIONS AT A TERTIARY CARE CENTRE	Dr Ayisha Thasneem

9:30am-9:40am	OP 7	ADHERENCE TO INHALERS IN CHRONIC OBSTRUCTIVE PULMONARY DISEASE (COPD) PATIENTS. A CROSS-SECTIONAL STUDY AT A TERTIARY CARE CENTRE.	Dr Syed Fayazuddin
9:40am-9:50am	OP 8	ULTRASOUND GUIDANCE VERSUS CT GUIDANCE BIOPSY FOR PERIPHERAL LUNG TUMOR: ANALYSIS OF SAFETY AND DIAGNOSTIC YIELD AT A TERTIARY CARE CENTER IN TELANGANA	Dr Thipperishetty Shravya
9:50am-10:00am	OP 9	A PROSPECTIVE STUDY ON PROGNOSTIC ROLE OF BLOOD PARAMETERS IN COMMUNITY ACQUIRED PNEUMONIA	Dr Sai Teja Pothabattula
10:00am-10:10am	OP 10	SMALL AIRWAYS INVOLVEMENT IN SEVERE ASTHMA : HOW COMMON AND ITS IMPLICATIONS ?	Dr Dhruv Talwar
10:10am-10:20am	OP 11	EFFICACY OF INHALED CORTICOSTEROIDS ON PULMONARY FUNCTION, QUALITY OF LIFE AND FREQUENCY OF EXACERBATION IN PATIENTS WITH BRONCHIECTASIS WITHOUT AIRWAY HYPERRESPONSIVENESS- A PILOT STUDY	Dr Safia Ahmed
10:20am-10:30am	OP 12	PULMONARY COMPLICATIONS IN PATIENTS HOSPITALIZED WITH DENGUE FEVER: A COHORT STUDY OF 40 INDIVIDUALS.	Dr Neelesh Guttikonda
11:30am-1:30pm	SESSION: 2 NAPCON AWARD		
OP 13- OP 24			
11:30am-11:40am	OP 13	CO-RELATION BETWEEN HIGH RESOLUTION COMPUTER TOMOGRAPHY FINDINGS AND BIO-MARKERS AMONG COVID-19 PATIENTS AND THEIR PROGRESSION TO LUNG FIBROSIS.	Dr V. Moniish

11:40am-11:50am	OP 14	UTILITY OF COPD ASSESSMENT TEST SCORE AND 6-MINUTE WALK TEST IN STABLE COPD PATIENTS TO ASSESS SEVERITY AND ITS CORRELATION WITH SPIROMETRIC VALUES.	Dr Vasavi Sri Dattasena Rudraraju
11:50am-12:00pm	OP 15	A PILOT STUDY ON A NOVEL METHOD OF DRAINING MALIGNANT PLEURAL EFFUSION WITH AN INDWELLING PLEURAL CATHETER	Dr Shrinath V
12:00pm-12:10pm	OP 16	CLINICAL AND RADIOLOGICAL PROFILE OF PATIENTS WITH CTD RELATED ILD	Dr Farjana
12:10pm-12:20pm	OP 17	A STUDY OF SERUM TO PLEURAL FLUID ALBUMIN GRADIENT IN DIFFERENTIATION OF EXUDATIVE AND TRANSUDATIVE PLEURAL EFFUSION IN COMPARISON TO LIGHT'S CRITERIA	Dr Sara Ahmed
12:20pm-12:30pm	OP 18	OUTCOMES OF BEDAQUILINE AND DELAMANID CONTAINING REGIMENS AMONG PRE -XDR AND XDR PULMONARY TUBERCULOSIS PATIENTS IN NODAL DR TB CENTRE OF ODISHA	Dr Bibek Prasad Acharya
12:30pm-12:40pm	OP 19	PERCEPTIONS OF INDIAN MDR-TB PATIENTS TOWARDS PRIVATE AND PUBLIC HEALTHCARE SECTOR	Dr Zara Akhtar Ansari
12:40pm-12:50pm	OP 20	SAFETY AND EARLY EFFICACY RESULTS FROM THE PROPHYLACTIC PIRFENIDONE FOR PREVENTION OF RADIATION INDUCED PNEUMONITIS IN PATIENTS WITH LUNG CANCER (PROPER) STUDY	Dr Naveen Mummudi
12:50pm-1:00pm	OP 21	ECHOES OF RESPIRATION: INVESTIGATING REACTANCE AND FORCED VITAL CAPACITY IN INTERSTITIAL LUNG DISEASES PATIENTS.	Dr Riba Achu Abraham

1:00pm-1:10pm	OP 22	FLUORESCEIN DIACETATE STAINING IN DRUG RESISTANT PULMONARY TUBERCULOSIS PATIENTS ON LONGER TREATMENT REGIMEN	Dr Aswathy S A
1:10pm-1:20pm	OP 23	COPD AND UNDER NUTRITION IN DEVELOPING COUNTRIES	Dr Harsha
1:20pm-1:30pm	OP 24	RANDOMIZED CONTROL TRIAL ON HOME BASED REHABILITATION IN INTERSTITIAL LUNG DISEASE	Dr Rishabh Kochar
3:30am-4:30am	SESSION : 3 ICS AWARD Dr R Vijai Kumar, Dr Deepak Talwar, Dr Subhakar Kandi		
OP 25- OP 34			
3:00pm-3:10pm	OP 25	ROLE OF THORACIC ULTRASOUND IN RULING OUT PNEUMOTHORAX IN PATIENTS AFTER BRONCHOSCOPIC TRANSBRONCHIAL LUNG BIOPSY – A RETROSPECTIVE STUDY	Dr Priyadarshini S
3:10pm-3:20pm	OP 26	PREVALENCE OF OSA IN ACUTE MYOCARDIAL INFARCTION PATIENTS AS ASSESSED BY STOP BANG SCORE	Dr Deepa Maria Jose
3:20pm-3:30pm	OP 27	: COMPARATIVE STUDY OF PATIENTS ATTENDING RESPIRATORY CLINICS WITH MILD RESPIRATORY SYMPTOMS WITH NORMAL SPIROMETRY VERSUS ABNORMAL IMPULSE OSCILLOMETRY	Dr Sabahath Nazia
3:30pm-3:40pm	OP 28	ROLE OF ULTRASONOGRAPHY IN DIAGNOSIS AND MANAGEMENT OF ACUTE RESPIRATORY FAILURE- AN OBSERVATIONAL STUDY FROM A TERTIARY CARE CENTRE	Dr Bidisha Devi



YELLA PRAGADA HALL (FREE POSTER PRESENTATION)					
E-POSTER SESSION	GROUP AND TIME	DAY 1 1st DEC 2023 E-POSTER NUMBERS	DAY 2 2nd DEC 2023 E-POSTER NUMBERS	DAY 3 3rd DEC 2023 E-POSTER NUMBERS	SCREEN NUMBER
E Poster Session 1					
8:30- 10:30am	A) 8:30-9:00am	1-30	361-390	721-750	1-30
	B) 9:00-9:30am	31-60	391-420	751-780	1-30
	C) 9:30- 10:00am	61-90	421-450	781-810	1-30
	D) 10:00- 10:30am	91-120	451-480	811-840	1-30
10:30- 11:30am		ORATION	ORATION		
E Poster Session 2					
11:30- 1:30pm	E) 11:30- 12:00pm	121-150	481-510		1-30
	F) 12:00- 12:30pm	151-180	511-540		1-30
	G) 12:30- 1:00pm	181-210	541-570		1-30
	H) 1:00-1:30pm	211-240	571-600		1-30
1:30- 2:00pm	LUNCH				
2:00- 3:00pm		ORATION	ORATION		
E Poster Session 3					
3:00- 5:00pm	I) 3:00-3:30pm	241-270	601-630		1-30
	J) 3:30-4:00pm	271-300	630-660		1-30
	K) 4:00-4:30pm	301-330	661-690		1-30
	L) 4:30-5:00pm	331-360	691-720		1-30

DEBATE RINGS

DEBATE RING (DAY 1 - 1ST DECEMBER 2023)

TIMING	TOPIC	DEBATER / DEBATE REFEREE
09:30am-10:30am	Biopsy in Interstitial Lung Disease – Is it needed? <i>Debate Referee:</i> Dr Girija Nair	
	A Game Changer -	Dr Manu Madan
	Over Rated Entity -	Dr Chandrakant Tarke
11:30am-12:30pm	Diagnosing & treating Latent Tuberculosis Infection in India- Is it prime time? <i>Debate Referee:</i> Dr Aleemuddin, Dr Bindu CG	
	Yes	Dr Malik Parmar
	No	Dr Vinod Kumar Viswanadan
3:00pm-04:00pm	Steroid vs No Steroid in Severe Community Acquired Pneumonia- A Story without an ending <i>Debate Referee:</i> Dr Paramjyothi G K	
	Pro-	Dr Mansi Gupta
	Con-	Dr Gyanendra Agarwal

SCIENTIFIC PROGRAMME GRID

	PLEURA	Light Blue
	ILD	Light Green
	SLEEP	Pink
	CRITICAL CARE	Light Orange
	INTERVENTIONS	Red
	PAH AND VASCULAR DISEASES	Grey
	ASTHMA and BRONCHIECTASIS	Yellow
	COPD	Purple
	PNEUMONIA	Green
	TUBERCULOSIS AND NTM	Dark Orange
	MISCELLANEOUS	White
	LUNG CANCER	Dark Grey

DAY 2	CHARAKA HALL	FISHMAN HALL	LAENNEC HALL
Session 1 (8:30-9:30)	Emerging therapies for COPD (SYMPOSIUM)	Managing Tb in special instances (SYMPOSIUM)	Difficult to manage Pleural effusion – How I do it (SYMPOSIUM)
Session 2 (9:30 -10:30)	Lung Nodule – The Newer Gadgets	ABPA and Asthma	Community Acquired Pneumonia (PANEL DISCUSSION)
Session 3 (10:30 – 11:30)			
Session 4 (11:30 – 12:30)	CLEVELAND CLINIC SYMPOSIUM	Expert panel discussion – From evidence to practice (IPF)	HOT & NEW IN TUBERCULOSIS (2020-2023) where do I integrate in clinical practice
Session 5 (12:30- 1:30)	HOT & NEW IN PLEURAL DISEASES (SYMPOSIUM)	ARDS - How I do it	TRIPLE THERAPY IN COPD – THE WAY FORWARD
Session 6 (2:00 – 3:00)	NCCP Oration 3 &4		
Session 7 (3:00 – 4:00)	SAPH SYMPOSIUM	Whats new in Community acquired pneumonia (SYMPOSIUM)	HOT & NEW IN BRONCHOSCOPY
Session 8 (4:00- 5:00)	ASTHMA AND CO-MORBIDROME (CASE DISCUSSION)	HOT & NEW IN PULMONARY HYPERTENSION (SYMPOSIUM)	Bronchiectasis in India (SYMPOSIUM)



DAY 2	KILLIAN HALL	PAINTAL HALL	OSLER HALL
Session 1 (8:30-9:30)	Physiology / concepts in critical care	Hot and new in diagnosis of Lung cancer (SYMPOSIUM)	Diagnostic evaluation of pneumonia (SYMPOSIUM)
Session 2 (9:30 -10:30)	Approach to Granulomatous disease in Thorax- Is every granuloma Tuberculosis?	Non-Pharmacological management of COPD	APPROACH TO CHRONIC COUGH
Session 3 (10:30 – 11:30)			
Session 4 (11:30 – 12:30)	Fungal lung diseases (SYMPOSIUM)	LUNG TRANSPLANT - WHAT A PULMONOLOGIST NEEDS TO KNOW? (SYMPOSIUM)	Mastering Biologics in Asthma
Session 5 (12:30- 1:30)	Approach to a case with Pulmonary Hypertension (Case based MDD)	Ventilator associated infections	MICRO NODULES IN LUNG DISEASE
Session 6 (2:00 – 3:00)	NCCP Oration 3 &4		
Session 7 (3:00 – 4:00)	Lung Nodule MDD	UNIQUE CONCEPTS IN PULMONOLOGY	Pediatric Sleep Medicine
Session 8 (4:00- 5:00)	Newer therapeutics in Sleep Medicine	Severe asthma - Real World Evidence and Practice	Women in IP session (ICS sponsored)



CHARAKA HALL (DAY 2 - 2ND DECEMBER 2023)			
TIMING	TOPIC	SPEAKER / PANELIST	CHAIRPERSON
COPD SESSIONS			
08:30am-09:30am	Session 1: Emerging therapies for COPD (Symposium)		
08:30am-08:45am	Bronchoscopic Lung Volume Reduction (BLVR): A glimpse into future	Dr Md Munavvar (UK)	Dr Anand kumar
08:45am-09:00am	Targeted Lung Denervation (TLD), Rheoplasty, Cryospray and beyond: A new hope	Dr Anshul Mittal	Dr Bhaskar Rao
09:00am-09:15am	Role of Biologics in COPD: Has the time come?	Dr Ajeet Singh	Dr Manish Bairwa
09:15am-9:30am	Newer inhalers and newer combinations for COPD	Dr Srikanth Krishnamurthy	Dr Kanishk Sinha
INTERVENTIONAL PULMONOLOGY SESSIONS			
09:30am-10:30am	Session 2: Lung Nodule – The Newer Gadgets		
09:30am-09:50am	Cone beam CT: How do I use it for a PPN?	Dr Wolfgang Hohenforst-Schmidt (Germany)	Dr Latha Sharma
09:50am-10:10am	Bronchoscopic Trans Parenchymal Nodule Access (BTPNA)	Dr Sun Jiayuan (China)	Dr Narendra Methuku
10:10am-10:30am	Robotic Bronchoscopy	Dr Ashutosh Sachdeva (USA)	Dr Vineeth A K
NCCP ORATION 1 & 2			
10:30am-11:30am	Session 3:		
10:30am-11:00am	Prof. P. S. Shankar-Prof. K. C. Mohantay Chest Oration Environmental Lung Diseases	Dr T Mohan Kumar	Dr Gautam Bhagat Dr S N Gaur
11:00am-11:30am	Prof. R. Vishwanathan memorial Chest Oration My Journey with COPD	Dr Narayan Mishra	

CLEVELAND CLINIC SYMPOSIUM			
11:30am-12:30pm	Session 4:		
11:30am-11:50am	Antibody deficiency at a glance for pulmonologist: Protection from inside out	Dr Md. Abuzakouk	Dr Atul C Mehta
11:50am-12:10pm	What is new in lung transplantation	Dr Saimuddin Mohammed	Dr Subhakar Kandi
12:10pm-12:30pm	Scientific basis of Yogic breathing in Pulmonary Medicine	Dr Sai Charan	
PLEURA SESSIONS			
12:30pm-01:30pm	Session 5: Hot & New in Pleural Diseases (Symposium)		
12:30pm-12:45pm	Management of pleural infections: Newer strategies	Dr Mahendran Chetty (UK)	Dr S N Gupta
12:45pm-01:00pm	Whats new in Thoracoscopy?	Dr Ranganath	Dr Thomas George
01:00pm-01:15pm	Ambulatory Devices for Pneumothorax	Dr Aravind Alaga (Malasiya)	Dr Rajendra Sogat
01:00pm-01:30pm	Newer Biomarkers in Pleural effusion	Dr Richa Gupta	
NCCP Oration 3 & 4			
02:00pm-03:00pm	Session 6:		
02:00pm-02:30pm	Prof. S. K. Jain-Prof. S. K. Katiyar Chest Oration Utility of Navigational Bronchoscopy in Peripheral Lesions	Dr Mahendra Kumar Bainara	Dr Gautam Bhagat Dr S N Gaur
02:30pm-03:00pm	Prof. A. S. Paintal- Dr R.C. Jain Memorial Chest Oration Chronic Obstructive Pulmonary Disease: an Entity Ever-Evolving	Dr Prem Prakash Gupta	

PULMONARY HYPERTENSION SESSIONS			
03:00pm-04:00pm	Session 7: SAPH Symposium (Saudi Association for Pulmonary Hypertension)		
03:00pm-03:20pm	PAH Diagnosis and Risk Stratification: importance of Precision	Prof. Abdullah M Aldalaan	Dr Latha Dr Sowjanya
03:20pm-03:40pm	PAH management : Where do we stand	Prof Majdy M Idrees	
03:40pm-04:00pm	Group II PH: Common disease with treatment challenges	Dr Abdullah M Alkhodair	Dr Vineeth A K
ASTHMA SESSIONS			
04:00pm-05:00pm	Session 8: Asthma and Co-Morbidrome (Case Discussion)		
04:00pm-04:15pm	Allergic rhinitis and the newer anti histaminics	Dr K S Satish	
04:15pm-05:00pm	Panel discussion on asthma comorbidities		
	Moderator: Dr Premanand Raya Panellists: Dr Theerasuk (Thailand) Dr Tanushree Gehlot, Dr Unni R Baby, Dr N H Krishna Dr Meghanath, Dr Saicharan (UAE)		
	Case 1: Asthma and OSA	Dr Nirupam Sharan	
	Case 2: Asthma Mimics	Dr Srikanth Goud	
	Case 3: Asthma and Allergic rhinitis	Dr Nishita Singh	



FISHMAN HALL (DAY 2 - 2 ND DECEMBER 2023)			
TIMING	TOPIC	SPEAKER / PANELIST	CHAIRPERSON
TUBERCULOSIS & NTM SESSIONS			
08:30am-09:30am	Session 1: Managing Tuberculosis in special instances (Symposium)		
08:30am-08:45am	TB & HIV - What's beyond convention ?	Dr P T James	Dr Jaikishan
08:45am-09:00am	TB & solid organ transplant / haematological malignancies	Dr Amitesh Gupta	Dr Nikhila K Govind
09:00am-09:15am	TB regimens – CLD & CKD	Dr K P Venugopal	Dr G Sambasiva Rao
09:15am-9:30am	TB & pregnancy	Dr Anitha Kumari	
ASTHMA SESSIONS			
09:30am-10:30am	Session 2: ABPA and Asthma		
09:30am-09:45am	ABPA-When to suspect and how to diagnose	Dr Komal Jasani	Dr Yugaveer
09:45am-10:00am	Treatment of ABPA: Steroids, anti-fungals and beyond	Dr Dipti Gothi	Dr Ramakrishna Reddy
10:00am-10:30am	Cases based panel discussion: Moderator: Dr Naveed Shah Panellists: Dr Atul Luhadia, Dr Mandeep Sodhi, Dr Rahul Dev, Dr Gitartha Baruah, Dr Manju R		
	Case 1: SAFS	Dr Keerthivasan	
	Case 2: ABPA -S	Dr Angshuman Mukherjee	
	Case 3: Refractory ABPA	Dr Venugopal Jagannathan	
NCCP ORATION 1 & 2			
10:30am-11:30am	Session 3:		
10:30am-11:00am	Prof. P. S. Shankar-Prof. K. C. Mohantay Chest Oration Environmental Lung Diseases	Dr T. Mohan Kumar	Dr Gautam Bhagat Dr S N Gaur
11:00am-11:30am	Prof. R. Vishwanathan memorial Chest Oration My Journey with COPD	Dr Narayan Mishra	

ASTHMA SESSIONS			
11:30am-12:30pm	Session 4: Mastering Biologics in Asthma		
11:30am-11:45am	Clinical remission in Severe asthma – The new goal	Dr Rohit Katial (USA)	
11:45am-12:30pm	Tribate on ideal biologic for Asthma overlap phenotype Debate Referee: Dr Ambika Sharma Dr Siddharth Raj Yadav	Case Presenter: Dr Deepak Talwar Debater: Dr Rohit Katial (USA) - Benralizumab Dr Sandhya Khurana (USA)- Omalizumab Dr Sanjeev Mehta - Mepolizumab	
COPD SESSIONS			
12:30pm-01:30pm	Session 5: Triple Therapy in COPD – The Way Forward		
12:30pm-12:45pm	Single inhaler triple therapy – The pharmacologic Options and Evidence	Dr Mohit Kaushal	Dr Surender Kahyap
12:45pm-01:30pm	Panel discussion: Triple Therapy in COPD (Indian Scenario)		
	Moderator: Dr K Satish Panellists: Dr Krishna Kumar, Dr Suhail N, Dr Thomas Vadakkan, Dr Piyush Arora, Dr P R Gupta, Dr Bharat Gopal		
NCCP Oration 3 & 4			
02:00pm-03:00pm	Session 6:		
02:00pm-02:30pm	Prof. S. K. Jain-Prof. S. K. Katiyar Chest Oration Utility of Navigational Bronchoscopy in Peripheral Lesions	Dr Mahendra Kumar Bainara	Dr Gautam Bhagat Dr S N Gaur
02:30pm-03:00pm	Prof. A. S. Paintal- Dr R.C. Jain Memorial Chest Oration Chronic Obstructive Pulmonary Disease: an Entity Ever-Evolving	Dr Prem Prakash Gupta	

INFECTIOUS DISEASES SESSIONS

03:00pm-04:00pm	Session 7: Whats new in Community Acquired Pneumonia (Symposium)		
03:00pm-03:15pm	Artificial intelligence in CAP	Dr Talha Saad	Dr Tirupathi Kumaraswamy
03:15pm-03:30pm	Newer antibiotics for CAP	Dr Ravindra Sarnaik	Dr Rahul Ahluwalia
03:30pm-03:45pm	Imaging in Viral pneumonia & Differential diagnosis	Dr Raghu	Dr Srinivas Reddy
03:45pm-04:00pm	Post-COVID aftermath	Dr Bharat Gopal	Dr Kalpesh Panchal

PULMONARY HYPERTENSION SESSIONS

04:00pm-05:00pm	Session 8: Hot & New in Pulmonary Hypertension (Symposium)		
04:00pm-04:15pm	Mimickers of Chronic thrombo embolic PH	Dr Farid Rashidi (Iran)	Dr J Sarma
04:15pm-04:30pm	Newer tests/scores to prognosticate PH	Dr Murali Mohan B V	Dr K Sailaja
04:30pm-04:45pm	Therapeutic Advances in Pulmonary Hypertension	Dr Hari S Sharma (Netherlands)	Dr Lokender Kumar
04:45pm-05:00pm	Newer combination regimens for PH	Dr Vishnu Sharma	Dr. V Gangadharan



