



Second Scoping Meeting of The Governing Consortium

Key proceedings, outcomes and action plan endorsement



Canberra, Hyatt Hotel 4 – 5 November 2019

Second Meeting of The Governing Consortium, UN Science-Policy-Business Forum on the Environment

Canberra, Australia, 4-5 November 2019

Key proceedings, outcomes and action plan endorsement

Contents

Executiv	ve summary	3
Outline	of key outcomes	4
Proceed	lings	5
Open	ing Session	5
From	Vision to Action – Adoption of Key Forum Activities 2020-2021	5
Strate	egic Briefings to the Governing Consortium	6
1.	Science-based decision making – Key issues for the consideration of the Governing	ng Consortium
2.	Resource Efficiency, Circularity, Nature-Based Solutions	8
3.	Technology & Innovation: Solutions, Deployment, Policy, Finance	12
4.	Financing and Business Models	15
5.	Tracking Performance and Impact	16
Endorse	ement of Forum Action Plan 2020-2022:	20
Attachments		23
Ackn	owledgements	23
	acts	

Executive summary

The United Nations Science-Policy-Business Forum on the Environment (UN-SPBF or Forum) is a powerful multi-sectoral platform that facilitates meaningful engagement and dialogue between UNEP and the science, policy and business sectors to strengthen and interface between these sectors and society at large. It works to build greater collaboration towards the achievement of the environmental aspects of the Sustainable Development Goals, UNEA Decisions and SDG targets.

The platform is multi-sectoral, cross-divisional and is designed to provide direct interaction between these communities and UNEA.

The Forum initiatives also aims to support the sustainable growth of green technology markets that are driven by advances in science and technology, empowering policies and innovative financing.

With a platform of over 2000 collaborating partners — representing the worlds of business, science and policy — UN-SPBF provides a unique platform for multi-stakeholders to work together to shape the future, with the private sector given a unique place on the table as a key partner and driver of sustainable development.

Key topics Governing Consortium (GC) discussed and received expert briefing on, included; Science-based decision making, Resource efficiency, Circularity and nature-based solutions, Sustainable agriculture, Financing and business models, and Tracking performance and sustainability reporting.

Over 150 top business, UN, Civil Society Organizations, academics and government representatives attended the two-day event held at the Hyatt Hotel in Canberra, Australia. From the private sector, senior representatives from organizations such as Google, International Copper Association, IBM, Accenture, ESRI, Huawei and The Economist, amongst others, all provided valuable insight into market led innovations in Big Data and Digital Ecosystems for the planet. While government delegates from Norway, current Presidency of the UN Environment Assembly (UNEA), Australia, European Commission and Costa Rica, provided political oversight and direction to proceedings (see Attachments section for full list).

Outline of key outcomes

Key outcomes and decisions reached during the Second Meeting of the Governing Consortium provided the UN-SPBF Secretariat with a roadmap of plans and activities to deliver for the period 2020-2022 on the theme "Working with Nature", focusing on nature-based solutions and innovation for environmental sustainability in accordance with the 5th Session of the UN Environment Assembly (UNEA-5) theme.

Highlighting some of the main outcomes from the meeting, GC Members unanimously endorsed the UN-SPBF programme of activities for 2020-2021-2022 (see Attachments for details) and committed to supporting its convening in parallel with UNEA-5 in 2021. GC Members welcomed the launch of regional Forum's in Africa and Asia Pacific, calling for harmony and integration with the global process, while maintaining focus on regional priorities and context.

On the topic of **sustainable public procurement**, GC Members called for promoting action on using digital technologies to map global supply chains, embed sustainability through product codes and develop harmonized reporting frameworks and rankings by building on UNEP's ongoing work in this area.

On the topic of **Big Data, technology and AI**, GC Members requested that UN-SPBF continue to support the development of Big Data strategies through UNEP channels, promote the ethical and transparent application of AI and analytics for the environment and explore the partnership and financial needs for key initiatives on Big Data and digitization of an open platform for the environment.

On the topic of **sustainable energy**, GC Members endorsed the continuation of UN-SPBF's close collaboration with UNEP's Energy Branch and wider energy sector to address barriers to advancing the clean energy transition and support the work of the recently launched private sector led 3% Club on improving energy efficiency across sectors.

On the topic of **behavioural change**, GC members invited the UN-SPBF to consider human perception and behavior when looking at promoting sustainability for business, policy and society.

The GC also seconded a proposal to achieve greater gender equity and representation.

On the other hand, The Forum Governing Consortium called for wider coherence and presence in the lead up to and during UNEA, which was supported by the UNEP Secretariat of the Governing Bodies and the UNEA Presidency. The Forum, therefore, would support the convening of multi-sector dialogues and consultations during the Bureaux meetings of UNEA and the CPR, and strive convene during (rather than ahead of) the UN Environment Assembly meeting in 2021, aiming to provide greater access to policy makers to access and engage the platform in a more meaningful way.

The GC presented its appreciation to the SPBF Secretariat and commended the work undertaken to ensure the efficient running of the Forum and the Canberra GC meeting.

Proceedings

Opening Session

Welcoming Remarks

Mr James Chisholm, First Assistant Secretary, Environment and Energy welcomed the attendees to Canberra and highlighted Australia's commitment to finding solutions to address the shared global environmental challenges faced. He outlined a range of initiatives that the Australian Government have implemented to tackle these environmental challenges, including encouraging sustainable production patterns, a national waste policy with targets to make 100% of all packaging recyclable or compostable by 2025.

