



ACGIH<sup>®</sup>

# TLV<sup>®</sup>/BEI<sup>®</sup> Development Process

James H. Price  
ACGIH<sup>®</sup>, Director of Science



# Agenda

- Introduction to ACGIH®
- Statement of Position
- Conflict of Interest
- TLV®/BEI® Development Process and **Important Changes**
- Basis and Limitations of TLVs®/BEIs®
- Providing Input to ACGIH®
- Sources of Information



# ACGIH<sup>®</sup>

- New Position and Tagline for ACGIH<sup>®</sup>

- ✓ **ACGIH<sup>®</sup> Brand Promise:**

- ACGIH<sup>®</sup> advances worker protection by providing timely, objective scientific information to occupational and environmental health professionals.

- ✓ **ACGIH<sup>®</sup> Tagline:**

- ACGIH<sup>®</sup>: Defining the science of occupational and environmental health

- ACGIH<sup>®</sup>: Membership-based organization
- ACGIH<sup>®</sup> Committees: Provide technical expertise and knowledge fundamental to ACGIH<sup>®</sup>





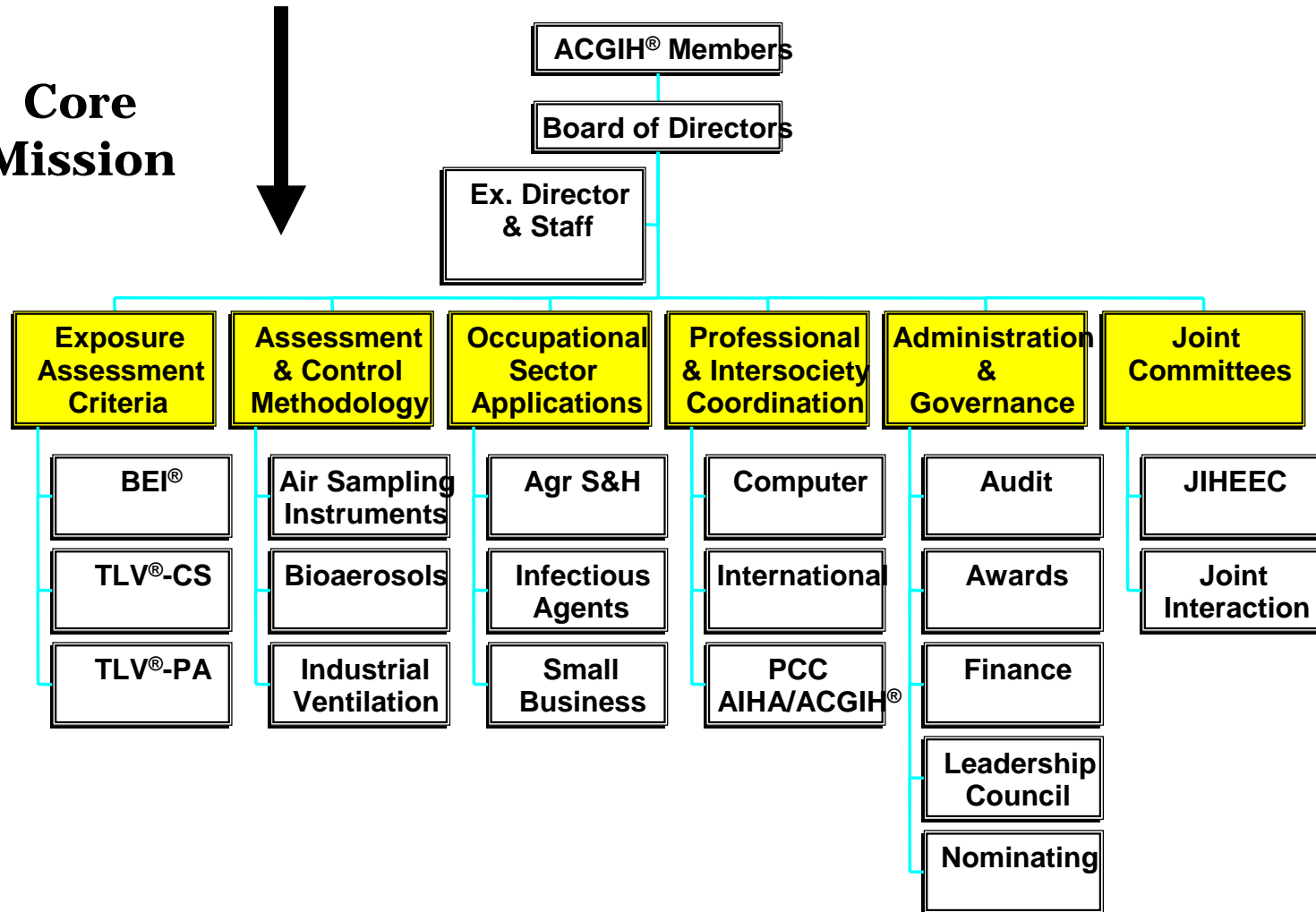
# ACGIH® Committees

- Committees consist of members who volunteer time toward developing scientific guidelines and publications
  - ✓ Primary goal is to serve the scientific needs of occupational and environmental health professional
  - ✓ Committee expenses (travel) are supported by ACGIH®
  - ✓ Time is donated by the members



# Committees

**Core  
Mission**





# Policies and Processes for Limiting Conflict of Interest



# Conflict of Interest

- Committee members serve as individuals, not as representatives of organizations and/or interest groups
- Members are selected based on expertise, soundness of judgment, and ability to contribute

# Conflict of Interest

- Annual discussion of conflict of interest in full Committee
- Annual declaration by each member
  - ✓ Professional employment background
  - ✓ Current professional activities
  - ✓ Consulting
  - ✓ Research funding
  - ✓ Financial holdings



ACGIH<sup>®</sup> Statement of Position  
adopted by the ACGIH<sup>®</sup> Board of Directors on  
March 1, 2002

***ACGIH<sup>®</sup> is not a standards setting body.***

**TLVs<sup>®</sup> and BEIs<sup>®</sup> —**

- Are an expression of scientific opinion.
- Are not consensus standards.
- Are based solely on health factors; it may not be economically or technically feasible to meet established TLVs<sup>®</sup> or BEIs<sup>®</sup>.