LAENNEC HALL (DAY 2 - 2 ND DECEMBER 2023)			
TIMING	TOPIC	SPEAKER / PANELIST	CHAIRPERSON
PLEURA SESSIONS			
08:30am-09:30am	Session 1: Difficult to manage Pleural effusion – How I do it (Symposium)		
08:30am-08:45am	Management of a Refractory transudate	Dr Rajesh Thomas (Australia)	Dr T Manmadha Rao
08:45am-09:00am	Chylothorax	Dr Trilok C Rao (UAE)	Dr Rajendra Prasad
09:00am-9:15am	Trapped and Entrapped lung	Dr Rakesh Panchal (UK)	Dr Milan Malik
09:15am-9:30am	Pleural effusion in CKD patient	Dr Ajmal Khan	
INFECTIOUS DISEASES SESSIONS			
09:30am-10:30am	Session 2: Community Acquired Pneumonia		
	Panel Discussion on Community Acquired Pneumonia: All that you need to know Moderator: Dr Mahavir Modi Panellists: Dr Akhilesh, Dr Supriyo Sarkar, Dr B Jayaprakash, Dr Lokendra Dave, Dr Surendra Kumar		
NCCP ORATION 1 & 2			
10:30am-11:30am	Session 3:		
10:30am-11:00am	Prof. P. S. Shankar-Prof. K. C. Mohantay Chest Oration Environmental Lung Diseases	Dr T Mohan Kumar	Dr Gautam Bhagat Dr S N Gaur
11:00am-11:30am	Prof. R. Vishwanathan memorial Chest Oration My Journey with COPD	Dr Narayan Mishra	



TUBERCULOSIS & NTM SESSIONS			
11:30am-12:30pm	Session 4: Hot & New in Tuberculosis (2020-2023) Where Do I Integrate in Clinical Practice		
11:30am-11:40am	Newer diagnostics in pipeline	Dr Chaitali Sharma	Dr V K Arora
11:40am-11:50am	Newer drugs in pipeline	Dr Anil Jain	Dr Madhurmay
11:50am-12:00pm	Newer Drug sensitive tuberculosis regimens	Dr Rajesh Solanki	Dr Vinod joshi
12:00pm-12:30pm	Newer Drug Resistant tuberculosis regimens	Dr Pauline Howell (South Africa)	Dr Ayappa
CRITICAL CARE SESSIONS			
12:30pm-01:30pm	Session 5: ARDS: How I do it?		
12:30pm-12:45pm	Titrating PEEP in ARDS- Evidence and How to do it bedside?	Dr K C Misra	Dr Ajoy Kumar Behra
12:45pm-01:00pm	Management of ARDS in 2023 – current guidelines	Dr Gyanendra Agarwal	Dr Narayan
01:00pm-01:30pm	Panel Discussion: Management of refractory hypoxemia in ARDS		
	Moderator: Dr Kalpalata Guntupalli (USA) Panellists: Dr Sryma, Dr Shital Patil, Dr Kajal Arora, Dr Shuvranu G, Dr Vijay Kumar C Case Presenter: Dr Vitrag Shah		
NCCP Oration 3 & 4			
02:00pm-03:00pm	Session 6:		
02:00pm-02:30pm	Prof. S. K. Jain-Prof. S. K. Katiyar Chest Oration Utility of Navigational Bronchoscopy in Peripheral Lesions	Dr Mahendra Kumar Bainara	Dr Gautam Bhagat Dr S N Gaur
02:30pm-03:00pm	Prof. A. S. Paintal- Dr R.C. Jain Memorial Chest Oration Chronic Obstructive Pulmonary Disease: an Entity Ever-Evolving	Dr Prem Prakash Gupta	

INTERVENTIONAL PULMONOLOGY SESSIONS			
03:00pm-04:00pm	Session 7: Hot & New in Bronchoscopy		
03:00pm-03:15pm	What's new in bronchoscopy in 2024: Going beyond white light bronchoscopy.	Dr S V Siva Prasad Reddy	Dr Jaykar Babu
03:15pm-03:45pm	Thin and ultra-thin bronchoscopy – Evolving role	Dr Jamsak Techeikuna (Thailand)	Dr K Ramesh Kumar
03:30pm-03:45pm	Special precautions in transmissible infections (COVID/TB)	Dr Rennis Davis	Dr Ganesh Wattamwar
03:45pm-04:00pm	Airway foreign bodies - Choosing the correct gadget	Dr Ashkan Moslehi (Iran)	Dr S P Rai
BRONCHIECTASIS SESSIONS			
04:00pm-05:00pm	Session 8: Bronchiectasis in India (Symposium)		
04:00pm-04:15pm	The Indian experience (EMBARC INDIA)	Dr Archana B	Dr Saket Sharma
04:15pm-04:30pm	TB and Post TB bronchiectasis – Is it a distinct entity	Dr Surya Kumari	Dr Anil Maske
04:30pm-04:45pm	Role of a surgeon in treating bronchiectasis in India - Experience and Evidence	Dr Ajay Narasimhan	Dr Anirban Sarkar
04:45pm-05:00pm	Ideal investigation bundle for an undiagnosed bronchiectasis in India	Dr Shweta Bansal	Dr Dhanamurthy



KILLIAN HALL (DAY 2 - 2 ND DECEMBER 2023)			
TIMING	TOPIC	SPEAKER / PANELIST	CHAIRPERSON
CRITICAL CARE SESSIONS			
08:30am-09:30am	Session 1: Back to the Basics		
08:30am-08:45am	Pulse Oximetry - Evolution and Recent Advances	Dr Vivek P	Dr. Sumit Mittal
08:45am-09:00am	EtCo2 Monitoring- Principle and Clinical Application in ICU	Dr Alisha Chaudry	Dr. A raghavender Reddy
09:00am-09:30am	Debate: Pro /Con P-SILI (Patient Self Induced Lung Injury) – Myth Or Reality Debate Referee: Dr Rohit Kumar, Dr Anand Agarwal	Dr Pradeep Rangappa (Myth) Dr Rajesh Chawla (Reality)	Dr. Rajendra Shastri
TUBERCULOSIS & NTM SESSIONS			
09:30am-10:30am	Session 2: Approach to Granulomatous disease in Thorax- Is every granuloma Tuberculosis?		
09:30am-09:45am	Granulomas in Thorax- Causes & Approach	Dr R Sridhar	
09:45am-10:30am	Panel Discussion: Approach to Granulomas in Thorax		
	Moderator: Dr Rajendra Prasad Panellists: Dr GN Srivastava, Dr Gajendra Vikram Singh, Dr Salil Bhargav Dr Hirenappa Udnur		
	Case 1: Granulomas in Intrathoracic node Case 2: Granulomas in Pleura Case 3: Granulomas in Lung	Dr Irfan Ismail Dr Rinoosha R Dr Rekha Parameswari	
NCCP ORATION 1 & 2			
10:30am-11:30am	Session 3:		



10:30am-11:00am	Prof. P. S. Shankar-Prof. K. C. Mohantay Chest Oration Environmental Lung Diseases	Dr T Mohan Kumar	Dr Gautam Bhagat Dr S N Gaur
11:00am-11:30am	Prof. R. Vishwanathan memorial Chest Oration My Journey with COPD	Dr Narayan Mishra	
INFECTIOUS DISEASES SESSIONS			
11:30am-12:30pm	Session 4: Fungal lung diseases (Symposium)		
11:30am-11:45am	Chronic Pulmonary Aspergillosis – How to suspect and diagnose	Dr Deepti Rathee	Dr G Aruna
11:45am-12:00pm	Chronic Pulmonary Aspergillosis – Treatment algorithm and monitoring	Dr Vijay Hadda	Dr R Suresh
12:00pm-12:15pm	Newer oral antifungals (NOAF's) and their rationale use	Dr Dibakar Sahu	Dr Subba Naidu
12:15pm-12:30pm	Acute Invasive Pulmonary Fungal infections	Dr Gurmeet Singh (Indonesia)	
PULMONARY HYPERTENSION SESSIONS			
12:30pm-01:30pm	Session 5: Approach to a case with Pulmonary Hypertension - Case based Multi Disciplinary Discussion		
	Moderator: Dr Namita Sood (USA) Panellists: Dr Hani Sabbour (UAE), Dr B V Murali Mohan, Dr K K Sharma, Dr Bindu C G, Dr Reshmi Nair, Dr Sunny Viridi		
12:30pm-12:45pm	Case 1: Unexplained PAH	Dr Akanksha Chawla	Dr Namitha Sood
12:45pm-01:00pm	Case 2: PH and OSA OHS	Dr Ravi K Dosi	Dr Murali Mohan B V
01:00pm-01:15pm	Case 3: CTEPH	Dr Sudha Kansal	Dr Sowjanya
01:15pm-01:30pm	Case 4: Disproportionate PH in ILD/COPD	Dr Shubranshu	

NCCP Oration 3 & 4			
02:00pm-03:00pm	Session 6:		
02:00pm-02:30pm	Prof. S. K. Jain-Prof. S. K. Katiyar Chest Oration (Utility of Navigational Bronchoscopy in Peripheral Lesions)	Dr Mahendra Kumar Bainara	Dr Gautam Bhagat Dr S N Gaur
02:30pm-03:00pm	Prof. A. S. Paintal- Dr R.C. Jain Memorial Chest Oration (Chronic Obstructive Pulmonary Disease: an Entity Ever-Evolving)	Dr Prem Prakash Gupta	
INTERVENTIONAL PULMONOLOGY SESSIONS			
03:00pm-04:00pm	Session 7: Lung Nodule Multi Disciplinary Discussion		
	Moderator: Dr Ashutosh Sachdeva (USA) Panellists: Dr Nadeem Parkar (USA), Dr Wolfgang H Schmidt (Germany) Dr Tie Sew Teck (Malaysia), Dr Ujjwal Parakh, Dr Vijay Tyagi, Dr Nasser Yusuf, Dr Sharada Nagoti		
03:00pm-03:20pm	Case 1	Dr Deepak Muthreja	
03:20pm-03:40pm	Case 2	Dr Ajay Ravi	
03:40pm-04:00pm	Case 3	Dr Gaurav Gupta	
SLEEP SESSIONS			
04:00pm-05:00pm	Session 8: Newer therapeutics/data in Sleep Medicine		
04:00pm-04:15pm	Management of Restless Leg Syndrome	Dr Aboussounan Loutfi (USA)	Dr Ravi Kumar
04:15pm-04:30pm	Approach to residual day time somnolence on CPAP therapy	Dr Sankar Duvvuri	Dr M Raghavendra Rao
04:30pm-04:45pm	Newer therapies/strategies in Insomnia	Dr Nalini Nagella	Dr A Archana
04:45pm-05:00pm	Results from Indian Sleep Survey	Dr Abhishek Goyal	

PAINTAL HALL (DAY 2 - 2ND DECEMBER 2023)			
TIMING	TOPIC	SPEAKER / PANELIST	CHAIRPERSON
LUNG CANCER SESSIONS			
08:30am-09:30am	Session 1: Hot and new in diagnosis of Lung cancer (Symposium)		
08:30am-08:45am	E-Nose Screening	Dr Srikar Darisetty	Dr Vinod Jangid
08:45am-09:00am	Liquid biopsy - The current role in lung cancer	Dr Arda Kiani (Iran)	Dr Sukesh Rao
09:00am-09:15am	Next Generation Sequencing	Dr Thomas Vadakkan	Dr S K Pathak
09:15am-09:30am	Role of Artificial Intelligence in lung cancer screening and diagnosis	Dr Chinnababu Sunkavalli	
COPD SESSIONS			
09:30am-10:30am	Session 2: Non-Pharmacological management of COPD		
09:30am-09:45am	Pulmonary Rehabilitation: A neglected entity	Dr Sally Singh (UK)	Dr Aswini Kumar Mohapatra
09:45am-10:00am	Explorative restorative journey in COPD	Dr Narendra Bhatta (Nepal)	Dr U P S Sidhu
10:00am-10:15am	Surgical interventions in severe COPD- Easing the breath	Dr Rajat Saxena	Dr N K Jain
NCCP ORATION 1 & 2			
10:30am-11:30am	Session 3:		
10:30am-11:00am	Prof. P. S. Shankar-Prof. K. C. Mohantay Chest Oration Environmental Lung Diseases	Dr T Mohan Kumar	Dr Gautam Bhagat
11:00am-11:30am	Prof. R. Vishwanathan memorial Chest Oration My Journey with COPD	Dr Narayan Mishra	Dr S N Gaur
LUNG TRANSPLANTATION			
11:30am-12:30pm	Session 4: Lung Transplant - What A Pulmonologist Needs to Know? (Symposium)		

11:30am-11:45am	Whom to refer and when to refer – The guidelines versus the reality	Dr Vimi Varghese	Dr Pavan Yadav
11:45am-12:00pm	Immunosuppression and rejection in lung transplant – The current understandings	Dr Vijil Rahulan	Dr Venu
12:00pm-12:15pm	Donor lung management strategy before the transplant team arrives	Dr Harish Seetamraju (USA)	Dr Shivalingaswamy S
12:15pm-12:30pm	Infections post lung transplantation – Timeline and Prevention	Dr Vivek Singh	
INFECTIOUS DISEASES SESSIONS			
12:30pm-01:30pm	Session 5: Ventilator associated infections		
12:30pm-12:45pm	Diagnosis of infections in a ventilated host: Colonizer, VAT and VAP	Dr Uday Kakodkar	Dr Anupama
12:45pm-01:00pm	Antimicrobial surveillance and treatment protocols for VAP	Dr Suhail Neliyathodi	Dr Sonia Santhakumar
01:00pm-01:30pm	Panel Discussion: Prevention of VAP – Best practices Moderator: Dr Dhruv Chaudhary Panellists: Dr Hari Prasad, Dr Siva Kumar, Dr Gehan M Elassal (Egypt), Dr Ram Awadh Singh, Dr Rahul Gupta		
NCCP Oration 3 & 4			
02:00pm-03:00pm	Session 6:		
02:00pm-02:30pm	Prof. S. K. Jain-Prof. S. K. Katiyar Chest Oration Utility of Navigational Bronchoscopy in Peripheral Lesions	Dr Mahendra Kumar Bainara	Dr Gautam Bhagat Dr S N Gaur
02:30pm-03:00pm	Prof. A. S. Paintal- Dr R.C. Jain Memorial Chest Oration Chronic Obstructive Pulmonary Disease: an Entity Ever-Evolving	Dr Prem Prakash Gupta	

MISCELLANEOUS SESSIONS			
03:00pm-04:00pm	Session 7: Unique Concepts in Pulmonology		
03:00pm-03:15pm	Role of Heliox and iNO in medical practise	Dr Hassan Alorainy (Saudi Arabia)	Dr M Venkat Rao
03:15pm-03:30pm	Role of Vitamin D in allergic and invasive aspergillosis	Dr Uday Kishore (UK)	Dr Shylendra
03:30pm-03:45pm	Oxygen therapy - Beyond interface	Dr Sanjay Kumar	Dr Phani kumar
ASTHMA SESSIONS			
04:00pm-05:00pm	Session 8: Severe asthma - Real World evidence and Practice		
04:00pm-04:15pm	Real World Experience of Mepolizumab from Asia (NEST experience)	Dr V. Nagarjuna Maturu	Dr Anita Bhatt
04:15pm-05:00pm	Panel Discussion on Management of Severe asthma		
	Moderator: Dr Sandhya Khurana (USA) Panellists: Dr A K Singh, Dr Fathahudeen, Dr Avinash Nair, Dr Mohammed Abuzakouk (UAE), Dr Gopal Chawla (UK)		
	CASE 1: Asthma with co-morbidities	Dr Arun Chowdary K	
	Case 2: T2 low phenotype	Dr Asmita Mehta	
	Case 3: Use of Biologics	Dr Dhvani Gopinath	

OSLER HALL (DAY 2 - 2 ND DECEMBER 2023)			
TIMING	TOPIC	SPEAKER / PANELIST	CHAIRPERSON
INFECTIOUS DISEASES SESSIONS			
08:30am-09:30am	Session 1: Diagnostic evaluation of pneumonia (Symposium)		
08:30am-08:45am	Radiographic imaging of CAP: A case based approach	Dr Vamsi Krishna Mootha	Dr Ajit Vigg
08:45am-09:00am	POC diagnostic tests for Acute CAP- Are they really useful?	Dr Suman K Das (UK)	Dr Gowrinath
09:00am-09:15am	Making a sense of culture report (Focus on antibiotic susceptibility, cut-offs)	Dr Hari Prasad	Dr Sadhana Y
09:15am-09:30am	Newer diagnostics for Pneumonia- Going beyond cultures	Dr Adesh Kumar	Dr M Shravan Kumar
COPD SESSIONS			
09:30am-10:30am	Session 2: Chronic Cough - Diagnosis & Management		
09:30am-09:45am	Algorithmic approach to diagnosis of chronic cough	Dr Vivek N Iyer (USA)	
09:45am-10:30am	Panel discussion on Pharmacologic and Non pharmacologic management strategies for chronic cough		
	Moderator: Dr Vivek N Iyer (USA) Panellists: Dr Harsha D S, Dr Kamal Jodhani, Dr Mayank Saxena, Dr R P Meena, Dr Akashdeep Singh		
NCCP ORATION 1 & 2			
10:30am-11:30am	Session 3:		
10:30am-11:00am	Prof. P. S. Shankar-Prof. K. C. Mohantay Chest Oration Environmental Lung Diseases	Dr T Mohan Kumar	Dr Gautam Bhagat
11:00am-11:30am	Prof. R. Vishwanathan memorial Chest Oration My Journey with COPD	Dr Narayan Mishra	Dr S N Gaur



ILD SESSIONS			
11:30am-12:30pm	Session 4: Expert panel discussion – From evidence to practice		
	How do I manage my case with IPF		
	<p>Moderator: Dr Randeep Guleria Panellists: Dr Susmita Kundu, Dr Tarushree Sharma, Dr Paramjyothi GK Dr Ambarish Joshi, Dr Rahul Alhuwalia, Dr Supreet Batra, Dr Sally Singh (UK) Case Presenter: Dr Koushik Saha Case Presenter: Dr Dhiraj Bhatkar</p>		
MISCELLANEOUS SESSIONS			
12:30pm-01:30pm	Session 5: Micro Nodules in Lung Disease		
12:30pm-12:45pm	Approach to a case with micro nodular lung disease	Dr Nadeem Parkar (USA)	Dr P D Motiani
12:45pm-01:00pm	Silicosis in India - An overview	Dr Pawan Kumar Singh	Dr U C Ojha
01:00pm-01:15pm	Silicosis - Looking beyond the lungs	Dr Ramakant Dixit	Dr. Honney Sawhney
01:15pm-01:30pm	Role of Artificial Intelligence in diagnosing silicosis and tuberculosis	Dr C R Choudhary	Dr Rajesh V
NCCP Oration 3 & 4			
02:00pm-03:00pm	Session 6:		
02:00pm-02:30pm	Prof. S. K. Jain-Prof. S. K. Katiyar Chest Oration Utility of Navigational Bronchoscopy in Peripheral Lesions	Dr Mahendra Kumar Bainara	Dr Gautam Bhagat Dr S N Gaur
02:30pm-03:00pm	Prof. A. S. Paintal- Dr R.C. Jain Memorial Chest Oration Chronic Obstructive Pulmonary Disease: an Entity Ever-Evolving	Dr Prem Prakash Gupta	

SLEEP SESSIONS			
03:00pm-04:00pm	Session 7: Pediatric Sleep Medicine		
03:00pm-03:15pm	The problem and scope of pediatric sleep medicine	Dr Nisha Keshary Bhatta (Nepal)	
03:15pm-03:45pm	Case Presentations: a. Case 1 b. Case 2 c. Case 3	Dr Pawan Kalyan Dr Latha Casturi Dr Harshini E	Dr Mandeep Sodi
03:45pm-04:00pm	Pediatric Sleep Medicine in India - An overview	Dr Pawan Kalyan	Dr Mohan Rao T
INTERVENTIONAL PULMONOLOGY SESSIONS			
04:00pm-05:00pm	Session 8: Women in Indian Interventional Pulmonology (WiIP)		
04:00pm-04:15pm	Pleura - Real life lessons	Dr Richa Gupta	Dr Rajani Bhatt
04:15pm-04:30pm	Central Airway Obstruction - Interesting Cases	Dr Pratibha Singhal	Dr M Munnavar
04:30pm-04:45pm	Bronchoscopy in ICU	Dr Sonia Dalal	
04:45pm-05:00pm	EBUS - Tips and tricks	Dr Suhsmitta Roychoudhary	Dr Krishna Priya



ROBERT KOCH HALL (DAY 2, 2nd DECEMBER 2023)

TIMING	OP ID	TOPIC	PRESENTER
8:30am-10:30am	SESSION : 1 NAPCON AWARD		
8:30am-8:40am	OP 35	PREDICTORS AND OUTCOMES OF SEVERE COVID-19 PATIENTS	<i>Dr Anantha Lakshmi T</i>
8:40am-8:50am	OP 36	ROLE OF MEDICAL THORACOSCOPY IN UNDIAGNOSED PLEURAL EFFUSIONS - AN OBSERVATIONAL STUDY	<i>Dr Pradeep Naik G</i>
8:50am-9:00am	OP 37	CORRELATION OF BODE INDEX AND SEVERITY OF RIGHT VENTRICULAR DYSFUNCTION ASSESSED USING ECHOCARDIOGRAPHY IN STABLE COPD PATIENTS	<i>Dr Sangavi S</i>
9:00am-9:10am	OP 38	PULMONARY FUNCTION TEST IN DIFFERENT PHENOTYPES OF COPD: A CROSS SECTIONAL STUDY	<i>Dr Manimozhi</i>
9:10am-9:20am	OP 39	ROLE OF THERAPEUTIC DRUG MONITORING IN OPTIMIZATION OF FIRST-LINE ANTI-TUBERCULOSIS DRUGS : A SYSTEMATIC REVIEW	<i>Dr Shubhendu</i>
9:20am-9:30am	OP 40	SPECTRUM OF INTERSTITIAL LUNG DISEASES IN A TERTIARY CARE CENTRE- A CROSS SECTIONAL STUDY	<i>Dr Sagar</i>
9:30am-9:40am	OP 41	TO STUDY ASSOCIATION BETWEEN DLCO, 6MWT AND PULMONARY HYPERTENSION IN PATIENTS OF IDIOPATHIC PULMONARY FIBROSIS	<i>Dr Khusboo Bihani</i>