Statement of Key Objectives

Professor Jian Liu, Director of Science, UNEP, addressed GC Members by highlighting that through strengthening the relationships between science, policy and business, communities can work together to discover solutions. He reminded the members that the next two to three year window will be pivotal in determining ways to take action. He asked Consortium Members to 'dare to think big' and be 'courageous' in their brainstorming over the coming week of activities.

Vision and priorities - UNEA Presidency

H.E. Ambassador Paul Gulleik Larsen spoke to GC Members on behalf of H.E. Ola Elvestuen, President of UNEA and Minister of Climate and Environment, Norway. He highlighted that nature-based solutions have been attracting support and that the increased attention on sustainable oceans and forests, will form part of a holistic approach to delivering sustainable development objectives in the future.

Adoption of the Agenda

The agenda for the remainder of the meeting was adopted unanimously.

From Vision to Action – Adoption of Key Forum Activities 2020-2021

Science Policy Business Forum 2.0

Head of the UN-SPBF Secretariat Shereen Zorba presented to the participants a brief history of the Science-Policy-Business Forum and highlighted that its creation was requested by governments to strengthen the interface between science, policy and markets. She highlighted the activities and structure of the Forum and emphasised the importance of delivering solutions that are agile and impactful.

Ms. Zorba highlighted the need to focus on 'big-ticket' items that allow the Forum to create impact through the aligned actions of its members to support and complement UNEP's work across multiple sectors.

Public-private partnerships for the environment, sustainable public procurement, technology innovation and financing and supporting the Big Data Strategy were outlined as key elements, based on the work of the Second Global Session of the Forum, which convened in Nairobi in March 2019, along with ongoing consultations with Forum Membership.

Prof. Jian Liu, co-founder of the Forum and Director of the Science Division shared with GC Members the vision towards Stockholm+50 in 2022, including the development of a paper in the context of the science policy interface outlining key global trends which shaped this interface since 1972. The paper would underscore the lessons learned during this period to determine the links between science, policy and action.

Prof. Liu called upon GC Members, all within their expertise and the powerful sectors they represent to support UNEP's work in this regard and to raise the level of ambition and delivery, with focus on solutions and impact.

H.E. Ambassador Larsen recognised that seven of the seventeen Sustainable Development Goals (SDGs) are directly related to the environment before opening the floor to comments.

Key contributions from the floor

- Citizen Science has the capacity and expertise to help address the data gaps present and would welcome the opportunity to be brought into the themes at future UN-SPBF events to be held in 2020 in Paris and Oslo.
- Newer and lesser known initiatives to tackle the environmental crisis should be integrated into discussions at a UNEA level, such as the 'Three Percent Club', launched in 2019, bringing together governments, businesses and international organizations to achieve the annual energy efficiency improvements needed to meet the Paris Agreement on climate change.
- The development and proliferation of Big Data has become an important tool for measuring the detrimental impacts of human lifestyles and consumption patterns on the environment.
- Given current social, economic and environmental challenges, the benefits of sharing Big Data between public and private sectors needs to be acknowledged and promoted.
- Businesses should be encouraged to implement non-financial targets for tracking progress against sustainable development rather than only profits.
- The SDG framework has been well received by the business community but questions remain over how businesses institutionalise the SDG's in their every-day operations.
- To more effectively measure and understand the implementation of sustainable private and public procurement, we need improved science and metrics. 12.7% of national procurement needs to be green for achieving the SDG's.
- UN-SPBF provides a unique role in promoting Green Technology Marketplace models and frameworks to deliver impact in terms of the science-policy nexus.

Review and Adoption of Forum Action Plan 2020-2022

The Forum Action Plan 2020-2022 was adopted unanimously.

Strategic Briefings to the Governing Consortium

1. <u>Science-based decision making – Key issues for the consideration of the Governing Consortium</u>

Key Findings: Global Environment Outlook (GEO)

Ms. Elaine Baker, GEO Lead Author, GRID/Arendal presented this portion of the proceedings and noted that the team had recently released the sixth edition of the Global Environmental Outlook (GEO) report. Key findings:

6 key drivers of environmental change	6 key cross cutting issues	
Population	Human health	
Economic development	Environmental disasters	
Demographics	Energy	
Urbanization	Chemicals	
Technological change	Waste and wastewater	
Climate change	Education for sustainable development	

Ms. Baker highlighted that while data gaps currently exist there is a need to analyze the data available more efficiently. She noted that the current path the world is taking is unsustainable and that failure to act now, will lead to an irreversible impact on the environment. She urged governments on the need to educate citizens on the environmental footprint of their lifestyles and businesses to help drive change in food and energy systems, support the

development of a circular economy by developing markets, processes and enabling policies.

Key contributions from the floor

- A renewed focus on translating environmental data to the public should be prioritized over the collection of new data. Citizen science can play a key role in this dialogue.
- Data is not the only factor in driving change, rather actions need to be suggested to provide credible alternatives to the current unsustainable lifestyle choices of humans.
- Governments need to implement ambitious and target focused policies and regulatory frameworks to assist in driving change across sectors.
- Although the science policy component and regulatory framework are important, so to is understanding data. How science is translated into actionable and measurable actions requires new thinking, new methodology and investment.

The Emissions Gap and Role of Non-State Actors

Nihit Goyal, Yale-NUS College, Singapore / EGR Collaborator presented this portion of proceedings. He highlighted that although the world is projected to warm by one degree Celsius by 2030, the urgency of this crisis is not being reflected through actions. No G20 member has committed to 100% renewable electricity

targets. Similarly, no G20 member signed up to legally binding legislation to cease subsidies for coal-fired power plants has divested.

