



# INTERNATIONAL LEAD AND ZINC STUDY GROUP

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## **ECONOMIC & ENVIRONMENT COMMITTEE**

Forty-Fifth Meeting

Lisbon

Friday 27 September 2024

09:00 to 11:00

### **ACTIVITIES IN 2024 AND PROPOSALS FOR THE 2025 WORK PROGRAM**

The Economic and Environment Committee was set up to ensure that members are kept informed about environmental regulations that may have trade implications, developments in lead and zinc end-use sectors, and changes in production and recycling technology. In order to fulfil this role, the Committee has produced reports on end-use markets and directories monitoring environmental regulations governing lead and zinc.

Work items that have been completed are indicated below. In a number of cases work items have been drawn from feedback received from government representatives and industry advisers.

#### ***Activities Completed Since the October 2023 Session***

##### **a. World Zinc Factbook 2024**

With its wide application in consumer goods, construction, automobile, fertilizer, and nutrition supplements to organisms, zinc is not only an industrial mineral but is also listed as a “lifesaving commodity” by the United Nations. Based on the ILZSG’s many years of detailed monitoring of the global zinc market it was agreed that the secretariat would develop a Zinc Factbook to provide member countries, the industry, and the broader public with a better understanding of zinc’s role and importance in the global economy and human wellbeing.

The inaugural Factbook published in 2020 provided a clear picture of how zinc functions both as an industrial mineral and as a product that is important in daily life.

To reflect the most recent developments in the world zinc industry it was agreed that the Secretariat would prepare an update of the World Zinc Factbook using internal resources. The director of Economics and Environment presented key elements of the World Zinc Factbook

2024 at the Group's April meetings. After incorporating comments and inputs received, the soft and hard copies of the Factbook will shortly be available for distribution.

#### **b. "ILZSG Insight" Reports, Metals Despatch Newsletter and Published Articles**

The secretariat continues to produce concise briefing notes ("ILZSG Insights") on a variety of topics that may have implications for the lead and zinc industries in ILZSG member countries. The "ILZSG Insight" focuses on subjects of interest to our members. Member countries are invited to ask the secretariat to cover specific topics of interest.

Issue No.34 of the Metal Dispatch Newsletter was published in January 2024. The Newsletter included a summary of the most recent Study Group meetings and secretariat activities as well as updated details of current publications and other information of interest to members.

Further issues of "ILZSG Insight" and "Metal Despatch Newsletter" are planned and member countries are invited to put forward requests to the secretariat regarding topics.

#### **c. World Lead Factbook**

The Director of Economics and Environment presented the key findings of the new World Lead Factbook 2023 at the Study Group's meetings last October. Since then, both the soft and hard copies of the Factbook have been made available for distribution. Comments and suggestions from Members regarding the content on the next Factbook are welcome.

#### **d. Presentations and Meetings**

The Director of Economics and Environment participates in conferences and meetings each year, typically making presentations and providing information on the work of the Study Groups.

Details of the conferences and meetings attended by the Director of Economics and Environment over the past 12 months are shown below.

- The ILZSG Director of Economics and Environment represented the Secretariat at the 8th Edition of the EU Raw Materials Week organized by the EU Commission in Belgium in November 2023. During the week, the Director of Economics and Environment participated in a series of events including the 10th Annual High-Level Conference of the European Innovation Partnership on Raw Materials "Critical Raw Materials Act – Ready to Go", Sustainable Raw Materials Value Chains in the EU CRM Act, 6th EU Critical Raw Materials Event "Challenges and solutions in supply risk monitoring and mitigation", 6th Event on the United Nations Framework Classification for Resources and the United Nations Resource Management, EU – Kazakhstan Business Forum, Promoting raw materials exploration in the EU, and Workshop on the Strategic R&I Agenda for the Co-funded Partnership Raw materials for Europe. Besides participating in the discussions at those meetings, the Director of Economics and Environment discussed with participants and speakers a variety of issues related to the supply of critical raw materials and the role of the Study Groups in the provision of market transparency in the process.
- The 10th Scientific Seminar organized by the Mineral Processing and Extractive Metallurgy for Mining and Recycling Innovation Association took place in Lisbon in November 2023. A series of pyrometallurgical and hydrometallurgical lab-stage and pilot-stage technological processes were introduced by representatives from universities, research institutes, and

smelters/refiners to secure the availability of critical raw materials, reduce carbon emission and energy consumptions, and contribute to twin green transition and digital transition in the EU. The Director of Economics and Environment attended the seminar, discussed with a wide range of professors, technicians, and practitioners in the field, and introduced the activities of the Study Group.