9:40am-9:50am	OP 42	PEAK ENERGY ANALYSIS OF ACOUSTIC COUGH TO IDENTIFY RESPIRATORY DISEASES	<i>Dr Sujith Thomas Chandy</i>
9:50am-10:00am	OP 43	ROLE OF ESS AND STOPBANG SCORES IN MONITORING RESPONSE TO CPAP THERAPY IN PATIENTS OF SLEEP RELATED BREATHING DISORDERS	<i>Dr Tanushee Wason</i>
10:00am-10:10am	OP 44	COMPARING HIGH-FLOW NASAL CANNULA WITH NON-INVASIVE VENTILATION FOR MANAGING ACUTE EXACERBATION OF CHRONIC OBSTRUCTIVE PULMONARY DISEASE: A SYSTEMATIC REVIEW AND META-ANALYSIS.	<i>Dr Pugazhendi Inban</i>
10:10am-10:20am	OP 45	RHEUMATOID ARTHRITIS ASSOCIATED INTERSTITIAL LUNG DISEASE MANAGEMENT: INITIAL EXPERIENCE FROM A BUDDING INTERSTITIAL LUNG DISEASE CLINIC FROM CENTRAL INDIA	<i>Dr Vikas Kumar</i>
10:20am-10:30am	OP 46	HOW INFORMED ARE BRONCHIAL ASTHMA PATIENTS ABOUT THE DISEASE-A QUESTIONNAIRE BASED STUDY	<i>Dr Athira Chandran T</i>
11:30am-1:30am	SESSION : 2 NAPCON AWARD		
11:30am-11:40am	OP 47	PROPORTION OF RLS AND INSOMNIA IN COVID SURVIVORS: AN INTERIM ANALYSIS	<i>Dr Lokesh Kumar Saini</i>



11:40am- 11:50am	OP 48	MAJOR DEPRESSIVE DISORDER AMONG PATIENT WITH TUBERCULOSIS AND IMPACT OF TB TREATMENT ON DEPRESSION	<i>Dr Suganthi</i>
11:50am- 12:00pm	OP 49	OSA IN YOUNG: A NEW DYNAMIC	<i>Dr Ayushi Gupta</i>
12:00pm- 12:10pm	OP 50	CONVERGENCE OF CLUES IN DECODING THE AETIOLOGY OF PLEURAL DISEASES-DO CT SCANS RING A BELL?	<i>Dr Jasti Venkata Suneel Kumar</i>
12:10pm- 12:20pm	OP 51	UTILITY OF THORACIC ULTRASOUND FOR PREDICTING THE SUCCESS OF WEANING FROM MECHANICAL VENTILATION IN PATIENTS ADMITTED TO RESPIRATORY ICU	<i>Dr Vishnu K</i>
12:20pm- 12:30pm	OP 52	PREDICTORS OF DIFFICULT WEANING AMONG MECHANICALLY VENTILATED PATIENTS IN RESPIRATORY INTENSIVE CARE UNIT	<i>Dr Anjana Satheesh</i>
12:30pm- 12:40pm	OP 53	HAEMOGLOBIN AND RED BLOOD CELL INDICES IN CHILDREN UNDER 5 YEARS WITH TUBERCULOSIS IN INDIA	<i>Dr Aishwarya Venkataraman</i>
12:40pm- 12:50pm	OP 54	CLINICAL PROFILE, SEVERITY OF NICOTINE DEPENDENCE AND PREDICTORS OF ABSTINENCE IN PATIENTS ATTENDING SMOKING CESSATION CLINIC IN A TERTIARY CARE CENTRE IN SOUTHERN INDIA	<i>Dr Ashwini Kesavalu</i>



12:50pm- 1:00pm	OP 55	THE IMPACT OF AIR POLLUTION ON CHRONIC OBSTRUCTIVE PULMONARY DISEASE (COPD) EXACERBATIONS	Dr Pavani Chinnapaka
1:00pm- 1:10pm	OP 56	EFFECT OF METFORMIN ON SYSTEMIC CHEMOKINE RESPONSES DURING ANTI-TUBERCULOSIS CHEMOTHERAPY	Dr N. Pavan Kumar
1:10pm- 1:20pm	OP 57	EARLY REAL-WORLD EXPERIENCE ON EFFECTIVENESS OF IL5 TARGETED THERAPIES FOR SEVERE EOSINOPHILIC ASTHMA PATIENTS IN INDIA	Dr Prerna Galhotra
1:20pm- 1:30pm	OP 58	DEVELOPING A SUSTAINABLE MODEL FOR IDENTIFICATION AND MANAGEMENT OF TUBERCULOSIS INFECTION (TBI) IN CONTACTS OF DRTB PATIENTS IN KHAMMAM DISTRICT, TELANGANA, INDIA- A PILOT STUDY	Dr Sumalata Chittiboyina
3:30pm- 4:40pm	SESSION : 3 NCCP AWARD Dr Gautam Bhagat, Dr S N Gaur, Dr Nikhil Sarangdhar		
3:00pm- 3:10pm	OP 59	A STUDY TO CORRELATE SLEEP STAGE INDEPENDENT OBSTRUCTIVE SLEEP APNEA WITH POLYSOMNOGRAPHIC VARIABLES AND SLEEP QUESTIONNAIRES	Dr Beauty Prasad R



3:10pm- 3:20pm	OP 60	A PROSPECTIVE LONGITUDINAL STUDY OF CHRONIC PULMONARY ASPERGILLOSIS IN NEWLY DIAGNOSED PULMONARY TUBERCULOSIS PATIENTS FROM DIAGNOSIS TILL END-OF-TREATMENT	<i>Dr Dhouli Jha</i>
3:20pm- 3:30pm	OP 61	ASSESSMENT OF KNOWLEDGE AND PRACTICES REGARDING OXYGEN THERAPY AMONG MBBS INTERNS IN A TERTIARY CARE HOSPITAL,SOUTH INDIA. $\hat{\text{A}}\text{€}$	<i>Dr Paritala Akhil</i>
3:30pm- 3:40pm	OP 62	PREVALENCE AND PREDICTORS OF SUBOPTIMAL PEAK INSPIRATORY FLOW RATES IN THE MANAGEMENT OF COPD	<i>Dr Vemuri Mahesh Babu</i>
3:40pm- 3:50pm	OP 63	COMPARATIVE STUDY ON IMPULSE OSCILLOMETRY AND SPIROMETRY IN DIAGNOSING OBSTRUCTIVE LUNG DISEASES	<i>Dr Pendyala Vamsi Krishna</i>
3:50pm- 4:00pm	OP 64	A SEVERITY-OF-ILLNESS SCORE TO PREDICT THE MORTALITY OF TB PATIENTS ADMITTED TO ICU	<i>Dr K Mothilal</i>
4:00pm- 4:10pm	OP 65	A CROSS SECTIONAL STUDY TO ASSESS POTENTIAL OF SERUM URIC ACID, URIC ACID- CREATININE RATIO AS PROGNOSTIC MARKERS FOR ASSESSING COPD SEVERITY AND COPD RELATED COR PULMONALE	<i>Dr Girija D</i>



4:10pm- 4:20pm	OP 66	VENTILATORY LIMITATION AND GAS EXCHANGE ABNORMALITY AS POST COVID-19 SEQUELAE IN PATIENTS WITH SEVERE COVID-19 DISEASE: A CARDIOPULMONARY EXERCISE TESTING STUDY	Dr Jessy Aleyamma Jose
4:20pm- 4:30pm	OP 67	PREVALENCE OF SARCOPENIA IN CHRONIC OBSTRUCTIVE PULMONARY DISEASE	Dr Krishnapriya S
4:30pm- 4:40pm	OP 68	CHALLENGES OF LIVING WITH ASTHMA: RESULTS OF A SURVEY IN INDIAN ASTHMA PATIENTS	Dr Swapna Nair



YELLA PRAGADA HALL (FREE POSTER PRESENTATION)					
E-POSTER SESSION	GROUP AND TIME	DAY 1 1st DEC 2023 E-POSTER NUMBERS	DAY 2 2nd DEC 2023 E-POSTER NUMBERS	DAY 3 3rd DEC 2023 E-POSTER NUMBERS	SCREEN NUMBER
E Poster Session 1					
8:30- 10:30am	A) 8:30-9:00am	1-30	361-390	721-750	1-30
	B) 9:00-9:30am	31-60	391-420	751-780	1-30
	C) 9:30- 10:00am	61-90	421-450	781-810	1-30
	D) 10:00- 10:30am	91-120	451-480	811-840	1-30
10:30- 11:30am		ORATION	ORATION		
E Poster Session 2					
11:30- 1:30pm	E) 11:30- 12:00pm	121-150	481-510		1-30
	F) 12:00- 12:30pm	151-180	511-540		1-30
	G) 12:30- 1:00pm	181-210	541-570		1-30
	H) 1:00-1:30pm	211-240	571-600		1-30
1:30- 2:00pm	LUNCH				
2:00- 3:00pm		ORATION	ORATION		
E Poster Session 3					
3:00- 5:00pm	I) 3:00-3:30pm	241-270	601-630		1-30
	J) 3:30-4:00pm	271-300	630-660		1-30
	K) 4:00-4:30pm	301-330	661-690		1-30
	L) 4:30-5:00pm	331-360	691-720		1-30

DEBATE RING (DAY 2 - 2ND DECEMBER 2023)		
09:30am-10:30am	Pan-Vaccination for all in COPD in India (A need vs An Overkill) <i>Debate Referee:</i> Dr Abhinav Bhanot, Dr B Menon	
	A need	Dr Agam Vora
	Overkill	Dr Sachin Baliyan
11:30am-12:00pm	Home based sleep testing vs Level 1 Polysomnography for an uncomplicated OSA <i>Debate Referee:</i> Dr Abhishek Goyal, Dr Ajay Godse	
	Home Based Testing	Dr Suma
	Level 1 PSG	Dr Uma Maheswari
12:00pm-12:30pm	Choosing the correct triple inhaler therapy for my patient in rural India (SITT vs MITT) <i>Debate Referee:</i> Dr S K Luhadia	
	SITT	Dr Prasanna K Thomas
	MITT	Dr T K Jayalakshmi
03:00pm-04:00pm	Single use bronchoscopes: Is it the prime time? (Yes-No Debate) <i>Debate Referee:</i> Dr T Balaraju, Dr Kedar Hibare	
	Yes	Dr Shivanshu Raj Goyal
	No	Dr Sachin D



SCIENTIFIC PROGRAMME GRID

	PLEURA	Light Blue
	ILD	Light Green
	SLEEP	Pink
	CRITICAL CARE	Light Orange
	INTERVENTIONS	Red
	PAH AND VASCULAR DISEASES	Grey
	ASTHMA and BRONCHIECTASIS	Yellow
	COPD	Purple
	PNEUMONIA	Green
	TUBERCULOSIS AND NTM	Dark Orange
	MISCELLANEOUS	White
	LUNG CANCER	Dark Grey

DAY 3	CHARAKA HALL	FISHMAN HALL	LAENNEC HALL
Session 1 (8:30-9:30)	Mediastinal staging in lung cancer (SYMPOSIUM)	Hot and new in ILD (SYMPOSIUM)	Infection control & Anti-microbial stewardship (SYMPOSIUM)
Session 2 (9:30 - 10:30)			
Session 3 (10:30 - 11:30)	Tuberculosis - EPTB	Molecular diagnostics and genetics in NSCLC lung (SYMPOSIUM)	SARCOIDOSIS (SYMPOSIUM)
Session 4 (11:30 - 12:30)			
Session 5 (12:30- 1:30)	ISCCMSymposium	Treatment of Community Acquired Pneumonia (Symposium)	Sepsis-CASE BASED PANEL DISCUSSION
Session 6 (1:30 - 2:30)			
Session 6 (1:30 - 2:30)	PERSISTENT AIR LEAK SYMPOSIUM	Cystic lung diseases: A comprehensive overview	High altitude and lung health



DAY 3	KILLIAN HALL	PAINTAL HALL	OSLER HALL
Session 1	PULMONARY EOSINOPHILIC SYNDROMES (SYMPOSIUM)	Non- tuberculous Mycobacteria (SYMPOSIUM)	PRACTICE changing papers and landmark clinical trials in management of COPD in the last 3 years
(8:30-9:30)			
Session 2	Interpreting a Sleep report : Looking beyond AHI (SYMPOSIUM)	VACCINATION FOR RESPIRATORY DISEASES (SYMPOSIUM)	Safe practices in ICU
(9:30 - 10:30)			
Session 3	Infections in a bronchiectatic patient (SYMPOSIUM)	DIFFUSE ALVEOLAR HEMORRHAGE	Recent Practice changing publications in ILD (2021-2023) : Year in review
(10:30 – 11:30)			
Session 4	Investigations for bronchiectasis – The way forward (SYMPOSIUM)	LUNGS ON FIRE SESSION: Multi-disciplinary discussion in ILD	Infection control and bronchoscope care in the bronchoscope unit (SYMPOSIUM)
(11:30 – 12:30)			
Session 5	PRACTICE CHANGING PUBLICATIONS IN PLEURAL DISEASES	AIR POLLUTION AND LUG HEALTH	Trouble-shooting in a patient with adverse effects (Panel Discussion)
(12:30- 1:30)			
Session 6	Newer therapies/ advances-CRITICAL CARE	Management strategies for bronchiectasis (SYMPOSIUM)	Prescribing PAP device - What you should know
(1:30 – 2:30)			



CHARAKA HALL (DAY 3 - 3 rd DECEMBER 2023)			
TIMING	TOPIC	SPEAKER / PANELIST	CHAIRPERSON
LUNG CANCER SESSIONS			
08:30am-09:30am	Session 1: Mediastinal staging in lung cancer (Symposium)		
08:30am-08:45am	When do we need to stage the mediastinum	Dr Deepak Agarwal	Dr Ayyappa
08:45am-09:00am	Medical mediastinoscopy – How & when?	Dr Mayank Mishra	Dr A Vinay Kumar
09:00am-09:15am	Surgical staging of the mediastinum – Is it needed?	Dr Manjunath Bale	Dr Sanjay Thankur
09:15am-9:30am	Restaging the mediastinum - Indication & Techniques	Dr Pawan Kumar Biraris	
ILD SESSIONS			
09:30am-10:30am	Session 2: Paediatric Interstitial Lung Diseases		
09:30am-09:50am	Paediatric ILD : Etiology & Pathogenesis : An overview	Dr Sajith Kesavan	Dr George Moti Justin
09:50am-10:10am	Paediatric ILD : Diagnosis : An update	Dr Srikanta J T	Dr Sujata Sarada
10:10am-10:30am	Paediatric ILD : Pharmacological & Non pharmacological management	Dr Suresh Kumar P	
TUBERCULOSIS & NTM SESSIONS			
10:30am-11:30am	Session 3: Tuberculosis - EPTB		
10:30am-11:30am	Case Based Panel Discussion: Extra Pulmonary Tuberculosis		
	Moderator: Dr Alladi Mohan Panellists: Dr Shipra Anand, Dr Meenakshi, Dr Nithya Haridas Dr Somnath Das, Dr Anil Kashyap		
	Case 1:	Dr Supreet Batra	
	Case 2:	Dr Nithyanand Ravi	
	Case 3:	Dr Prashant Kanbur	

CRITICAL CARE SESSIONS			
11:30am-12:30pm	Session 4: ISCCM Symposium		
11:30am-11:45am	Initial Management of Sepsis and Septic Shock - What is new ?	Dr Gunjan Chanchalani	Dr Sheila N Myatra
11:45am-12:00pm	ESICM guidelines on management of Acute Respiratory Distress Syndrome - What has changed ?	Dr Bharat Jagiasi	Dr Srinivas Samavedam
12:00pm-12:15pm	Newer non - conventional modes of mechanical ventilation	Dr Anand Nikalje	
12:15pm-12:30pm	Non - invasive respiratory support in AHRF (HFNO vs NIV)	Dr Pradip Bhattacharya	
PLEURA SESSIONS			
12:30pm-01:30pm	Session 5: Smoking Cessation: Choose Life not Tobacco		
12:30pm-12:45pm	Assessing Nicotine dependence and addiction: Questionnaire and tests	Dr Shika Jindal Gupta	Dr A K Janmeja
12:45pm-01:00pm	E-ciarette and Vaping- The new trouble maker	Dr Vrushali Khadke	Dr Palaniappan
01:00pm-01:30pm	Panel Discussion: How to convince my patient to give up tobacco smoke		
	Moderator: Dr Vishal Chopra Panellists: Dr Vipin Varkey, Dr Ramesh Chokani (Nepal), Dr Prem Prakash Gupta, Dr Tanmay Jain, Dr Rajiv Paliwal		



PLEURA SESSIONS			
01:30pm-02:30pm	Session 6: Persistent Air Leak Symposium		
01:30 pm-01:45pm	Pleural strategies	Dr Kanumuri Srinivas	Dr Ilyas Khan
01:45pm-02:00pm	Bronchoscopic approach	Dr Priyanka Poda	
02:00pm-02:30pm	Case based panel discussion: Persistent air leak - How do I approach?		
	Moderator: Dr Rajesh Thomas (Australia) Panellists: Dr Amir Khoja, Dr Laxmikanth Yenge Dr Gopal Krishna, Dr Loganathan, Dr B Visweswaran		
	Case 1 : COPD and PAL	Dr Srikanth	
	Case 2 : Post Surgical PAL	Dr Sameer Bansal	



FISHMAN HALL (DAY 3 - 3 rd DECEMBER 2023)			
TIMING	TOPIC	SPEAKER / PANELIST	CHAIRPERSON
ILD SESSIONS			
08:30am-09:30am	Session 1: Hot and new in ILD (Symposium)		
08:30am-08:45am	Newer therapies in fibrotic ILD- Looking beyond the horizon	Dr B P Singh	Dr Milta Kuriakose
08:45am-09:00am	Artificial intelligence in ILD: Image texture analysis	Dr Abhishek Faye	Dr Pragathi Rao
09:00am-09:15am	Integrative Multiomics in ILD	Dr Senthil D	Dr Mathew Ninnan
09:15am-9:30am	Cryobiopsy in CTD - ILD: Is it the way forward ?	Dr Harikishan G	Dr Ashraff
CRITICAL CARE SESSIONS			
09:30am-10:30am	Session 2: Ventilation & Weaning - How to optimise at the bedside ?		
09:30am-09:45am	Driving pressure and Mechanical Power- Applying these concepts at the bed side	Dr Suresh Ramasubban	
09:45am-10:00am	Newer modes of ventilation	Dr Amit Raodeo	
10:00am-10:30am	Panel Discussion: Case Based ABCDE approach to a patient with difficult weaning		
	Moderator: Dr Venkat Raman Kola Panellists: Dr Amutha Kumar, Dr Ashish Agarwal, Dr Ankit Bansal Dr R Santosh Nemagouda Case Presenter: Dr Amina Mobashir		
LUNG CANCER SESSIONS			
10:30am-11:30am	Session 3: Molecular diagnostics and genetics in NSCLC lung (Symposium)		
10:30am-10:45am	EGFR mutations: diagnosis and therapy	Dr Rekha Bansal	Dr Ramakrishna
10:45am-11:00am	ALK mutations: diagnosis and therapy	Dr Nikhil Sarangdhar	Dr Alok Srivatsava
11:00am-11:15am	ROS mutations: diagnosis and therapy	Dr Ramniwas	Dr Pradyuth Waghay
11:15am-11:30am	Other targetable mutations	Dr Rajiv Garg	

INFECTIOUS DISEASES SESSIONS			
11:30am-12:30pm	Session 4: Treatment of Community Acquired Pneumonia (Symposium)		
11:30am-11:45am	The Optimal antibiotic for non severe CAP	Dr P S Tampi	Dr Prabhakar
11:45am-12:00pm	The Optimal empiric regimen for severe CAP	Dr BNBM Prasad	Dr Ramaswamy
12:00pm-12:15pm	The Optimal duration for treating CAP	Dr Suraj Varma	Dr Sindhoora Rawul
12:15am-12:30pm	Emerging Anti-microbial resistance in the community	Dr Harshit B	
SLEEP SESSIONS			
12:30pm-01:30pm	Session 5: What is new in Sleep diagnostics – Hot & New		
12:30pm-12:45pm	Sleep Sense, My night & Other sleep monitoring	Dr Sudip Ghosh	Dr Jayaramanr
12:45pm-01:00pm	One Sleep Test	Dr Venkat Ramanaprasad	Dr Shyamal Sarkar
01:00pm-01:15pm	Watch PAT and other wrist based tools	Dr Harshini Errabelli	Dr Anup
01:15pm-01:30pm	Artificial Intelligence in Sleep Medicine	Dr Ravichandra	
ILD SESSIONS			
01:30pm-02:30pm	Session 6: Cystic lung diseases: A comprehensive overview		
01:30pm-01:50pm	Approach to cystic lung disease – focus on LAM	Dr Nishanth Gupta (USA)	
01:50pm-02:30pm	Case based panel discussion:		
	Moderator: Dr Nishanth Gupta (USA) Panellists: Dr Prashant Saxena, Dr Sai Praveen Harnath Dr Nithin Reddy, Dr Kripesh Ranjan, Dr Deepak Agarwal Dr Venugopal P		
	Case 1: LAM Case 2: PLCH/LIP Case 3: BIRT HOGG DUBE Case 4: LCDD	Dr Ritisha Bhatt Dr Ugandhar Bhatt Dr Venu Gopal P Dr A Raghukanth	