At the localized scale, Mr. Goyal highlighted the number of non-state actors and city authorities committing to climate actions has risen.

Mr. Goyal concluded by advising that data and technologies be used to identify the potential for local action on addressing climate change.

Air-Climate Change Nexus

Helena Molin Valdes, Head of CCAC Secretariat presented this portion of the meeting proceedings.

Ms. Valdes highlighted that air pollution is the biggest environmental health risk facing the world. Currently, 7 million premature deaths per annum occur due to air pollution. 36% from pollution related lung cancer, 34% from strokes and 27% from heart disease. By reducing the output of black carbon, 2.4 million lives can be saved annually. This can only be achieved through stepping up the ambition to have a net zero carbon society.

Ms. Valdes highlighted that many developing countries do not see carbon emissions as their responsibility. Nonetheless, governments have a responsibility to create emission targets and policies. Local councils have the ability to make change through the creation of municipal rules surrounding recycling. She highlighted that data should be made available to support integrated assessments on the status of environmental health risks.

Ms. Valdes advised that amendments to the Paris Agreement were not going to be likely, rather a focus on initiatives to assist the countries involved in adopting the program. She urged that it may be up to citizens to demand change.

2. Resource Efficiency, Circularity, Nature-Based Solutions

Spurring Transformation through Resource Efficiency and Circularity

Edan Dionne, Vice President, IBM, Chaired the panel comprised of representatives across the energy efficiency, transport, extraction and consumer goods industries.

Luke Menzel, Chief Executive Officer, Energy Efficiency Council of Australia presented to GC Members about the National Australian Built Environment Rating System (NABERS) which assesses and benchmarks the energy efficiency of buildings in Australia. Since its inception, NABERS has reached nearly 80% of all office buildings within Australia and is a positive example of how Government regulation can positively contribute to resource efficiency.

Steven Kukoda, Executive Director, International Copper Association presented to GC Members about the important role copper plays in energy efficiency and reducing associated carbon emissions. He highlighted that copper is critical to clean energy, due to its physical properties as the most efficient non-precious conductor of heat and electricity. Due to copper's infinite recyclability, two thirds of the 600 million tons of copper produced since 1900 is still in productive use, saving on waste and contamination issues.

Mr. Kukoda outlined The Copper Mark project, launched in early 2019, which will provide organizations who show continuous improvement in the responsible production of copper, with a certification.

Ian McAlister, CEO, Consumer Electronics Supplier Association (CESA), presented to GC Members the sustainability impacts of the home appliance sector. He provided real-life examples of water and energy efficiency improvements resulting from the introduction and continued development of electronic appliances in the homes of millions of people around the planet.

Mr McAlistair outlined how Australian Government policies have driven improvements in the energy efficiency of whitegoods e.g fridges, microwaves etc.. He concluded by saying that such policies are required globally and called for industry to be involved in policy development from the outset, particularly in designing products that contribute to the circular economy.

Luke Todd, Senior Advisor, BYD Australia, presented to GC Members recent technological advancements he had seen in the production of electric buses. He provided an example of how Government policy in Shenzhen, China had resulted in all buses and taxis transitioning to electric power within three years. Circular economy considerations had been factored into the production of the buses batteries which are designed to be recommissioned into 30 residential battery storage.

The Chair, requested the panel and key experts to provide an outline of specific actions, which included:

- Governments to lead in the creation of sector specific targets in terms of energy efficiency which allows industry to set ambition.
- Policy to help industry and businesses absorb the initial high upfront costs of moving to greener technologies.
- The global harmonisation of policies to create internationally recognised energy efficiency standards on products and supply chains.

Key contributions from the floor

- It is important for Governments to address the problem of planned obsolesce in electronic goods with 'right to repair' legislative action.
- Although planned obsolesce can positively impact industry in striving to ensure business efficiency, the ability to replace components of machinery without resulting in machinery waste should be adopted.
- Take back schemes are a valuable tool to mitigate waste, yet from a business perspective, predicting the price point of green technology in the future is difficult to calculate from a product stewardship point of view.

From Resource Efficiency to Nature-Based Solutions – IRP Recommendations

Peder Jensen, Head of the Secretariat of the IRP, presented to GC Members via video link. He advised that from the findings of the Global Resources Outlook Report the relentless demand for resources has positively

impacted economies through lifting many individuals out of poverty, however the world is now using more resources than in the 1970s, with less material productivity being achieved.

Mr. Jensen outlined how full service-life Value-Retention-Processes (VRPs) can achieve savings up to 40% of the cost and up to 90% of emissions, yet only 2% are in productive use. He concluded by confirming that circular economic policies based on the concept of decoupling are essential ingredients of an SDG compliant economy.

Jeffrey Herrick, Scientist, USDA Agricultural Research Service presented to GC Members about land degradation. He outlined that The United Nations Convention to Combat Desertification (UNCCD) Framework for achieving land degradation neutrality can be achieved through both land restoration as well as the decoupling and further, re-match of land use with sustainable potential. He concluded by outlining that an integrated landscape approach including targeting research and investment, is key to increasing the total return on land restoration investments.

Key Contributions from the Floor

- Through both top-down and bottom-up approaches, different stakeholder groups can facilitate engagement and cohesively integrate Government departments.
- The Commonwealth Scientific and Industrial Research Organisation (CSIRO) found that a GDP growth increase by up to 8% can be achieved by 2060 through remanufacturing and associated resource efficiency gains.