# ACGIH<sup>®</sup> Statement of Position

## TLVs<sup>®</sup> and BEIs<sup>®</sup> —

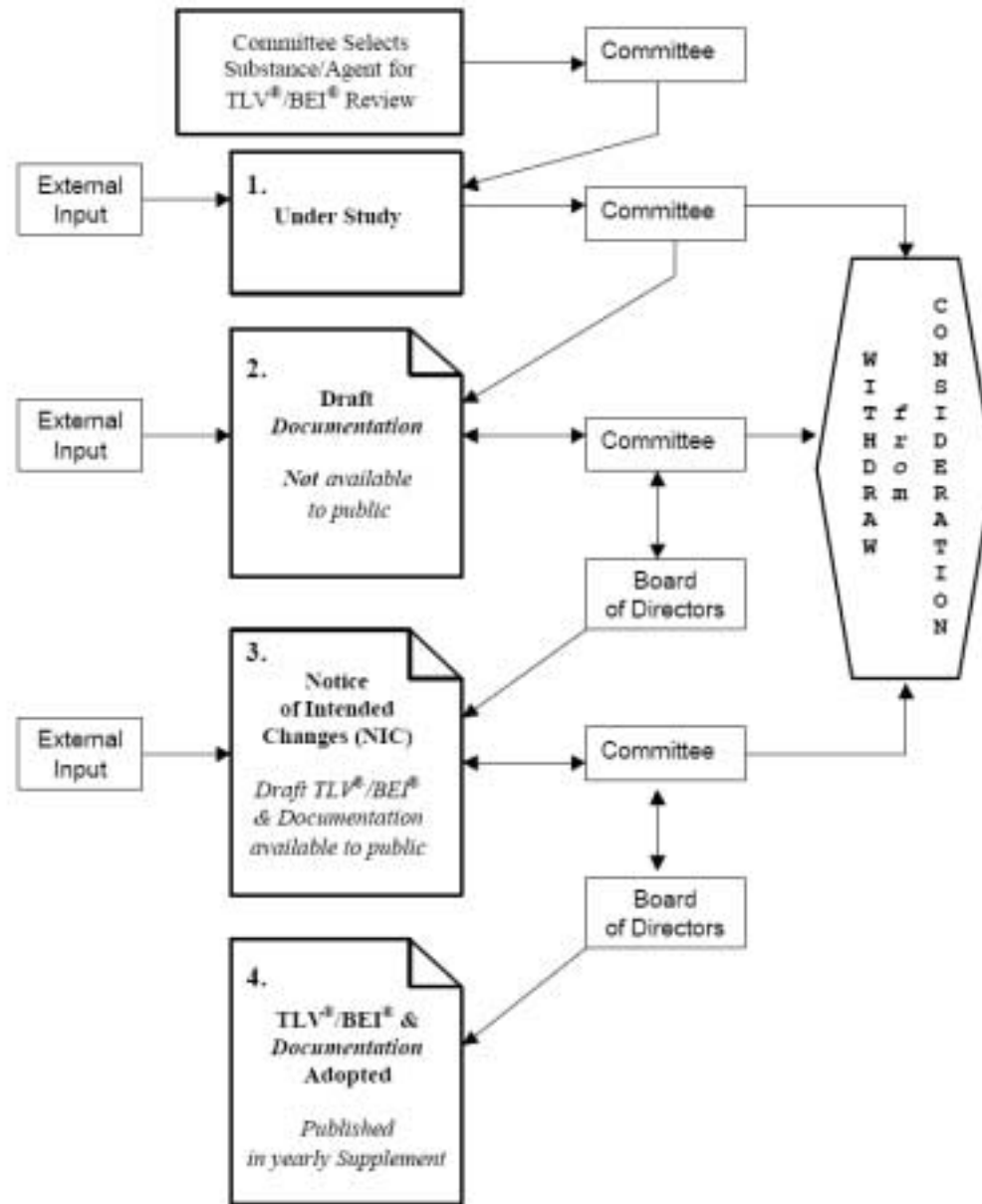
- Should **NOT** be adopted as standards without an analysis of other factors necessary to make appropriate risk management decisions.
- Can provide valuable input into the risk characterization process. The full written *Documentation* for the numerical TLV<sup>®</sup> or BEI<sup>®</sup> should be reviewed.