LAENNEC HALL (DAY 3 - 3 RD DECEMBER 2023)			
TIMING	TOPIC	SPEAKER / PANELIST	CHAIRPERSON
INFECTIOUS DISEASES SESSIONS			
08:30am-09:30am	Session 1: Infection control & Anti-microbial stewardship (Symposium)		
08:30am-08:50am	Infection control measures for Airborne respiratory viruses and Tuberculosis	Dr Ashesh Dhungana	Dr Banani Jena
08:50am-09:10am	Infection control in Bronchoscopy Unit	Dr Animesh Ray	Dr Sudheena
09:10am-09:30am	Anti-microbial resistance mechanisms and detection	Dr Nanda Kishore	Dr Md Shamim
INTERVENTIONAL PULMONOLOGY SESSIONS			
09:30am-10:30am	Session 2: Improving patient comfort and safety during bronchoscopy		
09:30am-09:45am	Optimal anesthetic strategy during an awake bronchoscopy	Dr Praveen Valsalan	Dr Karthikeyan
09:45am-10:00am	Sedation practices and protocols during bronchoscopy	Dr Saurabh Mittal	Dr C N Prasad
10:00am-10:15am	HFNC/NIV in improving patient comfort and tolerance in a hypoxic patient	Dr Lokesh Gutta	Dr Priya Deshpande
10:15am-10:30am	Music therapy & Virtual reality during bronchoscopy	Dr S Santhakumar	
ILD SESSIONS			
10:30am-11:30am	Session 3: Sarcoidosis in India (Symposium)		
10:30am-10:45am	Diagnosing sarcoidosis in a tuberculosis endemic country	Dr Anand Jaiswal	Dr Sumit Mittal
10:45am-11:00am	Epidemiology and Clinical presentation in India	Dr P R Gupta	Dr B N Panda
11:00am-11:15am	Treatment strategies in Sarcoidosis	Dr RMPL Ramanathan	Dr Hari Prasad
11:15am-11:30am	Refractory Sarcoidosis	Dr Sachin Kumar	Dr Penchala Reddy

TUBERCULOSIS & NTM SESSIONS			
11:30am-12:30pm	Session 4: Drug Resistant Tuberculosis - Choosing the correct drug combination for my patient		
11:30am-12:30pm	Moderator: Dr Malik Parmar Panellists: Dr Chandrasekhar, Dr Vikas Oswal, Dr Ashwani Khanna, Dr Aleemuddin Naveed, Dr Sumalatha C		
	Case 1:	Dr Naresh	
	Case 2:	Dr Sangeeta Sharma	
	Case 3:	Dr Tasneem	
	Case 4:	Dr Akshata	
CRITICAL CARE SESSION			
12:30pm-01:30pm	Session 5: Sepsis: Case based Panel discussion		
12:30pm-01:30pm	Evolving concepts in diagnosis and management		
12:30pm-01:30pm	Moderator: Dr Srinivas Samavedam Panellists: Dr Dilip Dubey, Dr K A Ameer, Dr Aziz KS, Dr Bhavik Shah, Dr NT Awad Case Presenter: Dr Pavan Tiwari		
MISCELLANEOUS SESSION			
01:30pm-02:30pm	Session 6: High Altitude and Lung Health		
01:30pm-01:45pm	High altitude and lung diseases - An overview	Dr Badr Alghamdi (Saudi Arabia)	Dr Ravindranath
01:45pm-02:00pm	High altitude sickness and issues in pilgrims of Himalayas	Dr Rafi Ahmed Jan	Dr S K Sarkar
02:00pm-02:15pm	How to screen for fitness for high altitude or air travel	Dr Pankul Mangla	Dr Jyothi Belgam
02:15pm-02:30pm	Air travel and lung disease - An overview	Dr Brijesh Prajapat	Dr R Ramakrishna

KILLIAN HALL (DAY 3 - 3RD DECEMBER 2023)

TIMING	TOPIC	SPEAKER / PANELIST	CHAIRPERSON
ASTHMA SESSIONS			
08:30am-09:30am	Session 1: Pulmonary Eosinophilic Syndromes (Symposium)		
08:30am-08:45am	Measuring eosinophilia in clinical practice: Blood/sputum and BAL	Dr Angira Das Gupta	Dr Nalin Joshi
08:45am-09:00am	Clinical approach to a case of lung infiltrates and eosinophilia.	Dr Syamal Sarkar	Dr Manjari Tripathi
09:00am-09:15am	Role of Biologics in Non-asthmatic eosinophilic lung diseases	Dr Azmat Karim	Dr Suresh Koolwal
09:15am-09:30am	Tropical Pulmonary eosinophilia and its differentials	Dr Vidya Nair	
SLEEP SESSIONS			
09:30am-10:30am	Session 2: Interpreting a Sleep report : Looking beyond AHI (Symposium)		
09:30am-09:45am	Apnea and Hypopnea (The current definitions)	Dr Tripat Deep Singh	Dr Surender Reddy K
09:45am-10:00am	Oxygen Desaturation and related indices	Dr Mahismita Patro	Dr Prasanna Poorna
10:00am-10:15am	Arousal Index	Dr Tejas Suri	Dr Shashibhushan
10:15am-10:30am	Newer indices- REM and Positional OSA	Dr Khushboo Saxena	
INFECTIOUS DISEASES SESSIONS			
10:30am-11:30am	Session 3: Infections in a bronchiectatic patient (Symposium)		
10:30am-10:45am	Treating infections in bronchiectatic patients : Is it different?	Dr Amit Satish Gupta	Dr Aruna
10:45am-11:00am	Role of cough assist devices in treatment of bronchiectasis	Dr Ankit Bansal	Dr A Sreedhar

11:00am-11:15am	Nebulised Antibiotics- Role in Bronchiectasis	Dr Ankit Kumar Sinha	
11:15am-11:30am	Identifying and treating persistent colonizers	Dr R Narasimhan	Dr Venkateswarlu
BRONCHIECTASIS SESSIONS			
11:30am-12:30pm	Session 4: Investigations for bronchiectasis – The way forward (Symposium)		
11:30am-11:45am	Tests for diagnosing Primary Ciliary Dyskinesia	Dr Said Isse (UAE)	Dr Praveen
11:45am-12:00pm	Test for diagnosing Cystic fibrosis	Dr Debjyothi Bhattacharya	Dr Surinder Kumar
12:00pm-12:15pm	Tests for diagnosing ABPA	Dr Mir Elias Ali	Dr B M S Patrudu
12:15pm-12:30pm	Tests for diagnosing Immune deficiency disorders	Dr Pranav Ish	
PLEURA SESSIONS			
12:30pm-01:30pm	Session 5: Practice Changing Publications in Pleural Diseases		
12:30pm-12:45pm	Paper 1	Dr Paulo Varghese	Dr Chakradhar
12:45pm-01:00pm	Paper 2	Dr Poonguzhali Rajaji	Dr C H Raju
01:00pm-01:15pm	Paper 3	Dr Savita Jindal	
01:15pm-01:30pm	Paper 4	Dr Kishan Srikanth Juvva	Dr Ammaiyappan
CRITICAL CARE SESSIONS			
01:30pm-02:30pm	Session 6: Newer therapies in ICU		
01:30pm-01:45pm	Establishing ICU in rural India – How I do it?	Dr Raja Amarnath	Dr Suryanarayana Naidu
01:45pm-02:00pm	Stem cell therapy in ARDS- Current status	Dr Anurag Agrawal	Dr Anil Kumar
02:00pm-02:15pm	Artificial Intelligence – Role in ICU	Dr Dileep Raman	Dr Subba Rao S
02:15pm-02:30pm	Aerosol therapy in ICU- Principles and practice	Dr Manjunath	

PAINTAL HALL (DAY 3 - 3RD DECEMBER 2023)			
TIMING	TOPIC	SPEAKER / PANELIST	CHAIRPERSON
TUBERCULOSIS & NTM SESSIONS			
08:30am-09:30am	Session 1: Non- Tuberculous Mycobacteria (Symposium)		
08:30am-08:45am	NTM – Clinical Spectrum	Dr S K Sharma	Dr Banani Jena
08:45am-09:00am	Diagnostic Criteria & Tests in NTM	Dr Preetam Acharya	Dr Bhanu Rekha
09:00am-09:15am	Concepts In Treatment (MAC & M. Abscessus)	Dr Pragati Rao D	Dr R K Dewan
09:15am-09:30am	NTM- Where are we now and what the future holds?	Dr Doreen A Harris (USA)	Dr Madhu K
INFECTIOUS DISEASES SESSIONS			
09:30am-10:30am	Session 2: Vaccination for Respiratory Diseases (Symposium)		
09:30am-09:45am	Pneumococcal and Flu vaccine- True impact on prevention of Pneumonias	Dr Ved Prakash	Dr P M Ramesh
09:45am-10:00am	Newer Respiratory vaccines in pipeline (Focus on RSV vaccine)	Dr Kiran Vishnu	Dr Srikanth
10:00am-10:15am	Shingles Vaccine in COPD patients- Evidence & Utility	Dr Uma Shankar	Dr Mehboob Khan P
10:15am-10:30am	COVID vaccines in the post COVID era	Dr M G Krishna Murthy	
PULMONARY HYPERTENSION SESSIONS			
10:30am-11:30am	Session 3: Diffuse Alveolar Hemorrhage		
10:30am-10:45am	Causes and diagnosis of DAH	Dr Javid Malik	
10:45am-11:00am	Management strategies (new & old) for DAH	Dr Vidushi Rathi	

11:00am-11:30am	Case based Panel discussion on DAH		
	Moderator: Dr Javaid Malik Panellists: Dr Mir Faisal, Dr B P Rajesh, Dr Archana Mallick, Dr Gurraunaq Singh		
	Case 1: Infective DAH	Case Presenter: Dr Bhaskar K	
	Case 2: Auto-Immune DAH	Case Presenter: Dr Rishab Kackar	
ILD SESSIONS			
11:30am-12:30pm	Session 4: Lungs on Fire Session: Multidisciplinary discussion in ILD		
	Moderator: Dr Sujeet Rajan, Dr Ashfaq Hasan Panellists: Dr Yuvarajan, Dr Rajani S Bhat, Dr Debasish Behra, Dr Subin Ahmed Dr Eshwar Chandra, Dr Swetha Sethi		
11:30am-11:45am	PF-ILD	Dr Satish Chandra Reddy	
11:45am-12:00pm	Non fibrotic sub acute ILD	Dr Ashish Sinha	
12:00pm-12:15pm	ILD in ICU	Dr Swadip Mishra	
12:15pm-12:30pm	RA - ILD	Dr Sudin Koshy	
MISCELLANEOUS SESSIONS			
12:30pm-01:30pm	Session 5: Air Pollution and Lung Health		
12:30pm-12:45pm	House hold air pollution - Danger to lung health	Dr Pradyumna Sharma	Dr Prateek Kothari Dr R Sunil Kumar
12:45pm-01:00pm	Bronchial anthracofibrosis	Dr Ashok Shah	
01:00pm-01:15pm	Outdoor air pollution and impact on lung health	Dr M Sabir	
01:15pm-01:30pm	Strategies to minimize exposure to air pollution	Dr Mehul Shah	

BRONCHIECTASIS SESSIONS			
01:30pm-02:30pm	Session 6: Management strategies for bronchiectasis (Symposium)		
01:30pm-01:45pm	Airway clearance strategies	Dr Avya Bansal	Dr S Surya Prakash
01:45pm-02:00pm	Macrolides for bronchiectasis	Dr Gourahari Pradhan	Dr Srikant Kashinatmale Gaonkar
02:00pm-02:15pm	Mucolytes –oral and inhaled for bronchiectasis	Dr Yugandhar	Dr Deepak Bansal
02:15pm-02:30pm	Lung transplant for bronchiectasis	Dr Unmil Shah	



OSLER HALL (DAY 3 - 3RD DECEMBER 2023)

TIMING	TOPIC	SPEAKER / PANELIST	CHAIRPERSON
COPD SESSIONS			
08:30am- 09:30am	Session 1: Practice changing papers and landmark clinical trials in management of COPD in the last 3 years		
08:30am- 08:45am	Paper 1	Dr Deepak Prajapat	Dr Manoj Agarwal
08:45am- 09:00am	Paper 2	Dr Khurshid Dar	Dr Ankit Rathi
09:00am- 09:15am	Paper 3	Dr Sandhya Nair	Dr Amita Athavale
09:15am- 09:30am	Paper 4	Dr Pawan Gupta	Dr Francy Louis
CRITICAL CARE SESSIONS			
09:30am- 10:30am	Session 2: Safe Practices in ICU		
09:30am- 09:45am	Safe intubation in a patient with respiratory failure- Current practices	Dr Sheila N Myatra	Dr Mateenuddin
09:45am- 10:00am	Appropriate fluid management in Sepsis and ARDS	Dr Supradip Ghosh	
10:00am- 10:30am	Debate Oxygen therapy/targets in ICU- Less or More?? Debate Referee: Dr Rishab Raj, Dr Rajnish Gupta	Dr Dipesh Maskey (Less) Dr Puneet Saxena (More)	
ILD SESSIONS			
10:30am- 11:30am	Session 3: Recent practice changing publications in ILD (2021-2023) : Year in review		
10:30am- 10:45am	Idiopathic Pulmonary Fibrosis	Dr Anshuman Mukhopdhyay	Dr Pritam Chhotrey
10:45am- 11:00am	Sarcoidosis	Dr Nishant Sinha	Dr Linija K L

11:00am-11:15am	CTD-ILD	Dr Davis Paul	Dr Varun Rajpal
11:15am-11:30am	PF-ILD	Dr Bharat Toshniwal	Dr Sailendra
INTERVENTIONAL PULMONOLOGY SESSIONS			
11:30am-12:30pm	Session 4: Infection control and bronchoscope care in the bronchoscope unit		
11:30am-11:45am	Negative pressure bronchoscope room – Setting it up	Dr Sourabh Pahuja	Dr. Nalini Jayanthi Dr. Aparna Chatterji Dr. Deepak T H Dr. Lokesh Verma
11:45am-12:00pm	Bronchoscope care – How I do it?	Dr Anand Vijay	
12:00pm-12:15pm	Preventing transmission of infections in the bronchoscopy suite	Dr Sunil Kumar K	
12:15pm-12:30pm	Role of interventional pulmonologist post lung transplant.	Dr Chetan Rao V	
TUBERCULOSIS & NTM SESSIONS			
12:30pm-01:30pm	Session 5: Trouble-shooting in a patient with ATT adverse effects (Panel Discussion)		
12:30pm-01:30pm	Moderator: Dr M M Puri Panellists: Dr Santosh Kumar, Dr A D Shukla, Dr K P Singh Dr. Sathish Chandra, Dr K Venkateswara Rao		
	Case 1: Patient with Hepatitis & Recurrent vomiting Case 2: Patient with Vision Disturbances Case 3: Patient with Seizure Case 4: Patient with Joint & Muscle Pains	Dr Vani Dr Deepika Dr Rakesh Kodati Dr Sudheera N	



SLEEP SESSIONS			
01:30pm-02:30pm	Session 6: Prescribing PAP device - What you should know		
01:30pm-01:45pm	CPAP interface - Choosing the correct one for my patient	Dr Rajkrishnan S	Dr Satyanarayan
01:45pm-02:00pm	Newer modes of BiPAP - iVAPS, AVPAPS and others.	Dr Avishek Kar	Dr A Satya Prasad
02:00pm-02:30pm	Debate Which is the better mode for my OSA patient : Auto CPAP vs Manual CPAP Debate Referee: Dr Abhishek Goyal, Dr Bhaskar K	Dr Ajay Godse Vs Dr Vamsi Krishna	



ROBERT KOCH HALL (DAY 3, 3rd DECEMBER 2023)

TIMING	OP ID	TOPIC	PRESENTER
8:30am-10:30am	SESSION : 1 NAPCON AWARD		
8:30am-8:40am	OP 69	A STUDY ON COMPARISON BETWEEN DECAF AND MODIFIED DECAF SCORES IN PREDICTING IN-HOSPITAL MORTALITY RATES IN ACUTE EXACERBATION OF COPD.	<i>Dr Moganti Veera Lakshmi Aparna</i>
8:40am-8:50am	OP 70	COMPARISON OF ASTHMA CONTROL IN PATIENTS USING INHALATIONAL CORTICOSTEROIDS AND LONG ACTING BETA 2 AGONISTS DELIVERED BY PRESSURIZED METERED DOSE INHALERS VERSUS DRY POWDER INHALERS	<i>Dr Harshitha Madanapalli</i>
8:50am-9:00am	OP 71	PREDICTING PROGNOSIS IN PATIENTS PRESENTING WITH ACUTE EXACERBATION OF COPD BY USING CAUDA 70 SCORE	<i>Dr Aryasree V M</i>
9:00am-9:10am	OP 72	PLATELET NUMBERS AND INDICES AS PROGNOSTIC BIOMARKERS IN CHILDREN UNDER 5 WITH TUBERCULOSIS IN INDIA	<i>Dr Nancy Hilda</i>
9:10am-9:20am	OP 73	USE OF CURB-65 AND NEWS2 SCORES VERSUS MGAP SCORE TO PREDICT MORTALITY IN INTERSTITIAL LUNG DISEASE PATIENTS HOSPITALISED WITH ACUTE RESPIRATORY DETERIORATION	<i>Dr Aardra Dutt</i>

9:20am-9:30am	OP 74	IDENTIFYING DIFFERENT CLINICAL PHENOTYPES OF OBSTRUCTIVE SLEEP APNEA: A CLUSTER ANALYSIS	<i>Dr Tushar Nijhara</i>
9:30am-9:40am	OP 75	COMPARISON OF PREOPERATIVE RISK INDICES USING VARIOUS SCORING SYSTEMS IN DETERMINING POST-OPERATIVE PULMONARY COMPLICATION	<i>Dr K. Rajamani</i>
9:40am-9:50am	OP 76	CLINICAL AND FUNCTIONAL CHARACTERISTICS OF ASTHMA–CHRONIC OBSTRUCTIVE PULMONARY DISEASE OVERLAP IN A TERTIARY CARE CENTRE IN WESTERN MAHARASHTRA “ A CROSS SECTIONAL STUDY	<i>Dr Utkarsh Suyal</i>
9:50am-10:00am	OP 77	PREDICTING FACTORS FOR CHRONIC COLONISATION OF PSEUDOMONAS AERUGINOSA IN BRONCHIECTASIS	<i>Dr Yeluri Raj Vivek</i>
10:00am-10:10am	OP 78	COMPARISON OF THE ASSOCIATION OF BAL CBNAAT ON THE BASIS OF CYCLE THRESHOLD VALUE WITH TIME TO CULTURE POSITIVITY	<i>Dr Tangella Rajeev</i>
10:10am-10:20am	OP 79	INVASIVE VS NON-INVASIVE DIAGNOSTIC APPROACHES FOR MICROBIOLOGICAL DIAGNOSIS OF HOSPITAL ACQUIRED PNEUMONIA	<i>Dr Soumya Biswas</i>



10:20am-10:30am	OP 80	CLINICAL AND BACTERIOLOGICAL PROFILE OF PATIENTS ON TRACHEOSTOMY AT A TERTIARY CARE CENTRE IN SOUTH INDIA— AN ANALYTICAL STUDY	<i>Dr Sravan Kumar</i>
10:30am-10:40am	OP 96	ACCURACY OF THE CAPTURE QUESTIONNAIRE IN POPULATION SCREENING FOR COPD	<i>Dr Dhara Thakrar</i>
10:40am-10:50am	OP 97	MELIOIDOSIS : A NEW EMERGING INFECTION IN WEST COASTAL MAHARASHTRA	<i>Dr Preetham Napa</i>
10:50am-11:00am	OP 98	ALLERGEN SENSITIVITY PATTERN AND ITS CORRELATION WITH TOTAL IGE LEVELS AND EOSINOPHIL COUNT AMONG PATIENTS WITH ALLERGIC RHINITIS AND/OR ASTHMA IN NORTH KARNATAKA	<i>Dr Bokka Likhitha</i>
11:00am-11:10am	OP 99	FEASIBILITY OF HOME-BASED PULMONARY REHABILITATION FOR INDIVIDUALS WITH IDIOPATHIC PULMONARY FIBROSIS IN DELHI, INDIA.	<i>Dr Dr. Humaira Hanif (Pt)</i>
11:10am-11:20am	OP 100	ROLE OF PLEURAL FLUID NEUTROPHIL TO LYMPHOCYTE RATIO IN THE EVALUATION OF PLEURAL EFFUSION	<i>Dr Vuduthala Likhitha</i>
11:30am-2:00pm	SESSION : 2 NAPCON AWARD		
11:30am-11:40am	OP 81	HOW INFALLIBLE IS LIPS[LUNG INJURY PREDICTION SCORE] IN ARDS	<i>Dr Gunti Yashwanth</i>

11:40am- 11:50am	OP 82	FACTORS PREDICTING FAILURE OF CPAP IN OBSTRUCTIVE SLEEP APNEA PATIENTS	<i>Dr Challa Siva</i>
11:50am- 12:00pm	OP 83	AGREEMENT BETWEEN CLINICORADIOLOGICAL AND HISTOPATHOLOGICAL DIAGNOSIS IN INTERSTITIAL LUNG DISEASE	<i>Dr Vivek N Vijay</i>
12:00pm- 12:10pm	OP 84	COMPARISON OF PEARL SCORE WITH ADO BODEX FOR PROGNOSIS AND PREDICTION OF 90 DAYS READMISSION DEATHS AFTER HOSPITALISATION WITH AECOPD	<i>Dr P P Siva Rama Krishna</i>
12:10pm- 12:20pm	OP 85	LEVEL 1 POLYSOMNOGRAPHY VS LEVEL 3 POLYGRAPHY PLUS ACTIGRAPHY ON CLINICAL DECISION MAKING IN OBSTRUCTIVE SLEEP APNEA PATIENTS: AN INTERIM ANALYSIS	<i>Dr Prakash S</i>
12:20pm- 12:30pm	OP 86	A STUDY ON CASES OF MALIGNANT PLEURAL EFFUSION WITH SPECIAL REFERENCE TO ETIOLOGY, RISK STRATIFICATION AND THERAPEUTIC OUTCOME (ORAL PRESENTATION)	<i>Dr Ankita Chakraborty</i>