- The ILZSG Director of Economics and Environment was invited to participate in the 11th Annual World Ocean Summit and Expo 2024 on a complimentary base organized by the Economist Impact in Lisbon in March 2024. The Director of Economics and Environment took part in a series of side events ranging from deep seabed mining to ocean economy, and ocean ecosystem preservation.
- The ILZSG Director of Economics and Environment participated in the 3<sup>rd</sup> Session of the Open-ended Working Group Meeting on the preparation of a “Science-policy panel to contribute further to the sound management of chemicals and waste and to prevent pollution” in June 2024.
- Late this year, the Director of Economics and Environment will either speak on or participate in conferences organized by the Consortium for Battery Innovation in Guangzhou, IGF Annual Meeting in Geneva, and the EU Raw Material Week in Brussels.

#### **e. Activities Related to Minamata Convention, UNEP, and ISA**

The Study Groups have been admitted as Intergovernmental Observers to the Conference of Parties to the Minamata Convention on Mercury. The Director of Economics and Environment has represented the Study Groups at meetings of the Minamata Convention and was actively involved in discussions on issues related to non-ferrous minerals and metals.

The Study Groups currently participate in the work of the UNEP Global Mercury Partnership. Currently, the Global Mercury Partnership covers eight partnership areas including Artisanal and small-scale gold mining (ASGM), Mercury releases from coal combustion, Mercury cell chlor-alkali production, Mercury in products, Eliminating Mercury Skin Lightening Products, phasing down the Use of Dental Amalgam, Mercury air transport and fate research, Mercury waste management, Mercury supply and storage, and Mercury releases from the cement industry. Interest in developing a new working area covering Mercury from Non-ferrous Metals has been growing in recent years marked by the report Mercury from Non-ferrous Metals Mining and Smelting which the ILZSG has contributed to through participating in the expert group and a series of online discussions organized by UNEP.

The Study Groups have been invited by UNEP to participate in the ad hoc open-ended working group (OEWG) to prepare proposals for the “Science-policy panel to contribute further to the sound management of chemicals and waste and to prevent pollution” and the ILZSG Director of Economics and Environment participated in the Ad Hoc Open-Ended Working Group on the Science-Policy Panel to contribute further to the sound management of chemicals and waste and to prevent pollution (OEWG-3).

The International Seabed Authority (ISA) is an autonomous international organization. ISA has the mandate to ensure the effective protection of the marine environment from harmful effects that may arise from deep-seabed-related activities. As of 18 May 2023, ISA has 169 Members, including 168 Member States and the European Union. Further to the presentation by the

Secretary-General of the ISA at the Study Groups' Joint Seminar in April 2024, the Groups were invited to apply to be an official observer to the ISA and subsequently submitted an application.

## **f. Response to Inquiries from the Industry**

The International Lead Association commissioned Roland Berger to look at lead and lithium-ion battery raw material supply and demand out until 2035 to assess what impact if any, further regulatory restrictions on the use of lead in batteries could have for lithium-ion critical raw material demand. The Director of Economics and Environment provided data and worked with ILA to corroborate and justify the lead demand in different applications.

### ***On-going Activities and Work in 2024***

#### **1. "ILZSG Insight" and "Metals Despatch" Newsletters**

The secretariat has continued to produce concise briefing notes ("ILZSG Insight") on various topics that may have implications for the lead and zinc industries in ILZSG member countries.

The Economics and Environment Committee has coordinated the publication of the Joint Study Groups' Newsletter, "Metals Despatch".