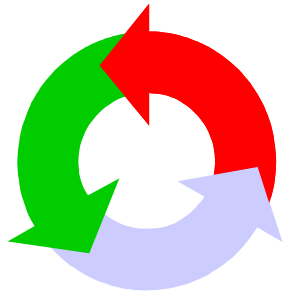


# TLV<sup>®</sup>/BEI<sup>®</sup> Development Process

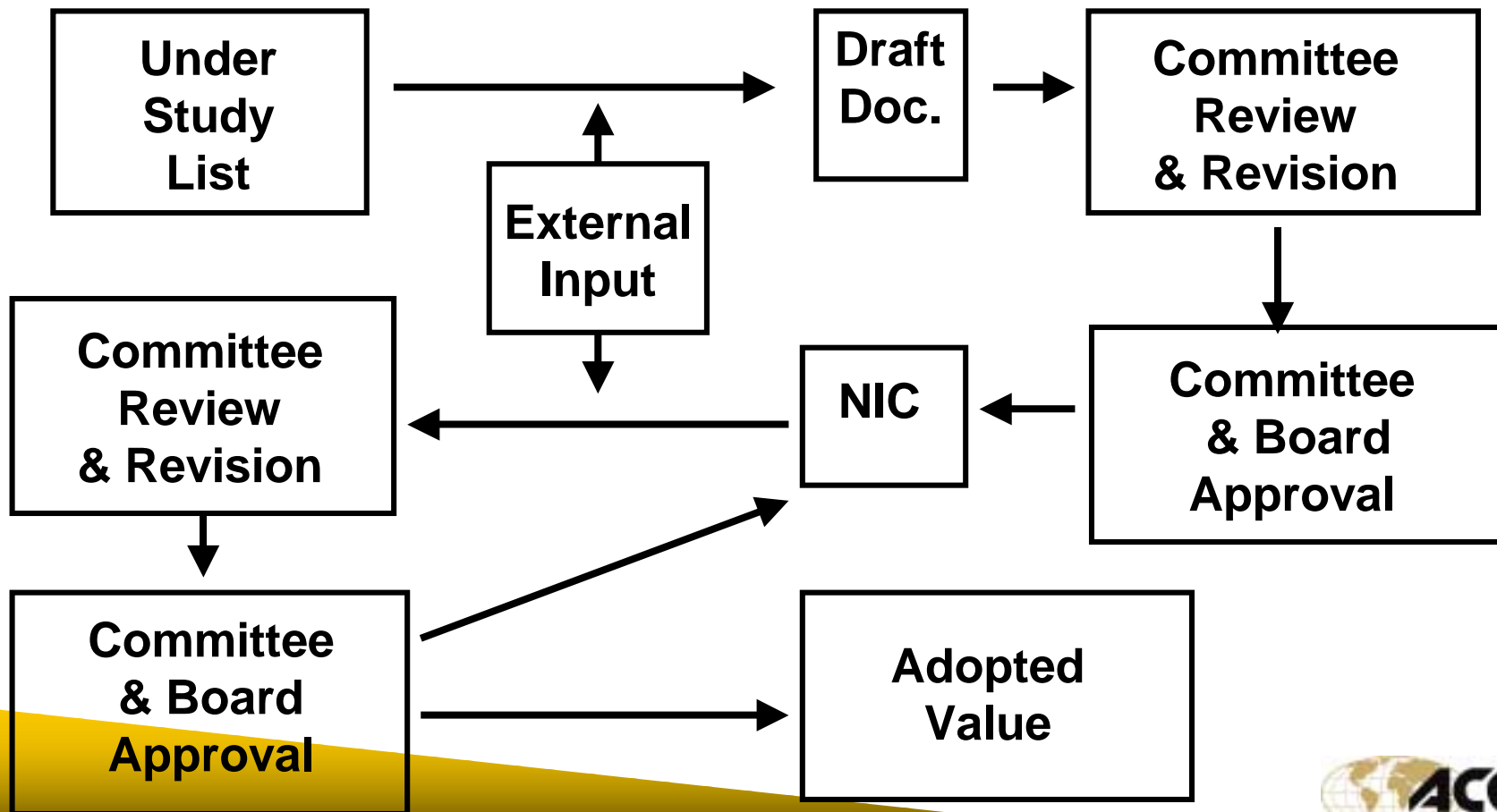




December 31, 2024



# TLV<sup>®</sup> Development Process





# TLV<sup>®</sup>/BEI<sup>®</sup> Development Process Important Changes

- **Under Study List:** Beginning 2006 provide additional information on status of substances and agents on Under Study List.
- **NIC and NIE Comment Period:** Beginning 2007 limit comment period to firm six-month period, running from February 1 to July 31 of each year.