12:30pm- 12:40pm	OP 87	THE USEFULNESS OF NEUTROPHIL TO LYMPHOCYTE RATIO AND PLATELET TO LYMPHOCYTE RATIO TO ASSESS SEVERITY OF PULMONARY TUBERCULOSIS: A RETROSPECTIVE STUDY	<i>Dr Prerna Galhotra</i>
12:40pm- 12:50pm	OP 88	EFFECT OF METHYCOBALAMIN ON PFT OF PEOPLE WITH COPD AND DIABETES	<i>Dr Sanjay Sud</i>
12:50pm- 1:00pm	OP 89	FENO WITH IOS AND SPIROMETRY " AN IMPROVED DIAGNOSTIC TOOL	<i>Dr Rajat Kumar Mishra</i>
1:00pm- 1:10pm	OP 90	PREVALENCE OF FUNGAL SENSITIZATION IN NEWLY DIAGNOSED AND FOLLOW UP ASTHMA PATIENTS IN A TERTIARY CARE TEACHING HOSPITAL	<i>Dr Leon Vinoth Kumar J</i>
1:10pm- 1:20pm	OP 91	AEROALLERGEN SENSITIVITY PATTERN AMONG PATIENTS WITH NASOBRONCHIAL ALLERGY AND ITS ASSOCIATION WITH DISEASE SEVERITY- A CROSS SECTIONAL STUDY	<i>Dr Dr Athulya S</i>
1:20pm- 1:30pm	OP 92	MORTALITY TRENDS IN RURAL SOUTHERN INDIAN POPULATION: INSIGHTS FROM BIOMASS AND SMOKING EXPOSURE " MUDHRA COHORT STUDY	<i>Dr Greeshma M V</i>



<p>1:30pm- 1:40pm</p>	<p>OP 93</p>	<p>FACTORS ASSOCIATED WITH FAILURE OF NON-INVASIVE VENTILATION IN CHRONIC OBSTRUCTIVE PULMONARY DISEASE WITH TYPE 2 RESPIRATORY FAILURE</p>	<p><i>Dr Maliakal Mala M K Avarachan</i></p>
<p>1:40pm- 1:50pm</p>	<p>OP 94</p>	<p>TITLE: METABOLIC AND CARDIOVASCULAR COMPLICATIONS IN OBSTRUCTIVE SLEEP APNEA PATIENTS: A DESCRIPTIVE STUDY.</p>	<p><i>Dr Ayush Jain</i></p>
<p>1:50pm- 2:00pm</p>	<p>OP 95</p>	<p>CLINICO-RADIOLOGICAL, LABORATORY AND FUNCTIONAL PROFILE OF CHRONIC PULMONARY ASPERGILLOSIS PATIENTS TREATED AT A TERTIARY CARE CENTRE IN WESTERN MAHARASHTRA- A PROSPECTIVE STUDY</p>	<p><i>Dr Jyothis M C</i></p>



YELLA PRAGADA HALL (FREE POSTER PRESENTATION)					
E-POSTER SESSION	GROUP AND TIME	DAY 1 1st DEC 2023 E-POSTER NUMBERS	DAY 2 2nd DEC 2023 E-POSTER NUMBERS	DAY 3 3rd DEC 2023 E-POSTER NUMBERS	SCREEN NUMBER
E Poster Session 1					
8:30- 10:30am	A) 8:30-9:00am	1-30	361-390	721-750	1-30
	B) 9:00-9:30am	31-60	391-420	751-780	1-30
	C) 9:30- 10:00am	61-90	421-450	781-810	1-30
	D) 10:00- 10:30am	91-120	451-480	811-840	1-30
10:30- 11:30am		ORATION	ORATION		
E Poster Session 2					
11:30- 1:30pm	E) 11:30- 12:00pm	121-150	481-510		1-30
	F) 12:00- 12:30pm	151-180	511-540		1-30
	G) 12:30- 1:00pm	181-210	541-570		1-30
	H) 1:00-1:30pm	211-240	571-600		1-30
1:30- 2:00pm	LUNCH				
2:00- 3:00pm		ORATION	ORATION		
E Poster Session 3					
3:00- 5:00pm	I) 3:00-3:30pm	241-270	601-630		1-30
	J) 3:30-4:00pm	271-300	630-660		1-30
	K) 4:00-4:30pm	301-330	661-690		1-30
	L) 4:30-5:00pm	331-360	691-720		1-30



NOTES



Oration

ICS - Dr. KJR Murty Oration Award



Dr KJR Murthy Oration Award

Diagnostic Thinking in Respiratory Medicine: A systematic approach



Dr. Ashfaq Hassan

Dr Ashfaq Hasan is currently Principal of the Deccan College of Medical Sciences, Hyderabad where he is also a Professor in Department of Pulmonary Medicine. He has over three decades of clinical experience in the field of Pulmonary Medicine.

Dr Hasan is an enthusiastic teacher of both undergraduate and postgraduate students of Medicine, a passionate writer, and a frequent speaker at medical meetings. He has given over 400 lectures to date, mostly at updates and peer-group academic fora.

He has a strong academic background. He has about eighty publications with about 400 citations, and three books to his name. Two of his books have been published by Springer-Verlag UK, and are now in their second edition. Both these books have been translated into Polish (by Prof. Dariusz Maciejewski, Head of the School of Mechanical Ventilation, Warsaw, Poland) as well as into Russian, and are currently being translated into other languages.

Dr Ashfaq Hasan has been Chief Editor of the Journal of Medical and Allied Sciences (an indexed journal) for the last 10 years. He also served on the Editorial board of several national journals including Chest India.

Dr Hasan serves on the board of trustees of a privately funded, non-denominational organization that focuses on primary and community healthcare of underprivileged individuals, especially women and children.



Oration

ICS - Dr O A Sharma Oration Award



O.A. Sarma Oration Award

Tuberculosis!!! Past Present Future



Dr. Vikas Oswal

Dr Vikas Oswal holds the position of National trainer, Sub-committee member & National technical expert of National Tuberculosis Elimination Program (NTEP), INDIA. He is also Chairperson of two DOTS PLUS SITE VI- MDR TB OPD at Mumbai. He has a teaching experience of more than 15 years. He has been faculty for PMDT trainings across India. He has conducted more than 250 training sessions for all the medical officers, district TB officers and chest physicians across the country under NTEP and ICS.

To his credit he has conducted more than 100 "Training of trainers (TOT)" training sessions for PMDT guidelines, sensitization and training sessions for Programmatic management of DR-TB for all the trainers across the country along with all WHO consultants under NTEP. His work and contribution have been recognized and acknowledged by Ministry of Health & Family Welfare, GOI. He has been recently selected as a member of sub-committee National technical expert member as a National Technical Expert for DR-TB in India by Central TB division, India.

Dr Vikas Oswal is one of the Authors of latest Guidelines on "Programmatic Management of Drug Resistant Tuberculosis" and also of 2014, 2019 and 2021 guidelines. He has also contributed in the policy making and formation of the latest guidelines 2023 in pipeline for getting rolled out in India. He has contributions in editing of the latest version of "Standard for TB care In India", second edition March - 2022, National Tuberculosis Elimination Programme.

Dr Oswal has a strong background in research with over more than 85 peer reviewed national and international journals publications. He was invited for a Global Meeting of the working group on Private - Public Mix (PPM) for TB care and prevention 23rd to 25th November 2020 by Stop TB partnership & World health Organization

Dr Vikas Oswal has his contributions in National Trials

1. Site Principal Investigator for Modified BPaL, National trial sponsored and conducted by ICMR, Chennai.
2. Site Principal Investigator for BPaL-M, National trial sponsored and conducted by ICMR, Delhi.
3. Instrumental to start newer drugs like Bedaquiline and Delamanid on OPD basis under the programmatic management in treatment of DRTB for the first time.

Dr Vikas Oswal is active in social services too with Darshan GIVA (Good Initiative Voluntary Actions) foundation as his own NGO – a Nikshay Mitra arranging and contributing TB patients for food and nutrition. He has adopted many TB patients for their educational sponsorship.

He has conducted many plays and skits on streets as well as in schools to spread the awareness and educating the mass for Tuberculosis.

Summary of the Oration talk:

"In this prestigious oration, I will take you on a journey through the history, current status, and future prospects of tuberculosis.

We will explore the origins of this ancient disease, its impact on society in the past, and the remarkable progress made in its diagnosis and treatment in recent years.

Additionally, we will delve into the challenges that still exist in the fight against tuberculosis, such as drug resistance and access to healthcare, and discuss promising developments in research and global efforts to eradicate this deadly disease.

By the end of this talk, you will have a comprehensive understanding of tuberculosis, from its historical significance to the ongoing efforts to control and ultimately eliminate it."



Oration

ICS - CV Ramakrishnan Oration Award



C V Ramakrishnan Oration Award

Post-tuberculosis lung disease: An overlooked entit



Dr Deependra Kumar Rai
Professor & Head, Pulmonary Medicine, AIIMS Patna

Post-tuberculosis lung disease (PTLD) has been overlooked for the past several years and research mainly focussed on newer diagnostic tests and treatments of tuberculosis. This is now changing: the last decade has seen a renewed focus on the burden and damaging impact of the long-term sequelae of tuberculosis disease, for individual patients, their households, and their communities. Post-TB sequelae are considered chronic lung diseases associated with frequent hospital visits for symptoms like cough, dyspnoea, wheezing, or hemoptysis. PTLD is defined as 'Evidence of chronic respiratory abnormality, with or without symptoms, attributable at least in part to previous tuberculosis.[1]. Abnormality could be in the form of abnormal spirometry or residual abnormality on imaging. PTLD possibly occurs due to the interplay between direct damage caused by the tuberculosis organism in the lower respiratory tract and the host immune response. These processes result in airway distortion, reduced lung elasticity, destruction of the muscular components of bronchial walls, or damage to the lung parenchyma and vasculature. All these lead to changes in lung pathology, anatomical distortion on imaging, and abnormal respiratory physiology which may be detected as abnormal spirometry, altered lung volumes, and impaired diffusing capacity. Emerging data suggest a high burden of residual morbidity and mortality among tuberculosis survivors, even after treatment completion. An estimated 18-87% of the patients with pulmonary tuberculosis (TB) experience lung impairment and may have a mortality risk up to three times that of the general population.[2]. In our study, radiological lung sequelae were found in 72% of 128 patients who completed treatment for Pulmonary tuberculosis. There was also an observation that patients with extensive radiological involvement and smear positivity for Acid fast bacilli (AFB) were associated with increased incidence of radiological lung sequelae.[3]. Post-TB sequelae may be as structural complications (such as bronchiectasis, residual cavitation, chronic obstructive pulmonary disease [COPD]), chronic pulmonary aspergillosis (CPA), non-tubercular mycobacterial infections, pneumonia, or psychosocial morbidities (such as anxiety, depression, financial burden). Despite this growing body of data, accurate estimates of the global burden and morbidity associated with PTLD remain limited for our country. Such estimates have been hampered by the diverse clinical spectrum of PTLD presentations, the limited correlation between physiological, radiological, symptom, and outcome data with different ways of measuring disease, and heterogeneous case definitions. Adult Pulmonary TB survivors have 2 to 4-fold higher odds of persistently abnormal spirometry (airway obstruction and restriction) compared with those without previous TB disease, with parenchymal and airway abnormalities seen on imaging, associated respiratory symptoms, and reduced quality of life [4].

References

1. Allwood BW, van der Zalm MM, Amaral AFS, Byrne A, Datta S, Egere U, et al. Post tuberculosis lung health: perspectives from the First International Symposium. *Int J Tuberc Lung Dis*. 2020 Aug 1;24(8):820–8.
2. Romanowski K, Baumann B, Basham CA, Ahmad Khan F, Fox GJ, Johnston JC. Longterm all-cause mortality in people treated for tuberculosis: a systematic review and meta-analysis. *Lancet Infect Dis*. 2019 Oct;19(10):1129–37.
3. Kumar Rai D, Kumar R. Identification of risk factors for radiological sequelae in patients treated for pulmonary tuberculosis: Prospective observational cohort study. *Indian J Tuberc*. 2020 Oct;67(4):534–8.
4. Meghji J, Lesosky M, Joekes E, Banda P, Rylance J, Gordon S, Jacob J, Zonderland H, MacPherson P, Corbett EL, Mortimer K, Squire SB. Patient outcomes associated with post-tuberculosis lung damage in Malawi: a prospective cohort study. *Thorax*. 2020 Mar;75(3):269-278. doi: 10.1136/thoraxjnl-2019-213808



Oration

NCCP(I) - Prof. P. S. Shankar

Prof. K. C. Mohanty Chest Oration



Prof. P. S. Shankar – Prof. K. C. Mohanty Chest Oration

Exploring Current Trends and Future Directions in Pulmonology



Dr Mohankumar Thekkinkattil
MD, DPPR, FCCP, FAPSR, FAARC
Senior Consultant Pulmonologist,
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Environmental lung diseases present complex challenges for pulmonologists, requiring a nuanced understanding of their origins, prevention strategies, and advanced medical interventions. In this article, we delve into these diseases from a pulmonologist's perspective, examining the diverse etiological factors, clinical manifestations, preventive measures, and cutting-edge treatments that shape our approach to managing these conditions effectively.

Understanding the Diverse Aetiology

Asthma: Pulmonologists recognize asthma as a multifactorial disease, with genetic predisposition and environmental factors playing pivotal roles (1). Identifying specific triggers, such as airborne allergens and pollutants, is crucial in tailoring individualized treatment plans.

Chronic Obstructive Pulmonary Disease (COPD): COPD, commonly caused by long-term exposure to irritants like cigarette smoke and occupational dust, is a major concern for pulmonologists (2). Genetic susceptibility and air pollution exacerbate the disease, emphasizing the need for comprehensive patient assessment.

Pneumoconiosis: Pulmonologists recognize the importance of occupational history in diagnosing pneumoconiosis. Regular exposure to mineral dust, asbestos, and silica demands meticulous evaluation and preventive counselling (3).

Hypersensitivity Pneumonitis: Pulmonologists are vigilant about recognising the signs of hypersensitivity pneumonitis, often seen in specific occupational settings. Early diagnosis and meticulous allergen avoidance are essential to prevent disease progression (4).

Prevention and Advanced Management Strategies

Personalized Prevention Plans: Pulmonologists advocate for tailored prevention strategies, emphasizing allergen avoidance, smoking cessation, and workplace safety protocols. Patient education and empowerment are pivotal in reducing exposure risks (5).



Advanced Diagnostic Tools: Pulmonologists leverage advanced diagnostic techniques, including high-resolution computed tomography (HRCT) and pulmonary function tests, to assess disease severity accurately (6). Early diagnosis enables timely intervention and improved patient outcomes.

Biological Therapies: Recent advancements in immunotherapy offer promising avenues for managing environmental lung diseases. Pulmonologists explore targeted biological therapies, addressing specific inflammatory pathways and providing personalized treatment options for patients (7).

Interdisciplinary Collaboration: Pulmonologists collaborate closely with researchers, allergists, and occupational health specialists to enhance understanding and treatment modalities. Interdisciplinary approaches foster comprehensive patient care, integrating diverse perspectives and expertise (8).

Exploring Current Trends and Future Directions in Pulmonology

Environmental lung diseases continue to challenge pulmonologists, necessitating a deep understanding of their origins, prevention strategies, and advanced treatment options. This article offers insights from a pulmonologist's perspective, focusing on the multifaceted nature of these diseases and discussing innovative approaches in diagnostics, prevention, and management. Moreover, it explores the evolving landscape of environmental lung diseases, highlighting promising future directions in pulmonary medicine.

Understanding the Diverse Aetiology in the New Era

Genetic and Environmental Interplay: Pulmonologists delve into the intricate interplay between genetic predisposition and environmental factors, recognizing the significance of personalized medicine in tailoring treatment plans (9).

Advances in Imaging: Cutting-edge imaging techniques, including functional magnetic resonance imaging (fMRI) and positron emission tomography (PET) scans, enable pulmonologists to visualize lung function and assess disease progression with unprecedented accuracy (10).

Immunogenetics and Precision Medicine: Research in immunogenetics paves the way for targeted therapies, allowing pulmonologists to tailor treatments based on patients' genetic profiles. Precision medicine holds immense promise in optimizing outcomes for individuals with environmental lung diseases (11).

Prevention, Management, and Future Strategies

Digital Health and Telemedicine: Pulmonologists increasingly embrace digital health solutions and telemedicine platforms to monitor patients remotely, ensuring timely interventions and personalized care. Wearable devices and mobile applications empower patients to actively participate in managing their lung health (12).

Nanotechnology and Drug Delivery: Nanotechnology offers novel drug delivery systems, enabling targeted and controlled release of medications to affected lung areas. Pulmonologists explore nanomedicine's potential to enhance drug efficacy while minimizing systemic side effects (13).



Artificial Intelligence (AI) and Machine Learning: AI-driven algorithms analyse vast datasets, aiding pulmonologists in early disease detection, prognostication, and treatment optimization. Machine learning models predict disease trajectories, enabling personalized interventions and improving patient outcomes (14).

Embracing the Future

As we stand at the crossroads of medical innovation, pulmonologists are at the forefront of revolutionizing environmental lung disease management. By leveraging advances in genetics, imaging technologies, digital health, nanotechnology, and artificial intelligence, pulmonologists are poised to deliver precise, patient-centred care. The future of pulmonary medicine holds the promise of earlier and more accurate diagnoses, personalized treatments, and improved patient outcomes.

By embracing these innovative strategies and fostering collaborative research efforts, pulmonologists are not only transforming the lives of individuals affected by environmental lung diseases today but are also shaping a healthier, more resilient future for generations to come.

Conclusion

Pulmonologists play a pivotal role in understanding, preventing, and managing environmental lung diseases. Through a holistic approach encompassing personalized prevention plans, advanced diagnostic tools, and innovative therapies, pulmonologists strive to improve patients' quality of life. Interdisciplinary collaboration, continuous research, and patient education are fundamental in addressing the challenges posed by environmental lung diseases. As we move forward, the concerted efforts of pulmonologists and allied healthcare professionals are essential in alleviating the burden of these diseases on individuals and communities.

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Oration

**NCCP(I) - Prof. R. Viswanathan
Memorial Chest Oration**



Prof. R. Viswanathan Memorial Chest Oration

My journey with COPD



Prof (Dr) Narayan Mishra

Three years before my entry to medical education i.e. in 1965, William Briscoe, coined the term "COPD" for the first time and it was discussed at the 9th Aspen Emphysema Conference. This term got the recognition and today we refer to COPD as a disease which is a burning problem across the world. Prior to this for more than 200 years this entity was described with the terms- bronchitis, emphysema and asthmatic bronchitis. Chronic bronchitis was defined as chronic cough lasting at least three months for at least two years and emphysema as enlarged alveolar spaces and alveolar walls (CIBA Guest Symposium 1959 & ATS 1962). Diagnosis for Chronic Bronchitis (British/European) was based on symptoms whereas emphysema (American) was based on radiology/autopsy. As a young medico, I started growing with the knowledge that COPD is caused by smoking, can be diagnosed by history, clinical examination and a chest x-ray and the therapy on those days was antibiotic, mucous thinner (potassium iodide), bronchodilator (Ephedrine, Theophylline, β_2 agonist Isoproterenol) and almost never used Corticosteroid and Oxygen. The commonly used short acting β_2 Salbutamol came to lime light around 1980s. Though spirometer was invented by John Hutchison in 1846, in those days it was not in use for diagnosis of COPD.

When I joined the Department of TB & Chest Disease in in the year 1978, one of my teacher and colleague said – "it is a futile attempt to treat cases of COPD and it is not worth treating them". When I look back it is astonishing that how first things have developed and given me a chance to learn and help the people to have a better quality of life. By the end of 20th century, the diagnostic criteria of COPD (post bronchodilator FEV1/FVC = <70%) was well established, mechanism of inflammation was well understood with newer insight of causative agents other than smoking (dust, pollution bio-mass fuel use etc). Researchers were convinced that all inflammation are not neutrophilic and in some cases eosinophil plays a vital role. Simultaneously newer drugs & modalities came to existence like- new anticholinergic (ipratropium), long acting β_2 agonist (salmeterol & formoterol), anti-inflammatory drugs (corticosteroids, chemokine inhibitors, leukotriene B4 inhibitors , phosphodiesterase inhibitors- theophylline/aminophylline, other neutrophilic inhibitors- macrolides like erythromycin/azithromycin/ roxythromycin, surfactant), antiprotease, mediator antagonists- N-acetyl cysteine, pulmonary vasodilators, mucoregulators, delivery systems- metered dose inhalers or dry powdered inhalers, use of O₂, use of ventilators, ideas of possible surgeries.

Today the consensus global definition (GOLD 2024 report) defines COPD as a heterogeneous lung condition characterized by chronic respiratory symptoms (dyspnea, cough, sputum production and/or exacerbations) due to abnormalities of the airways (bronchitis, bronchiolitis) and/or alveoli (emphysema) that cause persistent, often progressive, airflow obstruction.

In late 1990s, the National Heart Lung and Blood Institute (NHLBI) and WHO planned to develop the Global Initiative for Chronic Lung Disease (GOLD) to frame a global strategy basing on evidence based science for the Diagnosis, Management and Prevention of COPD. The 1st GOLD strategy report was published in 2001, then it is updated annually and revised every 5 years. The main aim of 2001 GOLD Report was to have global networking of distinguished individual professionals and organizations and to involve the experts from the field of respiratory medicine, epidemiology, socioeconomic, public health, and health education. At the same time it was realized that it will be just a consensus global guideline, but it is impossible to make the same guideline for all countries as the local scenario varies.

GOLD 2001 for the first time introduced the classification of severity with 5 categories (Grade 0-at risk, Grade 1-Mild, Grade 2- Moderate, Grade 3 Moderate with 2 variants, Grade 4- Severe) & subsequently in 2006 Grade- 0 lost its validity and since then this classification is extensively used as a nick name GOLD 1234 (Mild, Moderate, Severe, and Very severe). Initially therapeutic recommendation was based only on this classification and later on it was realized that Symptoms & Exacerbation are 2 important outcomes of COPD apart from the severity classification and GOLD 2011 came out with GOLD ABCD classification. It included mMRC or CAT score assessment to quantify symptom and numbers of exacerbation and or hospitalization. Further in due course of time the evidences suggested that exacerbation history is more relevant than the level of airflow limitation and in 2017 GOLD report the severity classification was separated from symptom and exacerbation components and pharmacological treatment was based on 2 later components. There is further evolution of evidences which indicates that exacerbation history is of much more important and it is independent of level of symptoms of the patient and therefore 2023 GOLD & 2024 update suggested GOLD ABE assessment tool (by merging C & D to a single group termed as E). Spirometric assessment is still of paramount importance for diagnosis, follow up, to find out rapid decliner and to take decision for non-pharmacological management.

