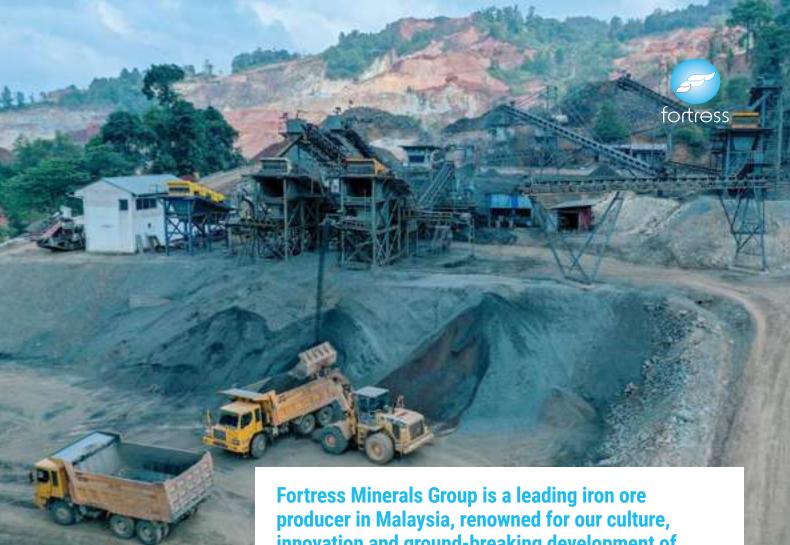


MALAYSIAN CHAMBER OF MINES (Incorporated 1914)

YEAR BOOK 2022 / 2023

Implementing Critical Priorities in Malaysia's Mineral Industry Transformation and Contribution to New Sources of National Income







innovation and ground-breaking development of our mining assets in Malaysia.

Fortress Minerals Limited ("Fortress" or the "Company" and collectively with its subsidiaries, the "Group") is principally in the business of exploration, mining, production and sale of iron ore of low level of impurities.

The Group is headquartered in Selangor, Malaysia. It presently produces iron ore products from its two producing assets, the Bukit Besi mine and Cermat Aman Sdn Bhd (the "CASB") mine, and sells its iron ore primarily to steel mills in Malaysia and trading companies in the People's Republic of China. Iron ore sold to domestic steel mills are trucked daily via the in-house fleet of heavy-duty trucks while export sales requiring sea freight sail from the easily accessible port of Kuantan or Kemaman, in the state of Pahang or Terengganu, Malaysia respectively. All of our iron ore are efficiently priced in the United States Dollar against international iron ore indices as practiced world-wide.

The Bukit Besi mine has a land area of 526.20 hectares which was leased to the Group from the state government of Terengganu under a mining concession agreement expiring in year 2033. Bukit Besi mine comprises the East, Valley and West Deposits and is situated in the district of Dungun, state of Terengganu in Malaysia.

The Group had on 7 April 2021 completed the acquisition of the entire issued and paid-up capital of Fortress Mengapur Sdn Bhd and its subsidiaries ("Fortress Mengapur"), which comprises the entire tenements held by its subsidiaries, namely CASB and Star Destiny Sdn Bhd (the "SDSB"), which covers approximately 951.68 hectares. The Group commenced production at the CASB mine in FY2023.

As part of the Group's strategic growth efforts, it was awarded two exploration licenses in 2023 for two mining areas in Sabah, which offer the opportunity to expand the Group's commodities profile and diversify its revenue streams.

The Group continues to invest prudently and through the cycle, to enhance long-term shareholder value, in its mission to become a leading mining group in the region.

Fortress Minerals Limited (OAJ: SGX) has been listed on the Catalist Board of the Singapore ExchangeSecurities Trading Limited ("SGX-ST") since 27 March 2019.

Fortress upholds our team's safety, values, integrity and honesty. The team leads the business to achieve our vision of becoming a multi-disciplinary premier iron ore player in Malaysia.

Fortress Minerals Limited (201732608K) SGX: OAJ www.fortress.sa

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We are committed to promote responsible and sustainable mineral resource development in Malaysia.

We support all kinds of effort to develop the entire mineral resource sector in an environment friendly manner.

We believe the sustainability of mineral resource development is important for our country's economy, our people's livelihood and well-being.



Our Vision

To be the premier apex body championing the national minerals resource industry interests in the country



Our Strategic Objectives

To protect, promote and advance the general interest of the minerals resource community in Malaysia

To consider all questions connected with the minerals industry and promote public discussion thereon

To collect, classify and diffuse minerals resource Information

To communicate and exchange information on minerals resource industry matters to and with other minerals industry associations in Malaysia and elsewhere

To promote and facilitate the minerals resource industry contribution to sustainable development within the national and global sustainable development strategies

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MALAYSIAN CHAMBER OF MINES

CORPORATE INFORMATION

PRESIDENT

Dato' Seri Mohd Ajib Anuar, SSAP, DIMP

VICE PRESIDENT

Dato' Sri Hj. Ahmad Omar, SSAP, DIMP

SECRETARIAT OFFICE

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COUNCIL MEMBERS

Hj. Abdul Rahman Ishak Aldrin Alambono Dato' Chin Lean Choong, DPMP, JP Chong Wai Min Assoc. Prof. Dr Hashim Hussin (until 27 September 2022) [alternate: Dr Mior Termizi] Assoc. Prof. Ir Dr Syed Fuad Saiyid Hashim (from 27 September 2022) Ir Steve Zhen Xiong Loh Ir Kamarudin Abdul Karim Dato' Kelvin Lee Wai Mun, DIMP Ir Christopher Lum Har Chi Dato' Sri Pek Kok Sam, SSAP, DIMP [alternate: Lim Wei Hung] Hj. Johaizal Dato' Musa Dato' Ir S S Subramaniam, DSSA, JSM, PJK, AMS P.Geol. Dato' Sia Hok Kiang, DIMP Eric Vesel (until 31 May 2022) Hj. Mohd Zain Ghazali (from 31 May 2022) Dato' Dr Patrick Yong Mian Thong, DIMP [alternate: P.Geol. Madzlan Zam,] Zaidi Harun

AUDITOR

Messrs Kamal Zahari & Co 19-4-2, Diamond Square Jalan Semarak Api 2 Off Jln Gombak 53000 Setapak Kuala Lumpur

EXECUTIVE DIRECTOR

Hj. Muhamad Nor Muhamad, JSM

PRINCIPAL BANKER

Standard Chartered Bank Malaysia Berhad Kuala Lumpur Main Branch No. 36, Jalan Sultan Ismail 50250 Kuala Lumpur

CORPORATE INFORMATION

CONSTITUTION

he Malaysian Chamber of Mines is the only Chamber in this country to have been established by an Act of Parliament. On 10 December 1914, the Chamber was formally incorporated under the Federated Malay States Chamber of Mines Incorporation Enactment No. 25 of 1914.

On 8 September 1988, the States of Malaya Chamber of Mines Incorporation (Amendment) Act was gazetted to give effect to a change of name from the previous States of Malaya Chamber of Mines to the present Malaysian Chamber of Mines.

On the same day, the then Minister of Primary Industries, in exercise of the powers conferred by Section 15 of the Act, gazetted several amendments to the Chamber's By-Laws. These were to streamline the management and administration of the Chamber's affairs in order to keep-up with the prevailing changed circumstances in the mining industry. These amendments were gazetted in the Federal Government Gazette on 6 April 1989 vide Act 367.

At the Chamber's 78th Annual General Meeting held on 29 May 1989, members of the Chamber approved a further three amendments to the Chamber By-Laws. The three amendments to the Malaysian Chamber of Mines Incorporation Act 1914 (Revised 1989) were gazetted in the Federal Government Gazette vide P.U. (B) 93 dated 15 February 1990. The amendments simplified the system of voting for the election of ordinary members and raised the annual subscription of corporate mining members.

At its 99th Annual General Meeting held on 25 May 2010, Chamber members approved an amendment to By-Law 10(e) of the Malaysian Chamber of Mines Incorporation Act 1914 to raise the annual subscription rate for individual ordinary members. This amendment was gazetted in the Federal Government Gazette vide P.U.(B) 366 dated 20 July 2011.

At its 102nd Annual General Meeting held on 28 May 2013, Chamber members approved a resolution to amend By-Law 10 of the Malaysian Chamber of Mines Incorporation Act 1914 to raise the annual subscription rates for all members except individual ordinary members. The amendment received approval from the then Minister of Natural Resources and Environment on 5 August 2015 and was implemented with effect from 1 January 2016.

At its 108th Annual General Meeting held on 2 May 2019, Chamber members approved a resolution to amend By-Law 10 (a) and (d) of the Malaysian Chamber of Mines Incorporation Act 1914 on the rate of annual subscription for corporations and companies directly engaged in the mining industry admitted as ordinary members, and the rate of annual subscription payable by corporations or companies not actively engaged in the mining industry but are otherwise connected with the industry admitted to ordinary members.

In 2020, following feedback received from the Ministry of Energy and Natural Resources (KeTSA) with regard to some technicality issues in the voting procedures of approving the afore-said resolution, the Secretariat revisited the Chamber By-Laws and found that By-Law 10(i) provides that the Council can revise members' subscription fees if they do not exceed existing rates without the necessity of obtaining the Minister's approval. As such, at its 109th Annual General Meeting held on 15 September 2020, Chamber members approved a resolution to retract the earlier resolution passed at the 108th AGM held on 2 May 2019.

CORPORATE INFORMATION

CHAMBER COUNCIL

Management of the Chamber is vested in a Council comprising 15 elected members and three nominated members. Of the latter, two are nominated by the Miners' Association of Selangor, Negeri Sembilan and Pahang and the other by the Perak Bumiputra Chamber of Mines.

The Chamber Council usually meets once every two months. Its Annual General Meeting (AGM) is normally held in May each year. The AGM is followed by an Annual Luncheon.

MEMBERSHIP

The Chamber draws its membership from the major mining companies, mining consultants, engineers, individuals and other mining associations. It is the oldest Chamber of its kind in the country and as at end of 2022, has a membership of 156 comprising honorary, life, individual, corporate and other mining Chamber/Association members.

SECRETARIAT

The Chamber Secretariat was located in Ipoh until 1975 when it moved to the Federal capital, Kuala Lumpur. This move was consonant with the need for the Chamber to be in closer proximity with the relevant Ministries, Government departments and agencies with which it has considerable dealings on matters pertaining to the minerals resource industry.

The Secretariat also services three other associated bodies, namely the Tin Industry (Research and Development) Board (Tin Board), the Malaysian Tin Products Manufacturers' Association (MTPMA), and The Kuala Lumpur Tin Market (KLTM). It also served as host Secretariat to the ASEAN Federation of Mining Associations (AFMA) during the year. The Secretariat is located at the 8th Floor, West Block, Wisma Golden Eagle Realty, 142-C Jalan Ampang, 50450 Kuala Lumpur since 1 September 1989.

Tuan Hj. Muhamad Nor Muhamad is the Executive Director of the Chamber. He is supported by other senior officers, namely P.Geol. Lutfi Hamidee Abd. Latif, Senior Technical Manager (until 27 January 2023); P.Geol. Ahmad Ashraf Abdul Ghafar, Technical Manager (from 7 February 2023); En. Muhammad Adzrul Madzlan, Senior Technical Executive; En. Dzuhilmy Omar, Information Technology (IT) Executive; Pn. Nor Marzlini Mohamed Hasini, Executive Secretary; Cik Siti Zaithun Md Saad, Senior Accounts Executive (until 25 August 2023); En. Emil Nuruddin Che Jamaludin Mahmud, Accounts Executive and Pn. Nor Azlin Mazlan, Junior Executive Secretary. In addition, the Chamber employs two junior support staff, namely Pn. Rozlina Jahrun, Receptionist/Clerk and En. Azizuddin Azizi, Driver/Despatcher, and a Technical Consultant, namely P. Geol. Teoh Lay Hock.

In 2022, the Chamber continued to focus its strategic role and efforts at both the National and Regional levels as a platform and bridge in strengthening multi-stakeholder partnerships and engagements to enhance the recovery, development, resilience and sustainability of the mining sector.

DATO' SERI MOHD AJIB ANUAR PRESIDENT MALAYSIAN CHAMBER OF MINES



n 2022, the Chamber continued to focus its strategic role and efforts at both the National and Regional levels as a platform and bridge in strengthening multi-stakeholder partnerships and engagements to enhance the recovery, development, resilience and sustainability of the mining sector. The Chamber actively participated in engagements covering specific issues and policy recommendations on ESG including fiscal regime, legal framework, issuance of licences, permits and leases and mining development in Permanent Reserved Forests and Environmentally Sensitive Areas. In addition, the Chamber actively promoted the development of the upstream mining sector in technology and critical metals needed in achieving climate change, renewable energy and carbon neutral targets as well as in providing a potential significant new source of national income.

Preliminary data provided by the Department of Mineral and Geoscience (JMG) showed that the estimated total value of mineral production in 2022 was RM7.9 billion, an increase of 11.3 per cent from the RM7.1 billion achieved in 2021. All mineral sectors showed increases in mineral production. The non-metallic mineral sector was again the highest contributor at RM4.2 billion, up 16.7 per cent, followed by the metallic mineral sector at RM2.8, up 7.7 per cent and the energy mineral sector (represented by coal production) at RM0.9 billion, up 12.5 percent. Rock aggregates and iron ore were the highest contributors to the mineral production value.

As the world was starting to recover from the COVID -19 pandemic, the political conflict in Ukraine worsen in 2022. The war caused disruptions in the global supply chain which led to higher energy prices, rising inflation in the US and Europe, and ultimately a decrease in consumer demand. Meanwhile, China had to enforce a total lockdown in several major cities following the spread of the Covid-19 Omicron variant. International trade was severely impacted adding further woes to the global supply chain. The volatile global macroeconomics did have an impact on the Malaysian mineral sector, especially the export oriented downstream mineral-based manufacturing sector.

Several domestic socio-economic and political events which occurred during the year also had a significant impact on the mineral sector.

In the second quarter of 2022, the Government agreed to relax entry restrictions to international travellers and this was followed by allowing all economic sectors to resume operation. This signalled the country's preparedness to move into the endemic phase of the post Covid-19 period. The initiatives had stimulated the resumption of international trade and domestic economic activities. As a result, the national Gross Domestic Product (GDP) for the third quarter of the year recorded a 14.2% growth, the second highest since 2020. This led Bank Negara Malaysia (BNM) to forecast that Malaysia would register an 8.7% annual GDP growth for 2022. However, BNM reminded that the balance of risks remains tilted to the downside, mainly from weaker global growth, tighter financial conditions, re -escalation of geopolitical conflicts and worsening supply chain disruptions.

Apart from the economic developments, this year also witnessed the nation's 15th General Election which was held during its fourth guarter. The Election resulted in the formation of a unity Government with Yang Amat Berhormat Datuk Seri Anwar Ibrahim appointed as Malaysia's 10th Prime Minister. The new Government brought about a change in the structure of the Cabinet. In December 2022, the Ministry of Energy and Natural Resources (KeTSA) and Ministry of Environment and Water (KASA) were restructured and rebranded as Ministry of Natural Resources, Environment and Climate Change (NRECC). Yang Berhormat Tuan Nik Nazmi bin Nik Ahmad was appointed as the Minister-in-charge of this portfolio, with Yang Berhormat Dato' Sri Huang Tiong Sii as Deputy Minister. Incidentally, earlier in the year in April 2022, the Ministry, then known as KeTSA had also witnessed a change in its top management with YBhg. Dato' Haji Rosli Isa replacing YBhg. Datuk Zurinah Pawanteh as Secretary General.

The National Mineral Industry Transformation Plan (TIM) 2021-2030, the framework of which was officially launched by KeTSA on 22 April 2021, had identified five important and critical minerals that have high potential in terms of their economic value, namely non-radioactive rare earth elements resources (NR-REE) (better known globally as the ionadsorption clay-type rare earth elements resources), bauxite, tin ore, silica sand and kaolin.

In support of the above initiative by KeTSA, the Chamber co-organised a half day online Forum on 5 July 2022 with the theme "Future of the Tin Industry in Malaysia" with the Tan Sri Omar Centre for STI Policy Studies, UCSI University and the Tin Industry (Research and Development) Board. Some 300 participants registered for the event with 100 participating via Zoom and the rest via Facebook and YouTube. There were five technical paper presentations, two from Malaysia, and one each from the Philippines, Indonesia and the United Kingdom on subjects relating to tin resources, sustainability, mining in forested areas and future applications of tin. The Forum had generated renewed interests in developing the tin resources in Malaysia, in particular, primary tin deposits and also the fine tin in the offshore marine sediments.

Apart from the initiative taken by the Chamber to promote the development of tin resources, 2022 could be remembered as the year in which the Government recognised rare earth resources, or more specifically NR-REE resources, as a potential new source of national income.

To recapitulate, on 19 December 2021, the Chamber was invited to participate in the Public Hearing on the proposed Standard Operating Procedures (SOP) for the Mining of Non-Radioactive Rare Earth Elements (NR-REE) in Perak. The aim of the Public Hearing was for KeTSA to present to relevant stakeholders the draft of the SOP for public review, comments and feedback. Representatives from the Chamber Secretariat participated and provided useful feedback.

Subsequently, on 15 July 2022, KeTSA appointed the Academy of Sciences Malaysia (ASM) as its strategic partner to formulate a Business Model for the development of the NR-REE. This project is still ongoing and is expected to be completed in the second quarter of 2023. Several members of the Chamber are playing an active role in this project.

The Chamber, represented by the President, has been appointed a member of the Steering Committee at the Ministry level.

The year 2022 had again been a very busy year for the Chamber. As a body responsible for protecting the interest of the mining industry, it had been actively involved in various activities to fulfill its role and at the same time, promoting the importance of this industry. The Chamber had taken a lot of proactive steps in strengthening its cooperation with the various Ministries, Government agencies and bodies especially the NRECC (formerly KeTSA), and also the Department of Mineral and Geoscience (JMG).

Early in 2022, the Chamber was invited by the KASA to provide comments, inputs and recommendations to their draft of a new EIA Order which they intended to use to replace the Environmental Quality (Prescribed Activities) (Environmental Impact Assessment) Order 2015. The Chamber duly prepared and submitted a position paper on 19 May 2022, entitled "Malaysian Chamber of Mines' Position on the Draft of the Environmental Quality (Prescribed Activities) (Environmental Impact Assessment) Order 202x [EIA Order 202X] to replace the Environmental Quality (Prescribed Activities) (Environmental Impact Assessment) Order 2015 [EIA Order 2015]" expressing the Chamber's position on the newly drafted EIA Order. Copies of the proposal were extended to KeTSA and JMG. The Chamber was hoping to have an engagement with KASA and the Department of Environment on this issue but so far had been unsuccessful. The recent restructuring of KeTSA and KASA into the NRECC has further delayed the above initiative. involved in the Malaysian Green Technology and Climate Change Corporation (MGTC)'s initiative to develop a set of green practices industry guidelines including those for the mining sector. Representatives from the Chamber participated in a workshop organised by MGTC on the Green Practices Guideline for the Mining Sector which was held on 19 and 20 January 2022 at the Putrajaya Marriot Hotel.

Representatives from the Chamber also participated in a workshop on the way forward for the mineral industry in Perak organised by the Perak Lands and Mines Office (PTG) from 12 to 14 August 2022 at the Zenith Hotel, Putrajaya. The main objective of the workshop was to find ways to increase State revenue from the mining and quarrying sector by reassessing the various red tapes impeding mineral resource development in the State of Perak. Several papers from State and Federal agencies were presented. The Chamber presented a paper entitled "Mineral Industry towards Sustainable Development - From the Industry Players' Perspective". The paper covered issues on the fiscal regime, legal framework, issuance of licences, permits and leases, and mines development in Permanent Reserved Forests (PRF) and Environmentally Sensitive Areas (ESA).

Following KeTSA's announcement in Sinar Harian on 6 October 2021 regarding the ban on mining in PRF and ESA, the Chamber took the initiative to prepare a Terms of Reference (TOR) for the setting up of a Focus Study Group to undertake a study entitled "A proposal for national policies allowing mining in forest and plantation areas that generate net positive impact on the country's ecosystem embracing biodiversity, social, economic and climate change objectives". The purpose was to use scientific data to determine the cost and benefit of mining in PRF and ESA. The TOR was submitted to KETSA and JMG on 10 August 2022. However, the response was not encouraging. The Chamber decided not to pursue the matter further as the Chamber had come to know that NRECC (formerly KeTSA) had initiated a project with ASM to prepare a Business Model for the development of the nonradioactive rare earth elements (NR-REE) resources in Malaysia. It is envisaged that in this NRECC-ASM Business Model project some of the items in the Chamber's proposed TOR would be undertaken. Hence, the Chamber will await the outcome of the NRECC-ASM Business Model project before taking further action.

In 2022, the Chamber was again invited to participate in the Federal Government's annual Budget Consultation for the year 2023 which was held on 23 August 2022 at the Ministry of Finance (MoF). The half-day 2023 Budget Consultation with the theme "Strengthening Recovery and Facilitating Reforms towards Economic Resilience and Wellbeing of Keluarga Malaysia" was attended by nearly

300 invited participants from various Government agencies, Government-linked companies, business and corporate bodies, professional organisations, chambers of commerce and industries, public and private universities, and Non-Government Organisations (NGOs). The Chamber also submitted a memorandum containing the mineral sector's budget proposal to the Ministry of Finance as requested.

Two Chamber representatives participated in the International Symposium on "Facing the Environmental Turn: The Extractive Industries Under Scrutiny Crossing Legal, Political and Economic Perspectives" which was held from 24 to 26 August 2022 at the premises of the Technical Services Division (BPT) of the JMG in Ipoh. The event was organised by IETE Research Network, France and several other French and Malaysian NGOs.

The Chamber Technical Consultant presented a paper entitled "Sustainability in the Mining Sector" and the Chamber's Senior Technical Manager participated as one of the panelists at the roundtable discussion on "Actors on the ground: a cross-sectorial dialogue". Through their participation and presentations, the Chamber representatives managed to enlighten the academics and NGOs on the role and importance of the mining sector to the country's economy and livelihood of the people. More importantly, they managed to share the responsible and sustainable mineral resource development agenda which the Chamber is actively promoting.

As mentioned earlier, one of the primary objectives of the Chamber is to protect, promote and advance the general interest of the mineral resource community in Malaysia, and in this regard one of the ways in which this objective can be achieved is through member support services.