Presentation by H.E. Ambassador Marta Juarez of Costa Rica on the occasion of Champions of the World Award to Costa Rica

H.E. Ambassador Marta Juarez, Member of the Bureau of UNEA, and Representative of the Costa-Rica Presidency of UNEA 2017 presented to GC Members. She provided a thoughtful speech highlighting that the world must now rise to a tremendous challenge, a global climate crisis threatening society.

H.E. Ambassador Juarez explained some of the reasons why Costa Rica was awarded the 2019 UN Champion of the Earth award through the deployment of hydropower and 98% renewable energy, tripling of forest cover in the last 40 years and effective biodiversity conservation. The promotion of eco-system restoration will aim to deliver 60% forest cover by 2030 which will protect biodiversity and combat climate change. She highlighted how eco-tourism is now the main source of income for Costa Rica and that nature-based solutions are critical for fighting climate change.

Sustainable Agriculture: Start-up Innovation

Ullas Samrat and Dhruv Khanna, Co-founders and CTO's, Triton Foodworks, presented their Indian startup company to GC Members which they created in 2014 to address unsustainable and inefficient agricultural methods in India.

Mr. Samrat outlined how Triton Foodworks has created 'smart farms', which uses precision farming techniques to address inefficiencies in traditional farming systems. Ideal farming conditions can be achieved which result in 98% less water being used, a 365-day harvest, zero pesticides use, while being located close to consumption centers. Currently, 25 varieties of fruits and vegetables are being farmed.

The Road to UNEA-5

Jorge Laguna, Director of the Secretariat of the Governing Bodies, UNEP, joined proceedings via video call. He began by expressing his pleasure at seeing the UN-SPBF continue to strengthen and acknowledged its key role in UNEP's private sector engagement strategy.

He outlined the expected themes for inclusion at UNEA-5, confirming that nature-based solutions were important for Consortium Members to research further. Another theme likely to feature at UNEA-5 in 2021 will be industry perspectives on the use and conservation of national resources, particular in the extracting and agriculture sectors, and the way multi-benefit innovative solutions and actions for the environment can be achieved cost effectively.

Mr. Laguna invited Consortium Members to support and contribute to UNEA-5's roadmap for 2021, namely on addressing the following:

- 1. Improving access to data to help the private sector engage with sustainable development,
- 2. Establishing stronger commitments towards developing effective and transparent sustainable value chains,
- 3. Ensuring policy coherence and robust frameworks to create level playing fields and to create incentives for businesses.
- 4. Inspiring business models based on sustainable resource use and decoupling of resource use for economic growth.

Mr. Laguna concluded by inviting GC Members through the UN-SPBF to submit their proposals to the Secretariat of the Governing Bodies after the meeting.

Conclusions and Closing of Day 1

The Governing Consortium endorsed the work program presented by the Secretariat and commended its efforts, and expressed support to the vision shared by Professor Liu in regards to the Stockholm +50 commemoration.

Key Contributions from the Floor

- A five-year thematic and programmatic focus aligned with UNEA would be beneficial.
- Discussions are needed to talk about science, culture and the behavioural aspects of people and how they interact with the natural world.
- Citizen Science can work with businesses to understand where values are aligned and where they can coordinate efforts and synergise in some way.

Professor Liu concluded the meeting for day one by suggesting that a maximum of five work streams be created to consolidate the niche of the Science Policy Business Forum. He also requested for GC Members to provide their feedback regarding their ideas and contributions for Stockholm +50 to be held in 2022.

3. Technology & Innovation: Solutions, Deployment, Policy, Finance

Big Data and AI for the Planet: Policy Perspective and UNEA Ministerial Declaration Introducing World Environment Situation Room

Ado Lohmus, Permanent Representative of Estonia to EC / UNEA Presidency 2017-2019, presented to GC Members a review of why Big Data was a prominent component of the Ministerial Declaration in 2019 and explained the importance of Big Data access to decision making.

He highlighted the pioneering work of the Forum in this area, underscoring the unique partnerships it was able to establish in such a short period of time with the most prestigious and important data generators, aggregators and users. The Forum presents a unique space for those to interact, at the same time and uniquely, with technology giants in the fields of AI, blockchain and the internet of things.

In addition to IBM, who co-chairs the UN-SPBF Working Group on Big Data, participants in the Second Adhoc Working Group on Big Data (which was to be launched the next day) included Google Earth Engine, Huawei and Amazon. In addition to several start-ups, including ones invited by Mr. Lohmus to represent the Estonian technology sector.

Mr. Lohmus relayed that it is valuable to work closely with Member States through the Forum to explore the best solutions available which will ensure that empowerment on a global level can be achieved.

He advised that significant data gaps exist on a global level. But that at the same time we need to fully utilize and make data available. A common understanding and standardisation of global data tools and metrics through the determination of a global data strategy will enable the progress development to be measured.

Mr. Lohmus advised that the main aim of the global environmental data strategy should ensure that access to transparent, accountable and comparable global environment data can be achieved. There is a need to improve national level data gathering systems and national data management capacities. A requirement exists to promote wider use of frontier technologies for data analysis, including Artificial Intelligence and block-chain technologies.

Decision makers at all level, government, business, consumer, need actionable information. Ideally, the disclosure of appropriate product information to consumers and develop measures to increase transparency in product chains. Further elaboration is needed to harness potential of digital solutions for a circular economy, to develop tools for supporting sustainable financing and to improve natural capital accounting. Establishment of environmental performance indicators would provide a competitive incentive for governments to improve the condition of the environment.

Pascal Peduzzi, Director UNEP GRID/Geneva, presented to GC Members about the work he has been undertaking to create a data knowledge platform called the World Environment Situation Room (WESR).