# Under Study List Change - 2006

- Continued Practice: Publish general Under Study List by February 1 of each year
- Added Practice beginning 2006: Publish updated two-tiered Under Study List by July 31 of each year
  - ✓ Tier 1: Substances and agents that may move forward as an NIC or NIE in upcoming year
  - ✓ Tier 2: Substances and agents that will not move forward, but will either remain on, or be removed from list in upcoming year
  - ✓ Two-tier list will remain for balance of year
- Above practice: Will start over each year
  - ✓ General list by February 1
  - ✓ Two-tiered list by July 31





# NIC and NIE Change - 2007

- Restructuring comment period to ensure receipt of comments in time for full consideration
  - ✓ Comment period closes July 31 for that year's Committee deliberations regarding outcome for possible adoption of a NIC or NIE.
  - ✓ Comment period runs from February 1 to July 31.
  - ✓ Draft *Documentation* available for review during this full six month comment period.
- Ongoing Process
  - ✓ ACGIH<sup>®</sup> reviews all comments regarding substances/agents on Under Study, on NIC or NIE or currently adopted BEIs<sup>®</sup> or TLVs<sup>®</sup>
  - ✓ Comments received after July 31 for a NIC or NIE will be considered in the following year.





# Basis of TLVs<sup>®</sup> / BEIs<sup>®</sup>

## *Scientific Literature*

- Published/Peer Reviewed Science (Principal Source)
- Reviewed Articles (Secondary)
- Unpublished Science (Secondary)
  - ✓ Before Use: Owner must provide ACGIH<sup>®</sup> permission to use and cite the report, and release the report to a third party
  - ✓ Consideration of TLVs<sup>®</sup> are not deferred pending completion of on-going or planned research
- Not a review of all available literature
  - ✓ Emphasis on peer-reviewed literature
  - ✓ Emphasis on literature pertinent to the issue



# TLVs<sup>®</sup> Defined

- TLV<sup>®</sup> — more than just  
“THE NUMBER”
- *Documentation* describes:
  - ✓ Critical health effects
  - ✓ Quality of the data relied upon and areas of uncertainty
  - ✓ Possible sensitive subgroups
  - ✓ Type of TLV<sup>®</sup> (TWA, STEL, C) and reason for selection
  - ✓ Notations

# Warnings

- NOT to be used as an index of relative toxicity
- NOT for estimating toxic potential of continuous, uninterrupted exposures or other extended work periods
- NOT as proof/disproof of existing disease
- NOT to evaluate or control air pollution
- NOT legal standards

# How/When Interested Parties Can Most Effectively Provide Input to the TLV<sup>®</sup>/BEI<sup>®</sup> Development Process

- Under Study stage
- NIC Stage
- Submit published, peer-reviewed science
- Unpublished works: Write an article and get it published
- Relevant unpublished studies: Submit to ACGIH<sup>®</sup> with permission to use, cite and release study



# Information Sources on TLV<sup>®</sup> / BEI<sup>®</sup> Recommendations Ratified by ACGIH<sup>®</sup> Board

For Adopted and Notice of Intended Changes  
(NIC) Recommendations:

- ACGIH<sup>®</sup> Annual Report  
(January/February)\*
- ACGIH<sup>®</sup> Website (January/February)\*
- *TLVs<sup>®</sup> and BEIs<sup>®</sup>* Book (Spring)\*

\* Also identifies substances and agents Under  
Study





# Online ACGIH<sup>®</sup> TLV<sup>®</sup>/BEI<sup>®</sup> Resources

[www.acgih.org](http://www.acgih.org)

- Conflict of Interest Policy
- TLV<sup>®</sup>/BEI<sup>®</sup> Policy Statement
- TLV<sup>®</sup>/BEI<sup>®</sup> Position Statement
- TLV<sup>®</sup>/BEI<sup>®</sup> Development Process
- Under Study List
- Notice of Intended Changes (NIC) List
- BEI<sup>®</sup>/TLV<sup>®</sup>-CS Committees Operations Manuals
- ACGIH<sup>®</sup> Annual Presentation at AIHce



# Questions/Discussion