The issue relating to the setting up of the Pahang Mining Corporation Sdn Bhd (PMC) had been long standing. Members had long complained that the establishment of the PMC had created numerous additional problems for the miners in Pahang. After several attempts, the Chamber PMC Issues Committee led by its Chairman, En. Zaidi Harun, managed to meet with the then Chief Operating Officer of PMC, En. Mohd Khairul Fazli Ariffin on 24 February 2022 at his office in Kuantan, Pahang. The outcome of the meeting, however, was not very encouraging for the miners.

Other issues raised by members included:

- Moratorium on mining activities in areas surrounding Tasik Chini, Pahang,
- Long delay in the renewal of mining tenements, and
- Exemption from preparation of EIA for tenements which were issued before the enforcement of EIA Order 2015.

In response to the above, the Chamber had sent a letter to the Pahang Menteri Besar on 3 November 2022 highlighting the afore-mentioned issues. On 29 December 2022, the Chamber Secretariat received a copy of a letter which the Menteri Besar's office had sent to PTG Pahang and PMC and copied to the Secretariat. In the letter, PTG Pahang and the PMC were requested to look into the issues raised by the Chamber. To-date, the Secretariat had yet to receive any response.

On 26 January 2022, the Chamber President, accompanied by the Technical Consultant, paid a courtesy call to the Chief Minister (CM) of Sabah, YAB Datuk Seri Panglima Hj. Hajiji bin Hj. Noor at the CM's office in Kota Kinabalu, Sabah. The President shared with the CM on the global efforts in advancing the interests of the mineral resource industry, in partnership with other stakeholders, to create value from minerals. The courtesy call was very fruitful with good exchange of information, and the CM was appreciative of the Chamber's efforts. On 18 May 2022, the Executive Director, in his role as Secretary of the Tin Industry (Research and Development) Board (Tin Board), briefed the new Secretary General (KSU) of KeTSA, Dato' Hj. Rosli Isa on the background, objectives and functions of the Tin Board. The new KSU was appreciative of the briefing given and indicated his strong support to collectively promote the development of the mining and mineral resource industry, and to realise the objectives of the National Mineral Industry Transformation Plan (TIM) 2019-2030 including the generation of additional revenue from mineral resource development for the country.

On 6 December 2022, the Chamber received a delegation comprising officials from the China-ASEAN Geoscience Co-operation Center (CAGCC), China-ASEAN Mining Co-operation Forum (CAMCF) Secretariat and members of the Guanxi Overseas Mining Association (GOMA). The delegation included representatives from Chinese companies involved in the mining of gold and manganese as well as producers of mining equipment. The main purpose of the visit was to discuss ways to enhance co-operation between CAGCC/CAMCF and the Chamber, and on potential investment in mining projects in Malaysia.

The Chamber continued to be active in domestic and regional activities involving the ASEAN Federation of Mining Associations (AFMA), ASEAN Senior Officials Meeting on Minerals (ASOMM), ASEAN Ministerial Meeting on Minerals (AMMin) and the China-ASEAN Mining Cooperation Forum and Exhibition (CAMCFE).

At the request of members of AFMA Executive Council and because of its excellent track record, the Chamber was again persuaded to take up the responsibility of hosting the AFMA Secretariat for 2022, and accordingly, the President and Executive Director of the Chamber were re-elected as President and Secretary-General of AFMA, respectively for the year. This was the eighth consecutive year in which the Chamber had hosted the AFMA Secretariat.

The Chamber, as host of AFMA, held its premier annual Private Sector Forum (PSF) on 20 December 2022 via Zoom Meeting Platform. With the theme "Towards Creating a Conducive Environment for Responsible and Sustainable Mineral Resource Development in ASEAN: Focusing on Addressing Climate Change, Renewable Energy and Meeting Carbon Neutral Targets", this 10th PSF attracted some 70 online participants comprising AFMA members, public officials of ASEAN Member States (AMS), ASEAN Secretariat (ASEC), industry players in the region and the mining fraternity. There were five technical paper presentations, two from Indonesia, and one each from Malaysia, Thailand and South Korea. Since AFMA is a Civil Society Organisation (CSO) accredited to ASEAN, AFMA is required to report a summary of its activities and programmes undertaken annually including its funding position to the ASEAN Secretariat (ASEC). As such, the Chamber, as host Secretariat for, and representing AFMA, participated actively in the various relevant ASOMM and AMMin-related meetings organised by ASEC. These include:

- 7th ASOMM Joint Working Group Meeting & Associated Meetings hosted by Brunei Darussalam held online from 8 to 10 March 2022. during which a report on AFMA's activities undertaken under the ASEAN Minerals Cooperation Action Plan (AMCAP) III Phase 1: 2016-2020 as well as proposed activities to be undertaken under AMCAP III Phase 2: 2021-2025.Webinar on "Seizing the Development Prospects of ASEAN Minerals Cooperation: Pathways for AMCAP Implementation". The Webinar, which was organised by ASEC in collaboration with the ASEAN Australia Development Cooperation Programme Phase II (AADCP II), was held online on 27 April 2022. The Executive Director, representing AFMA, was appointed as one of the panel members during the Panel Discussion on "Minerals' Contribution to ASEAN and Beyond: Partnerships and Stakeholder Perspectives".
- 8th Joint Working Groups (JWG) Meeting of the ASEAN Minerals Cooperation Plan which was held via video-conferencing on 9 and 10 August 2022 and hosted by Brunei Darussalam. At this meeting, AFMA presented a proposal on the establishment of the Multi-Stakeholder Focus Groups (MSFGs), a platform to discuss specific issues impeding mineral resource development in ASEAN Member States (AMS).
- 22nd ASOMM & Associated Meetings which were held from 22 to 25 November 2022 via online platform hosted by Brunei Darussalam. The Chamber, representing AFMA, was invited to some of the sessions. At the session held on 22 November, AFMA presented the proposal on the establishment of the MSFGs to the ASEAN Senior Officials.

In addition to the above ASEAN-related meetings, the Chamber, representing AFMA, also participated in several meetings organised by the CAMCFE Secretariat. These include:

- 11th Liaison Officials' Meeting of CAMCFE 2022. This meeting was held on a hybrid basis at the Howard Johnson CAEXPO Plaza Nanning, China. The Executive Director, concurrently the Secretary General of AFMA, attended online and gave a five-minute speech on international cooperation.
- 24th China Mining Conference and Exhibition 2022 held online between 21 to 24 September 2022. The Chamber Executive Director was given the honour of delivering a speech at the Keynote Session during the Conference which had the theme "Sustainable Mining for Sustainable Economic Growth". The Conference was organised by the China Mining Conference and Exhibition (CHINA MINING), and the Ministry of Natural Resources China had given an encouraging support towards the event's programme. The Conference enabled the exchange of views and opinions on various topics related to the supply and demand situation of China products, mining capital and mineral trading markets and others.

The Chamber membership showed an increase of 12 during the year under review to 156 from 144 in 2021. Corporate mining members increased by two, while Individual members increased by 11. These increases were offset by the loss of a Life member during the year.

The Chamber remained financially strong and healthy. Total income for the year was RM247,630 against expenditure of RM200,972, resulting in a surplus of RM46,658 for the year 2022. Members' Accumulated Fund increased to RM479,095. To conclude this President's Statement for the year 2022, let me state that the Malaysian mineral industry has had a reasonably good year despite the uncertainties in the global macroeconomics. Nevertheless, more needs to be done to move the industry forward at a faster pace. Critical priorities have been identified and need to be implemented to transform Malaysia's mineral resource industry, particularly tin and NR-REE, as well as position itself as a major contributor to new sources of national income.

On behalf of the Chamber, I wish to express my appreciation to all relevant stakeholders in the mineral resource industry, especially the NRECC, JMG and the Tin Board, as well as other organisations related to the mineral industry such as the KLTM, Malaysian Tin Products Manufacturers' Association, Board of Geologists, Institute of Geology Malaysia, Institute of Mineral Engineering and Geological Society of Malaysia for their continuous support and united effort in advancing the interest of the mining and mineral resource industry.

I also wish to express my sincere gratitude to all Chamber Council members for their proactive and meaningful contributions to the management of the Chamber. In addition, a special thanks to the Secretariat staff led by the Executive Director for their enthusiasm and hard work in delivering quality and excellent services to the Chamber. Last, but not least, to every member of the Chamber, I wish to thank all of you for your continuous support and effort in assisting the Chamber to fulfill its responsibility of advancing the interest of the mining industry.

DATO' SERI MOHD AJIB ANUAR President

REPORT OF

DEAR MEMBERS,

On behalf of members of the Council, it is my pleasure to present the Chamber's Annual Report and Statement of Accounts for the financial year ended **31 December 2022.**

ACCOUNTS

Total income for the year was RM247,630 against expenditure of RM200,972. Thus, there was a surplus of RM46,658 for the year 2022. Members' Accumulated Fund as shown in the Statement of Financial Position increased by this surplus which at end of the year under review totalled RM479,095.

MEMBERSHIP

The overall Chamber membership at the end of the year under review totalled 156 an increase from 144 in 2021. The breakdown in membership categories for 2021 and 2022 are shown below.

	2022	2021
Honorary members	4	4
Life members	10	11
Corporate mining members	17	15
Other corporate members	9	9
Association members	6	6
Individual members	110	99
Total	156	144

COUNCIL

During the year 2022, the Council met six times on 25 January, 29 March, 31 May, 26 July, 27 September and 29 November. At the 111th Annual General Meeting of the Chamber held on a hybrid basis on 31 May 2022, the following 15 members were elected to serve on the Council for the ensuing year:-

Dato' Seri Mohd Ajib Anuar, Dato' Sri Hj. Ahmad Omar , Abdul Rahman Ishak, Aldrin Alambono, Dato' Chin Lean Choong, Assoc. Prof. Dr Hashim Hussin, Ir Kamarudin Abdul Karim, Dato' Kelvin Lee Wai Mun, Ir Steve Zhen Xiong Loh Hj Mohd Zain Ghazali, Dato' Sri Pek Kok Sam, Dato' Ir S. S. Subramaniam, P. Geol. Dato' Sia Hok Kiang, Dato' Dr Patrick Yong Mian Thong, and Zaidi Harun.

Three other Council members were appointed under By-Law 18, namely Messrs Chong Wai Min and Ir Christopher Lum Har Chi, who were nominated by The Miner's Association of Selangor, Negeri Sembilan and Pahang, and Hj. Johaizal Dato' Musa nominated by the Perak Bumiputra Chamber of Mines.

Tuan Hj Mohd Zain Ghazali was appointed as a Council member on 31 May 2022 to replace Mr Eric Vesel who resigned on 31 May 2022.

REPORT OF COUNCIL



Council Members and Secretariat staff participating in a hybrid Chamber Council meeting in 2022

PRESIDENT AND VICE-PRESIDENT

At the 111th Annual General Meeting of the Chamber, Dato' Seri Mohd Ajib Anuar and Dato' Sri Hj. Ahmad Omar were re-elected President and Vice-President, respectively for the term 2022/2023.

EXECUTIVE DIRECTOR

During the year under review, affairs of the Chamber Secretariat continued to be administered and helmed by the Executive Director, Hj. Muhamad Nor Muhamad.

HOMEPAGE

The Chamber maintains a website to keep pace with the challenging global information technology and network. The address of the Chamber's website is **www.mcom.com.my**.

In addition, the Chamber also maintains an industry web portal, which was formally launched in May 2010. The web portal address is <u>www.malaysianminerals.com.</u>

ANNUAL GENERAL MEETING / ANNUAL LUNCHEON

The Chamber's 111th Annual General Meeting was held on a hybrid basis on 31 May 2022 at 12.00 noon. At the conclusion of the 111th AGM, members present adjourned to Hotel Maya, Jalan Ampang, Kuala Lumpur for lunch.

REPORT OF

CONGRATULATORY LETTERS

The President, on behalf of the Chamber, sent congratulatory letters to various relevant individuals who were appointed to high office and who received awards during the year under review. They included:

- YB Tan Sri Idris Jusoh, Chairman of Federal Land Development Authority (FELDA) on being conferred the Panglima Setia Mahkota (PSM) in conjunction with the 63rd birthday of the Yang Di-Pertuan Agong XVI, Al Sultan Abdullah Ri'ayatuddin Al-Mustafa Billah Shah.
- YBrs P. Geol. Mohd Badzran Mat Taib, Deputy Director General (Operation), Department of Mineral and Geoscience on being conferred the Johan Setia Mahkota (JSM) in conjunction with the 63rd birthday of the Yang Di-Pertuan Agong XVI, Al Sultan Abdullah Ri'ayatuddin Al-Mustafa Billah Shah.
- YBhg Tan Sri Dato' Seri Mohd Zuki bin Ali, Chief Secretary to the Government on being conferred the Darjah Dato' Seri Paduka Cura Si Manja Kini (SPCM) in conjunction with the 66th birthday of the Royal Highness The Sultan of Perak, Sultan Nazrin Muizzuddin Shah.
- YBhg Dato' Hj. Rosli bin Isa, Secretary General, Ministry of Energy and Natural Resources on being conferred the Darjah Dato' Paduka Mahkota Perak (DPMP) in conjunction with the 66th birthday of the Royal Highness The Sultan of Perak, Sultan Nazrin Muizzuddin Shah.

CONDOLENCE LETTERS

The Executive Director, on behalf of Council members and staff, sent condolence letters during the year to the following:

- Puan Sri Woon Mun Fah on the demise of her late husband, Tan Sri Hew See Tong on 22 May 2022, a former Senior Council member.
- Tuan Hj. Johaizal Dato' Musa on the passing away of his beloved father, Dato' Hj. Musa Nordin, on 16 October 2022.

MINING INDUSTRY STATUS

Malaysia's mining industry is estimated to have again recorded a commendable performance in 2022, an increase of some 11.3 per cent in production value, year-on-year. A detailed description of the performance of Malaysia's mining industry during the year under review is described elsewhere in this Annual Report.

ACTIVITIES

The Chamber continued to undertake vigorously activities that directly or indirectly benefit its members, the mineral resource industry and the fraternity. A report of these activities undertaken during 2022 are detailed elsewhere in this Annual Report.

SECRETARIAT SERVICES

Staff of the Chamber Secretariat continued to service several industry related and associated bodies during the year under review. Brief details of these organisations serviced by the Secretariat can be found elsewhere in this Annual Report.

REPORT OF COUNCIL

ACKNOWLEDGEMENT GOVERNMENT

The Chamber records its appreciation of the cooperation and support given by various Ministries and Government departments and agencies, both at Federal and State levels, throughout the year.

Special mention must be made of the support the Chamber continued to receive from the Minister of Natural Resources, Environment and Climate Change, YB Nik Nazmi Nik Ahmad and the Deputy Minister of Natural Resources, Environment and Climate Change, YB Dato' Sri Huang Tiong Sii. The Ministry's Secretary -General, YBhg. Dato' Hj Rosli Isa, the Deputy Secretary-General (Natural Resources), YBrs. Tuan Abdul Wahid Abu Salim, the Director-General of the Department of Mineral and Geoscience, YBrs. Tuan Hj. Hisamuddin Termidi, and their officials were also particularly co-operative and supportive of the activities and efforts of the Chamber towards promoting the interests and development of the mineral resource industry nationally, regionally and internationally.

ACKNOWLEDGEMENT OTHERS

Thanks are also due to those Chamber members who had given much of their time and energy to serve on the Council and or its various Committees and Sub-Committees during the year under review. A list of Chamber representatives in the various bodies and Chamber Committees and Sub-Committees during the year 2022 will be included in the Chamber 2022/2023 Year Book, which will be published for distribution later this year.

The continued co-operation extended by the All-Malaya Chinese Mining Association, the Perak Bumiputra Chamber of Mines, the Perak Chinese Mining Association, The Miners' Association of Selangor, Negeri Sembilan and Pahang, the Institute of Mineral Engineering, the Perak Quarry Association, the Academy of Sciences Malaysia, the Institute of Geology Malaysia and the Board of Geologists Malaysia is recorded with gratitude.

The Council also wishes to record its appreciation of the continued dedication and hard work by the Secretariat staff led by the Executive Director during the year under review.

By Order of the Council,

HJ. MUHAMAD NOR MUHAMAD, JSM Executive Director/Secretary

10 May 2023

MINERAL PRODUCTION 2022

(Based on revised data and latest figures obtained from official sources)

alaysia's mineral resource industry broadly comprise the metallic, non-metallic, and energy mineral sectors. The metallic mineral sector produces minerals such as tin, gold, bauxite, iron ore, ilmenite, manganese and other associated mineral by-products of tin and gold mining such as zircon, monazite, rutile, struverite and silver. The non-metallic mineral sector produces limestone, clays, kaolin, silica sand, sand and gravel, aggregates, feldspar and mica. The energy mineral sector produces only coal.

The country's mineral resource industry (excluding oil and gas) performed commendably in 2022. According to data provided by the Department of Mineral and Geoscience (JMG), the total value of minerals produced in Malaysia during the year was RM 8.1 billion, an 10.96 per cent increase from the RM7.3 billion produced in 2021.

The production value for the metallic mineral sector in 2022 was RM 3.0 billion, an increase of 11.11 per cent, year-on-year. The non-metallic mineral sector also registered an increase in production value from RM 3.8 billion in 2021 to RM4.2 billion in 2022. Meanwhile, the production value for the energy mineral sector was RM 0.9 billion, up 12.50 per cent from the 2021 value of RM 0.8 billion.

The following is a brief breakdown and description of Malaysia's mineral production during the year under review.

The country's mineral resource industry (excluding oil and gas) performed commendably in 2022. According to data provided by the Department of Mineral and Geoscience (JMG), the total value of minerals produced in Malaysia during the year was RM 8.1 billion, an 10.96 per cent increase from the RM7.3 billion produced in 2021.

METALLIC MINERALS

TIN

Malaysia's annual tin-in-concentrate production in 2022 increased by 16 per cent to 3,697 tonnes valued at RM510.47 million. The production during the year came from mines operating in Perak, Selangor, Pahang, Kedah and Johore. The statistics on tin-in-concentrate production, operating units and direct workers employed in 2022 and the preceding year for each of the various mining/production methods are shown in the table below.

		2022		2021			
Mining Methods	Production (Tonnes)	No. of Units	No. of Workers	Production (Tonnes)	No. of Units	No. of Workers	
Open Cast	3,300	20	1,840	2,828*	13	1,624	
Panning	139	-	n.a	118*	-	n.a	
Mineral Processing Plant	81	10	197	63*	11	220	
By-product from mining of other minerals **	177	1	n.a	184	1	n.a	
TOTAL	3,697	31	2,037	3,193*	25*	1,844	

Source: Department of Mineral and Geoscience Malaysia

n.a - not available

iron ore mining in Terengganu

* - revised

- - nil

In 2022, Malaysia Smelting Corporation Bhd (MSC) continued to import tin-in-concentrate for smelting at its plants in Pulau Indah, Klang, Selangor and Butterworth, Penang. The imports came mainly from Nigeria, DR Congo, Australia, Brazil, South Africa, Rwanda, Spain and Tanzania. During the year, 20,391 tonnes of tin-in-concentrate were imported, an increase of 16 per cent from 17,649 tonnes imported in 2021.

Malaysia exported refined tin metal to several major tin consuming countries, such as Japan, China, India, Thailand and South Korea. In 2022, refined tin metal export decreased to 14,594 tonnes from 15,714 tonnes exported in 2021, a decline of 7 per cent.

The following table shows the volume and value of Malaysia's import of tin-in-concentrate, and export of refined tin metal in 2021 and 2022.

Year	Tin-in-Concentrate Imports (Tonnes)	Value (RM million)	Tin Metal Exports (Tonnes)	Value (RM million)
2022	20,391	1,868.69	14,594	1,998.67
2021	17,649*	1,235.35	15,714*	1,799.20

Source: Department of Statistics, Malaysia * : revised

The Kuala Lumpur Tin Market (KLTM) had only four trading days in 2022 during which transactions were recorded. These were all in the month of January. The lowest tin price recorded was US\$40,400 per tonne on 12 January 2022, whilst the highest price recorded was US\$42,020 per tonne on 19 January 2022. After 19 January 2022, there was no more trading at the KLTM for the rest of the year. This was because MSC, the sole supplier of tin metal at the KLTM, did not offer any tin metal for sale.

During the absence of tin trading at the KLTM, local consumers had to purchase tin from elsewhere and used the London Metal Exchange (LME) tin price as reference.

Stocks of tin metal at LME warehouses rose during the year under review. At end of 2022, LME high-grade tin stocks totalled 2,990 tonnes compared with 2,020 tonnes at end of 2021, an increase of 48 per cent.

Tin stocks in the U.S. strategic stockpile at the end of 2022 remained unchanged at 4,020 tonnes.

Consumption of tin in Malaysia in 2022, meanwhile, declined by 0.3 per cent to 1,152 tonnes from 1,156 tonnes in 2021. The tinplate sector remained the largest local consumer of tin metal in 2022, followed by the solder and pewter sectors.

BAUXITE

Bauxite production in 2022 increased by 173 per cent to 129,825 tonnes from 47,577 tonnes produced in 2021. They came from five mines located in Pahang. Potential bauxite resources exist in other Peninsular Malaysia States as well as in Sarawak and Sabah.

The volume and value of production, number of mines, number of workers, volume and value of import, and volume and value of export of bauxite in 2022 compared with the preceding year are shown in the table below.

Year	Production (Tonnes)	Value (RM million)	No. of Mines	No. of Workers	Import (Tonnes)	Value (RM million)	Export (Tonnes)	Value (RM million)
2022	129,825	10.15	5	28	10,211	19.68	321,454	56.04
2021	47,577	5.71	9	63	9,710	16.36	227,691	42.44

Sources: Department of Mineral and Geoscience Malaysia Department of Statistics, Malaysia

GOLD

Malaysia's gold production in 2022 came from mines located in three states, namely Kelantan, Pahang and Sabah. The major gold producers in 2022 were the CMNM Sokor Gold project in Kelantan, the Selinsing gold mine in Pahang and the Bukit Mantri gold mine in Sabah. The former two were joint-ventures between local and foreign interests. The production of gold during the year increased by 3 per cent to 1,828 kgs from 1,781 kgs in 2021.

According to the JMG, prospective gold deposits are also found in other States, including Negeri Sembilan, Johore and Sarawak.

The table below shows the volume and value of production, number of mines, number of workers, volume and value of import, and volume and value of export of gold in 2022 compared with the preceding year.