Mr. Peduzzi advised that the UNEP Grid Knowledge Platform will ensure that data is available to assist achieving global sustainability ambitions using the 2,400 satellites currently orbiting the world. The data from which is being aggregated to review changes in worldwide geography.

Mr. Peduzzi showed GC Members the demo version of the WESR map which uses 1,200 data sets had been created so far, with 900 indicators, relating to climate change, pollution and biodiversity.

Mr. Peduzzi confirmed that a further USD 5 million over the next four years would be required to ensure the completion of the project according to schedule in 2023.

Key contributions from the floor:

- It was expressed that, in some countries, in-situ data isn't free and readily available due to legal restrictions making it difficult to use certain data for UNEP GRID's purposes.

Mr. Peduzzi concluded by addressing GC Members about the need Earth Observation data to be made readily available for environmental monitoring purposes, rather than the current situation, whereby data is most often being used commercially for natural resource extraction.

Technology for Sustainability and the Planet: Opportunities and Challenges to Wider Deployment of IOT and AI

Edan Dionne, VP IBM, presented this portion of the meeting proceedings. She confirmed that we are currently at a time where computers are more affordable than ever before and that new technology must be shared and accessible.

Ms. Dionne outlined the Jefferson Project undertaken by IBM, in association with Rensselaer Polytechnic Institute and The Fund for Lake George, to monitor the scale and impact of pollution and invasive species on Lake George, USA and to determine potential mitigation strategies.

In 2013, after noticing that the lake was being affected by pollution, the project installed IoT connected sensors to perform AI analytics and data semantics on the lake. The accuracy of the sensors, platforms and weather stations used has improved dramatically over time due to technological advancements. Ms. Dionne confirmed that the Jefferson Project is now able to take action to protect the river from further contamination. It is intended for the learnings from this project to be scaled up for use in other fresh-water lakes.

Ms. Dionne outlined some additional examples of how IBM is using AI and other digital technologies to tackle environmental problems, including Agro Pad for analysing soil, Wildfire Detection to predict wildfires as well as the Watson Decision Platform to optimize agricultural yields.

Ms. Dionne concluded by confirming that IBM can do more but needs policy-makers to compel industries to make change.

Key contributions from the floor:

 In terms of data sharing, IBM has made the lessons learned from the Jefferson Project widely available for others to use either for free or through a subscription model.

AI for Good: Charting a Way Forward

I. **Cyrus Hodes**, Chair of The AI Initiative, Co-Founder of The Future Society, and **Nicholas Miailhe**, Co-Founder of the Future Society, joined proceedings via video call.

Mr. Hodes and Mr. Miailhe advised that they were currently involved in a AI4SDG Centre project to develop an operational multi-stakeholder partnerships model for a global framework on sustainable AI applications.

Mr. Hodes identified that AI financial modelling should take place to determine how to make data and power more sustainable.

Mr. Miailhe concluded by suggesting that an AI Global Forum would enable problems such as data sharing and climate action to be tackled.

II. **Heri Ramampiaro**, Norwegian University of Science and Technology, Head of Data and AI Group, presented to GC Members next.

Mr. Ramampiaro advised that the greatest challenges faced by the Norwegian University of Science and Technology, is how to scale up to a global solution in terms of AI due to cultural differences. Another challenge he identified was technology acceptance due to demographical differences between different regions.

Confirming that data is being used to develop the technology of the future, Mr. Ramampiaro informed Consortium members of an AI project he has been working on to assist in the diagnosis of cerebral palsy.

III. **Anne Bowser**, Global Partnership for Citizen Science, presented the Citizen Science perspectives on AI for Good. She announced that on 22 April 2020, the 20th Anniversary of Earth Day will be taking place enabling citizen scientists from all over the world to share 1 billion data points. An app will be launched for Earth Challenge to enable the linking of technologies for data validation with the ultimate aim of filling data gaps. This app will use AI technology to perform data quality checks.

Ms. Bowser concluded by advising that Citizen Science needs to establish ways to retain the community engagement of their volunteers by engaging them on how their data is being used.

IV. **Agu Leinfeld**, Software Development and Technology Director, Datel AS presented the final component of this discussion panel. He highlighted that consistent, quality data is required to allow for the discovery and recognition of patterns to make the world a better place.

Mr. Leinfeld presented to GC Members, Sille, a satellite imagery software for professional and amateur data analysts. He highlighted how in the City of Mexico; underground water removal has caused the land to sink. Sille is able to display to the users, where the sinking has taken place over the last three years.

Mr. Leinfeld suggested that in order to make the world a better place, information should be freely shared to allow even greater solutions to be solved.

Key contributions from the floor

- In response to questions about how Mr. Hodes and Mr. Miailhe have gone about negotiating the AI eco-system and how others could duplicate the work they are doing, Mr. Hodes confirmed that they developed governance on AI which has been used to assist political discussions in Dubai around these discussions.
- In response to questions about how their policies could be structured to frame the G20 opportunity,
 Mr. Hodes confirmed that the next G20 Summit would be held in Saudi Arabia and that he had been advising the Saudi Government on AI principals.
- Many organisations are beginning to share their data openly, subject to data sharing agreements.

4. Financing and Business Models

Mobilizing capital to deliver sustainable development goals

Yuki Yasui, UNEP Finance Initiative, presented this portion of the meeting proceedings.

