



## Editorial

### First Ibero-American Summit on Lung Cancer Screening



Lung cancer is the leading cause of cancer deaths worldwide with an incidence–mortality ratio close to one.<sup>1</sup> Although it affects non-smokers as well, smoking remains the main cause of lung cancer, with a biological gradient showing a higher risk associated with heavier tobacco use. An increase in cases and deaths related to this disease is expected in the coming years. Low-income countries are the most affected, experiencing higher incidence and mortality rates from lung cancer.<sup>2</sup>

In recent years, several scientific studies, registries, and meta-analyses have unequivocally shown that lung cancer screening of high-risk individuals using low-dose chest computed tomography (LDCT) significantly reduces mortality from this disease.<sup>3–5</sup> The benefit of screening is expected given that most lung cancers found incidentally are inoperable and costs of systemic therapies, which at best prolong life, are significantly higher than those of a successful surgical resection.<sup>6,7</sup>

Lung cancer screening programs should meet certain minimum standards, including at least a tobacco cessation program, a referral system for patients with non-respiratory comorbidities, access to LDCT and an interdisciplinary lung nodule committee.

There are limitations and potential dangers associated with the implementation of these programs, mainly related to the false positive rates associated with LDCT, potential overdiagnosis, and complications associated with invasive procedures. In regions with a high incidence of tuberculosis, for example, and in much of Latin America, granulomatous or scar-related nodules might increase the false positive rate and raise the risk of complications related to invasive management. However, two publications show that the implementation of lung cancer screening programs in populations with a high incidence of tuberculosis yields similar results to the initial studies in terms of diagnoses and biopsies performed.<sup>6,7</sup> In other words, lung cancer screening programs demonstrate good external validity even in contexts that differ from the original studies.

In this context, the first Ibero-American Summit on Lung Cancer Screening was held during the 56th SEPAR Congress in Granada, Spain. During the summit, participants from more than ten countries discussed implementation of screening, its limitations, and challenges in Ibero-America. Future perspectives and new complementary technologies to LDCT were also discussed. Finally, a scientific meeting was held with representatives of all the participating respiratory societies in order to reach a consensus regarding next steps.

Members of the scientific committee of the first Ibero-American Summit on Lung Cancer Screening agreed that there is enough evidence to recommend and promote the implementation of lung

cancer screening programs in our respective countries. It is no longer a question of if, but when and how these programs should be implemented. Lung cancer screening programs should minimize risks and be adapted to regional realities, taking into account the importance of lung cancer's impact on women, nonsmokers, and the heterogeneity of molecular profiles in Latin America and the Iberian peninsula. Data should be registered and analyzed in order to guarantee quality assurance.

We recognize the inherent obstacles to implementation, including institutional, social, and economic challenges in an extensive and diverse region. Participants in the summit proposed various initiatives in order to identify available resources, as uncertainty regarding the disparity and availability of technical and human resources remains. In this sense, an agreement was reached to promote education in lung cancer screening programs, extending it to non-specialist physicians involved in primary care.

The development of national and regional consensus statements that consider the particularities of each region and the creation of homogeneous, regional, and collaborative registries should be a public health priority. Lung cancer screening programs, as a secondary prevention strategy for a highly prevalent and lethal disease, offer a unique opportunity to improve survival and reduce inequity in our health systems.

#### Conflict of Interest

Sebastian Lamot reports honoraria from AstraZeneca as advisor and speaker. He has received travel grants from Boheringer and Janssen. Francisco Suarez reports serving as an advisor and speaker for AstraZeneca and Roche. Luis Seijo reports a role as scientific advisor for Sabartech, Serum, Astra Zeneca, Roche, MSD, and Median technologies, and paid honoraria as a speaker from Astra Zeneca, GSK, Roche, Menarini, and Chiesi. Iris Boyeras has received honoraria from AstraZeneca, Roche, and MSD. She was the principal investigator for an Astra Zeneca sponsored registry. Juan Carlos Trujillo reports receiving honoraria as a speaker and/or member of advisory boards from AstraZeneca, Medtronic, Olympus, Roche, and J&J. Sergio Benitez reports honoraria from Astra Zeneca and travel grants from GSK, Bago and Astra Zeneca. Gustavo Faibisew reports participating in scientific events and receiving honoraria for lectures and/or advisory board meetings from Astra Zeneca, Pfizer, Bristol Myers Squibb, Merck Sharp & Dohme, Daiichi Sankyo, Roche, Janssen, Takeda, and Boehringer-Ingelheim. Venceslau Hespanhol reports honoraria for lectures and/or advisory board membership from Astra Zeneca, Pfizer, Bristol Myers Squibb, Merck Sharp & Dohme, Daiichi Sankyo, Roche, Janssen, Takeda, Boehringer-