Year	Production (kgs)	Value (RM million)	No. of Mines	No. of Workers	Import (kgs) **	Value (RM million)	Export (kgs) **	Value (RM million)
2022	1,828	465.54	11	1,030	67,003	17,029.41	6,403	1,379.24
2021	1,781	426.87	13	1,393	73,391	17,441.85	3,468	690.82

Sources: Department of Mineral and Geoscience Malaysia

Department of Statistics, Malaysia

- refers to gold of non-monetary, unwrought or semi-manufactured or in powder form

ILMENITE

Malaysia's ilmenite production came exclusively from the processing of 'amang' or were by-products of alluvial tin mining. The mineral (amang) processing plants were located mostly in Perak. The production of ilmenite in 2022 increased to 24,076 tonnes from 4,598 tonnes produced in 2021. The country also imported large quantities of ilmenite for domestic consumption and re-export.

The volume and value of production, volume and value of import, and volume and value of export of ilmenite in 2022 compared with the preceding year are shown in the table below.

Year	Production (Tonnes)	Value (RM million)	Import (Tonnes)	Value (RM million)	Export (Tonnes)	Value (RM million)
2022	24,076	7.22	101,186	169.19	11,733	20.12
2021	4,598	1.38	101,420	148.01	12,312	22.32

Sources: Department of Mineral and Geoscience Malaysia Department of Statistics, Malaysia

IRON ORE

Malaysia's production of iron ore in 2022 increased by 1 per cent to 4,911,625 tonnes from 4,874,485 tonnes in 2021. During the year under review, iron ore production came from 77 mines located in Perak, Kedah, Johore, Pahang, Terengganu and Kelantan. They were generally of low grade and produced mainly from mining leases with small reserves. Most were exported to China with some consumed by the local cement and iron and steel plants. Iron ore were also imported into Malaysia for use by the local steel industry. These imports were in the form of lumps and pellets that came mainly from Brazil, Australia and Switzerland.

The volume and value of production, number of mines, number of workers, volume and value of import, and volume and value of export of iron ore in 2022 compared with the preceding year are as shown in the table below.

Year	Production (Tonnes)	Value (RM million)		No. of Workers	Import (Tonnes)	Value (RM million)	Export (Tonnes)	Value (RM million)
2022	4,911,625	1,868.36	77	2,018	24,068,396	7,432.47	21,389,397	5,301.58
2021	4,874,485	1,706.26	66	1,982	22,474,540	6,623.92	22,103,574	5,217.80

Sources: Department of Mineral and Geoscience Malaysia Department of Statistics, Malaysia

MANGANESE

Manganese ore is one of the main raw materials used in iron and steel production. It is essential by virtue of its sulphur-fixing, deoxidizing and alloying properties. Manganese ore is also used in producing aluminium alloys and dry cell batteries. Malaysia's production of manganese ore in 2022 increased by 11 per cent to 744,576 tonnes from 668,558 tonnes produced in 2021. They came from mines located in the States of Kelantan and Pahang.

Manganese deposits are found in the States of Kelantan, Terengganu, Pahang and Johore with resources totaling some 3.2 million tonnes with grades mostly 50 per cent Mn or below.

The following table shows the volume and value of production, number of mines, number of workers, volume and value of import, and volume and value of export of manganese ore in 2022 compared with the preceding year.

Year	Production (Tonnes)	Value (RM million)	No. of Mines	No. of Workers	Import (Tonnes)	Value (RM million)	Export (Tonnes)	Value (RM million)
2022	744,576	100.38	16	252	1,033,602	1,101.08	739,631	155.96
2021	668,558	95.84	21	215	1,072,849	812.72	614,557	151.78

Sources: Department of Mineral and Geoscience Malaysia Department of Statistics, Malaysia

OTHER METALLIC MINERALS

The following table shows the volume and value of production of other metallic minerals / metals such as rutile, rare earth, lead, zircon, silver, zinc, tungsten and struverite.

	20	22	20)21
Mineral	Production (Tonnes)	Value (RM million)	Production (Tonnes)	Value (RM million)
Rutile	8,359	25.08	11,513	34.54
Rare Earth	520	14.66	46	0.46
Lead	332	8.20	0	0
Zircon	768	2.30	1,518	4.55
Silver(kg)	481	1.88	672	2.62
Zinc	412	1.37	0	0
Tungsten	23,520	1.06	4,313	0.09
Struverite	35	0.7	0	0
TOTAL	34,427	55.25	18,062	42.26

Source: Department of Mineral and Geoscience Malaysia

NON-METALLIC MINERALS

AGGREGATES

Malaysia's production of aggregates in 2022 came from two main sources, namely quarries and river beds, with the former producing mainly granite and limestone. These aggregates formed the primary construction materials used for many of the country's on-going infrastructure and mega projects. The production of aggregates in 2022 increased by 27 per cent to 138,637,415 tonnes from 109,519,817 tonnes produced in the previous year.

Malaysia has abundant resources of aggregates located mainly in the States of Perak, Selangor, Johore, Sabah and Sarawak.

The table below shows the volume and value of production, number of quarries, volume and value of import, and volume and value of export of aggregates in 2022 compared with the preceding year.

Year	Production (Tonnes)	Value (RM million)	No. of Quarries	Import (Tonnes)	Value (RM million)	Export (Tonnes)	Value (RM million)
2022	138,637,415	2,465.03	359	29,175	18.33	1,121,562	120.68
2021	109,519,817	2,215.88	365	27,585	19.00	2,904,991	218.79

Sources: Department of Mineral and Geoscience Malaysia Department of Statistics, Malaysia

CLAYS

The clays produced in Malaysia included common clay, ball clay, fire clay, shale, laterite and red earth. They were used mainly in making bricks, ceramic wares, cement and also for landfill. In 2022, the production of clays in Malaysia decreased by 14 per cent to 5,682,356 tonnes from 6,632,913 tonnes produced in 2021.

The country has abundant clay resources with deposits located in the States of Pahang, Selangor, Terengganu, Kelantan, Perak, Kedah, Pulau Pinang, Negeri Sembilan, Johore and Sarawak.

The volume and value of production, number of producers, volume and value of import, and volume and value of export of clays in 2022 compared with the preceding year are shown in the table below.

Year	Production (Tonnes)	Value (RM million)	No. of Producers	Import (Tonnes)	Value (RM million)	Export (Tonnes)	Value (RM million)
2022	5,682,356	78.52	113	118,307	92.16	200,034	79.42
2021	6,632,913	147.86	112	116,144	78.85	271,066	116.76

Sources: Department of Mineral and Geoscience Malaysia Department of Statistics, Malaysia

FELDSPAR

Feldspar or feldspathic rocks such as "pottery stone" are used mainly in the production of glass, ceramics and mild abrasives. During the year under review, Malaysia's production of feldspar or feldspathic rocks increased to 216,394 tonnes from 168,570 tonnes produced in 2021. Resources of feldspar or feldspathic rocks are found in the States of Negeri Sembilan, Perak, Johore, Kedah, Pahang and Kelantan.

The following table shows the volume and value of production, number of mines, number of workers, volume and value of import, and volume and value of export of feldspar in 2022 compared with the preceding year.

Year	Production (Tonnes)	Value (RM million)	No. of Mines	No. of Workers	Import (Tonnes)	Value (RM million)	Export (Tonnes)	Value (RM million)
2022	216,394	23.03	4	33	44,567	36.69	27,646	21.93
2021	168,570	18.20	4*	25	49,181	33.35	30,852	25.95

Sources: Department of Mineral and Geoscience Malaysia Department of Statistics, Malaysia

- revised

KAOLIN

Malaysia's production of kaolin in 2022 increased by 4 per cent to 236,840 tonnes from 228,605 tonnes produced in 2021. Fifteen kaolin mines located in Perak and Pahang were in active production during the year under review. Kaolin is used mainly as paper coatings and fillers, and in the manufacture of ceramics, paints, rubber, plastics and chemical products. Reserves of kaolin exist in the States of Perak, Johore, Kelantan, Selangor, Pahang and Sarawak.

The volume and value of production, number of mines, number of workers, volume and value of import, and volume and value of export of kaolin during 2022 compared with the preceding year are shown in the following table.

Year	Production (Tonnes)	Value (RM million)	No. of Mines	No. of Workers	Import (Tonnes)	Value (RM million)	Export (Tonnes)	Value (RM million)
2022	236,840	35.08	15	170	406,826	259.56	41,221	41.32
2021	228,605	31.32	18	200	102,651	106.67	64,626	47.23

Sources: Department of Mineral and Geoscience Malaysia Department of Statistics, Malaysia

LIMESTONE

Limestone production in Malaysia in 2022 increased by 14 per cent to 22,760,765 tonnes from 19,978,936 tonnes produced in 2021. The limestone was used in the manufacture of cement, and other limestone-based products such as ground calcium carbonate (GCC), precipitated calcium carbonate (PCC) and lime and lime products.

The JMG has identified some 27,640 million tonnes of limestone reserves in the States of Perlis, Kedah, Perak, Selangor, Negeri Sembilan, Pahang, Kelantan, Sabah and Sarawak.

The table below shows the quantity and value of production, number of limestone quarries, quantity and value of import, and quantity and value of export of limestone in 2022 compared with the preceding year.

Year	Production (Tonnes)	Value (RM million)	No. of Producers	Import (Tonnes)	Value (RM millon)	Export (Tonnes)	Value (RM million)
2022	22,760,765	261.19	11	211,630	35.09	1,060,556	193.48
2021	19,978,936	226.03	10	230,729	50.77	1,019,877	193.15

Sources: Department of Mineral and Geoscience Malaysia Department of Statistics, Malaysia

MICA

The production of mica in 2022 increased to 3,779 tonnes from 3,406 tonnes produced in 2021. There were two mica producers in 2022, both located in Bidor, Perak and operating on ex-tin mining land. The products were exported mostly to Thailand, China, Japan, South Korea and Indonesia.

Mica is a group of silicate minerals comprising varying amounts of aluminium, potassium, magnesium, iron and water. The mica produced in Malaysia is sericite, which is a fine-grained muscovite mica. The crude fine flakes are recovered from schistose rocks by screening according to the required grain size, either by wet or dry process. They are then further processed into various sizes of ground mica (sericite) powder. Sericite is used in industrial applications such as fillers in paints and cosmetics, as mould lubricant in the rubber industry, fluxing agent in welding electrodes and reinforcement in plastics.

The volume and value of production, number of mines, number of workers, volume and value of import, and volume and value of export of mica in 2022 compared with the preceding year are shown in the table below.

Year	Production (Tonnes)	Value (RM million)	No. of Mines	No. of Workers	Import (Tonnes)	Value (RM million)	Export (Tonnes)	Value (RM million)
2022	3,779	0.57	2	22	1,061	5.40	4,170	3.93
2021	3,406	0.51	2	22	923	5.21	5,862	7.77

Sources: Department of Minerals and Geoscience Malaysia Department of Statistics, Malaysia

SAND AND GRAVEL

Malaysia's sand and gravel production in 2022 decreased by 6 per cent to 33,566,866 tonnes from 35,556,500 tonnes produced in 2021.

The country has abundant sand and gravel resources, located mainly in river beds, alluvial plains, offshore areas and mine tailing dumps in the States of Perak, Kedah, Johore, Selangor and Sarawak. They are important raw materials for the building, construction and infrastructure development sectors.

The following table shows the volume and value of production, number of producers, volume and value of import, and volume and value of export of sand and gravel in 2022 compared with the preceding year.

Year	Production (Tonnes)	Value (RM million)	No. of Producers	Import (Tonnes)	Value (RM millon)	Export (Tonnes)	Value (RM million)
2022	33,566,866	624.89	889	15,620	67.15	7,487,122	100.96
2021	35,556,500*	622.44	864	12,321	60.71	18,627,416	126.38

Sources: Department of Mineral and Geoscience Malaysia Department of Statistics, Malaysia

- revised

SILICA SAND

Malaysia's silica sand production in 2022 came from sand mining operations in Johore, Perak, Terengganu and Sarawak. The production of silica sand during the year decreased by 22 per cent to 5,364,129 tonnes from 6,913,353 tonnes produced in 2021. Most of the silica sand was used in the manufacture of glass products and to a lesser extent in the production of ceramics, foundries, glass wool and water treatment materials.

The country has abundant silica sand resources. The silica sand were produced mainly from the mining of natural sand deposits and retreatment of ex-tin mine tailings. The JMG estimated that some 368.2 million tonnes of reserves are located in the States of Johor, Perak, Kelantan, Sabah and Sarawak.

The volume and value of production, number of mines, number of workers, volume and value of import, and volume and value of export of silica sand in 2022 compared with the preceding year are shown in the following below.

١	rear	Production (Tonnes)	Value (RM million)	No. of Mines	No. of Workers	Import (Tonnes)	Value (RM million)	Export (Tonnes)	Value (RM million)
2	2022	5,364,129	426.13	43	391	19,895	15.01	200,275	62.11
2	2021	6,913,353*	386.94	42	544	84,616	52.05	1,060,263	138.69

Sources: Department of Mineral and Geoscience Malaysia Department of Statistics, Malaysia

+ - revised

OTHER NON-METALLIC MINERALS

The following table shows the volume and value of production of other non-metallic minerals / rock materials such as earth materials and dolomite.

	20	22	2021			
Mineral	Production (Tonnes)	Value (RM million)	Production (Tonnes)	Value (RM million)		
Earth materials	24,281,563	219.17	19,916,821	157.64		
Dolomite	519,447	33.59	434,374	36.26		
TOTAL	24,801,010	252.76	20,351,195	193.90		

Source: Department of Mineral and Geoscience Malaysia

ENERGY MINERAL

COAL

Coal is the only energy mineral produced in Malaysia. It is one of Malaysia's current domestic energy mix under its Five-Fuel Policy comprising oil, gas, hydro power, coal and renewable energy. Malaysia's production of coal in 2022 increased to 3,405,847 tonnes from 3,110,605 tonnes produced in 2021. They came from 18 mines, all located in Sarawak. In 2022, Malaysia imported large quantities of coal from Indonesia, Australia, Russia and South Africa for consumption mainly by the power generation and cement plants and to a lesser extent by the iron and steel plants.

The country's coal resources are located primarily in the States of Sarawak and Sabah with minor occurrences in Peninsular Malaysia. The JMG has estimated that Malaysia has some 1,973 million tonnes of coal reserves. Some 80 per cent of these resources are located in Sarawak, 19 per cent in Sabah and one per cent in Peninsular Malaysia. The largest reserves of coal are located in Merit Pila, Sarawak and in Maliau and Malibau, Sabah.

The following table shows the volume and value of production, number of mines, number of workers, volume and value of import, and volume and value of export of coal in 2022 compared with the preceding year.

Year	Production (Tonnes)	Value (RM million)	No. of Mines	No. of Workers	Import (Tonnes)	Value (RM million)	Export (Tonnes)	Value (RM million)
2022	3,405,847	919.58	18	1,181	34,528,758	30,809.17	172,163	55.59
2021	3,110,605	839.86	8	1,199	35,079,311	16,654.67	144,624	44.65

Sources: Department of Mineral and Geoscience Malaysia Department of Statistics, Malaysia

SUMMARY

The table below summarises Malaysia's mineral production for 2022 and 2021 in terms of quantity, value, number of active mines and the number of direct workers employed. All the production figures are in tonnes except for gold which is in kilogrammes.

			2022				2021		
	Sub-sector	Production (tonnes)	Value (RM million)	No. of Mines	No. of Workers	Production (tonnes)	Value (RM million)	No. of Mines	No. of Workers
(i)	Metallic Mineral								
	Tin	3,697	510.47	31 ^(x)	2,037	3,193*	385.27*	25* ^(x)	1,844
	Bauxite	129,825	10.15	5	28	47,577	5.71	9	63
	Gold (kg)	1,828	465.54	11	1,030	1,781	426.87	13	1,393
	Ilmenite	24,076	7.22	n.a	n.a	4,598	1.38	n.a	n.a
	Iron Ore	4,911,625	1,868.36	77	2,018	4,874,485	1,706.26	66	1,982
	Manganese	744,576	100.38	16	252	668,558	95.84	21	215
	Other metallic minerals (+)	34,427	55.25	n.a	n.a	18,062	42.26	n.a	n.a
_	Sub-total		3,017.37	140	5,365		2,663.59*	134*	5,497*
(ii)	Non-Metallic Mineral								
	Aggregates	138,637,415	2,465.03	359	n.a	109,519,817	2,215.88	365	n.a
	Clays	5,682,356	78.52	113	n.a	6,632,913	147.86	112	n.a
	Feldspar	216,394	23.03	4	33	168,570	18.20	4*	25
	Kaolin	236,840	35.08	15	170	228,605	31.32	18	200
	Limestone	22,760,765	261.19	11	n.a	19,978,936	226.03	10	n.a
	Mica	3,779	0.57	2	22	3,406	0.51	2	22
	Sand and gravel	33,566,866	624.89	889	n.a	35,556,500*	622.44	864	n.a
	Silica sand	5,364,129	426.13	43	391	6,913,353*	386.94	42	544
	Other non-metallic minerals (~)	24,801,010	252.76	n.a	n.a	20,351,195	193.90	n.a	n.a
	Sub-total		4,167.20	1,436	616		3,843.08	1,417*	791
(iii)	Energy Mineral								
	Coal	3,405,847	919.58	18	1,181	3,110,605	839.86	8	1,199
	GRAND TOTAL		8,104.15	1,594	7,162		7,346.53*	1,559*	7,487*

Sources:

Department of Mineral and Geoscience Malaysia Department of Statistics, Malaysia

- revised

(+) - comprising rutile, rare earth, lead, zircon, silver, zinc, tungsten and struverite

(~) - comprising earth materials and dolomite

- (x) including mineral processing plants and by-product from other mining
- n.a not available

PROSPECTING / EXPLORATION / MINING DEVELOPMENT ACTIVITIES

KeTSA, which as of 13 December 2022 became known as Ministry of Natural Resources, Environment and Climate Change (NRECC), is the principle Federal Government body in charge of the mineral sector and oversees its development and advancement. The JMG is its supporting agency to implement its policies, plans and activity programmes.

Under TIM 2010-2030, the framework of which was launched in 2020, it is envisaged that the issuance of prospecting licences (PLs) and exploration licences (Els) as well as mining leases (MLs) and Proprietary Mining Leases (PMLs) will increase with the enhancement of investment environment making Malaysia more competitive and attractive as an investment destination.

Latest available figures published in JMG's Malaysian Mining Industry report states that in 2021 in Peninsular Malaysia, there were 79 new applications for ELs, including 71 in Pahang and five in Kelantan. There were 70 new applications for PLs, 48 in Kelantan and 20 in Perak, the latter also having seven applications for renewals. Johor and Terengganu did not see any new applications. Activities in Perlis, Kedah, Pulau Pinang and the Federal Teriitories of Kuala Lumpur and Putrajaya were not included in the report. The main minerals of interests were tin, kaolin, iron ore, ball clay, manganese, silica sand and rare earths.

In Sabah, in 2021, there were five new applications for PLs to search for base metals, gold, coal, antimony, iron ore, nickel and cobalt. During the year, seven Prospecting Permits were issued for silica sand.

In Sarawak, in 2021, there were six applications for General Prospecting Licence (GPL), mainly for coal and one for application for Exclusive Prospecting Licence (EPL) for gold, silver, copper and diamond.

There were altogether 169 mines in operations in 2021, almost unchanged from the 168 in the previous year. The value of minerals (classified as such, and mined under the State Mineral Enactments) produced totalled RM3.765 billion, an increase of 75% compared to RM2.153 billion produced in 2020. The increase was as a result of higher market prices of iron ore, tin and coal. The major minerals produced in 2021 were ball clay, bauxite, coal, feldspar, gold, iron ore, kaolin, mangnese, silica sand and tin.

"Under TIM 2010-2030, the framework of which was launched in 2020, it is envisaged that the issuance of prospecting licences (PLs) and exploration licences (Els) as well as mining leases (MLs) and Proprietary Mining Leases (PMLs) will increase with the enhancement of investment environment making Malaysia more competitive and attractive as an investment destination."

Highlighted below are some of the major activities undertaken by the Chamber in 2022.

COLLABORATION WITH THE MINISTRY OF ENERGY AND NATURAL RESOURCES (KETSA), THE DEPARTMENT OF MINERAL AND GEOSCIENCE MALAYSIA (JMG) AND OTHER GOVERNMENT AND GOVERNMENT-LINKED AGENCIES

The Chamber continued to maintain its excellent relationships with relevant Government agencies particularly with KeTSA, which later became Ministry of Natural Resources, Environment and Climate Change (NRECC) in December 2022 and JMG, in providing an avenue for these government authorities to reach out to the private sector mineral industry and at the same time, for the Chamber to ride on their patronage to influence policies-making processes for the benefit of the private sector. During 2022, the Chamber participated in numerous activities organised especially by KeTSA and JMG towards strengthening public-private sector collaboration.

JMG-MCOM MOU COLLABORATIVE ACTIVITY PROGRAMMES

There had not been much progress on the above MoU following the first meeting of the Technical Committee held on 14 December 2021. The Chamber noted that there had been staff movements within JMG at both the headquarters and State levels which had delayed and affected the MoU's progress. It was also noted that the JMG had been pre-occupied with the exercise of restructuring the Department and the establishment of the Malaysian Mineral Industry Development Board (Mineral Board). The JMG had informed that they were reviewing the above MoU and would be proposing several changes so as to be in-line with KeTSA's new KSU's vision, mission and direction for the Department.

INPUTS TOWARDS THE DRAFTING OF A NEW EIA ORDER TO REPLACE EIA ORDER 2015

In response to the Department of Environment's (DOE) request for feedback during the online stakeholders meeting on proposed amendments to the Environmental Quality (Prescribed Activities) (Environmental Impact Assessment) Order 2015 (referred to as "EIA Order 2015") held on 23 April 2021, the Chamber had prepared and submitted a position paper. The positon paper, entitled "*Malaysian Chamber of Mines' Position on the Draft of the Environmental Quality (Prescribed Activities)* (Environmental Impact Assessment) Order 202x [EIA Order 202X] to replace the Environmental Quality (Prescribed Activities) (Environmental Impact Assessment) Order 2015 [EIA Order 2015]" was submitted to the Ministry of Environment and Water (KASA) and DOE on 19 May 2022 and copied to KeTSA and JMG. As at end of 2022, EIA Order 2015 was still effective and has yet to be replaced.

REPORT OF

PUBLIC HEARING ON THE PROPOSED STANDARD OPERATING PROCEDURES (SOP) FOR THE MINING OF NON-RADIOACTIVE RARE EARTH ELEMENTS (NR-REE) IN PERAK

The Chamber was invited to participate in the above Public Hearing which was conducted on a hybrid basis on Sunday, 19 December 2021 at the Hotel Casuarina@Meru, Ipoh, Perak. The purpose of the Public Hearing was to present to relevant stakeholders the draft of the SOP for public review, comments and feedbacks. It was attended by invited stakeholders including representatives from the relevant Federal and State Government departments and agencies. The Chamber was represented by the Executive Director, Technical Consultant and Senior Technical Manager who participated online.