Ms. Yasui provided an overview of the UNEP Financial Initiative and advised that long term capital allocation is not currently aligned to the Paris Agreement targets. She advised that a huge emphasis of sustainable finance is on risk management. As new evidence has shown, environmental and social issues are a risk to financial institutions and businesses, where climate change activities are hurting the bottom line of financial institutions. Ms. Yasui provided a real-life example of GE Money who had recently made a large loss on the sale of a fossil-fuel powerplant.

Ms. Yasui relayed that climate change is both an economic and financial risk. The Financial Stability Boards Taskforce on Climate Related Financial Disclosures highlighted that businesses should be looking at scenario analysis to perform risk assessments.

UNEP have created an impact model to calculate the profit or cost, security valuation and portfolio level at today's value translated to a range of different climate scenarios. Technology patterns were used to positively credit green revenue, while acute risks were calculated from a quality and life remaining pattern.

Ms. Yasui's research showed that, calculated at today's net present value, a two degree warming over the next fifteen years would create a policy risk of USD 6.6 trillion and an aggregated risk USD 2.7 trillion.

Ms. Yasui concluded there is strong evidence that financial institutions are trying to grapple climate change. Investors and governments are demanding change. Finally, the science policy community should cooperate more with the business community as well as service providers (climate analysts etc.).

Key contributions from the floor

- Over time opportunities will become more widely available to bridge the gap between regulation and risk when a carbon price is announced.

Sustainable Public Procurement – Challenges and Opportunities

Farid Yaker, UNEP Resources and Markets Branch presented to GC Members regarding his work on Sustainable Public Procurement (SPP).

He confirmed that public procurement accounts for USD 1.7 trillion of GDP, which makes it extremely important. Bringing a real-life example to the group, he advised that to produce one tonne of virgin paper, 98 individual resources are required.

Mr. Yaker noted that every single purchase has hidden human health, environmental and social impacts throughout the entire supply chain.

He proposed that the Sustainable Development Goals could be used as the main framework for articulating the impact areas, that require action by purchasers. By embracing technology and information platforms through the encouragement of e-procurement platforms, better visibility and control over purchasing data and patterns to facilitate the implantation of a harmonized reporting framework can be achieved. Through the exploration of AI and blockchain technology for solving some of the large data problems, the impacts that purchasing has can be better understood.

Mr. Yaker suggested the importance of developing common tools to harmonize sustainable procurement, including to develop guiding common core purchasing criteria to send harmonized signals to the market. He also suggested that the combination of sustainable procurement with fiscal products, the development of calculators and other tools like life cycle costing, and the mandatory implementation of SP on certain groups of products could all assist.

Mr. Yaker noted the in order to drive a green economy, public and private sector procurement must be aligned. He also suggested that a global coalition for low-carbon procurement should be built to assist in the development of minimum energy performance standards.

Tanya Harris, Global Procurement and Sustainability, The Fred Hollows Foundation presented her perspective on sustainable procurement.

Ms. Harris noted that a complex supply chain with high risks exists due to the world currently experiencing the highest rate of modern slaves in history. She confirmed that procurement needs to understand risks across the whole value chain and that it is a key enabler for rapid action to take place in terms of sustainability.

Ms. Harris expressed that to achieve sustainable public procurement, clear guidance on how to frame the action needs to be undertaken. Targeted training and capacity building for procurers could also assist, while the readily available life cycle assessment data and credible certifications could also achieve SPP.

Key contributions from the floor

- Once the information is available, procurement can be a partner in managing relationships and turning them into positive opportunities.

5. Tracking Performance and Impact

How sustainability reporting can drive action across enterprises and governments?

Rachael Bartels, Natural Resources and Industry Managing Director, Accenture presented this portion of the meeting proceedings. She highlighted that sustainability reporting has been around for the last 20 to 30 years. It is now time to strengthen and update reporting criteria, mechanisms and tools.

Ms. Bartels noted how the landscape of sustainability and sustainability reporting has shifted dramatically. According to Accenture, around 81% of consumers are changing their purchasing habits to be more sustainable and 61% are wanting a purpose led purchase. Nonetheless, she noted that Government regulation isn't being the driver of these results, rather, consumer attitudes have changed.

Going forward, Ms. Bartels believes that a sustainability reporting framework would assist in determining whether products in the marketplace are sustainable. There is a need to move sustainability reporting out of a 'sustainability function' and further integrated into businesses. Sustainability reporting should form part of a company's Annual Report rather than its current format.

Key contributions from the floor

- To ensure data doesn't become meaningless, the standardization interface needs to be dissected.
- Mining companies have been tracking sustainability for longer than other companies which has made it an embedded part of their reporting standards.
- Many businesses are on a drive to dematerialise their businesses and now is the time to harness the power of the market. Although a fundamental layer of consistency is needed, the tighter you define the reporting framework, the harder you make it for businesses to conform.

Tracking domestic climate finance and investment

Ian Cochran and Hadrien Hainaut from I4CE presented this portion of the meeting proceedings. They explained that I4CE is a non-profit think tank based in Paris that aims to link financial capital, project development and end investments with climate objectives.

Mr. Cochran and Mr. Hainaut explained how climate investment and financial flows are being intently reviewed. However, counterproductive climate finance flows and adverse fossil fuel investments still represent close to 70 billion euros per annum according to I4CE research.

They concluded by questioning how historic flows and the investment gaps should be reviewed to determine a trajectory for achieving carbon neutrality. They expressed their desire to scale this project internationally to ensure that a uniform approach to support consistency and comparability of data and methodologies globally.

Measures and metrics of business biodiversity performance

Benjamin Tregenna, Head of Informatics, UNEP World Conservation Monitoring Centre presented to GC Members.