Two new Insight papers are currently under preparation and will be presented at the Groups' meetings in September. These are as follows:

- **Global Critical Minerals Acts, Initiatives, and Policies** Critical Minerals are essential for a range of key industries including solar photovoltaic, wind farms, EV batteries, grid upgrading, hydrogen, geothermal collection, chips, and defence. These industries are in turn dictating the speed and scale at which the energy transition, green transition, and digital transition will take place. These timely, efficient, and sustainable transitions will be essential in determining whether humans can win the battle against the triple crisis: climate change, nature and biodiversity loss, waste and pollution. Governments all over the world are increasingly prioritizing these issues in their agendas and have identified a plethora of critically important minerals that are indispensable for these efforts. This Insight paper will provide a holistic look at the current regulations, acts, and initiatives in securing the availability, affordability, and sustainability of critical minerals. The Director of Economics and Environment will present the key findings in the Paper at the Joint Seminar on Critical Minerals Initiatives and Strategies. The final paper will be sent to members with comments and inputs incorporated.
- **The Macro-Economic Outlook for China and the Implications for Base Metals.** China is currently the second-largest economy globally in nominal terms and is the largest in terms of purchasing power parity (PPP). Commensurate with its economic stature, China currently uses more than 50% of the world's base metals output. Accommodative monetary and fiscal policies favouring investment and consumption, and a sustained export market for goods made in China will all determine China's appetite for minerals and base metals in the future. The accelerating aging of its population, dwindling birth rate, crisis-affected real estate sector, anaemic domestic consumption, scepticism of investment prospects, and the deteriorating geopolitical environment are all clouding the confidence of consumers and investors.

However, the fundamentals of China's economy are still very strong taking into account the size of its economy and population, factoring in its inextricable links in the global supply chains and value chains, and reconciling China's leading role in producing and deploying renewable energies, EVs, and EV batteries. For the foreseeable future, the global minerals and base metals industries will not be able to find a substitute for China's role in their markets and will need to examine the overall outlook for China's policymaking and the implications on the sectors that are minerals and metals intensive. This Insight paper will try to dissect various concerns regarding China's economic policies and prospects so as to enable readers to accurately position their respective views on the development of China's minerals and base metals industry and the implications for the global base metals markets.

The Director of Economics and Environment also presented the key findings of the Insight Paper on the Macro-Economic Outlook for China and the Implications on Base Metals at the Economics and Environment Committee Meeting, the paper will be disseminated to members with comments and inputs incorporated.

Further issues of "ILZSG Insight" and Metals Despatch" are planned and member countries are invited to ask the secretariat to cover specific issues of interest.

## **2. Future Developments in the Global E-bike Market and the Implications for Lead Demand**

The global e-bike market has witnessed explosive growth over the past 20 years and this upward momentum is expected to continue. Though lead-based batteries are still considered to be the main motive source for e-bikes, new battery chemistries such as lithium-ion have gained market share thanks to their higher energy density, lighter weight, and lower cost. It is clear that though the e-bike sector remains a crucial sector for both lead-acid battery and refined lead metal demand, the shift towards other chemistries could have significant implications for both these sectors. This report aims to provide a holistic overview of the development of the global e-bike industry and its future requirements for lead-acid batteries. The report will assess both current and likely future trends in the e-bike market. It will analyze how changes in battery chemistry will evolve, at what speed, and the potential impact of this on global lead demand.

At the Group's last meetings, it was agreed that this report would be undertaken by an external consultant using finances from ILZSG's project fund up to a maximum cost of €30,000.

The Director of Economics and Environment developed detailed Terms of Reference and contacted several potential bidders for the project. At the end of a competitive bidding process, the contract was awarded to Shanghai Metal Markets (SMM) Global UK Ltd. SMM will present the draft report at the Study Groups April Meeting 2025 with the final report expected to be available the following month after comments and inputs received at the meeting and from the secretariat incorporated.

## **3. Further Development of the ILZSG Web Site**

The ILZSG website is a major source of information on the Study Group's activities for both members and the general public. The secretariat continues to review the content and the design of the ILZSG website and update the site. The Director of Economics and Environment overviewed and updated all the links to member countries, updated the online leaflet of the Study Groups in other languages, and will continue to contribute to the website on an ongoing basis.

#### **4. Product Stewardship, Sustainable Development, Recycling and Public Health**

The Secretariat is involved on an ongoing basis in a number of activities related to stewardship. The Secretariat will continue to monitor this initiative and will brief member countries on developments when they occur. In recent years the secretariat has assisted in establishing contacts and encouraging the exchange of information between industry and member countries.