The event began with an introduction by the Chairman of the Executive Committee for the preparation of the SOP, Prof. Dato' Dr Azizan Abu Samah. It was followed by presentations of three papers, namely "Permohonan Kelulusan Skim Pengendalian Melombong (Operational Mining Scheme – OMS)" by the Perak JMG State Director, "Permohonan Kelulusan Laporan Penilaian Impak Alam Sekitar (Environmental Impact Assessment – EIA)" by the Perak DOE State Director, and "Kawalan dan Kawal Selia Bahan Mineral di bawah Akta Perlesenan Tenaga Atom (LPTA)" by the Deputy Director General of the Atomic Energy Licensing Board.

The presentations were followed by a Question and Answer Session during which the following major issues were raised.

- Focus on care for, and reducing the impact on, the environment;
- Reconsider the usage of the term non-radioactive rare earth elements (NR-REE) which might be misleading;
- Comparison of the in-situ leaching mining method with other mining methods;
- Highlight the importance of mining Malaysia's NR -REE resources and development of the midstream and downstream sectors of rare earth industry;
- Environmental impact assessment (EIA) should be comprehensive; and
- Constant monitoring of the level of thorium and uranium.

On the whole, the Public Hearing was considered successful judging from favourable reviews and constructive feedbacks from the public.

BAN ON MINING IN PERMANENT RESERVED FORESTS (PRF) AND ENVIRONMENTALLY SENSITIVE AREAS (ESA)

Following KeTSA's press announcement on 6 October 2021 regarding the ban on mining in PRF and ESA, the Chamber sent a letter, dated 14 December 2021, to the KeTSA Minister appealing for the blanket decision to ban mining in PRF and ESA be reviewed. Unfortunately, the Ministry's response was that it would remain with its policy of not allowing mining to be undertaken in PRF and ESA.

Acting on the President's proposal at the Chamber Council meeting held online on 29 March 2022, the Secretariat prepared a Terms of Reference (TOR) for the setting up of a Focus Study Group to undertake a study entitled *"A proposal for national policies allowing mining in forest and plantation areas that generate net positive impact on the country's ecosystem embracing biodiversity, social, economic and climate change objectives".* The TOR was submitted to KeTSA and JMG on 10 August 2022.

The Chamber was later informed that KeTSA, through a strategic partnership, had appointed the Academy of Sciences Malaysia (ASM) to formulate a Business Model for the Development of the Non-Radioactive Rare Earth Elements (NR-REE) Industry in Malaysia. A Steering Committee, comprising mainly representatives from Government departments and agencies had been formed to review the said Business Model when completed. The Chamber President was appointed as a member of the Steering Committee representing the industry.

To undertake the project, ASM had formed five Working Groups, namely the Upstream; Midstream; Downstream; Environmental, Social and Governance (ESG) and Business Model Working Groups. The Upstream Working Group (WG 1) would be covering issues pertaining to exploration, mining and on-site processing of NR-REE. ASM had been given six months to complete the project with the expected date of completion targeted towards end of the first quarter of 2023.

Since WG1 would be covering some of the issues in the TOR for the Focus Study Group, the Chamber decided to put on hold the intended study by the Focus Group until after the completion of the ASM business model project.

INVOLVEMENT IN KETSA - ACADEMY OF SCIENCES MALAYSIA (ASM) PROJECT TO FORMULATE A BUSINESS MODEL TO DEVELOP THE NON-RADIOACTIVE RARE EARTH ELEMENTS (NR-REE) INDUSTRY IN MALAYSIA.

On 15th July 2022, KeTSA (*now known as NRECC*) had appointed ASM as its strategic partner to formulate a Business Model for the development of the NR-REE in Malaysia. The project agreement between the two parties was signed on 17 August 2022. The Chamber, represented by its President, was invited by KeTSA to be a member of the Steering Committee to monitor and review the progress of the project and its deliverables.

The objective of this six-month project, which is still in progress, is for ASM to formulate and submit to KeTSA a Business Model for the development of the NR-REE industry in Malaysia. In the implementation of the project, ASM had divided the preparation of the Business Model into five working groups (WGs), namely WG1 - Upstream Sector (Exploration, Mining & On-site processing); WG2 - Midstream Sector (Separation & Purification); WG3 - Downstream Sector (Manufacturing); WG4 - Environmental, Social and Governance (ESG); and WG5 - Integrated BM. As at end of 2022, the Inception and Interim reports have been submitted to NRECC.

Apart from the President being involved at the Steering Committee level, several members of the Chamber are also involved in the project. They include individual ordinary member, Datuk P. Geol. Fateh Chand as Chairman of the Project Task Force; Senior Council Member, Dato' P. Geol. Sia Hok Kiang as leader of WG2; and Technical Consultant, P. Geol. Teoh Lay Hock as leader of WG1.

Such participation is good for the Chamber as NR-REE is considered a strategic mineral resource for Malaysia and that several Chamber corporate mining members are currently involved in the exploration and mining of NR-REE.

WORKSHOP ON THE GREEN PRACTICES GUIDELINE FOR MINING SECTOR

The Chamber Technical Consultant and Senior Technical Manager participated in a workshop on the Green Practices Guideline for Mining Sector which was held from 19 to 20 January 2022 at Putrajaya Marriot Hotel. The workshop was organised by the Malaysian Green Technology and Climate Change Corporation (MGTC), a Government-linked agency under the Ministry of Environment and Water (KASA). Others who attended included representatives from the Department of Mineral and Geoscience (JMG), Economic Planning Unit (EPU) and several mining companies. The main objective of the workshop was to seek feedbacks on the final draft of the Guideline prepared by the MGTC Secretariat through a focused group discussion. The views and recommendations obtained were included in the Green Practices Guideline for the Mining Sector.

Following the completion of the said workshop, several training sessions on the Green Practices Guideline for the Industry Development Programme were conducted by the MGTC. The training sessions were focused on providing participants with a clear understanding of the importance of green practices in business, a better perception on the benefits of green technology, help to differentiate and understand different terminologies and the relationship between the processes of each sector as well as the methods of measuring the impact on carbon emissions and climate change. The pro-



At the Workshop on the Green Practices Guideline for Mining Sector

gramme aimed to create more local green products and services that are manufactured, supplied or provided by Malaysian local business and to facilitate in the development of green products and services in line with the National Green Technology Policy.

COURTESY CALL TO THE CHIEF MINISTER (CM) OF SABAH

On 26 January 2022, the Chamber President accompanied by the Technical Consultant, paid a Courtesy Call to the Chief Minister (CM) of Sabah, YAB Datuk Seri Panglima Hj. Hajiji bin Hj. Noor at the CM's office in Kota Kinabalu, Sabah.

During the discussion, the President shared on the global efforts in advancing the interests of the mineral resource industry, in partnership with other stakeholders, to create value from minerals. Sabah is endowed with abundance of nickel and coal resources. Unfortunately, most of the resources are located in protected forest areas. He advised the State to engage professionals to conduct scientific and technical studies on the pros and cons of mining, especially underground mining, and the impact it would have on the environment. He said that metals are required to make electrical and electronic parts for the manufacturing of computers, smartphones, cameras etc. Mining is needed to produce the metals. He also advised the State to strengthen its relationship with the Non-Governmental Organisations (NGOs) by highlighting the need to mine for minerals and metals. The country is currently importing technology metals from other countries costing billions of ringgit, losing much foreign exchange in the process. Overall, the courtesy call was very fruitful with good exchange of information, and the CM was appreciative of the Chamber's efforts.

BRIEFING TO THE NEW SECRETARY GENERAL OF KETSA



At the Briefing to the New Secretary General of KeTSA

Early in the year, the Secretariat received an invitation from KeTSA to brief the new Secretary General (KSU) of the Ministry, Dato' Hj. Rosli Isa on the Tin Industry (Research and Development) Board (Tin Board). The briefing took place on 18 May 2022 with the Executive Director, in his role as Secretary of the Tin Board, outlining the background, objectives and functions of the Tin Board. The Chamber's Technical Consultant, Senior Technical Manager and Senior Technical Executive were present at the briefing in which senior officials from KeTSA, specifically from its Division of Minerals and Geoscience, were also present in attendance.

The new KSU was appreciative of the briefing given and indicated his strong support to collectively promote the development of the mining and mineral resource industry, and to realise the objectives of the National Mineral Industry Transformation Plan (TIM) 2019-2030 including the generation of additional revenue from mineral resource development for the country.

KETSA MANAGEMENT RETREAT

The Chamber President, as Chairman of the Tin Board, was invited to the above Retreat which was held from 30 June to 2 July 2022 in Langkawi, Kedah. Organised by KeTSA, the main objective of the Retreat was for the Ministry to evaluate its achievements during the first half of 2022 and to prepare a strategic plan for the second half of the year. There were briefings by agencies under KeTSA in the energy and mineral resource sectors.

The Retreat was more of an internal networking of the Ministry where there were exchanges of ideas and preparation of work programmes for the second half of 2022. The Minister wanted to instill a business-oriented mindset towards generating additional revenue for the Government and had directed agencies under KeTSA to expand and broaden their scope of work which would eventually result in an increase in income for the Government. The President had opined that the Government could generate additional income through the granting of new licences for exploration and mining, introducing conducive policies to encourage investments in mining, etc. However, the mineral sector did not get much air time at the Retreat as discussions were focused mostly on the energy sector. Nonetheless, the President had the opportunity to discuss with top officials from the Ministry on issues pertaining to the mineral sector privately during breaks at the sidelines of the main event.



At the KeTSA Management Retreat

BENGKEL HALA TUJU INDUSTRI MINERAL NEGERI PERAK

The above workshop was organised by the Perak Lands and Mines Office (PTG) from 12 to 14 August 2022 at the Zenith Hotel, Putrajaya. The Chamber was invited to the workshop as a replacement for the Perak Bumiputera Chamber of Mines (DPBNPk) as its representative was unable to attend due to unavoidable circumstances. The main objective of the workshop was to find ways to increase State revenue from the mining and quarrying sector by re-assessing the various red tapes impeding mineral resource development in the State of Perak. The workshop was declared open by the State Director of Perak PTG, Dato' Mohamad Fariz Mohamad Hanip. In his Opening Address, Dato' Mohamad Fariz stated that the outcome of the workshop would be presented to the Sultan of Perak, Sultan Nazrin Muizzuddin Shah ibni Almarhum Sultan Azlan Muhibbuddin Shah Al-Maghfurlah. Therefore, he urged presenters to raise all relevant issues pertaining to the mineral resource industry in Perak for discussion, and to enable the State PTG to prepare a wellrounded recommendation to the Sultan of Perak. He also acknowledged the issues with regard to the Second Schedule of the EIA Order 2015 as well as KeTSA's new policy on the ban on mining in PRF and ESA being major impediments towards the development of the mineral resource industry in the State.

Representatives from several relevant State agencies and Government Link Companies (GLC) including the Economic Planning Unit (EPU), Legal Unit, Perbadanan Kemajuan Negeri Perak (PKNP), Perak Investment Management Centre (InvestPerak), Perak Menteri Besar Incorporated (MB Inc), Perak JMG, Perak Department of Environment (DOE), Perak Audit Department, Perak PLANMalaysia, Lumut Port and District Offices also attended the workshop. There were four Perak Assemblymen in attendance, namely YB Dato' Aznel Ibrahim of Pengkalan Hulu, YB Salbiah Mohamed of Temengor, YB Jamilah Zakaria of Trong and YB Dato' Abdul Manaf Hashim of Pengkalan Baharu.

Several papers from various State agencies were presented during the first day of the workshop, namely by MB Inc on "*Perak Mineral Development Blueprint*", Perak JMG on "*National Mineral Industry Transformation Plan 2021-2030*", InvestPerak on "*Strategic Direction for the State Mineral Industry*" and PKNP on "*Harnessing the State's Raw Materials for Other Economic Sectors*". The Chamber delivered a paper entitled "*Mineral Industry towards Sustainable Development – From the Industry Player's Perspective*". The paper covered issues on uncompetitive fiscal regime, unconducive legal framework, issuance of licences, permits and leases, and mines development in PRF and ESA. The paper also focused on the need for more exploration activities to be undertaken for the sustainability of the entire mineral value chain.

The workshop resumed the following day with several more paper presentations by other agencies including one by Prof. Emeritus Dato' Dr Ibrahim Komoo from Universiti Kebangsaan Malaysia (UKM) on "*Underground Mining*", and another by the DOE on "*Environmental Impact Assessment (EIA) Issues*".

BUDGET CONSULTATION 2023

The Chamber was invited to participate in the Federal Government's annual Budget Consultation for the year 2023 which was held on 23 August 2022 at the Ministry of Finance (MOF). The half-day 2023 Budget Consultation with the theme "*"Strengthening Recovery and Facilitating Reforms towards Economic Resilience and Well-being of Keluarga Malaysia"* was attended by nearly 300 invited participants from various Government agencies, Government-linked companies, business and corporate bodies, professional organisations, chambers of commerce and industries, public and private universities, and Non-Governmental Organisations. The Chamber was represented by its Senior Technical Manager.

It started with Welcoming Remarks by the Deputy Finance Minister 1, YB Dato' Shahar Abdullah who chaired the first session with three paper presentations, namely on Subsidy Rationalisation and Social Protection by Dr. Yasuhiko Matsuda and Dr Apurva Sanghi from the World Bank, Smooth Running of Businesses (*Kelancaran Urusan Perniagaan*) by Dato' Dr Ir Andy Seo Kian Haw from the Special Task Force to Facilitate Business (PEMUDAH) and Bumiputera Small and Medium Businesses (*Peniagaan Kecil dan Sederhana (PKS) Bumiputera*) by Dato' Hazimah Zainuddin from Hyrax Oil Sdn Bhd.

The second session of the Budget 2023 Consultation was chaired by the Finance Minister, YB Tengku Dato' Seri Zafrul Tengku Abdul Aziz. Two papers were presented; the first on Environment, Social and Governance (ESG) delivered by Prof. Datuk Dr Denison Jayasooria from All-Party Parliamentary Group Malaysia (AAPGM) and the second on Social Well-being from NGO perspective delivered by Dato' Shahira Ahmed Bazari from Yayasan Hasanah. Both sessions concluded with Q&A.

Before adjournment of the Budget Consultation, the Prime Minister, YAB Dato' Sri Ismail Sabri Yaakob, delivered Closing Remarks. He stated that the 2023 Budget was prepared by taking into consideration the challenges in the year ahead. It would centre on post-Covid-19 recovery efforts aiming to create more jobs, increase household income and sustainability of businesses. It would also focus on improving the social protection systems and well-being of the people through better quality healthcare services and education system, and prioritising the implementation of ESG initiatives and Sustainable Development Goals.

A total of 242 memoranda were received by the MOF, including from our Chamber who had never failed to submit each year proposals for the industry's mineral resource development.



At the Budget Consultation 2023

INTERNATIONAL SYMPOSIUM ON "FACING THE ENVIRONMENTAL TURN: THE EXTRACTIVE INDUSTRIES UNDER SCRUTINY *CROSSING LEGAL, POLITICAL AND ECONOMIC PERSPECTIVES"*

The Chamber was invited to send representatives to participate at the above International Symposium which was held from 24 to 26 August 2022 at the premises of the Technical Services Division (BPT) of the Mineral and Geoscience Department (JMG) in Ipoh.

The two-day Symposium, conducted on a hybrid basis, was organised jointly by:

- IETE Research Network, France, MSH-B & Réseau des Maisons des Sciences de l'Homme de Bretagne, Rennes,
- ASEAN China Norms International Research Network, CNRS, Paris,
- Climate Governance Malaysia, Kuala Lumpur,
- Institut Pondok Perancis, Kuala Lumpur, and
- Centre Asie du Sud-Est, CNRS, Paris.

It was supported by

- Fondation du droit continental, Paris,
- Ecole Normale Supérieure, Rennes,
- Department of Mineral and Geoscience (JMG) Perak,
- Department of Mineral and Geoscience (JMG) Pahang,
- University Technology Petronas, Perak,
- Perak Heritage Society, Ipoh,
- Malaysian Chamber of Mines, and
- International Institute of Islamic Thought and Civilization of International Islamic University Malaysia (ISTAC-IIUM)

The Chamber Technical Consultant presented a paper entitled "*Sustainability in the Mining Sector*" during the session on "Mining Sustainabil-



At the International Symposium on Facing the Environmental Turn: The Extractive Industries Under Scrutiny

ity in Southeast Asia and Malaysia". The Senior Technical Manager participated as one of the panelists at the roundtable discussion on "Actors on the ground: a cross-sectorial dialogue". He gave a briefing on the sustainability agenda in the ASEAN region, particularly within the scope and activities of the ASEAN Senior Officials Meeting on Minerals (ASOMM) and China.

Through their participation and presentations, the Chamber representatives managed to enlighten the academics and Non-Governmental Organisations (NGOs) on the importance of the mining sector to the country's economy and the livelihood of the people. More importantly, they managed to share the responsible and sustainable mineral resource development agenda which the Chamber is actively promoting.

The Symposium attracted some 70 participants who attended either physically and virtually. They included representatives from local and overseas universities, NGOs and related corporate sectors such as Sime Darby Plantation from the plantation industry and Petronas from the oil and gas industry.

A field trip to the Kinta Tin Mining Museum was organised on 26 August 2022.

MEMBER SUPPORT SERVICES

One of the primary objectives of the Chamber is to protect, promote and advance the general interest of the mineral resource community in Malaysia. Towards this end, the Chamber has taken up numerous cases to help the mining community, particularly its members, who had issues with the authorities with regard to their operations. Some of the services which the Chamber had provided in 2022 are outline below.

ISSUES RELATING TO SETTING UP OF PAHANG MINING CORPORATION SDN BHD (PMC)

Following the submission of a proposal paper entitled "*Proposal for Creating Long Term Sustainable Growth and Contribution to the State Economy and Revenue from the Mineral Resource Sector in Pahang*" to the PMC on 29 September 2021, a reminder letter dated 16 November 2021 was sent by the Secretariat. Unfortunately, there was still no response from the PMC.

With the assistance of one of our Chamber Council member, the Chamber PMC Issue Committee was able to meet with the Chief Operating Officer of PMC, En. Mohd Khairul Fazli Ariffin on 24 February 2022 at the PMC's office in Kuantan, Pahang. The delegation was led by En. Zaidi Harun as the Chairman of the PMC Issue Committee, accompanied by Dato' Kelvin Lee Wai Mun as a Committee member and the Senior Technical Manager from the Secretariat.

During the discussion, the delegation was informed that existing tenement holders had been told to write to the PMC to state their position and list out the tributes paid either to the Perbadanan Kemajuan Negeri Pahang, Yayasan Pahang or other State Government agencies. Tenement holders had also been informed that the ownership of the lease would be transferred to the PMC upon renewal. The PMC further informed that it had not approved any tenement application thus far, and that all costs pertaining to exploration and mining would have to be borne by the operators.



At the Meeting with Pahang Mining Corporation Sdn Bhd (PMC)

ADDRESSING MISCELLANEOUS ISSUES RAISED BY MEMBERS

During the year under review, the Chamber had received several requests from members to help them resolve operational issues pertaining to the mining industry. Some of the pertinent issues are highlighted hereunder.

A. Moratorium on mining activities in areas surrounding Tasik Chini, Pahang

Following the implementation of the above with effect from 16 June 2021, two issues were raised by miners in Pahang as follows:

- Orders from the Lands and Mines Office (PTG) of Pahang to halt their mining operations surrounding Tasik Chini even though their mineral tenements were located outside of the UNESCO Biosphere Reserve/ Chini Forest Reserve; and
- Orders from the Pahang State Government to clear the mineral stockpiles for all mining tenements surrounding Tasik Chini with effect from 8 March 2022 to October 2022. The period of seven months given to clear the stockpiles was too short for the miners to comply with due to the uncertain and challenging global mineral market situation.

B. Long delay in the renewal of mining tenements

There had been a long delay to renew the mining tenements by PTG Pahang even though the applications had been made in advance and in accordance to the time frame set by them. Subsequently, this had caused the applications for the Surat Kelulusan Skim Pengendalian Melombong (SKSPM) from the Department of Mineral and Geoscience (JMG) and 13D Permit from the Pahang Mining Corporation Sdn Bhd (PMC) to be delayed.

C. Exemption from preparation of EIA

Another issue raised was relating to the exemption from the preparation of EIA reports for tenements which had been approved prior to the enforcement of the EIA Order 2015. However, JMG Pahang needed a letter from DOE confirming the aforementioned exemption, and DOE was taking a long time to issue the said letter. This had caused the issuance of the SKSPM by JMG Pahang to be delayed and as a result, mining operations were affected.

In response to these issues raised by miners in Pahang, the Chamber had sent a letter to the Pahang Menteri Besar on 3 November 2022 highlighting the aforementioned issues. The letter was copied to the State Secretary of Pahang, State Director of PTG Pahang, Secretary General and Deputy Secretary General of KeTSA (*now known as NRECC*), Senior Undersecretary of the Minerals and Geoscience Division of KeTSA, Director General of JMG, State Director of JMG Pahang and all Chamber Council members.

On 29 December 2022, the Secretariat received copy of a letter which the Menteri Besar's office had sent to PTG Pahang and PMC, and copied to the Secretariat. In the letter, PTG Pahang and the PMC were requested to review the issues raised by the Chamber. However, to date, the Secretariat had not received any feedback from PTG Pahang nor the PMC.

MEMBERSHIP DRIVE

It was recognised that in order for the Chamber to continue to serve the national mineral industry effectively, and to remain relevant and sustainable, it has to expand its membership base. This would not only expand the Chamber's networking and reach out further geographically, but also provide additional income for the Chamber from the collection of membership subscription.

As part of the Chamber's membership drive initiative, the Chairman of the Membership Drive Committee met with the State Director of JMG Perak, Dato' Ir Ahmad Zukni Ahmad Khalil at the JMG Perak's office on 26 January 2022 to discuss the possibility of promoting the Chamber to mining companies in Perak and inviting them to become members. During the meeting, Dato' Ir Ahmad Zukni suggested that the initiative be extended to all the States in Malaysia. He also agreed to include the Chamber's membership pamphlet to all the licences issued by the JMG Perak.

Thinking ahead, the Chamber President suggested that the Government should make it mandatory for mining companies in Malaysia to become members of the Chamber before applying for exploration or mining rights, as what was being practised in Thailand. The Secretariat had raised the matter at the Technical Committee meeting of the JMG-MCOM MoU held on 14 December 2021 at JMG HQ in Putrajaya. The Secretariat would follow up on the matter when the Chamber resumes its discussion with JMG on the MoU. Once KeTSA and JMG were agreeable to the proposal in principle, the Secretariat would put up the necessary formal proposal.