Broadly, bronchodilators are the corner stone of the management of COPD which starts with- a bronchodilator to – LABA + LAMA to – LABA + LAMA + ICS (if eosinophil \geq 300) with Roflumilast & Macrolides as add on therapy depending on group of patient along with treatment for comorbidities, smoking cessation/avoidance of risk factors, vaccinations (Flu & Pneumococcal), O₂ therapy, Pulmonary rehabilitation, use of ventilators, Lung volume reduction surgery, immune-modulatory drugs and so on depending on the situation. During follow up treatment can be escalated/de-escalated basing on the predominant symptoms of breathlessness and exacerbations.



Keeping the basic ideas of GOLD guideline, Indian guidelines was framed in 2013 which was simple with practical recommendations in all aspects because of its vast differences in availability and affordability of health care system. COPD categorization was simplified to Mild, Moderate and severe with the help of post BD FEV1 %, mMRC score, and exacerbation / complications. Suggestion of treatment started with SABA/SAMA prn to- LAMA/LABA to- LABA + ICS/ LABA + LAMA +ICS with add on therapy of Methyl xanthine to Moderate and severe category.

With the in-depth understanding of the disease, many Treatable Traits have been found out with the knowledge of Genotype (the genetic background of the individual), Endotype (biological events that enables and restricts reactions), Phenotype (clinical expression of disease - symptoms, response to treatment, frequent exacerbation, rate of disease progression or death) which cannot be assessed by spirometry, radiology or clinical examination. Therefore, MultiOMICS analysis are coming in to picture. OMICS refers to a field of study in biological sciences that ends with -omics, such as genomics, transcriptomics, proteomics, and metabolomics etc.

Coming to prevention the risk factors which varies from place to place and person to person are to be identified and proper action to be taken. An Indian study (INSEARCH) revealed that 59% of chronic bronchitis patients never smoked and other factors like biomass fuel (more in rural) and air pollution (in certain urban) areas are important factors apart from smoking

Memorable events of my journey

- Do not believe blindly, unless it is evidence based. IN 1978, when I joined the TB & Chest Department of Medical College, one of my teacher and colleague said – “it is a futile attempt to treat cases of COPD and it is not worth treating them” which created inquisitiveness in me.
- During 1994-97 we conducted a longitudinal randomized control trial to study “Effectiveness of Ipratropium Bromide in Chronic Bronchitis” (The Antisept., Vol., 96, No.3, Mar, 99, P.86-89.)
- When Pneumococcal polysaccharide vaccine PPSV23 came to use in India, in our institution during 1999-2001 we studied the “Role of Polyvalent Pneumococcal Vaccine on the morbidity pattern of COPD cases” to prove its efficacy.
- Got a chance to work as the chief investigator of Odisha as a part of ICMR sponsored study (2007-2009) INSEARCH (Indian Study on Epidemiology of Asthma, Respiratory Symptoms and Chronic Bronchitis), to work in the field areas in rural and urban sector and I witnessed the real risk factors for COPD in our country, where 59% never smoked and Biomass fuel and pollution were important culprits.
- During 2012-13, it was a pleasant task to be a part of “Guide line for Diagnosis and management of Chronic Obstructive Pulmonary Diseases Joint ICS/ NCCP (I) Recommendation” as a working committee member.
- In 2016 I was a working committee member for- “Joint Indian Chest Society-National College of Chest Physicians (India) guidelines for spirometry” which included recommendations for COPD
- It was proud privilege to be a part of “Clinical practice guidelines 2019: Indian consensus-based recommendations on influenza vaccination in adults” which included suggestions for COPD cases

- In 2020 during the COVID pandemic period we came out with “Post-COVID-19 Respiratory Management: Expert Panel Report”

Most rewarding & satisfying features of my journey

Since 1994 I started my mission for Anti-Tobacco movement among teen agers particularly in institutions and of late among slum dweller for refraining them from biomass fuel use in addition to tobacco. Till date, completed 647 participatory workshop with audiovisual aid and 74 rallies in 4 states (Odisha, M.P, Chhattisgarh, and Delhi). Conducted an Anti-Tobacco Rally on World Cancer Day (04.02.2009) with more than 10,000 students at Berhampur City which was the largest of its kind in the world and was placed in the **Limca Books of Records** which is a land mark in my journey.

Important learning points for me during my journey

- COPD is a Preventable and Treatable entity and as a physician, our role is not to treat only but to give emphasis on prevention too.
- In India 59% of Chronic Bronchitis patients are never smoker.
- For diagnosis of COPD, PFT is the gold standard. Though spirometer is invented since 1846, it is very much under used leading to too much of under diagnosis or wrong diagnosis as bronchial asthma leading to catastrophes in management.
- Consensus global guideline (GOLD) is framed for diagnosis, management, and prevention which is revised and updated periodically. It is not a binding for all countries to follow it as the local scenario varies, but should follow the National guidelines, if there is any.
- Now with advent of newer research, we will have to think out of the box and look for precision medicine as all COPD cases are not the same and all cannot be fitted in to one-size-fit-format

Acknowledgement:

I profusely thank ICS, NCP (I), my mentors, Collogues and my patients for giving me an opportunity to work and learn about COPD. My special thanks to Mrs. Asha Mishra (my wife) who has given whole hearted support and assistance for my long journey of Ant-Tobacco movement

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Oration

NCCP(I) - Prof. S.K. Jain

Prof. S.K. Katiyar Chest Oration



NCCP(I) – Prof. S.K. Jain – Prof. S.K. Katiyar Chest Oration

Utility of Navigational Bronchoscopy in Peripheral Lesions



Dr Mahendra Kumar Bainara

MD, FRCP(g), FNCCP, FIAB, FIMSA, FUAPM, FAPSR

Present Position: -

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Teaching Experience – > 22 YEARS

- Delivered Guest Lectures More Than 40 And Conducted Many Workshops and Trainer in Many National & State Level scientific conferences/CME etc
- Publication Are More Than 35 In National and International Journals.

Book published

1. MEDICAL THORACOSCOPY- a practical guide.

Indian National Guideline Contribution –

National Chairman – NCCP(I) & ICS Medical Thoracoscopic Practice Guideline in India -fin.

Core Member – NCCP(I) Nebulization Guideline in India.

Journal Contributions –

Deputy Editor in Chief - United Academy of Pulmonary Medicine Journal of Respiratory Diseases and Allied Sciences

Editorial board member of Thoracic Endoscopy journal.

Editorial board member – Indian Journal of Tuberculosis.

Oration

NCCP(I) - Prof. A. S. Paintal

Dr R. C. Jain Memorial Chest Oration



Prof. A. S. Paintal - Dr R. C. Jain Memorial Chest Oration
Chronic Obstructive Pulmonary Disease: An Entity Ever Evolving



Prof (Dr) Prem Parkash Gupta

Senior Professor & Head

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At the outset, I want to confess that this my presentation may land up to disappoint the stalwarts as my presentation is

> not going to add anything to existing knowledge of COPD

> not going to be all exhaustive as COPD research is too exhaustive and thanks to world wide web, excellent reviews and State of the arts for the same are, well in public domain!

So, what am I doing here?

My humble attempt is to stimulate the young and future Chest expert to have an overview how the disease has evolved over centuries, and how during last few decades, it has seen exponential advancement.

'Then you should say what you mean,' the March Hare went on

In a rather unconventional order of presentation, before following the timelines of COPD, I shall describe current Definitions and impact of COPD

Current Definition

GOLD 2023 defines COPD as a heterogeneous lung condition characterized by chronic respiratory symptoms (dyspnoea, cough, expectoration and/or exacerbations) due to

abnormalities of the airways (bronchitis, bronchiolitis) and/or alveoli (emphysema) that cause persistent, often progressive, airflow obstruction (FEV1/FVC < 0.7).

This definition aims at:

1. recognizing that COPD is heterogeneous; and
2. describing explicitly what are the main structural, functional, and clinical manifestations of the disease.

Other acronyms that predated the COPD designation were

- chronic bronchitis and emphysema (CB&E),
- chronic obstructive bronchopulmonary disease,
- chronic airflow obstruction,
- chronic obstructive lung disease,
- nonspecific chronic pulmonary disease, and
- diffuse obstructive pulmonary syndrome.

William Briscoe (1965) is believed to be the First person to use the term COPD at the 9th Aspen Emphysema Conference.

The term “chronic obstructive pulmonary disease” (COPD) came into use gradually in the 1960s and 1970s replacing the previous term “chronic bronchitis and emphysema” (CB&E).

Epidemiology

Chronic obstructive pulmonary disease (COPD) is the **third** leading cause of death worldwide, causing 3.23 million deaths in 2019. In 1990, COPD was the **sixth** dominant cause of death, and in 2002, it became the **fourth** major contributor to death across the globe. The expanding epidemic of smoking and ageing of the world population, as well as the reduced mortality from other causes, mean that by **2060** there may be over 5.4 million deaths per year due to COPD and related diseases

Prevalence of COPD increased with age regardless of urbanisation level. The pooled global prevalence is 15.7% in men and 9.93% in women. The prevalence of COPD in the US is estimated at 14%.

Tobacco smoking accounts for over 70% of COPD cases in high income countries. In LMIC tobacco smoking accounts for 30–40% of COPD cases, and household air pollution is a major risk factor. Synergistic effects between **excess body fat** and **pollutants** might indeed enhance inflammatory responses causing more airway damage. Furthermore, participants with a lower income might be particularly prone to COPD due to poor nutrition, more respiratory infections during childhood, worse housing conditions, or more occupational exposures. An observational study in rural Kyrgyzstan in Central Asia, observed that COPD was more than three times as prevalent among highlanders (~2050 m above sea level) compared to lowlanders (~750 m above sea level, 36.7% versus 10.4% respectively; $p < 0.001$)

We also need to be aware that by 2040 more people shall die “with” rather than “from” COPD, **comorbidities** aggravated by COPD



Flash Back

.....Well, COPD has probably always existed!

In 1679, Bonet for the first time described voluminous lungs.

In 1721, Ruysh described enlarged lung airspaces in emphysema.

In 1769, Giovanni Morgagni described nineteen cases in which the lungs were “turgid” particularly from air.

Baillie is credited with being the first to produce an illustrated systematic textbook of morbid anatomy and probably the first to illustrate pulmonary emphysema and the composition of large vessels.

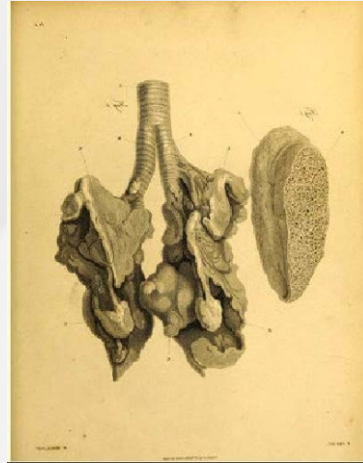


Figure 1: Section of lung of Samuel Johnson.

In 1808, bronchitis was first described by Charles Badham in England. He classified acute bronchitis to be of three forms by his definition (*Br. acuta, asthenica* and *chronica*).

Laënnec, the inventor of the stethoscope, recognized that emphysema lungs were hyperinflated and did not empty well (Laënnec 1821). Among the features of emphysema, he described were the presence of peripheral airway obstruction, collateral ventilation, loss of lung recoil, right ventricular hypertrophy in advanced disease and chronic bronchitis (bronchial “catarrh”). Described a combination of emphysema and chronic bronchitis in a beautiful book by Laënnec (1821) *Treatise of diseases of the chest*.

In this era, smoking was rare, but it is a fact that emphysema may occur in non-smokers, particularly with a familial predisposition or from environmental-provoking factors.

Did historically COPD precede smoking?

No Doubt that smoking is the most powerful risk factor causing COPD. Tobacco smoking accounts for over 70% of COPD cases in high-income countries and as many as 8 out of 10 COPD-related deaths. The prevalence of COPD for adults is 15.2% among current smokers. This figure drops to 7.6% among former smokers and just 2.8% among people who have never smoked.

However, we need to know that COPD was present before Smoking became a style Instrument of civilized world.

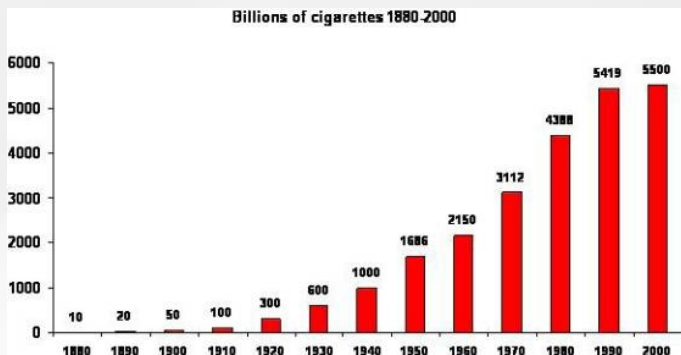


How long has tobacco been around?

Tobacco has been growing wild in the Americas for nearly 8000 years. Around 2,000 years ago tobacco began to be chewed and smoked during cultural or religious ceremonies and events.

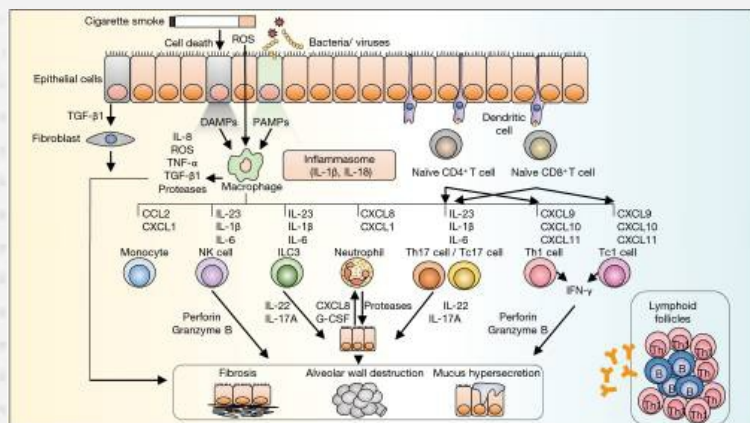
Who discovered tobacco and where?

The first European to discover smoking was **Christopher Columbus**. In 1531 tobacco was cultivated for the first time in Europe (at Santo Domingo). By 1600 tobacco use had spread across Europe and England and was being used as a **monetary standard**. By the 1700s smoking had become more widespread and a tobacco industry had fully developed. **Cigarette making machines** were developed in the latter half of the 1800s. The first such machines produced about 200 cigarettes per minute (today's machines produce about 9,000 per minute!). Smoking increased dramatically during the world wars, mainly due to the **policy of providing free cigarettes to allied troops as a 'morale boosting' exercise**.

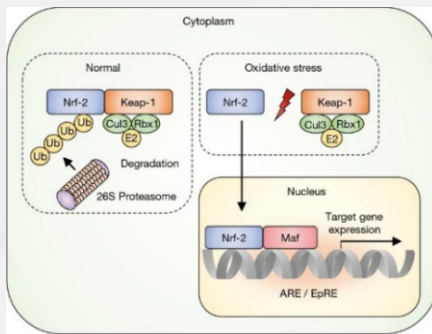


As smoking prevalence rates have declined in the traditional markets of North America and Western Europe, the tobacco industry has re-focused its promotional efforts onto the less developed and emerging nations.

Cigarette smoke (CS) contains numerous toxic chemical substances. Many studies have found that smoking induced oxygen-derived metabolites or **reactive oxygen species (ROS)** damage the lungs and contribute to COPD pathogenesis.



Nuclear factor E2-related factor 2 (Nrf2) facilitates antioxidant gene expression. Nrf2 protects the lungs against oxidative stress, while decrease activity of Nrf2 results in insufficient production of antioxidant molecules. Oxidative process not only affects the initiation process of lung injury, but also induces cellular senescence in the epithelium cells and stem cells. Altered immune response in the airways causes prolonged inflammation and structural modifications.



New findings suggest **autophagy** and programmed necrosis (**necroptosis**) involved in CS-induced cell death - the mechanism of exaggerated inflammatory response that is not explained by **apoptosis**-derived cell death.

Cigarette smoke (CS) induces airway inflammation in COPD, which is known to persist even after smoking cessation. A meta-analysis involving 11RCTs (3,830 patients) showed that theory-based smoking cessation interventions improved smoking cessation rates, quality of life, and lung function in COPD patients compared to conventional nursing.

Spirometer- The wonder instrument

John Hutchinson invented the spirometer in 1846. He examined its value systematically in more than 2000 men. Hutchinson's instrument only measured vital capacity (VC). Hutchinson promoted VC as a simple index of lung function, physique and bodily development; that might be useful in assessing longevity of subjects for life insurance, a prediction confirmed by the Framingham Study more than a century later. Hutchinson's belief in VC as a general measure of lung health and development

It took another 100 years for **Tiffeneau** to add the concept of timed vital capacity as a measure of airflow, (Tiffeneau and Pinelli 1947). Enabling Spirometry as a diagnostic instrument for COPD. **Gaensler** introduced the concept of the air velocity index based on Tiffeneau's work and later the forced vital capacity, which is the foundation of the FEV1 and FEV1/FVC percent (Gaensler 1950, 1951).

In 1944, Ronald Christie defined the diagnosis for emphysema based on dyspnea on exertion, after exclusion of bronchospasm, or left ventricular failure. Dickerson Richards, Nobel Laureate, who wrote on the pulmonary circulation and cor pulmonale. Reuben Cherniack, who described respiratory acidosis and has made major contributions to our understanding of the diagnosis and treatment of emphysema for over half a century

Two landmark meetings

The CIBA Guest Symposium: In 1959, the terms chronic bronchitis and emphysema were formally defined at the CIBA Guest Symposium of Physicians.

"Emphysema is a condition of the lung characterized by increase beyond the normal in the size of air spaces distal to the terminal bronchiole either from dilatation or from destruction of their walls."

"Chronic bronchitis refers to the condition of subjects with chronic or recurrent excessive mucous secretion in the bronchial tree."

American Thoracic Society Committee on Diagnostic Standards in 1962

Defined the components of COPD, which are the foundation for our definitions today.

*The American Thoracic Society (ATS) defined **chronic bronchitis** in clinical terms including chronic cough lasting at least three months for at least two years. The ATS defined **emphysema** in anatomic terms of enlarged alveolar spaces and loss of alveolar walls.*

Neither definition used any physiologic criteria.

Many other attempts to define COPD have not improved on these basic definitions, except that COPD is now defined in functional terms.

The Dutch hypothesis and British hypothesis

The Dutch hypothesis presented the concept of genetically determined bronchial hyperreactivity in COPD (Orie and Sluiter 1960).

The British hypothesis proposed that repeated chest infections and air pollution contributed to the pathogenesis of chronic bronchitis (Stuart-Harris et al 1953; Scadding 1959).

Both hypotheses are probably correct, and both bronchial hyperreactivity and chest infections plus irritant exposure are important in pathogenesis.

The first credible model of emphysema was prepared by Gross in 1964, who instilled pancreatic extracts (papain) into the airways of guinea pigs to cause destruction of alveoli and hyperinflation (Gross et al 1964). A forerunner to *the protease-antiprotease mechanism of the pathogenesis*, as described by Laurel and Erickson (1963) in Sweden with alpha-one-antitrypsin deficiency and emphysema.

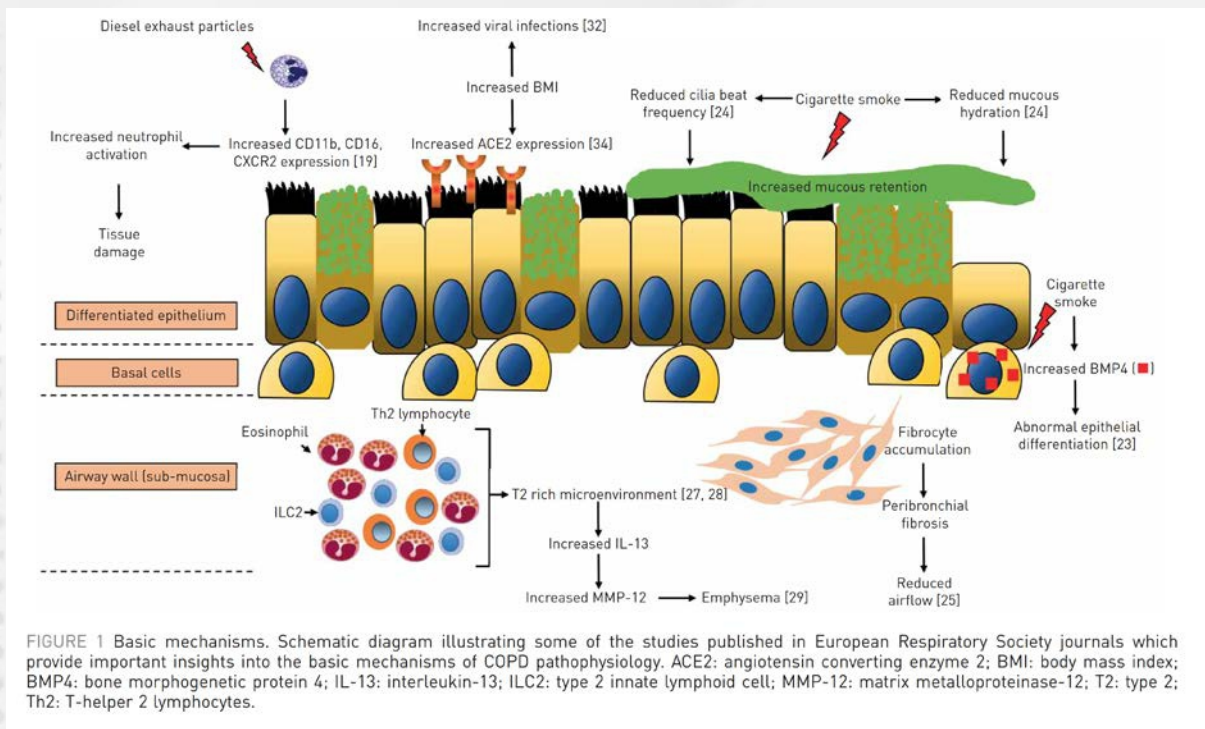
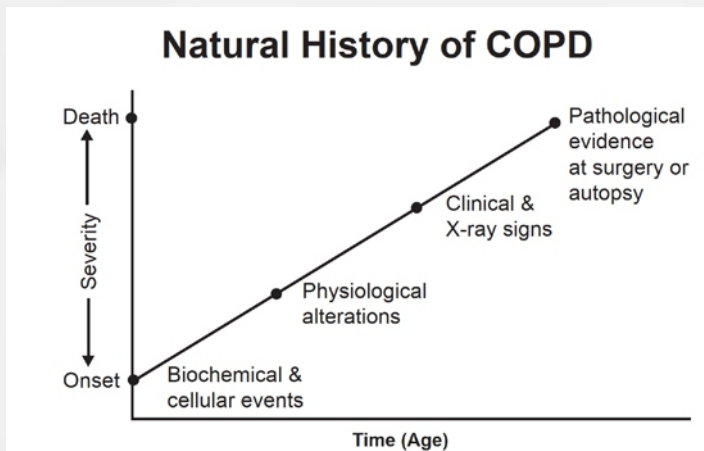
The Aspen emphysema conferences

The growing problem of emphysema and related disorders was the stimulus for a planned series of emphysema conferences held annually in Aspen, Colorado, beginning in **1958**. Subsequent conferences discussed certain collateral subjects including asthma, the environment, and the lung and pulmonary circulation. **The conferences were intended to conclude after the 1964 meeting.** However, the same are being continued, the latest one held was

THOMAS L. PETTY
ASPEN LUNG CONFERENCE
65th Annual Meeting
"Asthma: Pathogenesis, Phenotypes, Therapies and Gaps"
June 6-9, 2023

Natural Course Of COPD

The natural history of COPD begins with complex biochemical and cellular events in the small airways and surrounding alveoli.