He highlighted that biodiversity risk had increased the demand for the measurability of it in terms of reporting. He noted that six of the Sustainable Development Goals (SDGs) refer to life on land and a requirement exists to allow for the private sector to have their contributions recognised.

Mr. Tregenna noted that a focus on GDP exists, yet an equivalent for biodiversity in not apparent. In response, his work provides a biodiversity framework, aligned with policy-level biodiversity targets. Twelve different approaches exist to achieve this and coordinated efforts are being made to achieve a coherent and comparable view.

Mr. Treganna concluded that financial institutions should be required to report against the SDGs by using a standard framework. He highlighted that the science field is making positive gains towards measuring biodiversity for business applications and that post 2020, a new set of targets in terms of policy will allow business to report and contribute meaningfully. He finally noted that most sustainability reports are qualitative in form and there is a need to use more quantitative data for businesses to effectively measure progress against targets.

Climate Leadership – a response from Polish business to the climate crisis challenges

Maria Andrzejewska, Director, UNEP/GRID-Warsaw Centre presented to GC Members about the launch of the GRID-Warsaw initiative to tackle the climate crisis.

Ms. Andrzejewska noted that Poland is taking action to address the climate crisis with an ambition to achieve climate neutrality by 2050. She noted that in order to achieve this, companies need to understand how they can change their core business towards a climate neutral path.

The GRID-Warsaw Climate Leadership Initiative, launched in Poland at the time of the Governing Consortium in Canberra (5th November 2019), brings together leaders from a range of sectors including finance, retail, FMCG and fashion to introduce expert lead environmental assessments and certification for consumers to easily identify their sustainability performance.

Ms. Andrzejewska noted that the desired outcome of the GRID-Warsaw initiative is to work with the industry to withdraw from fossil fuel projects and invest renewable energy, tackling plastic packaging and increase recycling. She highlighted how by bringing consumers together to influence businesses, more can be achieved.

Big Data and AI to track the impacts of economic activities with the SDGs

Yuki Yasui, UNEP Finance Initiative presented this portion of the proceedings.

Ms. Yasui advised that on 22 September 2019, 133 signatories launched the Principal for Responsible Banking. One third of the banking industry signed the document, worth an estimated USD 47 trillion. Ms. Yasui confirmed that innovative principles are required to align with sustainable development.

She highlighted the positive increase in the number of 'Impact investors', defined as investors who have a social goal, willing to forgo profits to achieve their objectives as well as those good for society and the planet.

Ms. Yasui advised that the UNEP Finance Initiative created 20 areas of impact through the dissection of the seventeen SDGs. The Impact Radar Tool allows each of the industry categories to identify where the positive and negative impact of the 20 categories align with their businesses. This tool will ultimately assist banks to make more personalized decisions based on their clients and strategies while mitigating negative impacts.

UNEP Medium Term Strategy: Multi-Sector Insights and Contributions

Gary Lewis, Director of Policy, UNEP, joined via video link to present this portion of the proceedings to GC Members.

Mr. Lewis highlighted that the scope for the timing of UNEP's Medium-Term Strategy (MTS) has been grouped into three areas: the climate crisis, nature-based solutions and sustainable development.

Mr. Lewis advised that the ultimate aim of UNEP is to create a measurable plan in line with the seventeen SDGs. The two-guidance process allows for targets to be set in line with the best solutions to address the environmental problems that exist today through scaling the best knowledge.

Mr. Lewis noted that the MTS proposal will be launched in 2020 with knowledge and science being at the forefront, to allow influential outcomes to be achieved. He noted that the UN reforms currently taking place will allow for a uniform development of the system that can ensure that a multilateral environmental agreement can be launched in 2020.

Mr. Lewis concluded by confirming that thought leadership is critical at this time to ensure that the crisis affecting civilization and human security can be mitigated.

Key contributions from the floor

- UN reporting needs to be written and packaged in a format relevant for a C-level business audience, not just for policy makers.

Launch of Planet Heroes Platform (supported by UN-SPBF GreenTech Start-up Initiative)

Przemek Pyziel, CEO and Founder, Planet Heroes presented to the Consortium to launch the Planet Heroes Platform as a part of the GreenTech Start-up Initiative.

Mr. Pryziel explained that the Planet Heroes Platform was built to promote ecological activities and provide rewards to those who work for the benefit of the planet. Users take photos of clean-up projects and upload the photos at which point they are then provided with rewards.

Mr. Pryziel advised that the project had already started gathering support through social media with the hashtag #planethero and reiterated the projects ability to harness the power of the people to fight climate change.

Final Announcements, Conclusions and Adoption of 2020-2021-2022 Work Plan

Ms Zorba made the final announcements:

- Expressed deep appreciation to the Government of Australia for hosting the meeting and supporting engagement with GEO Week.
- Expressed gratitude to Norway, as the Presidency of UNEA, for supporting the Governing Consortium's meeting in Canberra and the work of the Forum and alignment with UNEA-5 and the Private Sector strategy.
- Thanked Members, partners and contributors for their continued support and contributions.
- Thanked UNEP leadership and Member States for the continued support of the Forum and for adopting innovative approaches for engagement and collaboration.
- Commended the Secretariat for the innovative approaches, communication and sound management of the Forum and its growing initiatives.

Endorsement of Forum Action Plan 2020-2022:

The Governing Consortium welcomed and endorsed the 2020-2021-2022 activities outline submitted by the secretariat and outlined below.