COLLABORATION WITH DOMESTIC & REGIONAL ORGANISATIONS

The Chamber participated actively during the year in domestic and regional activities, particularly involving the ASEAN Federation of Mining Associations (AFMA), ASEAN Senior Officials Meeting on Minerals (ASOMM), ASEAN Ministerial Meeting on Minerals (AMMin) and the China-ASEAN Mining Cooperation Forum and Exhibition (CAMCFE). In most of these activities, the Chamber participated as host Secretariat and representative of AFMA.

HOSTING OF THE ASEAN FEDERATION OF MINING ASSOCIATIONS (AFMA)

AFMA is a regional organisation consisting of several national mining associations in ASEAN subscribing to the common desire of promoting the development of the mineral sector in the region. It was formed 38 years ago in 1984 with four founding members, namely MCOM, Indonesian Mining Association (IMA), Chamber of Mines of the Philippines (COMP) and Mining Industry Council of Thailand (MICT). The Association has grown in size with the addition of several other members including the Myanmar Federation of Mining Association (MFMA), Cambodian Association of Mining and Exploration Companies (CAMEC) and Lao Mining Association.

AFMA is a Civil Society Organisation (CSO) accredited to ASEAN, and as such, it is required to submit a summary of activities and programmes undertaken annually including its funding position to the ASEAN Secretariat. 2022 was the eight consecutive year in which MCOM had hosted the AFMA Secretariat, and accordingly, also the eight consecutive year in which the Chamber President and Executive Director held the posts of AFMA President and Secretary General, respectively.

AFMA will be holding its 2022 Executive Council meeting sometime in February 2023 to elect the new lineup for AFMA President, Vice-President, Secretary General and host Secretariat for the 2023-2024 term.

11th LIAISON OFFICIALS' MEETING OF THE CHINA-ASEAN MINING COOPERATION FORUM AND EXHIBITION (CAMCFE) 2022



At the 11th Liaison Officials' Meeting of the CAMCFE 2022

The above meeting was held on-site and on-line at the Howard Johnson CAEXPO Plaza Nanning, China via "*Womeeting*" platform on Tuesday, 22 February 2022 from 9.30am to 12.00 noon. The online meeting was logged in by 58 participants comprising representatives from ASEAN Member States (AMS), international and national associations, ASEAN Secretariat and China. There were 30 Chinese delegates present on-site, including representatives from the China-ASEAN Mining Cooperation Forum (CAMCF) Secretariat, Beijing and Chengdu China Geological Survey. The Executive Director concurrently the Secretary General of the ASEAN Federation of Mining Associations (AFMA) attended and gave a five-minute speech on international cooperation at the above meeting.

The meeting started with a Welcome Speech and a report on the 11th China-ASEAN Mining Cooperation Forum and Exhibition 2021 (CAMCFE) held on 20 May 2021 by Mr Zhou Tao, Secretary General of the CAMCF Secretariat. This was followed by an Opening Speech by the Leader of the China Geological Survey. The Director of the General Affairs Department of the CAMCF Secretariat, Mr Ye Shaobo then briefed the meeting on the programmes of the 12th CAMCFE 2022 scheduled to be held from 18 to 22 May 2022 and the China-ASEAN Mining Personnel Exchange & Training Center (CAMPETC).

Representatives from ASEAN Member States were then invited, in alphabetical order, to give a fiveminute speech starting from Brunei, followed by Cambodia, Indonesia, Lao PDR, Malaysia, Myanmar, Philippines, Thailand and Vietnam. This was followed by a five-minute speech on international cooperation by the invited organisations/associations, namely the Coordinating Committee for Geoscience Programmes in East and Southeast Asia (CCOP), MCOM/AFMA, Indonesian Coal Mining Association, Indonesian Mining Association, Myanmar Federation of Mining Association, Philippine Mine Safety and Environment Association, Spire Events Singapore and Mining Industry Council of Thailand. At the end of event, Mr Ye Shaobo, in his concluding remarks, extended invitations to AFMA members to participate in the 12th CAMCFE 2022.

7th ASOMM'S JOINT WORKING GROUP (JWG) MEETING & ASSOCIATED MEETINGS

The ASEAN Senior Officials Meeting on Minerals (ASOMM)'s Joint Working Group (JWG) Meeting & Associated Meetings are considered preparatory to the ASOMM, ASOMM +3 Consultations and ASEAN Ministerial Meeting on Minerals (AMMin). In 2022, the meetings were held online from 8 to 10 March 2022 hosted by Brunei Darussalam. The Chamber, as the incumbent host Secretariat of AFMA, was invited to a session under the Working Group on Trade and Investment in Minerals. All ASEAN Member States (AMS) and the ASEAN Secretariat (ASEC) were represented at the meeting which was chaired by a representative from Enterprise Singapore (ES). The Chamber Senior Technical Manager and Senior Technical Executive attended the meeting as representatives from AFMA.

Under the meeting's Agenda Item 4.2.8 which was deliberated on 10 March, the Senior Technical Manager, reported on AFMA's activities undertaken under the ASEAN Minerals Cooperation Action Plan (AMCAP) III Phase 1: 2016-2020 as well as proposed activities to be undertaken under AMCAP III Phase 2: 2021-2025.

Under AMCAP III Phase 1: 2016-2020, he reported that AFMA had been organising the Private Sector Forum on Cooperation in Minerals in ASEAN (PSF) annually and the Asia Pacific Mineral Resource Exhibition and Conference (APMREC) once in 2016. AFMA had planned for a Technical Mission/ Field Visit but that did not materialise due to the lack of response from both the private and public sectors as well as shortage of funds.

As for the proposed activities to be undertaken under AMCAP III Phase 2: 2021-2025, he reported that AFMA would continue with the holding of the PSF as well as the APMREC. A PSF would be organised in 2022. However, the organising of the APMREC would have to be deliberated further as it would require bigger funding. AFMA also planned to revive its Technical Mission and Field Visit programme. He then requested ES and ASEC to provide some funding for the organising of the APMREC and also to help fund the Technical Mission and Field Visit programme.

The Senior Technical Manager further reported that, prior to this 7th ASOMM JWG meetings, AFMA Secretariat had a tripartite online meeting with ASEC and ES on 8 February 2022. At the meeting, the three parties had deliberated on the possibility of having joint activities under TI3.2 to create platforms for exchanging information and hold regular forums involving the business sectors and stakeholders in the minerals landscape within ASEAN and with dialogue partners and advanced mining countries to promote investment, adopt leading practices and build governance capacity. In addition to the above activities, AFMA also proposed to add two new activity programmes under the AMCAP III Phase 2: 2021-2025, namely i) the setting up of Focus Groups to deliberate on specific issues concerning mining in the ASEAN region, including mining in forested land, geological prospectivity, royalty rates and fiscal incentives; and ii) ASEC to initiate and take the lead in developing a suitable Environmental Stewardship agenda under the ESG initiatives.

Representatives from the AMS at the meeting were appreciative of AFMA's efforts and the presentation by the AFMA Secretariat, and Thailand, in particular, said that it would support AFMA's efforts to encourage mineral investment into the ASEAN region. ASEC, meanwhile, was keen on AFMA's proposal on the setting up of the Focus Groups, and would follow up with AFMA. However, it was not keen on the second proposal for ASEC to initiate and take the lead in developing suitable Environmental Stewardship agenda.

FORUM ON THE "FUTURE OF THE TIN INDUSTRY IN MALAYSIA"

The above half-day online Forum which was co-organised by the Tan Sri Omar Centre for STI Policy Studies, UCSI University together with the Chamber and Tin Board, and supported by KeTSA, JMG, Institute of Geology Malaysia (IGM), Geological Society of Malaysia (GSM), Malaysian Tin Products Manufacturers' Association (MTPMA) and Board of Geologists Malaysia (BOG), was successfully held on 5 July 2022. The objective of the Forum was to review and highlight tin's potential in enhancing the nation's economy, going forward.

More than 300 participants registered for the event with 100 participating via Zoom and the rest via Facebook and YouTube. The Opening Address was delivered by Prof. Emeritus Tan Sri Ömar Abdul Rahman, founder of the Tan Sri Omar Centre for STI Policy Studies, followed by five paper presentations from international speakers, namely by Prof. Dato' Dr Ahmad Ibrahim from the Tan Sri Omar Centre for STI Policy Studies on "*Reviving the Tin Industry as a New* Economic Powerhouse"; Dato' Sia Hok Kiang, Executive Chairman of Malaco Mining Sdn Bhd and senior Chamber Council Member on "Tin Resource Potential in Malaysia"; Mr Rocky Dimaculangan from the Chamber of Mines of the Philippines on "Beyond Compliance, Great Expectations"; Ms Arfidea Dwi Saraswati, from AKSET Law Firm in Jakarta, Indonesia on "Mining Activities in Indonesian Forests: Challenges and Opportunities"; and Mr James Willoughby from the International Tin Association, UK on "Tin for Tomorrow". The Forum concluded with a Question and Answer session.

The Forum had generated renewed interests in developing the tin resources in Malaysia, in particular the primary tin deposits and also the fine tin in the offshore marine sediments. The paper from the Philippines had created an awareness of the importance of embracing environmental, social and governance (ESG) in mining and how it had helped to convince the Philippines Government to change its anti-mining policy. The paper from Indonesia looked at the opportunities of how mining could be undertaken in forested areas legitimately, and in a responsible manner, although there could be numerous challenges involved. Overall, the Forum had been well received by the participants, many of whom had indicated to the Chamber that more of such Forums should be organised.



Flyer on the Forum on the Future of the Tin Industry in Malaysia



At the Webinar on "Seizing the Development Prospects of ASEAN Minerals Cooperation: Pathways for AMCAP Implementation"

PARTICIPATION IN THE WEBINAR ON "SEIZING THE DEVELOPMENT PROSPECTS OF ASEAN MINERALS COOPERATION: PATHWAYS FOR AMCAP IMPLEMENTATION"

The Chamber Executive Director, Tn. Hj. Muhamad Nor Muhamad concurrently the Secretary General of AFMA, was invited to participate in the above Webinar as one of the panel members during the Panel Discussion.

The Webinar, which was organised by the ASEAN Secretariat (ASEC) in collaboration with the ASEAN Australia Development Cooperation Programme Phase II (AADCP II), was held online on Wednesday, 27 April 2022 from 10.00am to 12.00 noon (Jakarta time) via Zoom meeting platform. Some 90 participants including representatives from ASEAN Member States (AMS), national and international associations, ASEC and University of Queensland (UQ), Australia logged in to attend.

The Webinar started with a Welcome Message by the Deputy Secretary General of ASEAN for ASEAN Economic Community, H.E. Satvinder Singh, followed by a Welcome and Opening Message by the Deputy Head of Mission of the Australian Mission to ASEAN, Ms. Caroline Scott. Thereafter, a presentation entitled "*The Overall Development Prospects of ASEAN Minerals Cooperation*" was delivered by Professor Ian Satchwell and Professor Paul Gow from the Sustainable Minerals Institute of UQ. This was followed by a presentation by the Head of Energy and Minerals Division of ASEC, Ms Marie Gail de Sagon entitled "*The Strategic Direction of ASEAN Minerals Cooperation to Boost Domestic and International Investments in all Components of the Minerals Value Chain*".

Following the presentations, a Panel Discussion with the theme "*Minerals' Contributions to ASEAN and Beyond: Partnerships and Stakeholder Perspectives*" was held. The discussion was moderated by Ms Catherine Frances Corpuz, a representative of AADCP II. The panelists comprised representatives from the Department of Primary Industries and Mines, Thailand; AFMA; International Energy Agency; Intergovernmental Forum on Mining, Minerals, Metals and Sustainable Development; Coordinating Committee for Geoscience Programmes in East and Southeast Asia; and Sustainable Minerals Institute of UQ. Each of them, in turn, were asked by the moderator to give certain specific opinions on the recently adopted ASEAN Minerals Cooperation Action Plan (AMCAP-III) Phase 2: 2021-2025 as well as views on priorities needed to enhance cooperation between the public and private sector in promoting

ASEAN as a mineral investment destination. The webinar concluded with a Closing Message by the Director of Sectoral Development Directorate of ASEC, Mr Ho Quang Trung.

During the Panel Session, the Chamber Executive Director as Secretary General of AFMA, was asked about the role of AFMA and its possible contribution in ASEAN's new strategic direction towards boosting domestic and international investments in all components of the minerals value chain, commencing with exploration.

The Secretary General replied that AFMA was fully commited to support all activities pertaining to developing mineral resources and would continue to actively participate and represent the private sector towards the development of mineral resources in ASEAN. He added that, in fact, it was with this spirit in mind that AFMA was formed some 38 years ago in 1984 with its four founding members, namely the Malaysian Chamber of Mines, Indonesian Mining Association, Chamber of Mines of the Philippines and Mining Industry Council of Thailand who have the common desire to advance the interests of the mineral resource sector in the ASEAN region. AFMA had since grown in size with the addition of several new members including the Myanmar Federation of Mining Association, Cambodian Association of Mining and Exploration Companies and the Lao Mining Association.

He said, AFMA believed that the potential for mineral resource development in ASEAN could be further advanced and enhanced through a more aggressive and focused efforts for the benefit of all ASEAN Member States (AMS). The development of the region's potential resources should be undertaken holistically throughout the entire supply and value chain from the upstream activity of mining and mine development to the midstream activity of mineral processing, and finally downstream valueadding through the manufacturing of mineral-based products.

The above, however, could only be fully realised if many of the current issues entrenched in the respective AMS policy and regulatory framework were being addressed and overcome. This was precisely one of the major reasons why over the years, foreign direct investments (FDI) into the ASEAN mineral resource sector declined to a share of less than 3% of the global investment fund available for exploration. In 2021, ASEAN only attracted some US\$300 million from the total of US\$2.5 billion in exploration fund invested globally. The major beneficiaries of this investment fund were the matured mining countries, such as Chile, Peru, Canada, Australia and the United States.

He added that in September 2021, AFMA Secretariat conducted a survey to identify the reasons for this inability of ASEAN countries to attract FDI into mining. Feedback from the respondents showed that some of the main reasons were;

- Limited availability of mineral resource information,
- Unfavourable mineral policy towards investment,
- Non-investor-friendly fiscal regime with excessively high taxes and other tributes, and
- Lack of integrity.

Governments, therefore, need to be mindful of these factors when planning to undertake initiatives to attract investments, domestic as well as foreign. AFMA believed that the future direction of the mineral resource development in AMS would be towards developing the green and high technology metals comprising nickel, cobalt, lithium, tin and rare earths, which were plentiful in several of the AMS.

He reiterated that AFMA, as the primary body representing the private sector interests in the ASEAN region would certainly provide the necessary support, facilitate and initiate collaborative partnerships towards enhancing the development of these important mineral resources together with AMS and also ASEAN Dialogue Partners.

TI3.2 CREATE PLATFORMS TO EXCHANGE INFORMATION AND HOLD REGULAR	GOING FORWARD AFMA'S INVOLVEMENT IN ASEAN MINERALS COOPERATION ACTION PLAN (AMCAP) III PHASE 2:2021-2025	Thailaid-Devid
FORUMS INVOLVING THE BUSINESS SECTORS AND STAKEHOLDERS IN THE MINERALS LANDSCAPE WITHIN ASEAN AND WITH DIALOGUE PARTNERS AND ADVANCED MINING COUNTRIES TO PROMOTE INVESTMENT, ADOPT LEADING PRACTICES AND BUILD GOVERNANCE CAPACITY	 An online meeting between AFMA Secretariat and Enterprise Singapore (ES) was held on 8 February 2022 to discuss the possibility of having joint activities under TI3.2 - Create platforms to exchange information and hold regular forums involving the business sectors 	Birgapore - Wen Chu a Indonesia ASEC - Aditya R Sick pheakder
	and stakeholders in the minerals landscape within ASEAN and with dialogue partners and advanced mining countries to promote investment, adopt leading practices and build governance capacity.	MOD Brunel
	 AFMA had indicated to ES that it: 1. Would continue to organise the annual PSF, 2. Plan to organise an APMREC physically in the near future, and 3. Plan to conduct Technical Mission / Field Visit to AMS. 	Myanmar, Myat JMG Malaysia ≇ Myenmer, Myat Myn., ≇ IMG Malaysia
	 In addition, AFMA would like to propose: 	Philippines - Liz
	 Setting up Focus Groups, and Environmental Stewardship Agenda under Environmental, Social and Governance (ESG). 	🥂 Philippines - Liz Cherr., 🦹 X260 Mbrai Wahyudin
20% WORKING GROUP ON TRACE AND INVESTMENT (WGTM) VERTIAL INCETING (18 MARCH 2022) BRIDNEI DA DUSSALAM		THA-DMR-Nutj Philippines - Ma

8th JOINT WORKING GROUPS (JWG) MEETING OF THE ASEAN MINERALS COOPERATION PLAN

The above meeting was held from 9 to 10 August 2022 via video-conferencing hosted by Brunei Darussalam. The Chamber, as the incumbent host Secretariat of AFMA, was invited to a session on 9 August 2022 to present a proposal on the establishment of the Multi-Stakeholder Focus Groups (MSFGs), a platform to discuss specific issues impeding mineral resource development in ASEAN Members States (AMS). The Executive Director, concurrently AFMA's Secretary General and the Senior Technical Manager, concurrently AFMA's Secretariat Officer, attended the virtual session and presented a report.

In the PowerPoint presentation delivered thereat, the AFMA Secretary General outlined the background and purpose of setting up the MSFGs, its work plan, specific issues and challenges for discussion, methodology, deliverables, participants and funding.

During the discussion that followed, Thailand thanked AFMA for the said proposal and acknowledged the impediments that hindered mineral investments into ASEAN. Thailand, as the country coordinator for ASEAN minerals co-operation in trade and investment, agreed that the proposal would be in-line with the Working Group on Trade and Investment in Minerals (WGTIM)'s action plan TI1.2 and TI1.3, namely *"Promote Investment to Domestic and International Companies in all Stages of the Minerals Value Chain"* and *"Adopt a Continual Improvement Strategy in Investor and Partner Engagement and in Making Quality Information on ASEAN Minerals Development"*.

The ASEAN Secretariat (ASEC) suggested the hiring of a professional consultant who has the experience and expertise on undertaking focus group discussions (FGD) relevant to mining and minerals industry issues. The consultant would be expected, amongst others, to help to set up and conduct the initial or pilot FGD, identify the specific issues or topics on the impediments to investment and trade for discussion, and produce the draft report and recommendations. ASEC also suggested that, for a start, the FGD could just focus on one or two major issues or topics for deliberation between AFMA members and private sector industry players. The outcome from the initial FGD would then be presented to the AMS through the ASEAN Senior Officials Meeting on Minerals (ASOMM) and subsequently to the ASEAN Ministerial Meeting on Minerals (AMMin). The MSFGs hopefully could become an evolving stakeholders' engagement platform which would support the region as a minerals investment destination.

ASEC further suggested that an AMS be nominated to work with AFMA to jointly develop the full project proposal, including work plan and budgetary requirements, as well as explore funding support from either ASEAN or Dialogue Partners. In this regard, Thailand agreed to be the co-lead with AFMA on the establishment of the MSFGs. Thailand, together with AFMA Secretariat, would develop and submit the full project proposal to ASEC including the process of searching for funding support, and thereafter in obtaining the necessary approvals from ASOMM and AMMin. ASEC informed that the Intergovernmental Forum on Mining, Minerals, Metals and Sustainable Development (IGF) was currently undertaking a study entitled "*Stakeholders Engagement Report for ASEAN Secretariat*". The study was expected to help ASEAN build up capacity to handle stakeholder engagements in a systematic manner. AFMA expressed its willingness to support IGF on this undertaking. Malaysia's Head of Delegation (HOD) to the JWG Meeting, En. Nor Azmi Ahmad, Undersecretary of the Geoscience Division of KeTSA applauded AFMA for the ambitious project proposal. He felt that the MSFGs could become a beneficial platform for all mineral resource industry stakeholders in ASEAN.

24th CHINA MINING CONFERENCE AND EXHIBITION 2022

The 24th China Mining Conference and Exhibition 2022 was held online from 21 to 24 September 2022. This event, with the theme *"Sustainable Mining for Sustainable Economic Growth"*, was organised by China Mining Association and supported by the Ministry of Natural Resources China. Several forums relating to the supply and demand situation of mineral products in China and abroad, mining capital markets, mineral trading markets, etc. were held during the event.

The Executive Director, concurrently Secretary General of AFMA, was invited to deliver an address at the Keynote Session of the Conference on 21 September 2022. His speech covered various sustainable mineral development efforts which were currently being pursued by ASOMM under its latest ASEAN Minerals Cooperation Action Plan (AMCAP) III Phase 2: 2021-2025 as well as AFMA's role in supporting the regional efforts towards sustainable mineral resource development in ASEAN Member States.



At the 24th China Mining Conference and Exhibition 2022



^{id} ASEAN SENIOR OFFICIALS MEETING ON MINERALS (ASOMM) sted Virtually by Brunei Darussalam November 2022



22nd ASEAN SENIOR OFFICIALS MEETING ON MINERALS (ASOMM) & ASSOCIATED MEETINGS

The above meetings were held from 22 to 25 November 2022 via online platform hosted by Brunei Darussalam. It was attended by all ASEAN Member States (AMS) and ASEAN Secretariat (ASEC) including its Deputy Secretary General, H.E. Satvinder Singh. The Chamber, as the incumbent host Secretariat of AFMA was invited to participate in some of the sessions. The Chamber President cum President of AFMA, the Executive Director cum Secretary General of AFMA and several senior officers of the Secretariat attended the sessions.

At the session with other International Dialogue Partners held on 22 November 2022, AFMA presented a proposal on the establishment of a Multi-Stakeholder Focus Groups (MSFGs), a platform to discuss on specific issues and challenges impeding the mineral resource development in AMS. This proposal was initially presented and discussed at the 8th Joint Working Groups (JWG) meeting held online on 9 August 2022. Subsequently, at a meeting between ASEC, Thailand and AFMA held on 11 November 2022 to discuss further on this proposal, it was agreed that Thailand and AFMA would be the coproponent for its establishment so as to be inline with Thailand's initiative on establishing a

Policy Framework and Governance on Trade and Investment. ASEC also suggested that a professional industry consultant, with experience and expertise in undertaking focus group discussions relevant to the mining and mineral industry, be appointed to assist in the development of the MSFGs. AFMA and Thailand would jointly prepare the full project proposal, including the Terms of Reference (TOR), work plan, budgetary and funding requirements as well as to identify a suitable professional mining industry consultant to be appointed with ASEC's assistance.