Ingelheim, MERCK, and BMS. Lucía Viola reports advisory board membership for MSD and BMS, receiving honoraria as a speaker for Astra Zeneca, BMS, and MSD, and travel grants from GSK, Sanofi, BMS, and MSD. Maria Rodriguez reports receiving honoraria from Astra Zeneca, Abex/Intuitive, and Johnson & Johnson.

## References

1. Mattiuzzi C, Lippi G. Current cancer epidemiology. *J Epidemiol Glob Health*. 2019;9:217–22.
2. Sung H, Ferlay J, Siegel RL, Laversanne M, Soerjomataram I, Jemal A, et al. Global cancer statistics 2020: GLOBOCAN estimates of incidence and mortality worldwide for 36 cancers in 185 countries. *CA Cancer J Clin*. 2021;71:209–49.
3. Aberle DR, Adams AM, Berg CD, Black WC, Clapp JD, Fagerstrom RM, et al. Reduced lung-cancer mortality with low-dose computed tomographic screening. *N Engl J Med*. 2011;365:395–409.
4. de Koning HJ, van der Aalst CM, de Jong PA, Scholten ET, Nackaerts K, Heuvelmans MA, et al. Reduced lung cancer mortality with volume CT screening in a randomized trial. *N Engl J Med*. 2020;382:503–13.
5. Bonney A, Malouf R, Marchal C, Manners D, Fong KM, Marshall HM, et al. Impact of low-dose computed tomography (LDCT) screening on lung cancer-related mortality. *Cochrane Database Syst Rev*. 2022. Art. No.: CD013829.
6. Hochhegger B, Camargo S, Borges da Silva Teles G, Caruso Chate R, Szarf G, Duarte Guimaraes M, et al. Challenges of implementing lung cancer screening in a developing country: results of the second Brazilian Early Lung Cancer Screening Trial (BRELT2). *JCO Glob Oncol*. 2022;8:e2100257. <http://dx.doi.org/10.1200/JGO.21.00257>.
7. Munhoz Svartman F, Mello Roux Leite M, Garcia Sartori AP, Soares Gutierrez R, Cadore AC, Martins de Oliveira CT, et al. Lung cancer screening with low-dose CT integrated with pulmonary care in a public hospital in southern Brazil: results from the first 712 patients. *J Bras Pneumol*. 2022;48, e20220146.
- Sergio Benitez<sup>a</sup>, Franzel Delgado<sup>b</sup>, Venceslau Hespanhol<sup>c</sup>, Iris Boyeras<sup>d</sup>, Sebastian Lamot<sup>a</sup>, Gustavo Faibischew<sup>e</sup>, Francisco Suarez<sup>f</sup>, Lucia Viola<sup>g</sup>, Maria Rodriguez<sup>h</sup>, Juan Carlos Trujillo<sup>h</sup>, Luis M. Seijo<sup>h,\*</sup>
- <sup>a</sup> Asociación Latinoamericana del Tórax (ALAT), Spain
- <sup>b</sup> Sociedad Venezolana de Neumología y Cirugía de Tórax (SOVETORAX), Spain
- <sup>c</sup> Sociedade Portuguesa Pneumologia (SPP), Spain
- <sup>d</sup> Asociación Argentina de Medicina Respiratoria, Spain
- <sup>e</sup> Sociedad Brasileira de Pneumología e Tisiología, Spain
- <sup>f</sup> Sociedad Chilena de Enfermedades Respiratorias, Spain
- <sup>g</sup> Asociación Colombiana de Neumología y Cirugía de Tórax (ASONEUMOCITO), Spain
- <sup>h</sup> Sociedad Española de Neumología y Cirugía Tóracica (SEPAR), Spain

Corresponding author.  
E-mail address: lseijo@unav.es (L.M. Seijo).