Within the context of product stewardship and sustainable development, the secretariat maintains an ongoing dialogue with several organizations including the United Nations Commission on Sustainable Development, the Intergovernmental Forum on Mining and Metals and the International Council on Mining & Metals, The Minamata Convention on Mercury, the IZA and ILA. The ILZSG was officially admitted as an “Observing Intergovernmental Organization” of the Conference of Parties of the Minamata Convention on Mercury which has 128 signatories and has been ratified by 101 countries.

#### **5. Common Fund for Commodities (CFC)**

The secretariat continues to seek to identify new projects for funding by the Common Fund for Commodities (CFC). The new approach adopted by the CFC to focus on larger-scale projects based on loans rather than small grants has resulted in a change to the criteria of potential projects and has reduced the role of the Study Groups in the approval process. However, the secretariat has maintained its contact with CFC and industry associations to provide information on world metals markets to support applications. The secretariat remains open to suggestions for new projects.

#### **6. Conflict Minerals**

The secretariat continues to monitor and report on the topic of conflict minerals and on activities underway by various organizations to assist companies in complying with legislative requirements. The secretariat collected publicly available information on smelters that process conflict minerals and compiled lists of compliant smelters for each of the four conflict metals. These lists have been made available to members. The secretariat is also following developments of different legislations and initiatives related to conflict minerals. The secretariat also extended its work on conflict minerals to the field of responsible supply chains.

#### **7. Identify and Confirm Suitable Speakers for the Group’s Meetings**

The Director of Economics and Environment maintains close contact with a variety of associations, NGOs, IGOs, academia, and consultancies and brings them to the Study Group’s meetings to share their expertise on issues related to minerals and metals with member governments. The Director of Economics and Environment follows closely the trends in the minerals and metals sector to identify the priority matters to be addressed at the Study Group’s EEC meeting and assist the Secretary-General regarding the organization of the Study Groups’ Joint Seminars.

## ***New Project Proposals***

### **1. ILZSG/INSG/ICSG Joint Study on Taxation and Fiscal Policies Impacting the Mining and Metals Sector**

The mining and metals sector plays a pivotal role in the economy of many countries, providing essential raw materials for industries, creating jobs, and contributing significantly to GDP. However, the mining and metals sector is subject to a complex array of taxation and fiscal policies that significantly influence its operations, profitability, and sustainability. Key tax burdens include corporate income taxes, royalties, and export taxes, which vary widely across jurisdictions. Royalties, often calculated as a percentage of the value of extracted resources, are a significant cost for mining companies and can be structured either as fixed rates or as sliding scales tied to commodity prices. Additionally, the sector may face value-added tax (VAT) on goods and services, import duties on equipment and materials, and environmental taxes aimed at mitigating the sector's ecological impact.

Fiscal policies also include incentives designed to attract investment and promote growth in the sector. These incentives can take the form of tax holidays, reduced tax rates, accelerated depreciation of capital investments, and exemptions or reductions in royalties and duties. Some countries offer specific incentives for exploration activities or for developing mines in remote or challenging locations. Governments may also provide stability agreements to protect investors from abrupt changes in fiscal policies.

However, the sector also faces challenges from unstable and unpredictable fiscal environments, particularly in developing countries, where frequent changes in tax laws can deter long-term investment. The overall tax burden in some regions can be high, impacting the competitiveness of the sector and discouraging both local and foreign investment.

Balancing these fiscal burdens and incentives is crucial for ensuring that the mining and metals sector can contribute to economic development while also generating fair revenue for governments. Effective fiscal policies should aim to create a stable, predictable, and fair environment that supports sustainable development and responsible mining practices.

To evaluate the taxation and fiscal policies affecting the mining and metals sector, and examine their implications on investment, revenue generation, operational efficiency, and long-term sustainability, the Study Group proposes to develop a report analyzing the impact of taxation and fiscal policies on the mining and metals sector, providing insights that can inform policy recommendations. The study will provide a comparative analysis of different fiscal regimes, assess the effectiveness of existing policies, and suggest potential reforms.

It is proposed that this report be carried out by an external consultant, funded by the ILZSG/INSG/ICSG Project Funds, with a budget of up to €30,000 shared equally among the Groups. Members are invited to consider and approve this project.

## ***Action for Member Countries***

Delegates are invited to discuss the proposed work items, propose additions or deletions, and agree on a Work Program for the Economic and Environment Committee for 2024/2025.