Following the presentation, several ASEAN Member States expressed their full support for the establishment of the MSFGs. The Deputy Secretary General of ASEC, H.E. Satvinder Singh and Malaysia's Head of Delegation (HOD), Tuan Hj. Shamsul Shahril Badliza Mohd Noor also congratulated AFMA for submitting the proposal

WELCOMING VISITORS FROM THE CHINA-ASEAN GEOSCIENCES COOPERATION CENTER (CAGCC), CHINA-ASEAN MINING COOPERATION FORUM (CAMCF) SECRETARIAT AND MEMBERS OF THE GUANGXI OVERSEAS MINING ASSOCIATION (GOMA)

A delegation comprising officials from the above organisations visited the Chamber Secretariat on 6 December 2022. It was led by the Executive Deputy Director of CAGCC, Mr Wei Qifeng, who was accompanied by several representatives of Chinese companies involved in the mining of gold and manganese as well as producers of mining equipment.

The Chamber President was on hand to receive the visitors. In attendance were the Chamber's Executive Director, Technical Consultant, Senior Technical Manager and Senior Technical Executive. Several Chamber members were also present, including Dato' Sri Chee Yew Fei and Mr Ng Mun Fey of Fortress Mining Sdn Bhd, Hj. Mohd Zain Ghazali of KL Larut Sdn Bhd and Mr Lim Wei Hung of Aras Kuasa Sdn Bhd. The main purpose of the visit was to discuss on enhancing cooperation between CAGCC/ CAMCF and the Chamber, and also on potential investment in mining projects in Malaysia.



At the meeting with CAGCC / CAMCF / GOMA

The delegation extended their invitation to all members of the Chamber to attend and participate in the upcoming 12th China-ASEAN Mining Cooperation Forum & Exhibition (CAMCFE) scheduled to be held physically from 17 to 21 May 2023 at the Nanning International Convention and Exhibition Centre, Guangxi, China.

The Chamber President proposed that a technical field visit to several mine sites and related projects be organised following the conclusion of the 12th CAMCFE. The members of the delegation from China were supportive of the proposal and would seek the approval of their relevant authorities for such a technical field visit to take place. The Chamber Secretariat will follow up with the Chinese representative assigned for this purpose.



Group photo after the meeting with CAGCC / CAMCF / GOMA

10th PRIVATE SECTOR FORUM ON COOPERATION IN MINERALS IN ASEAN (PSF)

The Chamber, as the incumbent host of the ASEAN Federation of Mining Associations (AFMA), held its premier annual Private Sector Forum on 20 December 2022 via Zoom Meeting Platform. With the theme *"Towards creating a conducive environment for responsible and sustainable mineral resource development in ASEAN: focusing on addressing climate change, renewable energy and meeting carbon neutral targets", this 10th PSF attracted some 70 online participants comprising AFMA members, public officials of ASEAN Member States, ASEAN Secretariat, industry players in the region and the mining fraternity.*

The Forum started with Welcome Remarks and Keynote Address by the AFMA President, concurrently the Chamber President, Dato' Seri Mohd Ajib Anuar followed by five paper presentations, namely by Ts. Raja Shazrin Shah Raja Ehsan Shah, Managing Director of Galaxy Tech Solutions (KL) Sdn Bhd, Malaysia entitled " Responsible and Sustainable Mining - the ESG Factor"; Prof. Min Jang from Kwangwoon University, Seoul, South Korea entitled "Introduction of Korea Mine Rehabilitation and Mineral Resources Corporation (KOMIR) and Sanha E&C, and their experiences for mine closure consulting and techniques"; Mr Djoko Widajatno, Executive Director of the Indonesian Mining Association (IMA), Indonesia entitled " Collaboration amongst Indonesia's mineral industry players towards achieving sustainable and green mining"; Mr Sitthipong Khunpirom, Quarry Manager of Siam Cement (Ta Luang) Co. Ltd., Thailand entitled "Green and smart mining: Campaign for sustainable mining development in Thailand"; and Mr Ignatius Wurwanto, Director of Sustainability and Risk Management of PT Indo Tambangraya Megah, Tbk., Indonesia entitled " The first step towards energy transition: Indonesia's perspective".



The questions raised during the Q & A session touched on the rehabilitation and exit plan of the Mamut copper mine in Sabah, mining in forested areas in Indonesia and ESG in the mining industry. The questions were suitably answered by the respective speakers on those subjects.

Dato' Seri Mohd Ajib informed that the Chamber and the Malaysian Tin Industry (Research and Development) Board would be organising a conference on primary tin sometime in 2023. The conference would focus not only on advancement in technology in the search for primary tin deposits, but also aspects relating to the extraction of tin, particularly relating to complex ores. Prof. Nik Meriam commented on the progress of ESG and timelines for implementation, and suitable guidelines for ASEAN countries to which Pak Djoko and Pak Ignatius added that ESG had been implemented in Indonesia, especially in the coal mining sector.

The 10th PSF ended with Closing Remarks from the AFMA Vice-President concurrently Chairman of the Mining Industry Council of Thailand, Ms Anchalee Trakuldit.

ASSOCIATED BODIES SERVICED BY THE SECRETARIAT

The following bodies continued to be serviced by the Chamber Secretariat during the year under review.

TIN INDUSTRY (RESEARCH AND DEVELOPMENT) BOARD (TIN BOARD)

The Tin Board has been serviced by the Chamber Secretariat since its formation in 1953, as it does not maintain any direct employee. The Malaysian Cabinet had decided in May 1996 that the Tin Board be dissolved and its functions transferred to other organisations. As a consequence of this decision, the Board submitted a recommendation containing proposals for the Tin Board to be restructured and re-constituted as a Mineral Industry Development Board (Mineral Board), which will be responsible for the development and promotion of the entire activity spectrum of the minerals resource industry including the upstream, midstream and downstream sectors. With this, the Mineral Board will be able to focus on activities covering all minerals and not just confined to those related to tin only.

Currently, the Ministry of Natural Resources, Environment and Climate Change (NRECC) (formerly KeTSA), together with JMG and the Tin Board are reviewing the draft Incorporation Bill of its new successor body to be known as the Malaysian Mineral Industry Development Board (MMIDB). Several discussions were held to brainstorm appropriate business models for MMIDB to sustain its operation as well as a reasonable cess rate for the other minerals and a suitable cess collection mechanism. To-date no decision has yet been made.

A separate report on the activities of the Tin Board during the year 2021 will be submitted to the NRECC Minister pursuant to the requirements of the Tin Industry (Research and Development) Fund Act 1953, which is the Board's incorporation Act. It will be published in the Federal Government Gazette after the Minister has presented it before Parliament. The Chairman of the Tin Board is Dato' Seri Mohd Ajib Anuar, who is concurrently the Chamber President. The Executive Director of the Chamber, Hj. Muhamad Nor Muhamad, is Secretary to the Tin Board.

THE MALAYSIAN TIN PRODUCTS MANUFACTURERS' ASSOCIATION (MTPMA)

The MTPMA, formed in 1989, is also serviced by the Secretariat, and comes directly under the purview of the Tin Board forming part of its extended activities under the Industrial Master Plan objectives covering the downstream tin-based products manufacturing sector.

The Association presently has 14 members comprising solder, pewter and tinplate manufacturing companies. It is managed by a Management Committee of nine duly elected members. Its Annual General Meeting is normally held in June where the Report of the Management Committee and Statement of Accounts for the year ending 31 December are presented.

THE KUALA LUMPUR TIN MARKET (KLTM)

The KLTM, which is a company limited by guarantee, is also serviced by the Chamber Secretariat since 2001. It was incorporated in 1984, and serves as a platform for the determination of the reference market price for the trading of refined tin metal. It conducts daily trading on-line electronically. However, in 2021 trading was disrupted because of issues related to the Covid-19 pandemic including production problems at Malaysia Smelting Corporation, the sole supplier of tin at KLTM.

The KLTM is managed by its Board of Directors with Dato' Seri Mohd. Ajib Anuar, the Chamber President, as its Chairman. It has a senior official from NRECC on the Board representing the Government. The KLTM currently has five ordinary members, many of whom are trading members who trade on the tin market. It also has one associate member. The KLTM normally holds its AGM in June each year. The Executive Director of the Chamber, Hj. Muhamad Nor Muhamad, is Company Secretary of the KLTM.



Standing from left. Muhammad Adzrul Madzlan (Senior Technical Executive), P.Geol. Teoh Lay Hock (Technical Consultant), Hj. Mohd Zain Ghazali, P.Geol. Madzlan Zam, Dato' Sri Hj Ahmad Omar (Vice President), Dato' Seri Mohd Ajib Anuar (President), Hj Muhamad Nor Muhamad (Executive Director), Lim Wei Hung, Assoc. Prof. Dr Syed Fuad Saiyid Hashim, P.Geol. Ahmad Ashraf Abdul Ghafar (Technical Manager), Hj. Johaizal Dato' Musa, Ir Kamarudin Abdul Karim; Zaidi Harun and Ir Steve Zhen Xiong Loh Dato' P.Geol. Sia Hok Kiang and Hj. Abdul Rahman Ishak Sitting from left:





Chamber members attending the 112^{th} AGM



WELCOME REMARKS BY DATO' SERI MOHD AJIB ANUAR PRESIDENT MALAYSIAN CHAMBER OF MINES AT THE 2023 CHAMBER ANNUAL LUNCHEON 30 MAY 2023 KUALA LUMPUR

Assalamualaikum and Salam Sejahtera

On behalf of the Malaysian Chamber of Mines, may I welcome each and everyone of you to the Chamber's Annual Luncheon 2023. This is indeed a very happy occasion. It has been four years since we last had this physical annual gathering which for years had been the hallmark of the Malaysian Chamber of Mines' activities.

This year, we are indeed honoured to have the Minister of Natural Resources, Environment and Climate Change (NRECC), YB Tuan Nik Azmi Nik Ahmad, to grace the occasion.

In 2022, the Chamber continued to focus its strategic role and efforts at both the National and Regional levels as a platform and bridge in strengthening and facilitating multi-stakeholder partnerships and engagements to enhance the recovery, development, resilience and sustainability of the mining sector. The Chamber actively participated in engagements covering specific issues and policy recommendations on ESG including fiscal regime, legal framework, issuance of licences, permits and leases and mining development in Permanent Reserved Forests or PRF and Environmentally Sensitive Areas or ESA. In addition, the Chamber actively promoted the development of the upstream mining sector in technology and critical metals needed in achieving climate change, renewable energy and carbon neutral targets as well as in providing a potential significant new source of national income.

The move into the endemic phase of the post Covid-19 period has stimulated the resumption of recovery in the country's mineral production. Preliminary data provided by JMG showed that the estimated total value of mineral production in 2022 was RM7.9 billion, an increase of 11.3 per cent from the RM7.1 billion achieved in 2021. All mineral sectors, namely the metallic mineral, non-metallic and energy mineral sectors showed increases in mineral production.

However, to sustain growth momentum and achieve exponential growth in the upstream sector as targeted in the National Mineral Industry Transformation Plan (TIM) 2021-2030, there need to be strategic priority and urgent support

to the upstream sector to provide the necessary critical and technology materials for the midstream and down-stream sectors of the industry as well, especially in meeting energy transition and climate change targets. To achieve these targets, two crucial and urgent priorities are required. Firstly, the existing mineral resource data need to be updated and enhanced through comprehensive geological mapping and zoning of potential mineralised areas by the relevant authorities. To do this, there must be, included perhaps in the 2024 Federal Government Budget, suitable allocations to allow this exercise to be adequately undertaken. Secondly, the issues concerning mining in permanent reserved forests (PRF) and environmentally sensitive areas (ESA) need to be addressed. The Government should perhaps look at allowing mining to take place in these areas subject to certain conditions being fulfilled instead of just coming out with a straight out ban on mining in PRF and ESA without considering its net positive impact and return on value. In both cases, high level engagements with stakeholders are urgently required to address them, and any new policy recommendations thereon must be based on science and facts. It would be pointless if these engagements involve just lower ranking officials with little knowledge, experience, know-how and expertise in dealing with such critically important matters. Obviously Federal, States and key private sector stakeholders should be involved in the engagements, with the NRECC to lead and technically supported by the JMG.

The mineral industry today is increasingly becoming exposed to ESG risks, including concerns around emissions, water use and quality, deforestation and social structures. ESG is indeed relevant throughout the entire mineral industry's value chain from exploration, mining, processing, rehabilitation and downstream mineral and metal-based manufacturing.

Addressing ESG requirements calls for focus on three core essentials to ensure the business is successful - people, process and product. Many investors are applying these non-financial factors as part of their analytical process to identify material risks and growth opportunities. Often, the ESG criteria are used to screen investments based on corporate policies with regard to ESG and to encourage companies to act responsibly. It is therefore crucial that the mineral sector leaps into the transition to a net-zero future by upgrading their ESG know-how to support a low-carbon economy.

The Paris Agreement 2015 outlined six key points, one of which was on Emission Goals by 2050. Carbon neutrality targets translate to having to balance the carbon emitted with carbon being absorbed from the atmosphere into "sinks" such as soil, forests and oceans. The Government has expressed its commitments, and players in the mineral industry have to do their part in helping the Government to meet those targets.

Many ways have been recommended towards achieving the carbon neutral target by 2050. These include reduction in emission, decarbonisation, and carbon capture, use and storage (CCUS) and integrated net zero solutions. The CCUS initiative plays an important role to decarbonise industrial processes by preventing exhaust CO2 from entering the atmosphere. Alternatively, CO2 could be captured and separated before being transported and stored into a geological formation where it may be utilised to generate use.

The mineral industry has to consider implementing some of these recommendations as an obligation to promote responsible and sustainable mineral resource development. Striking a balance is much needed for ultimate end results for enormous gain.

The Government must empower the various stakeholders to partake in the transition to renewable energy and in a way instill ownership on the initiatives. There must be a renewable energy road map to harness energy from the sun, wind, water and natural resources such as plants and vegetation.

This energy transition from the conventional way to renewable power generation would need concerted efforts and co-ordinated actions between various stakeholders in the upstream, midstream and downstream sectors of the mineral industry. There should be cooperation and collaboration between public and private sectors which would need to be continually enhanced and advanced.

In the "drive' towards a cleaner future, an exponential growth in the demand for, and accordingly production of, electric vehicles and battery metals is expected in the next few decades. Electric cars need six time more metal inputs as compared to conventional combustion engine cars. Likewise, an offshore wind turbine requires thirteen times more metals than a similar capacity gas-fired energy generation plant on land.

Hence, the search for new economic mineral deposits representing the sources of supply of raw materials to produce the necessary technology metals is crucial in the transition towards renewable energy and low carbon economy.

Minerals and metals, especially critical and technology metals such as rare earths, lithium, nickel, tin and magnesium play a very important role towards achieving the targets for the climate change agenda and, in particular, to reach the carbon neutral targets by 2050. Devices, equipment and machines such as solar cells, turbines and batteries require metals especially technology metals for them to function. Clean energy technolgies require much greater quantities of minerals and metals than their fossil fuel-based counterparts. As the world progresses towards carbon neutralilty, the rapid shift to these technologies is expected to drive significant increase in demand for these technology metals.

A critical path roadmap is needed for the country to provide a direction for mineral resource development to meet the carbon neutral targets. The roadmap should be comprehensive, covering mineral exploration to enable discovery of new economic mineral deposits which would be able to cater for the demand of renewable, clean energy and carbon neutral targets.

So what is in store in the year ahead?

The National Mineral Industry Transformation Plan (TIM) 2021-2030 has identified five mineral commodities of strategic importance. In support of this Government initiative, the Chamber has picked on two to focus on, namely tin and rare earths. The choice of tin needs no justification. Tin has been the backbone of our mineral industry and based on scientific knowledge, there is still plenty of undiscovered tin resources. Over the years, tin has been transformed to become a critical metal in the current technology revolution with its significance growing rapidly as an essential enabler for the electronic infrastructure, energy transition and digitisation leading to growing demand and higher prices.

Our main event for 2023 will be a Conference on the Development of Primary Tin Deposits in Malaysia with the theme "Revisiting Malaysia's Potential for Mining of Primary Tin Deposits" to be held in November 2023. The Chamber will be organising this event jointly with the Tin Industry (Research and Development) Board, with the support of NRECC, JMG, Institute of Geology Malaysia (IGM), Geological Society of Malaysia (GSM), Institute of Mineral Engineering (IME), Malaysian Tin Products Manufacturers' Association (MTPMA) and selected universities offering mineral or mining-related courses. The targetted participants will include geologists, mining engineers, representatives from exploration and mining companies, geological and mineral business consultants, investors in mineral resource development, relevant Federal and State Government officials, university lecturers, researchers and students. Apart from highlighting the enormous potential for the discovery of new economic primary tin deposits in Peninsular Malaysia, the Conference will focus on advanced exploration, mining and mineral processing technology, extraction and processing of complex tin ores from primary deposits, and assessing the current legal framework and fiscal regime, recommending changes needed to encourage mineral resource development and attracting investment. The event will have an international flavour with several speakers from overseas. It is hoped that this Conference will get the support of all concerned and rekindle our hope of bringing Malaysia back as a major global tin producer.

As for rare earths, or more specifically the ion adsorption clay (IAC) rare earth elements resources that we are endowed with, the Government has already recognised the value and potential of this mineral commodity. It could potentially be a major new source of national income once the full rare earths supply chain is established. In the context of global positioning, Malaysia's IAC-based rare earth elements (REE) provide strong competitive and comparative advantages due lower exploration, capital and operating costs compared with rocks or minerals -based REE, as well as its higher content of Nd, Pr and heavy REE which are in higher demand and more valuable.

To quote a Financial Post report, rare earth elements are critical to modern technology largely because they can be forged into powerful magnets that power the pumps, motors and sensors found in mundane items such as windshield wipers and fuel pumps, but also in complicated sensors and the motors that drive wind turbines and electric vehicles

The Malaysian mineral industry has had a reasonably good year in 2022 despite the uncertainties in the global macro-economics. Nevertheless, more needs to be done to move the industry forward at a faster pace. Critical priorities have been identified and need to be implemented to transform Malaysia's mineral resource industry, particularly tin and non-radioactive REE, as well as position itself as a major contributor to new sources of national income.

The country has to move towards creating a conducive environment for responsible and sustainable mineral resource development in Malaysia; focusing on addressing climate change, renewable energy and meeting carbon neutral targets. This will be in-line with the Government's "Malaysia Madani" concept, which is based on six core values; sustainability, prosperity, innovation, respect, trust and compassion. These core values will be the driver in tackling three strategic priorities which are poverty eradication, economic restructuring, and economic recovery and regeneration. To conclude my Welcome Remarks, let me take this opportunity to express the Chamber's appreciation to all relevant stakeholders in the mineral resource industry, especially the NRECC, JMG and the Tin Board, as well as other organisations related to the mineral industry such as the Kuala Lumpur Tin Market, Malaysian Tin Products Manufacturers' Association, Board of Geologists, Institute of Geology Malaysia, Institute of Mineral Engineering and Geological Society of Malaysia for their continuous support and united effort in advancing the interest and development of the mining and mineral resource industry.

Also, may I express my sincere gratitude to all Chamber Council members for their proactive and meaningful contributions to the management of the Chamber. In addition, a special thanks to the Secretariat staff led by the Executive Director for their enthusiasm and hard work in delivering quality and excellent services to the Chamber. Last, but not least, to every member of the Chamber, I wish to thank all of you for your continuous support and effort in assisting the Chamber to fulfill its responsibility of advancing and promoting the interest of the mining industry.

May I again, on behalf of the the Chamber, thank our NRECC Minister, YB Tuan Nik Nazmi Nik Ahmad, the Deputy Secretary General (Natural Resources) of NRECC, YBrs. Tuan Abdul Wahid Abu Salim and their senior officers for their presence and sparing time from their busy schedule to attend our Annual Luncheon 2023 and to touch base with members of our Chamber and the fraternity.

Thank you.

ADDRESS BY YB MINISTER OF NATURAL RESOURCES, ENVIRONMENT AND CLIMATE CHANGE

Assalamualaikum, Good Afternoon and Salam Sejahtera.

First and foremost, on behalf of the Ministry of Natural Resources, Environment and Climate Change (NRECC), I would like to thank the Malaysian Chamber of Mines (MCOM) for inviting me to deliver a speech to the mining fraternity at this august event. I have been informed that earlier today the Chamber has had its 112th Annual General Meeting.

Congratulations to the newly elected members of the Chamber Council for the term 2023/2024, notably to YBhg. Dato' Seri Mohd Ajib Anuar and YBhg. Dato' Sri Ahmad Omar as President and Deputy President, respectively, for again being re-elected to lead this prestigious body. The Ministry has great trust in their capabilities to continue to lead this Chamber in fulfilling its established objectives, especially in protecting, promoting and advancing the general interest of the mineral resources community in Malaysia.

Mining is one of the oldest economic activities in our nation's history, dating back to as early as the 5th century BC when the Sungai Batu civilisation was in existence in Kedah. We are all aware of the significant contributions made by the tin mining industry which was at one time, one of the main pillars of our national economy.

While the tin mining industry has slowed down, and the mining sector in general has been overtaken by other economic sectors, the Ministry, in 2021 has launched the National Mineral Industry Transformation Plan 2021-2030 (TIM 2021-2030) to rejuvenate the mineral sector, which we believe has great potential to be a new source of economic revenue for the nation.

Although the mineral sector contributes less than 1% of the total national GDP, the value of this industry to the country and the role it has played in the growth of the domestic economy should not be underestimated.

Traditionally, the mineral sector has been supplying essential raw materials to numerous other economic sectors such as construction, infrastructure, man-



ADDRESS

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YB TUAN NIK NAZMI NIK AHMAD MINISTER OF NATURAL RESOURCES, ENVIRONMENT AND CLIMATE CHANGE AT THE 2023 CHAMBER ANNUAL LUNCHEON 30 MAY 2023 KUALA LUMPUR

ADDRESS BY YB MINISTER OF NATURAL RESOURCES, ENVIRONMENT AND CLIMATE CHANGE

ufacturing, energy generation and rural development. With the country advancing into the 4th Industrial Revolution and tackling climate change issues, the mineral sector will play a vital role in providing critical minerals and metals for high technology and green technology applications.