Early in the course, damage to the structure leads to a loss of elastic recoil (Saetta, Ghezzi, et al 1985; Saetta, Shiner, et al 1985; Petty et al 1987). The lungs begin increase in size, and the FVC increases (Petty et al 1987). This results in early physiologic alterations that can be identified by simple spirometry (Burrows et al 1987). By the time clinical signs are present, COPD is often in a moderate-to-advanced stage (Mannino et al 2000).

Thus, the interrelated causes of airflow obstruction in COPD patients include a combination of airways inflammation and remodeling, bronchospasm, mucous hypersecretion, and loss of elastic recoil. There is a complex interrelationship among these phenomena, which results in the progressive reduction in expiratory airflow as judged by the FEV1.

Terminology

GOLD 2023 Guidelines proposes use of the following terminology:

Early COPD: the “biological” first steps of the disease i.e. the initial mechanisms that eventually lead to COPD, in an experimental setting.

Mild COPD: used only to describe the severity of airflow obstruction measured spirometrically.

Young COPD: “young COPD” in patients aged 20–50 years.

Pre-COPD: Individuals of any age, with respiratory symptoms and/or other detectable structural (e.g. emphysema) and/or functional abnormalities (e.g. hyperinflation, reduced lung diffusing capacity, or rapid FEV1 decline), in the absence of airflow obstruction on post-bronchodilator spirometry (i.e., FEV1/FVC >0.7)

Considered “patients” because they suffer symptoms and/or have functional and/or structural abnormalities

PRISm: *preserved ratio impaired spirometry (PRISm)*, Individuals with FEV1/FVC > 0.7 and FEV1 <80% of reference after bronchodilation. Its prevalence ranges from 7.1% to 20.3%, high in current and former smokers.

Taxonomy of COPD

As we know, COPD can originate from multiples causes (etiotypes), a new taxonomic classification was proposed by GOLD 2023:

Classification	Description
Genetically determined COPD (COPD-G)	Alpha-1 antitrypsin deficiency (AATD) Other genetic variants with smaller effects acting in combination
COPD due to abnormal lung development (COPD-D)	Early life events, including premature birth and low birthweight, among others
Environmental COPD	
Cigarette smoking COPD (COPD-C)	• Exposure to tobacco smoke, including <i>in utero</i> or via passive smoking • Vaping or e-cigarette use • Cannabis
Biomass and pollution exposure COPD (COPD-P)	Exposure to household pollution, ambient air pollution, wildfire smoke, occupational hazards
COPD due to infections (COPD-I)	Childhood infections, tuberculosis-associated COPD, WHIV-associated COPD
COPD & asthma (COPD-A)	Particularly childhood asthma
COPD of unknown cause (COPD-U)	

However, it aims at raising awareness about these other, frequent, non smoking related COPD and to stimulate further research and better management.

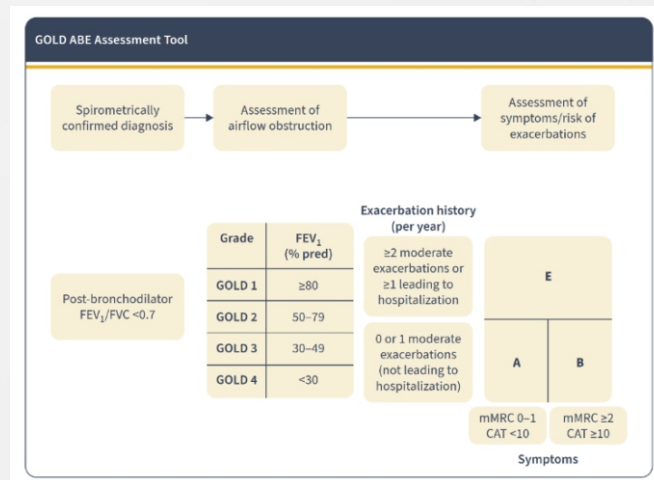


Assessment

The diagnosis of COPD is confirmed by spirometry

Combined initial COPD assessment: from ABCD to ABE

GOLD 2023 modifies the ABCD assessment tool to recognize the clinical impact of exacerbations independently of the level of symptoms of the patients



Imaging

Chest X-ray: signs of lung hyperinflation (flattened diaphragm and increased retrosternal air space), lung hyperlucency, and rapid tapering of the vascular markings. Also useful to exclude alternative diagnoses and establish the presence of significant comorbidities

Computed tomography (CT) of the chest

Presence, severity, and distribution of emphysema;

Bronchiectasis: about 30% of copd patients have bronchiectasis

Lung cancer screening

Quantification of airway abnormalities

COPD comorbidities

GOLD 2023 recommends chest CT in COPD patients with persistent exacerbations, symptoms out of proportion to airflow limitation severity, severe airflow obstruction with significant hyperinflation and gas trapping, or for those who meet criteria for lung cancer screening.

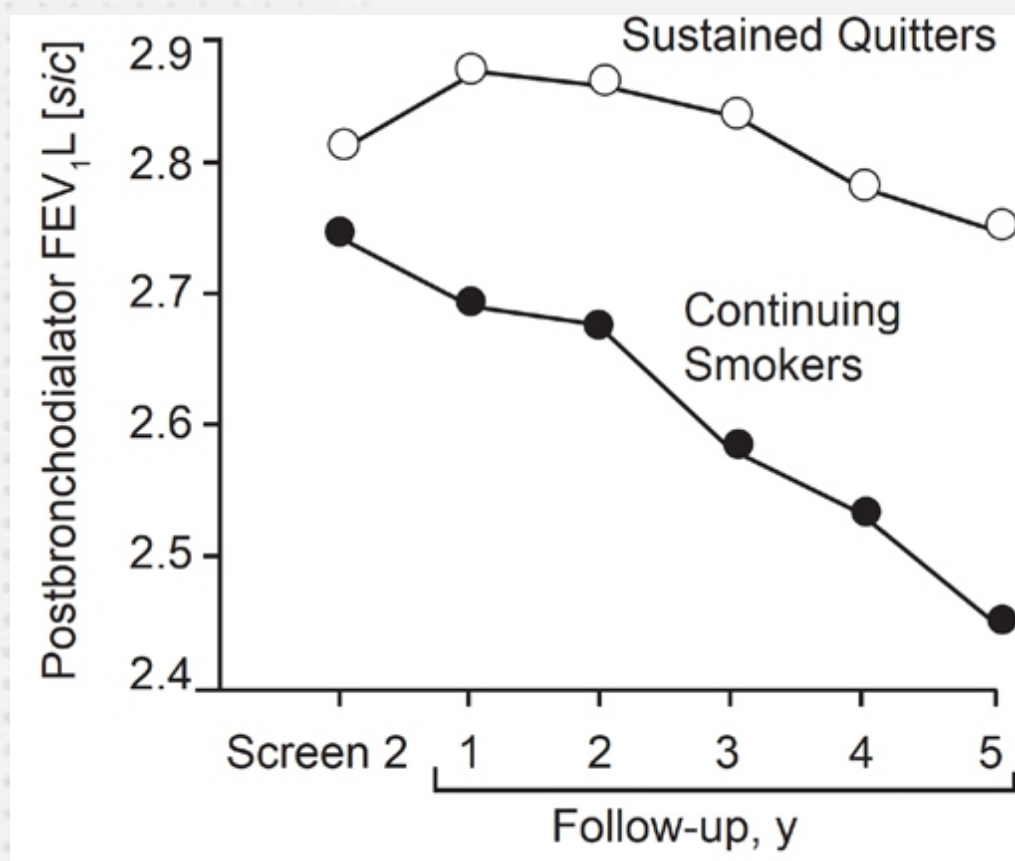
Treatment

Around five decades back, the only therapies for COPD were antibiotics for pneumonia, potassium iodide used as a mucus thinner, and combination products containing ephedrine, a small amount of theophylline, and a minor amount of sedative to deal with the side effects of ephedrine.

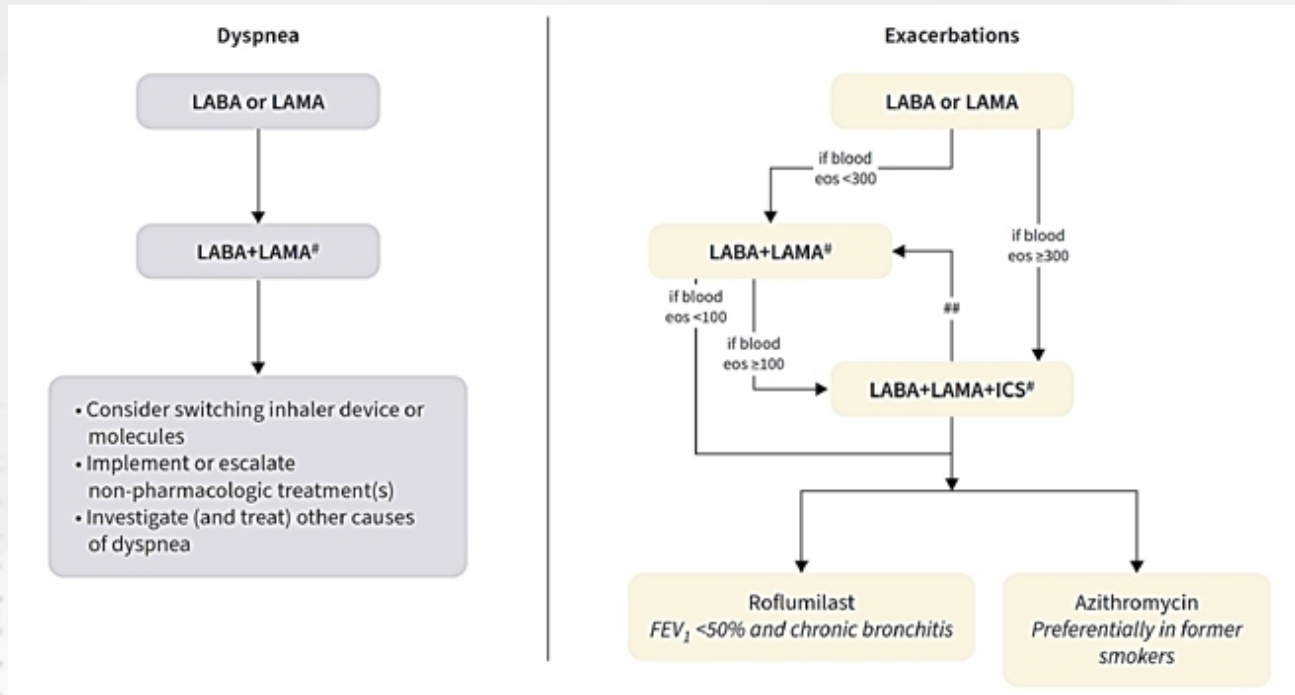
Inhaled isoproterenol began to be used in the early 1960s. In that era, oxygen was considered contraindicated, and exercise was prohibited for fear of straining the right heart. Corticosteroids were almost never used, even in cases of exacerbations of COPD.

Non-pharmacological therapy

Education	All patients should receive basic information about COPD and its treatment (respiratory medications and inhalation devices), strategies to minimize dyspnea, and advice about when to seek help.
Smoking cessation	Approximately 40% of people with COPD continue to smoke despite knowing they have the disease, and this behavior has a negative impact on prognosis and progression of the disease [108]. All patients who continue to smoke should be offered help and treatment to quit.
Vaccination	influenza, pneumococcus, coronavirus disease 2019 (COVID-19), pertussis, and herpes zoster
Physical activity	Technology-based interventions have the potential to provide convenient and accessible means to enhance exercise self-efficacy, and to educate and motivate patients to make healthy lifestyle changes
Pulmonary rehabilitation	community- and home-based GOLD groups B and E
Tele-rehabilitation	videoconferencing, telephone only, website with telephone support, mobile application with feedback, centralized "hub" for people to come together tele-rehabilitation is safe and has similar benefits to those of center-based PR across a range of outcomes



GOLD 2023 recommended treatment is based on two key treatable traits (TTs): **dyspnea** and occurrence of **exacerbations**. based on clinical recognition (phenotypes) and/or endotypes through biomarkers (e.g. circulating eosinophils) :



NEWER THERAPIES FOR COPD

COPD is one of the diseases that have seen major research work during last couple of decades leading to significant enhancement in understanding of its pathophysiology, and as a result new potential targets for the management of this disease and for prevention of its progression have been identified. Many of new molecules are under different trial phases and yet to achieve necessary acceptance and recommendations. Table-4 enlists some of these promising molecules.

New COPD Medicines

GROUP	DRUGS	GROUP	DRUGS
New LAMA monotherapy	Aclidinium Glycopyrronium Umeclidinium	New LABA+ICS Combination	Vilanterol + Fluticasone Indacaterol + Mometasone Formetrol + Ciclesonide Formetrol + Fluticasone
New LABA monotherapy	Indacaterol Vilanterol Olodaterol Abediterol	Triple drug LABA+LAMA+ICS Combination	Tiotropium + Salmeterol + Fluticasone Glycopyrronoum + Formoterol + Budesonide Umeclidinium+Vilanterol+Fluticasone Tiotropium+Formoterol+Ciclesonide
New LAMA+LABA Combination	Umeclidinium & Vilanterol Glycopyrronium & Indacaterol Tiotropium & Olodetrol Aclidinium & Formoterol Glycopyrrolate & Formoterol	Oral Medications	Roflumilast Simvastatin N-acetylcysteine

Targeted Drug Therapy In COPD

CXCR2 ANTAGONISTS

Antagonists of the human CXCR2 receptors target neutrophil trafficking in COPD inflammatory pathway. **MK-7123**, a CXCR2 antagonist, is being investigated and has shown significant improvement in FEV1 compared to placebo in patients with COPD.



P38 MITOGEN-ACTIVATED PROTEIN KINASE (P38 MAPK) INHIBITORS

P38 mitogen- activated protein kinase (P38 MAPK) pathway involves a signaling cascade controlling cellular responses to cytokines and stress. Table-5 represents the various molecules under study. The molecule **PH-797804** studied had shown improvements in dyspnea symptom index and FEV1. The efficacy and safety of two inhaled p38 MAPK inhibitors, **RV-568** and **PF-03715455** are under various phases of clinical trials. Inhaled delivery of p38 MAPK inhibitors may enhance p38 inhibition in the lung while reducing unwanted systemic effects.

P38 Mitogen-Activated Protein Kinase (P38 MAPK) Inhibitors

Drug	Group	Present status
PH-797804	Oral p38 MAPK inhibitor	Phase II trials of this agent have recently been discontinued.
GW856553X/ Osmapimod	Oral p38 α / β MAPK inhibitor	Phase II human clinical trial
Acumapimod	Orally p38 MAPK inhibitor	Active development
RV-568	Inhaled p38 MAPK inhibitors	Evaluated in clinical trials
PF-03715455	Inhaled p38 MAPK inhibitors	Evaluated in clinical trials

SELECTIVE MATRIX METALLOPROTEINASES (MMP) INHIBITORS

COPD is an inflammatory disorder in which protease and antiprotease imbalance plays an important role, antagonizing matrix metalloproteinases (MMP) with selective MMP inhibitors provided an option to revert back to this fine balance. The search for ideal drug in this group goes on; some of the studied molecules are listed in Table-6.



Selective Matrix Metalloproteinases (MMP) Inhibitors under study

Drug/ Molecule	Group	Action	Status
AZ11557272	Dual MMP9– MMP12 inhibitor	Prevent emphysema, small airway fibrosis, and inflammation in guinea pigs	Clinical development has recently been stopped
AZD1236	Orally Dual MMP9–MMP12 inhibitor	Failed biomarker endpoints, initial promising results	Further development aborted

HUMANIZED MONOCLONAL ANTIBODIES TARGETED TO ALPHA SUBUNIT OF THE INTERLEUKIN (IL)-5 RECEPTOR (IL-5RA)

Humanized monoclonal antibodies targeted to alpha subunit of the interleukin (IL)-5 receptor (IL-5Ra) selectively blocks IL-5 (Table-7). This action is particularly beneficial in management of asthmatic inflammation as well as COPD exacerbations. Soluble IL-5Ra is also found to be increased during virus-induced COPD exacerbations.

Humanized monoclonal antibodies targeted to IL-5Ra

Drug	Action
Benralizumab	Reduce COPD exacerbations and improve symptoms in patient with higher blood eosinophils Improvement in lung functions, and disease-specific health status
Mepolizumab	Approved by the U.S. FDA in severe asthma, EU in December 2015

ANTI HUMAN IL-17R ANTIBODIES

Interleukin (IL) -17A has been found to induce neutrophilic inflammation by releasing CXCL1, CXCL8 and GM-CSF from airway epithelial cells and smooth muscle cells. IL-17A can induce IL-6 expression in bronchial epithelial cells and fibroblasts. IL-17A is involved in human airway smooth muscle contraction. Th17 cells also mediate glucocorticoid resistant airway inflammation and airway hyperresponsiveness. Antihuman IL-17R

antibodies including **Ixekizumab** , **Brodalumab** and **Ustekinumab** are undergoing trial for possible clinical efficacy in asthma and COPD.

PHOSPHOINOSITIDE 3-KINASES (PI3K) INHIBITORS

The phosphoinositide 3-kinases (PI3K) are a family of proteins that are involved in the control of intracellular signaling pathways. Phosphoinositide 3-kinases inhibitors prevent recruitment of inflammatory cells including t-lymphocytes and neutrophils, prevent release of proinflammatory mediators, and also may restore steroid effectiveness. One molecule with promising phosphoinositide 3-kinases inhibitor property is **GSK2269557**, which is being further evaluated.

Targeted Rewriting of Epigenetic Marks

Epigenetics is a study of heritable or acquired mitotically stable changes in gene expression that occur without variation in DNA sequence. Epigenetic marks are usually subdivided in three classes: DNA methylation, post-translational histone modifications and non-coding RNAs, with all three probably induced by environmental factors, diet, diseases, and processes involved in ageing. The emerging evidences in some COPD patients suggest an aberrant expression of epigenetic marks such as DNA methylation, histone modifications and microRNAs in blood, sputum and lung tissue. Generally, DNA hypermethylation results in gene silencing and hypomethylation leads to transcription activation. Targeting epigenetic marks might be a very promising tool for treatment and lung regeneration in COPD in the future. As of now, none of the identified genes are specifically targeted by COPD therapeutic approaches.

Judicious use of Inhaled Corticosteroids:

Adding ICS has little or no effect at a blood eosinophil count **<100** cells μL^{-1} whilst blood eosinophils.

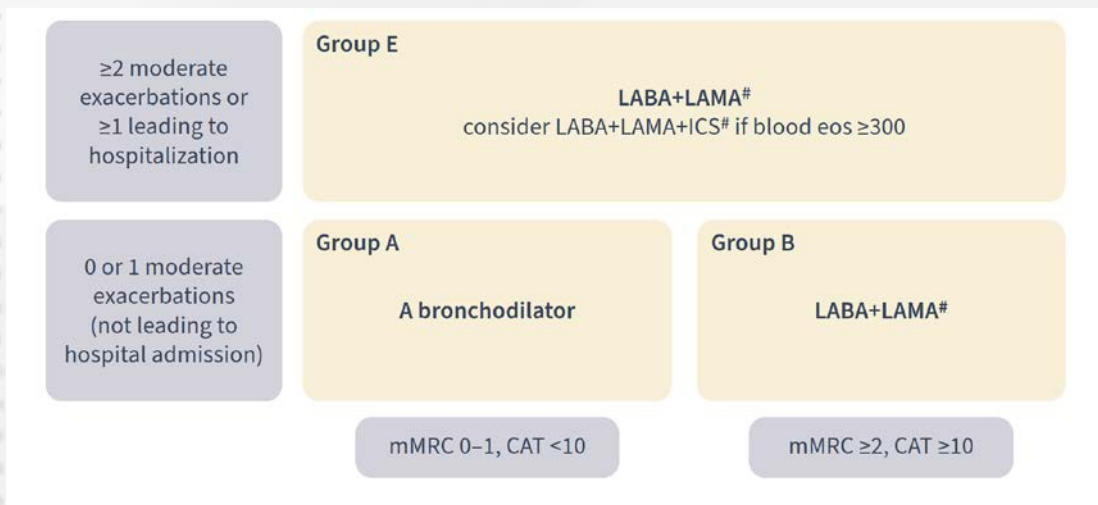
>300 cells $\cdot\mu\text{L}^{-1}$ identify patients with a strong likelihood of treatment benefit.