The Governing Consortium also:

- Welcomed the launch of the regional processes of the Forum in Africa and Asia Pacific, calling for harmony and integration with the global process, while maintaining focus on regional priorities and context.
- Committed to supporting UNEA-5 process and UNEP's Medium Term Strategy.
- Welcomed the invitation to enhance the forum's engagement with ministerial processes by convening in parallel with UNEA-5 including engagement with the high-level segment, in coordination with UNEA Presidency and the Secretariat of the Governing Bodies, under the leadership of the Executive Director of UNEP.
- Adopted 'nature-based solutions' as 2020-2021 theme, and called for a full alignment with the UNEA-5 theme and context, once endorsed by Member States.
- Welcomed the Climate Leadership Initiative, spearheaded by GRID-Warsaw in partnership with private sector partners as a partner initiative.
- Agreed to integrate gender rights and promote women's participation and representation as key principles across all streams and activities.
- Requested the Secretariat to provide a briefing on progress made in the development and implementation of the SDGs environment indicators, highlighting key challenges and opportunities while scoping out the extent to which performance reporting by governments and businesses will need to align with the SDG indicators.
- Encouraged Public-Private Partnership on the Environment to achieve environmental and sustainable development goals, making use of the existing body of work produced by organisations such as the World Bank and the World Economic Forum and building on it. Further, encouraged policy action to catalyse and encourage models and tools.
- Welcomed the improvement of the science-business interface through the customisation of the language and content of flagship scientific reports to target specific sectors in a manner that is relevant, action oriented, provides sector-specific guidance.

Sustainable Public Procurement

The Governing Consortium called for leveraging sustainable procurement as a catalyst for rapid action, building on UNEP's ongoing work in this area, including by raising awareness and promoting action by multiple sectors towards the:

- Use of AI and blockchain technology to map global supply chains against categories and commodities for impacts and benefits traceability and measurement.
- Harmonization of product codes and embed sustainability information into them (UNSPSC, SKU, etc.) to facilitate implementation.
- Development of a harmonized reporting framework for sustainable public procurement to assess performance and provide benchmark rankings.

Big Data, Technology and AI

UN-SPBF will continue to:

- Support the work of UNEP in developing the new Big Data Strategy by convening and co-funding multi-stakeholder and expert groups, including key technology partners.
- Support the Forum's Adhoc Working Group on Big Data and Digital Platform for the Environment.
- Promote the use of holistic data sets (e.g. earth observatory data, in situ, citizen science, IoT, social and economic) for SDGs and to keep the environment under review.
- Promote the ethically and transparent application of AI and analytics to generate insights from data that will help us to not only make informed decisions in addressing existing problems but also to make smarter choices.
- Create partnerships that leverage the strengths of each partner (demand generator, technology, financing, data, capacity building, etc.)
- Explore how the UNEP data platform can respond to the needs of the finance (and business) sector.
- Explore partnership to create an investment fund for AI for Good with a focus on supporting the work of the World Environment Situation Room as a key initiative on Big Data and digitisation of an open platform for the environment.

Sustainable Energy

SPBF will work with UNEP's Energy Branch and the Energy Sector to address barriers to advancing the clean energy transition and encourage integrated policy approaches. SPBF will support the work of the new 'Three Percent Club', acknowledging that:

Energy efficiency need to contribute nearly half of the actions to achieve the Paris Climate Change Agreement.

- The global annual rate of improvement in EE needs to be at least three-percent; today it is around 1.3%.
- On 23 September, the UN General Assembly endorsed the 'Three Percent Club'. The 'Three Percent Club' is a coalition led by the International Energy Agency, Sustainable Energy for All, and the EE Global Alliance. The goal is for countries and large companies to commit to 3% improvement in EE each year. 15 countries have joined so far: Argentina, Colombia, Denmark, Estonia, Ethiopia, Ghana, Honduras, Hungary, India, Ireland, Italy, Kenya, Portugal, Senegal, United Kingdom. 13 companies have joined so far, including: Danfoss, Enel, Johnson Controls, Signify UN SE-for-ALL EE Accelerators (PPPs) are the primary implementation mechanism.

Strengthening the Contribution of Citizen Science

The global citizen science community, working together, can help fill data gaps, contribute to policy formation and assessment, and influence behaviour change. Opportunities to collaborate with UN-SPBF partners to develop this potential, and to deliver outputs for Paris 2020 and UNEA-5 were proposed.

- Policy: Act on the Ministerial Declaration, advanced through UNEA-5, to "promote a wider use of innovative approaches, such as inclusive citizen science." Discuss the value of national and regional level policy frameworks with one or more SPBF partners.
- Science: Collaboratively identify priority areas for using citizen science to fill data gaps, validate other sources of information, and drive positive change. Work with SPBF to create one or more demonstrations of integrated data to advance the Digital Ecosystem for the Environment.
- Business: Work with business partners to identify synergies with the business community, including around supporting and evaluating the outcomes of CSR and impact investments.

Attachments

For Outline of Key Activities and Work Streams 2020 - 2022, delegate presentations, participant list, event agenda, and other supporting documents please click here.

For more information visit https://un-spbf.org/canberra-2019/

Acknowledgements

The UN-SPBF extends its sincere gratitude to the Government of Australia for hosting the meeting and supporting engagement with GEO Week and to Norway, as the Presidency of UNEA, for supporting the Governing Consortium's meeting in Canberra and the work of the Forum and alignment with UNEA-5 and the Private Sector strategy.

Contacts

Shereen Zorba Head, UNEP Science Policy Business Forum Chief, Science-Policy-Business Interface United Nations Environment Programme shereen.zorba@un.org