The nation has benefited enormously from this mineral raw material supply inputs by way of import substitution, and savings in foreign exchange, stimulating the establishment of value-added industries and earning of foreign exchange from the export of these value-added products. The Department of Mineral and Geoscience has reported that the estimated total value of mineral production in 2021 was RM7.35 billion, an increase of 38.8% from the RM5.29 billion achieved in 2020.

Despite the positive performance of the mineral resource industry, the Ministry would like to remind members of the Chamber, to continue in managing our nation's precious mineral resources in a sustainable and responsible manner, without compromising on the objectives of making the industry more competitive and robust. As much as the Ministry gives its full and undivided support to mining and mineral resource development, the Ministry is also concerned about the possible impact of the activity on the environment.

In this respect, the Ministry is very pleased and appreciative to note that the Chamber is an active member of the Working Group on Business Action and Advocacy for the Planet and is contributing to the development of the Business and Biodiversity Strategic Roadmap and Action Plan for Malaysia.

The Ministry is also committed to address climate change issues with the goal of reaching net zero carbon earliest by 2050. In this regard, the mineral sector has a role to play as certain technology metals are critical and vital for renewable energy generation, reduction of emissions of greenhouse gases and production of electric vehicles. As mining is highly risky and requires a huge amount of capital investments, investors including those from overseas are needed. The Ministry is optimistic that the Chamber would be able to play a key role in guiding and providing technical advice to potential stakeholders and investors interested to be part and parcel of the development process of our mineral resources. We especially welcome those who are able to help us develop our mineral resources in a responsible and sustainable manner.

As the mineral resource industry is expanding, there is a need for the establishment of a body responsible for managing, monitoring, controlling and overseeing its development. I understand that efforts led by my Ministry are underway towards the establishment of the Malaysian Mineral Industry Development Board.

Upon its formation, this Board will be responsible for the integrated development of the mineral resource industry, which will include, amongst others, promoting the potential and prospects of Malaysia's mineral resource, an important agenda to attract investments into the industry.

The Ministry would like to express its appreciation for the efforts of MCOM that played a significant role at the regional and international level, especially to become a host Secretariat to the ASEAN Federation of Mining Associations or AFMA, in spearheading the formation of the Multi-Stakeholder Focus Group, a platform to identify and discuss issues that impede the development of the mineral industry in the ASEAN region.

Before concluding my speech, I would like to express, once again, my sincere appreciation to the Chamber, particularly to Dato' Seri Mohd Ajib, for the invitation to address this 2023 Chamber Annual Luncheon, and gathering of the mining fraternity. The Ministry would also like to acknowledge and appreciate the diligent efforts of members of the Chamber, for their contribution towards the development of our mineral resources, which in turn has been most beneficial to our nation, our society, and environment. Finally, may I wish you all the very best in your endeavours, going forward.

Thank you.

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PRODUCTION OF TIN CONCENTRATES 2022 By Methods of Mining

METHOD	1st Qr. (KG)	2nd Qr. (KG)	3rd Qr. (KG)	4th Qr. (KG)	TOTAL (KG)	% BY METHOD
Open Cast	1,052,449	1,150,333	1,300,801	1,284,592	4,788,175	93.80
Panning	37,411	59,088	67,864	36,260	200,623	3.93
Mineral Processing Plants	57,594	22,716	23,423	12,237	115,970	2.27
TOTAL	1,147,454	1,232,137	1,392,088	1,333,089	5,104,768	100.00
Average Assay Value (Sn)	68.90%	67.76%	69.40%	69.32%	68.84%	
Tin Metal Contents (Tonnes)	791	835	966	924	3,517	

Source: Department of Mineral and Geoscience Malaysia

PRODUCTION OF TIN CONCENTRATES 2022 By States (In Kilogramme)

STATES	1st Quarter	2nd Quarter	3rd Quarter	4th Quarter	TOTAL
Perak	1,002,184	1,070,895	1,096,074	1,003,734	4,172,887
Selangor	8,593	19,329	96,091	74,542	198,555
Kedah	5	10,460	13,638	12,715	36,818
Johor	0	4,550	17,255	20,230	42,035
Pahang	136,173	126,904	168,631	221,867	653,575
Terengganu	500	0	400	0	900
TOTAL	1,147,455	1,232,138	1,392,089	1,333,088	5,104,770

PRODUCTION OF OTHER MINERALS 2022 (Output in tonnes except gold and silver)

NAME OF MINE	ERALS	1st Quarter	2nd Quarter	3rd Quarter	4th Quarter	2022 TOTAL
Tin-In-Concentra	ites (a)	791	835	966	925	3,517
Iron Ore	(b)	1,022,080	1,284,088	1,290,316	1,315,141	4,911,625
Coal		888,814	857,746	939,382	719,905	3,405,847
Raw Gold (gms)		482,589	500,560	409,486	435,626	1,828,261
Manganese Ore		152,225	367,642	89,365	135,344	744,576
Kaolin	(a)	54,023	71,383	55,719	55,715	236,840
Bauxite		106,625	0	23,200	0	129,825
Feldspar	(a)	41,612	35,264	40,920	46,096	163,892
Mica		776	947	1,263	793	3,779
Silica	(b)	708,545	818,961	935,810	961,668	3,424,984
Ilmenite	(b)	4,184	4,575	9,417	5,900	24,076
Silver (gms)	(c)	65,478	266,408	44,904	37,634	414,424

Notes: (a) Production are from mining concessions only (b) Includes by-products from other mining & amang factory (c) By-product from gold mining only

NUMBER OF ACTIVE MINES IN THE MINING INDUSTRY Monthly Average and Year-End Totals 2022

TYPES OF MINERALS	1st Quarter	2nd Quarter	3rd Quarter	4th Quarter	No. of Mines on 31.12.2022
Tin	12	14	18	18	19
Iron Ore	64	61	63	63	63
Coal	8	8	8	18	18
Gold	11	10	11	11	11
Manganese	16	16	16	16	16
Kaolin	14	11	12	13	13
Bauxite	5	5	5	5	5
Feldspar	2	2	2	2	2
Mica	2	2	2	2	2
Silica	9	10	13	13	13
TOTAL (Average)	144	140	151	161	162

LABOUR EMPLOYED IN THE MINING INDUSTRY Monthly Average and Year-End Totals 2022

TYPES OF MINERALS	1st Quarter	2nd Quarter	3rd Quarter	4th Quarter	Labour Force at 31.12.2022
Tin*	1,927	1,851	1,904	1,962	2,037
Iron Ore	1,971	2,011	1,965	2,065	2,018
Coal	1,214	1,211	1,207	1,178	1,181
Gold	984	1,100	1,015	1,087	1,030
Manganese	224	239	249	252	252
Kaolin	210	168	171	164	170
Bauxite	51	47	32	25	28
Feldspar	30	33	33	33	33
Mica	22	19	21	22	22
Silica	463	425	410	402	391
TOTAL (Average)	7,096	7,104	7,008	7,190	7,162

* Including Labour Employed in Mineral Processing Plant Source: Department of Mineral and Geoscience Malaysia

DIESEL USED IN THE MINING INDUSTRY Monthly Average 2022 ('000 Litres)

TYPES OF MINERALS	1st Quarter	2nd Quarter	3rd Quarter	4th Quarter	2022 Average
Tin	1,362,228	1,399,420	1,633,001	1,440,585	1,458,809
Iron Ore	3,322,872	3,713,365	4,895,291	5,222,936	4,288,616
Coal	1,732,794	1,739,267	1,967,923	1,746,077	1,796,515
Gold	762,892	956,202	1,068,199	1,082,902	967,549
Manganese	303,830	349,853	284,630	260,109	299,606
Kaolin	76,790	118,193	112,472	117,016	106,118
Bauxite	47,093	6,640	3,000	12,668	17,350
Feldspar	12,949	12,709	6,737	9,326	10,430
Mica	2,933	5,233	9,917	8,450	6,633
Silica	1,059,432	330,683	356,471	396,256	535,711
Total ('000 Litres)	8,683,813	8,631,565	10,337,640	10,296,326	9,487,336

ELECTRICITY USED IN THE MINING INDUSTRY Monthly Average 2022 ('000 Kwh)

TYPES OF MINERALS	1st Quarter	2nd Quarter	3rd Quarter	4th Quarter	2022 Average
Tin	4,515,445	6,521,206	5,557,577	6,075,446	5,667,418
Iron Ore	5,418,899	5,195,479	4,927,289	4,938,571	5,120,059
Coal	170,659	231,366	236,997	267,872	226,723
Gold	3,555,123	4,127,878	4,707,747	3,958,375	4,087,281
Manganese	0	0	0	0	0
Kaolin	142,942	388,201	296,174	262,319	272,409
Bauxite	0	0	0	0	0
Feldspar	69,703	72,160	77,367	72,353	72,896
Mica	3,550	6,700	11,733	10,217	8,050
Silica	649,352	671,300	676,825	667,227	666,176
Total ('000 Kwh)	14,525,672	17,214,290	16,491,709	16,252,380	16,121,013

EXPLOSIVE USED IN THE MINING INDUSTRY Monthly Average 2022 (kg)

TYPES OF MINERALS	1st Quarter	2nd Quarter	3rd Quarter	4th Quarter	2022 Average
Tin	50,707	38,776	36,902	32,424	39,702
Iron Ore	1,004,742	1,041,667	163,456	142,300	588,041
Coal	7,670	6,303	7,763	17,465	9,800
Gold	36,075	51,009	77,060	108,456	68,150
Manganese	0	0	0	0	0
Kaolin	0	0	0	0	0
Bauxite	0	0	0	0	0
Feldspar	0	0	0	0	0
Mica	0	0	0	0	0
Silica	0	0	0	0	0
Total (kg)	1,099,194	1,137,756	285,180	300,645	705,694

HORSEPOWER OF MACHINERY USED IN THE MINING INDUSTRY Monthly Average 2022 (Kilowatts)

TYPES OF MINERALS	1st Quarter	2nd Quarter	3rd Quarter	4th Quarter	2022 Average
Tin	665,917	33,242	53,944	53,754	201,714
Iron Ore	232,616	245,405	236,395	254,258	242,168
Coal	0	0	0	0	0
Gold	1,447,472	1,352,856	1,474,575	1,262,405	1,384,327
Manganese	15,895	14,045	14,045	14,045	14,508
Kaolin	23,004	22,535	22,535	22,993	22,767
Bauxite	12,313	12,073	10,968	12,073	11,857
Feldspar	2,132	3,198	1,577	2,366	2,318
Mica	266	423	423	423	384
Silica	17,507	17,507	17,434	22,732	18,795
Total (In Kilowatts)	2,417,122	1,701,283	1,831,895	1,645,049	1,898,837

IMPORTS OF TIN ORES & CONCENTRATES INTO MALAYSIA By Major Countries of Origin 2021 - 2022

COUNTRY OF ORIGIN		2022		2021
	Quantity Tonne	Value RM'000	Quantity Tonne	Value RM'000
Australia	2,561	181,781	2,346	134,765
Brazil	1,552	191,816	151	9,420
Chile	0	0	32	1,577
China	64	4,984	25	1,254
Colombia	84	5,347	0	0
Congo	1,455	144,151	785	58,254
Congo (DRC)	3,323	249,272	3,207	207,188
Cote D'ivoire	72	7,919	152	11,795
Hong Kong	16	1,145	0	0
Indonesia	278	25,866	239	7,767
Kenya	24	2,671	778	48,274
Lithuania	9	259	0	0
Luxembourg	22	2,925	0	0
Myanmar	377	40,323	353	33,746
Nigeria	7,601	755,081	8,007	621,522
Russian Federation	1	155	183	12,324
Rwanda	778	68,519	144	11,309
Singapore	160	8,816	6	275
South Africa	848	78,543	500	26,904
Spain	490	43,500	282	21,877
Switzerland	0	0	48	3,877
Tanzania	435	33,407	209	13,065
Thailand	16	724	0	0
Turkiye	0	0	25	2,246
U.S.A.	203	18,878	177	7,911
Vietnam	22	2,608	0	0
TOTAL	20,391	1,868,690	17,649*	1,235,350*

Source: Department of Statistics, Malaysia
* : revised

IMPORTS OF UNWROUGHT TIN, NOT ALLOYED INTO MALAYSIA By Major Countries of Origin 2021 - 2022

	2022		2021	
COUNTRY OF ORIGIN	Quantity Tonne	Value RM'000	Quantity Tonne	Value RM'000
Canada	0.040	0.8	0.05	5
China	925	126,885	1,236	165,232
Hong Kong	0	0	154	22,797
India	0	0	0.5	66
Indonesia	1,590	236,338	1,776	195,614
Japan	6	938	308	3,892
Nigeria	300	30,076	100	11,788
Philippines	129	16,721	170	19,876
Singapore	16	2,079	17	1,014
Thailand	90	14,099	129	7,013
United Kingdom	60	9,978	76	7,652
TOTAL	3,116	437,115	3,967*	434,949*

Source: Department of Statistics, Malaysia
* : revised

STATISTICS 2022

EXPORT OF TIN METAL FROM MALAYSIA By Major Countries of Destination 2021 - 2022

COUNTRY OF		2022	Quantity Tonne	2021 Value RM'000
DESTINATION	Quantity Tonne	Value RM'000		
Australia	0	0	31	1,629
Bangladesh	87	12,360	55	6,475
Belgium	375	54,056	415	46,865
China	3,308	425,481	60	6,170
Egypt	35	3,618	30	3,919
Fiji	3	368	0	0
Germany	0	0	35	4,044
Hong Kong	240	34,443	140	14,788
India	1,160	172,737	337	34,626
Indonesia	5	392	0	0
Italy	545	77,891	1,040	115,451
Japan	4,566	691,528	4,643	548,961
Korea	728	89,428	2,110	254,770
Moldova	0	0	199	11,457
Myanmar	105	10,501	0	C
Netherlands	5	440	75	6,482
Pakistan	269	37,821	174	21,425
Philippines	20	3,566	64	7,232
Poland	0	0	55	4,502
Saudi Arabia	40	6,949	25	2,608
Singapore	14	2,096	105	11,872
Slovenia	0	0	50	5,406
South Africa	95	13,261	225	26,202
Spain	75	7,473	236	26,406
Taiwan	640	92,547	920	89,742
Tanzania	0	0	25	3,129
Thailand	1,101	119,828	506	47,053
Turkiye	284	34,733	155	19,875
United Arab Emirates	285	33,404	427	48,750
United Kingdom	100	9,239	75	9,294
U.S.A.	410	51,510	3,473	416,636
Vietnam	99	13,003	29	3,426
TOTAL	14,594	1,998,673	15,714*	1,799,195*

Source: Department of Statistics, Malaysia
* : revised

STATISTICS 2022

PRODUCTION OF TIN-IN-CONCENTRATES 1801 - 2022 Peninsular Malaysia

YEAR	LONG TONS	YEAR	LONG TONS	YEAR	LONG TONS
* 1801-05	3,200	1902	47,258	1963	59,947
* 1806-10	3,400	1903	50,842	1964	60,004
* 1811-15	3,600	1904	51,733	1965	63,670
* 1816-20	3,800	1905	50,991	1966	68,886
* 1821-25	4,000	1906	48,672	1967	72,119
* 1826-30	4,200	1907	48,474	1968	75,069
* 1831-35	4,500	1908	50,868	1969	72,630
* 1836-40	4,800	1909	50,754	1970	72,630
* 1841-45	5,200	1910	45,918	1971	74,253
	5,600	1910	47,498	@	TONNES
* 1846-50		1911			
1851	6,000		50,003	1972	76,830
1852	6,000	1913	51,377	1973	72,260
1853	6,000	1914	50,643	1974	68,122
1854	6,000	1915	49,832	1975	64,364
1855	6,000	1916	47,224	1976	63,401
1856	7,000	1917	42,903	1977	58,703
1857	7,000	1918	40,105	1978	62,650
1858	7,000	1919	39,240	1979	62,995
1859	7,000	1920	36,927	1980	61,404
1860	7,000	1921	36,240	1981	59,938
1861	8,000	1922	37,226	1982	52,342
1862	8,000	1923	39,383	1983	41,367
1863	8,000	1924	46,917	1984	41,307
1864	8,000	1925	48,146	1985	36,884
1865	8,000	1926	47,790	1986	29,134
1866	9,000	1927	54,390	1987	30,388
1867	9,000	1928	64,505	1988	28,866
1868	9,000	1929	72,355	1989	32,034
1869	9,000	1930	67,032	1990	28,468
1870	9,000	1931	54,538	1991	20,710
1871	5,500	1932	29,176	1992	14,339
1872	6,100	1933	24,840	1993	10,384
1873	4,800	1934	37,612	1994	6,458
1874	4,200	1935	42,359	1995	6,402
1875	8,566	1936	66,729	1996	5,174
1876	9,520	1937	77,223	1997	5,065
1877	3,004	1938	43,317	1998	5,756
1878	7,900	1939	46,745	1999	7,340
1879	10,985	1939	83,468	2000	6,307
1880	11,735	1940	62,581	2000	4,972
1881	11,399	1941	15,748	2001	4,772
1882		1942		2002	
	11,704	1943	26,000		3,358
1883	16,957		9,309	2004	2,743
1884	7,548	1945	3,152	2005	2,857
1885	17,319	1946	8,432	2006	2,398
1886	19,673	1947	27,026	2007	2,263
1887	23,976	1948	44,815	2008	2,602
1888	23,854	1949	55,203	2009	2,412
1889	26,500	1950	57,767	2010	2,668
1890	27,200	1951	57,396	2011	3,343
1891	32,400	1952	57,065	2012	3,725
1892	34,300	1953	56,404	2013	3,697
1893	39,912	1954	60,933	2014	3,777
1894	47,676	1955	61,244	2015	4,125
1895	49,592	1956	62,296	2016	4,158
1896	48,541	1957	59,293	2017	3,894
1897	44,095	1958	38,458	2018	3,868
1898	41,167	1959	37,525	2019	3,611
1899	38,960	1960	51,979	2020	2,963
1900	43,111	1961	56,028	2021	3,193**
1901	47,475	1962	58,603	2022	3,697
			2		

Note: @ 1972 onwards in Metric Tonnes (Tonnes) * Annual Averages Source: Department of Mineral and Geoscience Malaysia ** - revised

(1 long ton = 1.016047 tonnes)

STATISTICS 2022

MONTH	AVERAGE PRICE (USD / TONNE)	MONTHLY TURNOVER (TONNES)		
January	41,007	21		
February	- No Transac	- No Transaction -		
March	- No Transac	- No Transaction -		
April	- No Transac	- No Transaction -		
May	- No Transac	- No Transaction -		
June	- No Transac	- No Transaction -		
July	- No Transac	- No Transaction -		
August	- No Transac	- No Transaction -		
September	- No Transac	- No Transaction -		
October	- No Transac	- No Transaction -		
November	- No Transac	- No Transaction -		
December	- No Transac	- No Transaction -		
ANNUAL AVERAGE	41,007	21		

Lowest Price: US\$40,400 on 12 January 2022 Highest Price: US\$42,020 on 19 January 2022

Source: Kuala Lumpur Tin Market (KLTM)

REPRESENTATION IN CHAMBER AND OTHER COMMITTEES

Chamber / Tin Board Remuneration Committee

President & Vice-President - Chamber of Mines Chairman - Tin Board

Investment Sub-Committee

Dato' Seri Mohd Ajib Anuar - Chairman Dato' Sri Hj. Ahmad Omar Hj. Muhamad Nor Muhamad

Tin Industry (Research & Development) Board

Dato' Seri Mohd Ajib Anuar - Chairman Dato' Sri Hj. Ahmad Omar Dato' Ir Dr Patrick Yong Mian Thong (Alternate: P.Geol. Madzlan Zam) Dato' Chin Lean Choong Ir Steve Zhen Xiong Loh Hj. Johaizal Dato' Musa

Publicity Management Committee of Tin Industry (Research & Development) Board

Dato' Seri Mohd Ajib Anuar - Chairman Dato' Sri Hj. Ahmad Omar Dato' Ir Dr Patrick Yong Mian Thong (Alternate: P.Geol. Madzlan Zam) Dato' Chin Lean Choong Ir Steve Zhen Xiong Loh Hj. Johaizal Dato' Musa

Malaysian Tin Products Manufacturers' Association (MTPMA)

Hj. Muhamad Nor Muhamad P.Geol. Ahmad Ashraf Abdul Ghafar Muhammad Adzrul Madzlan

The ASEAN Federation of Mining Associations (AFMA) Executive Council

Dato' Seri Mohd Ajib Anuar - President Hj. Muhamad Nor Muhamad - Secretary General P.Geol. Ahmad Ashraf Abdul Ghafar - Secretariat Officer

ASEAN Senior Officials Meeting on Minerals (ASOMM)

Dato' Seri Mohd Ajib Anuar Hj. Muhamad Nor Muhamad P.Geol. Ahmad Ashraf Abdul Ghafar

Liaison Officials of the China-ASEAN Mining Co-operation Forum and Exhibition (CAMCFE)

Hj. Muhamad Nor Muhamad P.Geol. Ahmad Ashraf Abdul Ghafar

Malaysian Employers Federation (MEF) Hj. Abdul Rahman Ishak

Industry Advisory Panel, Faculty of Chemical and Process Engineering Technology, Universiti Malaysia Pahang P.Geol. Teoh Lay Hock

Board of Geologists Malaysia

P.Geol. Teoh Lay Hock - Board member representing the industry

Committee for the Formulation of the Malaysian Mineral Resources and Reserve Reporting Code P.Geol. Teoh Lay Hock - Co-Chairman

Working Group for the Establishment of the Malaysian Platform for Business and Biodiversity (MPBB) and National Business Advisory Group (BAG) P.Geol. Teoh Lay Hock

Corporate and Finance Affairs Committee of the Board of Geologists Malaysia P.Geol. Teoh Lay Hock - Chairman

Steering Committee for Evaluating Proposed Business Model of Non-Radioactive Rare Earth Elements (NR-REE) Industry in Malaysia, NRECC Dato' Seri Mohd Ajib Anuar - Committee Member

REPRESENTATION IN CHAMBER AND OTHER COMMITTEES

Rare Earth Minerals Strategic Alliance (REMSance), Universiti Teknologi Petronas

Dato' Seri Mohd Ajib Anuar - Council Member P.Geol. Teoh Lay Hock - Alternate Member

ASM Task Force for the Formulation of a Business Model for the Development of Non-Radioactive Rare Earths Industry in Malaysia

Dato' P.Geol. Sia Hok Kiang - Working Group 2 (Mid Stream) Leader P.Geol. Teoh Lay Hock - Working Group 1 (Mid Stream) Leader

Symposium on Human Capital Development for the Mineral Resource Industry Organising Committee