Factors to consider when adding ICS to long-acting bronchodilators:
(note the scenario is different when considering ICS withdrawal)

Strongly favors use	History of hospitalization(s) for exacerbations of COPD# ≥2 moderate exacerbations of COPD per year# Blood eosinophils ≥300 cells·μL ⁻¹ History of, or concomitant asthma
Favors use	1 moderate exacerbation of COPD per year# Blood eosinophils 100 to <300 cells·μL ⁻¹
Against use	Repeated pneumonia events Blood eosinophils <100 cells·μL ⁻¹ History of mycobacterial infection

Pharmacological treatment In COPD as per GOLD 2023



for patients in Group B, a dual long acting bronchodilator combination (β2 adrenergic (LABA) + anti-muscarinic (LAMA) bronchodilators) is now recommended

For patients in Group E, LAMA+LABA is also the recommended initial therapy, except for those patients with blood eosinophils > 300 cells·μL⁻¹, in whom starting triple therapy (LABA+LAMA+ICS) can be considered.

The use of LABA+ICS in COPD is no longer encouraged.



Vaccination in stable COPD patients

- Influenza vaccination is recommended in people with COPD (**Evidence B**)
- The WHO and CDC recommends SARS-CoV-2 (COVID-19) vaccination for people with COPD (**Evidence B**)
- The CDC recommends one dose of 20-valent pneumococcal conjugate vaccine (PCV20); or one dose of 15-valent pneumococcal conjugate vaccine (PCV15) followed by 23-valent pneumococcal polysaccharide vaccine (PPSV23) in people with COPD (**Evidence B**)
- Pneumococcal vaccination has been shown to reduce the incidence of community-acquired pneumonia and exacerbations in people with COPD (**Evidence B**)
- The CDC recommends Tdap (dTaP/dTPa) vaccination to protect against pertussis (whooping cough) for people with COPD that were not vaccinated in adolescence (**Evidence B**), and Zoster vaccine to protect against shingles for people with COPD over 50 years (**Evidence B**)

Interventional Pulmonology and Lung transplant options

Lung Volume Reduction Surgery	<ul style="list-style-type: none">• Lung volume reduction surgery improves survival in severe emphysema patients with an upper-lobe emphysema and low post-rehabilitation exercise capacity (Evidence A)
Bullectomy	<ul style="list-style-type: none">• In selected patients, bullectomy is associated with decreased dyspnea, improved lung function and exercise tolerance (Evidence C)
Transplantation	<ul style="list-style-type: none">• In appropriately selected patients with very severe COPD, lung transplantation has been shown to improve quality of life and functional capacity (Evidence C)
Bronchoscopic Interventions	<ul style="list-style-type: none">• In select patients with advanced emphysema, bronchoscopic interventions reduce end-expiratory lung volume and improve exercise tolerance, health status and lung function at 6-12 months following treatment. Endobronchial valves (Evidence A); Lung coils (Evidence B); Vapor ablation (Evidence B)
Bronchoscopic Interventions Under Study	<ul style="list-style-type: none">• Phase III trials are currently being conducted to determine the efficacy of treatments for patients with refractory exacerbations and chronic bronchitis using cryospray, rheoplasty and targeted lung denervation technology

COPD and coronavirus disease 2019

Expression of **pulmonary ACE2** is increased in COPD patients and cigarette smoking and obesity appear important risk factors, increasing the susceptibility to COVID-19 infection

Numerous extensive and well-conducted cohort studies globally confirmed that COPD is an independent risk factor for hospitalisation, intensive care admission, ventilation, and death

Absolute cessation of any tobacco product in any form is strongly recommended

A recent systematic review revealed a paucity of clinical data on the impact of ICS on the outcomes of SARS, SARS-cov-2 or Middle East Respiratory Syndrome

There is consensus that ICS use should continue when indicated, in line with GOLD recommendations, in anticipation of further, direct clinical evidence



Future anticipations

Health care Delivery: TELE-HEALTH

It is long recognised that there is a wide gap between existing scientific knowledge and delivery of health care at patients` end and also there has always been lack of patients feedback to treatment providers.

A lot of things regarding it can be managed by smart phones (which are easiest vehicle to communicate) along with development of appropriate apps or software. Many devices to be used in future by patients like smart MDI, Pulse Oximeter, NIV etc can have communication mode that can be linked with patients devices and also with their care providers.

Patients feedback in term of their symptoms/ events can also be recorded and transmitted digitally. Surely there going to be drastic improvement in this area.

Capability of technology to capture data from multiple sources (pulse oximetry, pulse, respiratory rate, temperature, autonomic activation, activity) and also in the ability to use this data in real-time. By 2030

Implantable Data:

It is likely to be possible that data storage and portable communication devices will be implantable and thus directly accessible via suitable interfaces. Patients will be able to hold and store contemporaneous notes and then access them when needed. This will increase patient autonomy and possibly improve their knowledge and ability to direct their care.

Newer Molecules / Inhaled devices: an ongoing process

Ways to identify the **genotype / phenotype** and offer **targeted tailored therapy** to these patients.

Better management for nicotine addiction will be developed. We may see a nicotine vaccine and better nicotine receptor blockers.

An Overview

The evolution of knowledge concerning COPD and its components – emphysema, chronic bronchitis, and asthmatic bronchitis – covers 200 years.



The stethoscope has played very significant role in clinical diagnosis of COPD

Spirometry still remains the most effective means of identification and assessment of the course of COPD and responses to therapy, though it is grossly underused for this purpose.

The CIBA Guest Symposium in 1959 and **American Thoracic Society Committee on Diagnostic Standards** in 1962 were the landmark in defining COPD and its components

Smoking cessation improves the early course of disease.

Pharmacotherapy has progressively become more scientific and now the indications of addition of inhaled corticosteroids are better identified. New ultra-LABA, Ultra-LAMA and

Phosphodiesterase inhibitors are already in use. Various targeted therapies are in various stages of trials and soon may have more clarity regarding their clinical status.

Long-term oxygen improves the length and quality of life in selected patients with hypoxemia.

Bronchoscopic Interventions are evolving

Surgery benefits in a select few.

“NOTHING IS PERMANENT EXCEPT CHANGE .”

These wise words were expressed by the Greek philosopher Heraclitus around 500 BC.



BOOK ARTICLE



Lung Oscillometry

Editor - Dr Prof. Thomas Vadakkan



The book is for release during the Silver Jubilee NAPCON 2023 Hyderabad. We present a chapter from the book

Chapter 11-Practical approach of Oscillometry by Dr Akhil Paul



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Chapter 13 -*Practice questions and answers*- Dr Thomas Vadakkan



CHAPTER-11

A PRACTICAL APPROACH OF IMPULSE OSCILLOMETRY

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Spirometry serves as a major tool for a clinician in diagnosing and following up various obstructive and restrictive lung disorders. But, as spirometry measures forced inspiratory and expiratory volumes, the quality of the values and thus the test depends a lot on the patient and his or her efforts. In a study conducted by Van De Hei et al on the quality of the spirometry and the related diagnosis with a focus on clinical use, the general practitioners and the pulmonologists stated that the spirometry was clinically useful in more than eighty eight percent of the cases (1). But agreement on the diagnosis was very low and only thirteen percent of the spirometry tests had fulfilled the ATS/ERS criteria. Impulse oscillometry becomes a better choice in this aspect as it requires only tidal breaths from the patient.

Advantages of impulse oscillometry:

- 1, Only tidal breath is required (No forced manoeuvres)
- 2, Only a minimal patient co-operation is required
- 3, Can be performed in children > 2 years of age (2, 3)
- 4, Can be performed in patients with neuromuscular diseases, intellectual disabilities, post cardio thoracic surgery etc (4, 5)
- 5, High sensitivity in detecting peripheral airway obstruction (6)

Clinical application of impulse oscillometry:

- Because of the very high sensitivity of the impulse oscillometry in detecting the distal airway obstruction, this technique is very handy in making a diagnosis, where the clinical suspicion is questioned by a normal spirometry (7, 8).



- Bronchodilator reversibility can be assessed using inhaled short acting beta 2 agonists or ipratropium (9, 10)
- It is feasible to perform oscillometry in children, elderly, those with neuromuscular disorders (4,5), impaired intellect, mechanically ventilated patients (11) and even during sleep (2).
- Aerosol generation during various procedures was a major concern during the COVID 19 pandemic. It is risk that need to be handled carefully during any viral pandemic like COVID 19 or Influenza. Healthcare facilities had stopped performing spirometry during the pandemic period because of this particular reason. But oscillometry being an unforced procedure, aerosol generation during the same is very low and hence it can be performed without any significant added risk (12).
- Oscillometry have proven to be having a great potential in diagnosing and monitoring various respiratory diseases other than the obstructive airway diseases like cystic fibrosis (13), interstitial lung diseases (14), bronchopulmonary dysplasia (15), bronchiolitis obliterans in lung transplant recipients (16), vocal cord dysfunction (17) etc.

The repeat variability of all IOS parameters is significantly higher than FeV1 (~10% vs ~5%). But it is clinically acceptable. At the same time the IOS parameters are less variable than other common spirometry parameters like FEF50 (~20%) (18).

A clinical algorithm :

Step 1.

INDICATION:

- Spirometry is indicated, but the patient is unable to perform spirometry.
- Spirometry results are not able to contribute to a diagnosis which can explain the respiratory symptoms of the patient.

Step 2.

PREREQUISITE:

- Off Short Acting Beta2 Agonist (SABA) for 4 hours
- Off Long Acting Beta2 Agonist (LABA) for 24 hours



Step 3.

CALIBRATION:

- As per the instructions of the manufacturer

Step 4.

PATIENT POSITIONING:

- Sitting position
- Legs uncrossed to decrease the extra thoracic pressures
- Nose clip
- Mouth piece at a comfortable height
- Neck slightly extended
- Tight seal between the mouth piece and the lips to prevent the leak
- Cheeks should be held firmly as impedance of cheek, tongue and upper airway will affect R_{19/20}

Step 5.

PROCEDURE:

- Impulse Oscillometry is performed
- Minimum 3 acceptable readings (pre and post bronchodilator) taken
- Age and height matched control used

Step 6.

VALIDITY:

- Variation in consecutive R₅ values should be less than 15%

Step 7.

INTERPRETATION USING PARAMETERS:

A, OBSTRUCTIVE DISEASE

R ₅	R ₂₀	R ₅ - R ₂₀	Interpretation
Increased	Increased	Normal	Central airway obstruction
Increased	Normal	Increased	Peripheral airway obstruction
Highly Increased	Increased	Increased	Total airway obstruction

REVERSIBILITY CRITERIA:

Parameter	Change after bronchodilator
R ₅	40%
X ₅	50%
Ax	80%
Fres	Leftward shift

B, RESTRICTIVE DISEASE

- More negative X₅ and Increased Fres with normal R

INTERPRETATION USING GRAPHICS:

- Increased R₅, More negative X₅ and increased Fres- Peripheral airway obstruction
- Increased R₅ and R_{19/20} with normal X₅ and Fres- Central airway obstruction
- Normal R₅, More negative X₅ and increased Fres- Restrictive Lung Disease

Limitation:

- Even though impulse Oscillometry is a tidal breath-based technique, a minimum amount of co-operation is still required from the patient.
- Poor cheek support can falsely decrease the resistance values (19).
- Standardization of different type of machine need to be done.
- Reference values for different population needs to be established and validated.

- Reference cut off for significant reversibility using bronchodilator need to be validated using larger studies.
- More studies are required to establish and standardize the role of impulse oscillometry in restrictive lung disease, vocal cord dysfunction and in ventilated or sedated patients.
- Portability and the cost of the device is a limitation in resource limited settings. But more compact and cheaper versions of oscillometry devices are now at various stages of development and marketing.

Spirometry is better studied and more widely accepted at present (20,21). So the interpretation is comparatively easier for the practitioner. Clinical application of IOS parameters are still studied in various pulmonary diseases. The reference values for IOS in various populations are yet to be standardized and the results of the ongoing trials will contribute to that (22,23,24,25). During broncho provocation testing, the changes in R_{rs} and AX were detected much before any change in FeV1 was noticed (26, 27). In obese asthmatics, greater expiratory flow limitation associated with bronchial challenge can be measure better by X_{rs} than FeV1 (28)

As we are at a transition phase regarding the pulmonary function tests, it is wiser to perform spirometry as well as the impulse oscillometry in each patient. Apart from the fact that both tests can act complimentarily, performing both the tests and analysing the parameters will give a better knowledge regarding the underlying lung disease and will provide more informative data for comparative studies in the future. While performing tests requiring deep breaths(eg, FeNO, Spirometry, DLCO)along with oscillometry, later should be performed at first prior to other tests, as deep breathing can worsen the obstruction measured by the oscillometry as well as the spirometry (29, 30).

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Tuberculosis Simplified: The complete handbook

About the book

As the field of Mycobacteriology continues to grow daily with the generation of new and newer evidence, this book is an attempt to update our knowledge to the various developments in this field including diagnostics and therapeutics. This book modeled on Toman's, the Bible of Tuberculosis, is arranged in six sections covering a vast array of topics from epidemiology, diagnosis, treatment, the national TB elimination program and varied miscellaneous topics from airborne infection control to current updates in vaccines. The book is arranged in a simple question and answer format for the postgraduates and scholars in the field of Mycobacteriology to make learning easier. A must have and a must-read book for all postgraduates in the field of Respiratory Medicine.

About the authors

Tuberculosis Simplified: The complete handbook, draws on the knowledge of leading experts in the field of Tuberculosis from various specialists including Microbiologists, Pulmonologists, Cardiothoracic surgeons and public health experts who are involved in the day-to-day fight for TB elimination.

The editor **Prof. Vinod Kumar**, is currently Director and Professor of Respiratory medicine at the prestigious Institute of Thoracic medicine, Madras medical college. His special area of interest includes Tuberculosis and Clinical pulmonology. He was awarded the "Prof. S. N. Tripathy memorial Oration award" by TB association of India and the "Madras University TB Association Endowment Lecture" in recognition of his contributions to the field of Tuberculosis He has several national and international publications to his credit and has published Text book chapters in several books including Apollo Textbook of Medicine.

The book is for release during the Silver Jubilee NAPCON 2023 Hyderabad. We present a chapter from the book with the consent of the Author

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1. What are the current trials to shorten the duration of DSTB treatment?

Dr Vinod Kumar
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Currently drug sensitive TB is treated with a standardised treatment as per WHO guidelines with 2 months daily intensive phase of INH, Rifampicin, Pyrazinamide and Ethambutol followed by 4 months of daily INH, Rifampicin and Ethambutol. Though this regimen is associated with good success rate of > 85 %, problems of adherence and lost to follow up still exist and it is yet to achieve WHO's target of treatment success rate of 90 % (1)

The introduction of isoniazid in 1952, established the standard treatment of streptomycin, isoniazid and either Thiacetazone or Para-aminosalicylic acid for pulmonary tuberculosis. To achieve successful outcomes, TB patients had to take treatment for 18 to 24 months under supervision. The era of short course chemotherapy for Tuberculosis started in the 1970s due to the pioneering work done by Prof. Mitchinson and Wallace Fox with the introduction of Rifampicin and reappraisal of Pyrazinamide. Series of large controlled clinical trials carried out by the Medical Research Council (MRC) in East and Central Africa, India, Singapore, Hong Kong and elsewhere, showed that short course chemotherapy could be used in treatment of Tuberculosis with a reasonable degree of success. (2)

Currently TB treatment researchers and drug developers are trying to do several things at once— shorten treatment; make it all-oral; optimize drug doses, combinations, and duration; minimize toxicities; and expand treatment indications. Clinical trials of regimens for drug-sensitive TB are focused on shortening treatment to two-to-four months by optimizing rifamycin selection (i.e., rifampicin or rifapentine) and dosing and/or by introducing new and repurposed medicines to first-line regimens. (3)



The 2022 Tuberculosis Treatment Pipeline Report reviews recent results and puts them in context and provides an overview of the state of the clinical TB treatment research pipeline (4)

The World Health Organization (WHO) recommends the four-month regimens from the SHINE and Tuberculosis Trials Consortium (TBTC) Study 31/ AIDS Clinical Trials Group (ACTG) A5349 covered in the 2021 Pipeline report.(5)

The **SHINE trial (6)** was a phase 3 randomised open-label trial comparing four versus six months of treatment with Rifampicin, Isoniazid, Pyrazinamide with or without Ethambutol in children with smear-negative, non-severe TB. It was conducted in five study sites including India. 1204 children aged less than 16 years, including 127 with HIV infection, participated in the trial. The trial defined Minimal TB as Pulmonary TB which was both sputum smear negative and non-severe as determined by a chest x-ray and also included extrapulmonary lymph node TB.

The children were randomised to receive either six months or four months of treatment, with the continuation phase of treatment reduced from four to two months in the four-month arm. They were then followed up for a period of 18 months.

The key result was that four months of treatment was non-inferior to the standard six-month treatment. There was no statistically significant difference when comparing the six months and four months groups in terms of an unfavourable outcome (treatment failure, TB recurrence, death of any cause, and loss-to-follow-up). Both groups showed similarity in terms of side-effects related to treatment.

The Tuberculosis Trials Consortium Study 31/AIDS Clinical Trials Group A5349 (Study 31/A5349) was an international, multicentre, randomized, open-label, phase 3, noninferiority trial conducted at 13 countries by the Centre for Disease Control and Prevention (CDC) Tuberculosis Trials Consortium and the National Institutes of Health AIDS Clinical Trials Group involving persons with newly diagnosed pulmonary Tuberculosis.



It compared two 4-month Rifapentine-based regimens with a standard 6-month regimen consisting of Rifampicin, Isoniazid, Pyrazinamide, and Ethambutol (control group). In one of the study groups, in a 4-month regimen, Rifampicin was replaced with Rifapentine and in the other study group, Rifampicin was replaced with Rifapentine and Ethambutol with Moxifloxacin. The primary efficacy outcome studied was survival free of tuberculosis at 12 months. The trial results showed that the efficacy of a 4-month Rifapentine-based regimen containing Moxifloxacin was noninferior to the standard 6-month regimen in the treatment of Tuberculosis. (7)

RIFASHORT (5) was an International Multicenter Controlled Clinical Trial to evaluate 1200mg and 1800mg Rifampicin Daily for Four Months in the Reduction of the Duration of Standard Treatment of Pulmonary Tuberculosis. This trial showed that increasing the Rifampicin dose was not enough to demonstrate non-inferiority compared to the six-month standard of care, though participants randomized to the four-month, high-dose rifampicin regimens still did well.

The **TRUNCATE-TB** trial (5) pushed treatment shortening for drug-sensitive TB beyond the four-month benchmark, demonstrating the ability of a Bedaquiline- and Linezolid-containing regimen to shorten treatment to just two months. The two months treatment regimen containing Bedaquiline and Linezolid demonstrated non inferiority to the standard of care.

This trial is a proof-of-concept trial and should not be translated directly into policy until further studies are done to optimize the regimen in program settings and in a broader population which includes people living with HIV (PLHIV).

SimpliciTB (5) trial was conducted to evaluate the safety and efficacy of BPamZ (Bedaquiline, Pretomanid, Moxifloxacin and Pyrazinamide) regimen in patients with either DSTB or DRTB. Preclinical trials and an early-stage clinical study in DRTB patients with this regimen has earlier shown promising results with high efficacy and treatment shortening potential. The trial enrolled 455 participants with DSTB or DRTB in 26 sites across 8 countries. Analysing the primary end point results showed that DSTB patients had culture conversion by week 8, 2.93 times higher demonstrating better efficacy of this regimen. The secondary endpoint of non-



inferiority compared to the 6 months standard HRZE regimen in DSTB could not be demonstrated due to adherence challenges with almost 10 % of patients on BPamZ discontinuing treatment due to side effects.

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TB PATIENT -- TEN MORE MINUTES

Dr Latha Sarma

Tuberculosis is one of India's major public health problems. According to World Health Organization estimates, India has the world's largest tuberculosis epidemic. In 2020, India accounted for 26% of the incident TB cases across the globe.

The first response of the patient on knowing the diagnosis is dejection followed by fear. The worry is regarding spreading disease to close family members, need for prolonged medication, not wanting to disclose the diagnosis to others. Questions like will it be cured fully, will the disease come back, popup time and again. Persisting doubts, unclear data can lead to misinformation and defaulting, one important reason for drug-resistance.

Can we do anything about it, a little extra time to clear their doubts, little personal attention, feeling empathy towards the patient, involving family members go a long way in gaining patient's confidence.

An important cause for drug resistant TB which can be avoided and needs extra effort by the practitioner is counselling regarding meticulous intake of medication. This needs little more time than usual consultation but goes a long way in convincing the patients. Building trust, giving examples of good response and recovery, emphasizing importance of adherence to treatment, explaining the nature and duration of treatment do help in instilling confidence in the patients.

TB Seal Campaign is a novel way of spreading information regarding TB, treating Doctors can take an initiative of pasting the seal on consultation paper at diagnosis giving them assurance that we are there for you in this journey for recovery.

Explaining possible side-effects and ways to deal is another essential aspect that needs to be stressed on. Nausea/vomiting in initial days is an important reason for quitting treatment. Use of customized stamps enlisting the common side-effects of ATT can be practiced, this not only looks effective but also saves the practitioner's time.

While treating EPTB, it is advisable to interact with doctors of other specialties to understand the response to treatment. This is especially true in case of CNS, skeletal and abdominal TB, where advanced investigations and interventions might be needed for diagnosis and management. Private practitioners need to encourage patients to take medication from nearby TB centers especially for patients from suburban and rural areas to reduce drop-out rates. It is the responsibility of each one of us to provide our unstinting support to eliminate TB.

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