Dato' Seri Mohd Ajib Anuar - Patron Hj. Muhamad Nor Muhamad - Advisor P.Geol. Teoh Lay Hock - Advisor P.Geol. Ahmad Ashraf Abdul Ghafar Muhammad Adzrul Madzlan

Pahang Mining Corporation Issues Committee

Zaidi Harun - Chairman Dato' Seri Mohd Ajib Anuar Dato' Sri Hj. Ahmad Omar Dato' P.Geol. Sia Hok Kiang Dato' Kelvin Lee Wai Mun P.Geol. Madzlan Zam Hj. Abd Rahman Ishak Lim Wei Hung Hj. Muhamad Nor Muhamad P.Geol. Teoh Lay Hock P.Geol. Ahmad Ashraf Abdul Ghafar Muhammad Adzrul Madzlan

Membership Drive Committee

Hj. Johaizal Dato' Musa - Chairman Ir Kamarudin Abdul Karim Assoc. Prof. Dr Hashim Hussin Hj. Muhamad Nor Muhamad P.Geol. Ahmad Ashraf Abdul Ghafar Muhammad Adzrul Madzlan

JMG-MCOM MoU Steering Committee

Hj. Muhamad Nor Muhamad - Co-Chairman Dato' Seri Mohd Ajib Anuar P.Geol. Teoh Lay Hock P.Geol. Ahmad Ashraf Abdul Ghafar (Secretariat) Muhammad Adzrul Madzlan (Secretariat)

JMG-MCOM MoU Technical, Implementation and Coordination Committee

P.Geol. Teoh Lay Hock - Co-Chairman P.Geol. Ahmad Ashraf Abdul Ghafar Muhammad Adzrul Madzlan (Secretariat)

Conference on the Development of Primary Tin Deposits in Malaysia 2023 Organising Committee

Hj. Muhamad Nor Muhamad - Advisor P.Geol. Teoh Lay Hock - Advisor P.Geol. Ahmad Ashraf Abdul Ghafar - Chairman Muhammad Adzrul Madzlan - Vice Chairman Dzuhilmy Omar Emil Nuruddin Che Jamaludin Mahmud Nor Marzlini Mohamed Hasini Nor Azlin Mazlan Rozlina Jahrun Azizuddin Azizi

HONORARY MEMBERS

- Tuan Hj Mokty Dato' Mahmood Lot 3023, Lorong Melati, Kampung Damai, 48050 Kuang, Selangor.
- Tan Sri Datuk Ibrahim Menudin Safico Sdn Bhd, B-6-4, Megan Avenue II, No. 12, Jln Yap Kwan Seng, 50450 Kuala Lumpur.
- Datuk Ab. Sukor Shahar No. 4, Jalan Budiman 6, Taman Mulia, Bandar Tun Razak, 56000 Kuala Lumpur.
- 4. Dato' Ir Haji Abdul Rahman Dahan Osborne & Chappel Sdn Bhd, No. 2A, Jalan Taman Tambun, Taman Tambun, 31400 Ipoh, Perak

LIFE MEMBERS

- 1. Bennie, J.H. c/o UNDP, P. O. Box 650, Yangoon, Myanmar.
- Bridewell, J.W.
 45, Rue Vautier, 1227, Carouge, Geneva, Switzerland.
- Dempster, E. L. Oak Hill Fyning Lane, Rogate, Nr. Petersfield, Hants GU13 5DJ, United Kingdom.
- Dennis Taylor, Dr. 106 Duffy Street, Ainstie, A.C.T. 2602, Australia.
- Green, M. 153-0-6, Menara Duta, Jalan 1/38B, Segambut, 51200 Kuala Lumpur.
- 6. Henderson, J Flat 14, 51 Hyde Park Gate, London, S.W. 7, England.
- Pearson, J.C.
 "Jomanor", 41 lvydore Avenue, Worthing, W. Sussex, BN13 3JH, England.
- Rose, K.M.
 89 Desswood Place, Aberdeen, Scotland.
- Soo Ying Yuen 349 Cooper Street, Cambridge, Ontario N3C 3X8, Canada.
- 10. Tan Loong Keat P.O. Box 760, Indooroopilly Centre, QLD 4068 Australia.

CORPORATE MINING MEMBERS

- 1. J Resources Gold Ltd, Specific Resources Sdn Bhd Penjom Gold Mine, Empang Jalih, P O Box 49, 27200 Kuala Lipis, Pahang.
- Rahman Hydraulic Tin Bhd Lot P.T. 765, 33200 Klian Intan, Hulu Perak, Perak.
- 3. Selinsing Gold Mine Manager Sdn Bhd 157, Jln Bukit Bius, 27200 Kuala Lipis, Pahang.
- Malaco Mining Sdn Bhd
 28th Floor, UBN Tower, No. 10 Jln P. Ramlee, 50250 Kuala Lumpur

 Kumpulan Semesta Sdn Bhd Aras LPH, Menara Bank Rakyat Shah Alam, No. 1, Jalan Indah 14/8, Seksyen 14, 40000 Shah Alam, Selangor.

- Amanjaya Holdings and Ventures Sdn Bhd Level 16, Perak Techno Trade Centre (PTTC), Bandar Meru Raya, Off Jalan Jelapang, 30020 Ipoh, Perak.
- SMGB Group Sdn Bhd
 3.01C, West Wing, Level 3, Menara BRDB, 285, Jln Maarof, Bukit Bandaraya, 59100 Kuala Lumpur.
- Aras Kuasa Sdn Bhd Level 8, Menara Zenith, Putra Square, Jalan Putra Square 6, 25050 Kuantan, Pahang.
- Nalidah Tin Mine Sdn Bhd
 99, Jalan Raja Musa Aziz, 30300 Ipoh, Perak.
- Edubest Resources Sdn Bhd
 B-12, 1st Floor, Lorong Tun Ismail 8, Sri Dagangan II, 25000 Kuantan, Pahang.
- Ceramic Material Supply Sdn Bhd No 12, Jalan Wawasan 3/KU7, Sungai Kapar Indah, 42200 Kapar, Selangor.
- Prospek Suria Sdn Bhd Suite 25-01, 25th Floor Menara Keck Seng, 203 Jalan Bukit Bintang, 55100 Kuala Lumpur.
- 13. Lion Mining Sdn Bhd Level 14, Lion Office Tower, No. 1 Jalan Nagasari, 50200 Kuala Lumpur.
- Fortress Mining Sdn Bhd No. 9-1, Jalan PJS 8/18, Dataran Mentari, 46150 Petaling Jaya, Selangor.
- Alaska Resources Sdn Bhd No. 6-2, Jalan Radin Anum, Bandar Baru Sri Petaling, 57000 Kuala Lumpur.
- MO Sungai Temau Mines Sdn Bhd Lot 24205, Mukim Hulu Jelai & Batu Yon, 27200 Kuala Lipis, Pahang.
- BDB Rock Mineral Sdn Bhd No. 256, 1st Floor, Jalan Batik 2/1, 08000 Sungai Petani, Kedah.
- MCRE Resources Sdn Bhd Level 8, Menara Zenith, Jalan Putra Square 6, Putra Square, 25200 Kuantan, Pahang.
- Frank Resources Sdn Bhd
 B-12-6, Megan Avenue II, No. 12, Jalan Yap Kwan Seng, 50450 Kuala Lumpur.
- 20. Niche Capital Mining Sdn Bhd L11-03, KYM Tower, 8 Jalan PJU 7/6, Mutiara Damansara, 47800 Petaling Jaya, Selangor.

OTHER CORPORATE MEMBERS

- 1. Royal Selangor International Sdn. Bhd. No. 4, Jalan Usahawan Enam, Setapak Jaya, 53300 Kuala Lumpur.
- Kuari Batu Emas Sdn Bhd No. 7, Lebuh Lasam, Greentown, 30450 Ipoh, Perak.
- Batu Kawan Baik Sdn Bhd No. 7, Lebuh Lasam, Greentown, 30450 Ipoh, Perak.
- 4. S.E.K. (M) Sdn Bhd Timah House, 87, Jalan Sultan Yussuf, 30000 Ipoh, Perak
- SGS (Malaysia) Sdn Bhd Wisma SGS, Lot 603, Leboh Raja Lumu, Kawasan Perindustrian PKNS, Pandamaran, 42000 Port Klang, Selangor.
- 6. Magic Mirror Resource Consulting Sdn Bhd A-6-1, Block A, Megan Avenue I, No. 189, Jalan Tun Razak, 50400 Kuala Lumpur.
- Big Bob Trading (M) Sdn Bhd
 23-1, Premier Suite, One Mont Kiara, No. 1, Jalan Kiara, Mont Kiara, 50480 Kuala Lumpur.
- Kaolin World Sdn Bhd No. 42 Persiaran Bekor 15 Taman Pertama, 30100 Ipoh, Perak.
- Engeo Bumi Sdn Bhd 3A Level 1, Jalan Pengkalan Barat 19A, Pengkalan Gerbang Mutiara, 31650 Ipoh, Perak.
- 10. SWO Sdn Bhd 732, Jalan Rasah, Lorong Ceri 3/1, 70300 Seremban, Negeri Sembilan.

ASSOCIATION MEMBERS

- All Malaya Chinese Mining Association No. 73, Jalan Tun Sambanthan, 30000 Ipoh, Perak.
- Institute of Mineral Engineering Malaysia c/o Bizworth Sdn Bhd, 11A, Medan Gopeng 4, Medan Gopeng, 31350 Ipoh, Perak.
- Perak Chinese Mining Association No. 73, Jalan Tun Sambanthan, 30000 Ipoh, Perak.
- 4. Perak Quarry Association 116-F1, Jalan Kampar, 30250 lpoh, Perak.
- The Miners' Association of Selangor, N. Sembilan & Pahang c/o Chinese Assembly Hall, 1 Jalan Maharajalela, 50150 Kuala Lumpur.
- 6. Dewan Perlombongan Bumiputra Negeri Perak No. 14A, Medan Istana 1, Bandar Ipoh Raya, 30450 Ipoh, Perak.

INDIVIDUAL ORDINARY MEMBERS

- 1. Dato' Hj. Abdul Aziz Mohamed No. 4, Jln 4/1, Taman Tun Abdul Razak (TAR), 68000 Ampang, Selangor.
- Abdul Khaliq Abdul Hamid No. 7, Lebuh Lasam, Greentown, 30450 Ipoh, Perak.
- Dato' Abdul Malik Abd. Kadir RMT Metals Sdn Bhd, 14.02B, Menara Boustead Penang, 39, Jln Sultan Ahmad Shah, 10050 Penang.
- Ahmad Ashraf Ramli No. 58, Jalan 8/10, Bandar Tasik Puteri, 48020 Rawang, Selangor.
- 5. Ahmad Hazim Abdul Hadidi Malamet Sdn Bhd, 16A Jalan Tun Mohd Fuad, Taman Tun Dr Ismail, 60000 Kuala Lumpur.
- Ahmad Nizam Hasan
 53C, Jalan Sg 3/10, Pusat Bandar Sri Gombak, 68100 Batu Caves, Selangor.
- Dato' Sri Hj Ahmad Omar No. 16, Jalan SS20/24, Damansara Utama, 47400 Petaling Jaya, Selangor.
- Alexey Zmeyev Malamet Sdn Bhd, 16A Jalan Tun Mohd Fuad, Taman Tun Dr Ismail, 60000 Kuala Lumpur.
- Amran Mohd Sani Malaysia Smelting Corporation Bhd, Lot 6,8 & 9, Jln Perigi Nanas 6/1, Pulau Indah Industrial Park, West Port, Port Klang, 42920 Pulau Indah, Selangor.
- Balakrishnan B S Muthu No. 10, Jalan 5/10, Section 5, 46000 Petaling Jaya, Selangor.
- 11. Keith Chan Foo Khee No.5, Persiaran Chateau, Chateau Garden, 30250 Ipoh, Perak.
- 12. Bernard Chan Kee Siang Danga Bay Construction Sdn Bhd, S07, Podium 1, Menara Ansar, 80000 Johor Bahru, Johor
- Chan Kim Fan
 19, Jalan SS 17/3E, 47500 Subang Jaya, Selangor.
- Chan Sam Meng Sanguine Development Corporation Sdn Bhd, A1, Jalan Delima 1, Desa Timah Langat, PO Box 17, 43800 Dengkil, Selangor.
- Chan Wan Choon, PJK
 20, Jalan Bayu 6, Bukit Gita Bayu, Serdang, 43300 Seri Kembangan, Selangor.
- Reymond Chee Poi Kee Drilco Technologies (M) Sdn Bhd, 33-1, Jalan 2/115C, Taman Kuchai Jaya, 58200 Kuala Lumpur.
- Cher Hui Yun 80C, Jalan Rotan, Kampung Attap, 50460 Kuala Lumpur.
- Alexander Chieng Siong Huo No. 1B, Lorong Ulu, Sg. Merah 33A, 96000 Sibu, Sabah.

19. Dato' Chin Lean Choong Mariju Sama Sdn Bhd, Timah House, 87, Jalan Sultan Yussuf, 30000 Ipoh, Perak.

INDIVIDUAL ORDINARY MEMBERS

- Dato' Chin Lean Keat, DPMP
 S.E.K. (M) Sdn Bhd, Timah House, 87, Jalan Sultan Yussuf, 30000 Ipoh, Perak.
- Choo Mun Keong
 36, Jalan SS 21/1, 47460 Petaling Jaya, Selangor.
- 22. William Choong Nalidah Tin Mine Sdn Bhd, 99, Jln Raja Musa Aziz, 30300 Ipoh, Perak.
- Chua Cheong Yong
 2B-26-01, E Park Condominium, Jln Satu Uban, 11700 Gelugor, Penang.
- 24. Chuah Ai Ngor Nalidah Tin Mine Sdn Bhd, 99, Jln Raja Musa Aziz, 30300 Ipoh, Perak.
- 25. Chuah Yi Jie Nalidah Tin Mine Sdn Bhd, 99, Jln Raja Musa Aziz, 30300 Ipoh, Perak.
- 26. Daniel Mukhidinov Malamet Sdn Bhd, 16A Jalan Tun Mohd Fuad, Taman Tun Dr Ismail, 60000 Kuala Lumpur.
- Erina Dato' Musa No. 7, Lebuh Lasam Greentown, 30450 Ipoh, Perak.
- Datuk Fateh Chand
 465, Jalan Desa Utama, Taman Desa, 58100 Kuala Lumpur.
- Dato' Gainneos Jacob Goldie Jacob Goldie S. S. Chew, Advocates & Solicitors, B48, Tingkat 1, Lorong Tun Ismail 8, Sri Dagangan II, 25000 Kuantan, Pahang
- Gayathri Indran #11, Jalan 4/53, 46050 Petaling Jaya, Selangor.
- Goh Kim Chuan Nalidah Tin Mine Sdn Bhd, 99, Jln Raja Musa Aziz, 30300 Ipoh, Perak.
- Hamdan Kamaruddin
 490, Lorong Titiwangsa 7, Taman Bukti Setia, Ampangan, 70400 Seremban, Negeri Sembilan.
- Hariyanto Salleh Rahman Hydraulic Tin Sdn Bhd, Lot P.T. 765, 33200 Klian Intan, Hulu Perak, Perak.
- Harun Halim Rasip Halim Rasip Holdings Sdn Bhd, Apt B-4, Block B (2nd Floor), The Stories - Taman Tunku, Jalan Langgak Tunku, Bukit Tunku, 50480 Kuala Lumpur.
- Heng Yong Lai, Dato' No. 16, Lorong Chateau, Chateau Garden, 30250 Ipoh, Perak.
- Paul W. O. Hoskin LandTech Consulting, 11B Carlyle Street, Sydenham, Christchurch, 8023 Canterbury New Zealand.

37. Iaroslav Pilipenko Malamet Sdn Bhd, 16A Jalan Tun Mohd Fuad, Taman Tun Dr Ismail, 60000 Kuala Lumpur.

 Ismail Abd Rahman Rahman Hydraulic Tin Sdn Bhd, Lot P.T. 765, 33200 Klian Intan, Hulu Perak, Perak.

INDIVIDUAL ORDINARY MEMBERS

 Ismail Hussin Dynasty Agro Mining Sdn Bhd, Lot 2344, Taman Sri Kemboja, Jalan Bukit Marak, Binjai Banggu, 16150 Kota Bharu, Kelantan.

- 40. Dr Jasmi Hafiz Abdul Aziz Department of Geology, Faculty of Science, University Malaya, 50603 Kuala Lumpur.
- Hj. Johaizal Dato' Musa Hedd Industries (M) Sdn Bhd, No. 7, Lebuh Lasam Greentown, 30450 Ipoh, Perak
- 42. Ir Kamarudin Abdul Karim No. 4, Jalan L2, Taman Melawati, 53100 Kuala Lumpur.
- Dato' Lee Chung Han
 301C, West Wing, Level 3, Menara BRDB, 285 Jalan Maarof, Bukit Bandaraya, 59000 Kuala Lumpur.
- 44. Lee Sin Peng Citi Venture Limited, No. 7, Jln SS 22/22, Damansara Jaya, 47400 Petaling Jaya, Selangor.
- Lee Soo Loong No. 1, Jalan 26, Overseas Union Garden, Jalan Kelang Lama, 58200 Kuala Lumpur.
- Lee Toon Hian Pegang Mining Co Sdn Bhd, 56 Jalan Leong Boon Swee, 30000 Ipoh.
- Dato' Kelvin Lee Wai Mun B12, Tingkat 1, Lorong Tun Ismail 8, Sri Dagangan 2, 25000 Kuantan, Pahang.
- Lee Yian Ping Cotecna Trade Services Malaysia Sdn Bhd, 617, Jalan 31/39, Petaling Garden Kepong, 52100 Kuala Lumpur.
- 49. Leong Siang Fook Rahman Hydraulic Tin Sdn Bhd, Lot P.T. 765, 33200 Klian Intan, Hulu Perak, Perak.
- Liew Jwo No. 9, Jalan CH8, Bayu Mas, Taman Cheras Hartamas, Cheras, 43200 Selangor.
- Liew Poh Weng
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- 52. Liew Sen

Sg. Lui Gold Mine Sdn Bhd, PUB-S1, 2nd Floor, Sg. Wang Plaza, 55100 Kuala Lumpur.

- Lim Wah Ching PT Merdeka Copper Gold, 3 Jln 8/149L, Bandar Baru Seri Petaling, 57000 Kuala Lumpur.
- 54. Lim Yang Ern, Darren Darren Lim & Lee, A-13-11, Pinnacle PJ, Jalan Utara C, PJS 52, 46200 Petaling Jaya, Selangor.

 Lim Yong Huat Buler Engineering Sdn Bhd, No. 2A, Jalan Serendah 26/39, Kawasan Perindustrian HICOM, Seksyen 26, 40400 Shah Alam, Selangor.

 Datuk Lo Fui Ming Wullersdorf Resources Sdn Bhd, Lot 81-2, 2nd Floor, Kubota Sentral, KM 6, Off Jalan Apas, 91000 Tawau, Sabah.

INDIVIDUAL ORDINARY MEMBERS

- 57. Loh Ban Yew Sungei Piah Mineral Resources Sdn Bhd, 458-460, Jalan Kuala Kangsar, Taman Loke Lim, 30010 Ipoh Perak.
- Low Keng Lok
 1501 Block D, Kelana D'Putera, Jalan SS 7/26, 47301 Petaling Jaya.
- Dato' Ir Lum Weng Keong No. 6, Jalan BU 3/4, Bandar Utama, 47800 Petaling Jaya.
- 60. Lutfi Hamidee Abd. Latif Permint Minerals Sdn Bhd, 9th Floor, Menara PMINT, Jalan Sultan Ismail, 20200 Kuala Terengganu
- 61. Madzlan Zam Rahman Hydraulic Tin Sdn Bhd, Lot P.T. 765, 33200 Klian Intan, Hulu Perak, Perak.
- 62. Mohamad Nazri Tamby Malaysia Smelting Corporation Bhd, Lot 6,8 & 9, Jln Perigi Nanas 6/1, Pulau Indah Industrial Park, West Port, Port Klang, 42920 Pulau Indah, Selangor.
- 63. Dato' Hj Mohamed Noor Ayoob Nalidah Tin Mine Sdn Bhd, 99 Jln Raja Musa Aziz, 30300 Ipoh, Perak.
- 64. Dato' Seri Mohd Ajib Anuar Magic Mirror Sdn Bhd, A-6-1/1, Block A, Megan Avenue I, 189 Jalan Tun Razak, 50450 Kuala Lumpur.
- 65. Mohd Aljunid Abdul Ghani Kayfour Development Corp Bhd, 53-2, Jln. 2/27, Pusat Bandar Wangsa Maju, 53300 Kuala Lumpur.
- 66. Mohd Azmizan Sulaiman Rahman Hydraulic Tin Sdn Bhd, Lot P.T. 765, 33200 Klian Intan, Hulu Perak, Perak.
- 67. Dato' Seri Ts. Hj. Mohd Nawahidudin Mahamad Isa Nilaimas Services, No. 17-2 & 17-3, Jalan Equine 10D, Taman Equine, 43300 Seri Kembangan, Selangor.
- 68. Mohd Ridzuan Rajen Abdullah San Indah Sdn Bhd, No. 130-1, Jalan Mega Mendung, Jalan Klang Lama, 58200 Kuala Lumpur.
- 69. Mohd Shaffizan Ikmal Mohd Khalil Rahman Hydraulic Tin Sdn Bhd, Lot P.T. 765, 33200 Klian Intan, Hulu Perak, Perak.
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- 74. Ir Muhamad Asri Mahayuddin Bizworth Sdn Bhd, 11A Medan Gopeng 4, Medan Gopeng, 31350 Ipoh, Perak.

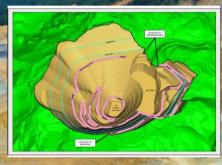
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- 76. Nik Mohd Fazli Nik Ibrahim Rahman Hydraulic Tin Sdn Bhd, Lot P.T. 765, 33200 Klian Intan, Hulu Perak, Perak.
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113.	Dato' Yunus Abd Razak D'Villa 10, Jalan Sunway 5/7, Bandar Sunway, Semenyih, 43500 Selangor.











Incorporated in 1907, **Rahman Hydraulic Tin Sdn Bhd (RHT)** is Malaysia's oldest and largest operating hard-rock open pit tin mine. It is also one of only a few tin mines that still operate in Malaysia. Since November 2004, RHT has become a wholly owned subsidiary of Malaysia Smelting Corporation Berhad (MSC), one of the world's largest integrated producers of tin metal and tin based products. With the full support and commitment of its parent company, RHT has transformed itself into a significant tin producer in Malaysia.

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