### ASI Standards Committee Greenhouse Gas Emissions (SC-GHG) sub-committee Teleconference #2 Minutes

10 December 2020



### Antitrust Compliance Policy

Attendees are kindly reminded that ASI is committed to complying with all relevant antitrust and competition laws and regulations and, to that end, has adopted a Competition Policy, compliance with which is a condition of continued ASI participation.

Failure to abide by these laws can have extremely serious consequences for ASI and its participants, including heavy fines and, in some jurisdictions, imprisonment for individuals.

You are therefore asked to have due regard to this Policy today and in respect of all other ASI activities.





### Acknowledgement of Indigenous People

ASI acknowledges Indigenous Peoples and their connections to their traditional lands where we and our members operate. We aim to respect cultural heritage, customs and beliefs of all Indigenous people and we pay our respects to elders past, present and emerging.





## ASI Ways of Working



ASI is a multi-stakeholder organisation. Dialogue is at the heart of everything we do. It is critical to ensure that the organisation delivers on its mission. We welcome all participants and value the diversity of backgrounds, views and opinions represented in this meeting. We recognise that we have different opinions; that is the heart of healthy debate and leads to better outcomes. To ensure our meetings are successful, we need to express our views and hear the views of others in a respectful and professional way, protecting the dignity and safety of all participants and enabling full participation from all attendees.



### Agenda: SC-GHG meeting #2

	Торіс	Lead	Time
1	<ul> <li>a. Introduction &amp; Apologies</li> <li>b. Objectives</li> <li>c. Documents Circulated</li> <li>d. Previous Minutes</li> </ul>	ASI	5 mins
2	<ul> <li>a. Criterion 5.2 a &amp; b – current text</li> <li>b. IAI - IEA projected pathway to 2050</li> <li>c. 2020 coal-fired smelter – reductions plan</li> </ul>	ASI	5 mins
3	Key issues and concerns raised previous meeting – summary and further discussion	ASI	~ 60 mins
4	Discussion and development of Criterion 5.2a text	ASI	~ 30 mins
5	<ul><li>a. Agreed upon actions for Committee members</li><li>b. Agreed upon actions for the Secretariat</li><li>c. Close</li></ul>	ASI	5 mins



#### 1a Introduction & Apologies

- Attendees:Annemarie Goedmakers (Chimbo)<br/>Catherine Athenes (Constellium)<br/>Guilia Carbone (IUCN)<br/>Jostein Søreide (Hydro)<br/>Justus Kammüeller (WWF)<br/>Steinunn Steinson (Nordural)
- ASI: Cameron Jones (facilitator) Camille Le Dornat Marieke van der Mijn
- Apologies:Jessica Sanderson (Novelis)Rosa Garcia Pineiro (Alcoa)
- **Proxy:** Jostein Søreide (Hydro) for Rosa Garcia Pineiro (Alcoa)



#### 1b,c Objectives & Documents Circulated

#### b) Objectives

- 1. Agree on the key features and requirements of Criterion 5.2 a
- 2. Continue (complete?) revision of wording for Criterion 5.2a
- c) Documents Circulated
  - 1. ASI SC-GHG Teleconference meeting minutes 2Dec20
  - 2. ASI SCMemberApptProxyForm 10Dec20
  - 3. ASI –SCMemberAlternateForm 10Dec20



#### 1d Previous Minutes

d) Previous SC-GHG Minutes 2 December 2020 circulated on 7/12/20 – no comments received.

Resolved to accept the SC-GHG 2 December 2020 meeting minutes.



#### 2a Criterion 5.2 a & b – current text

- GHGWG was not able to reach consensus on 5.2a.
- Criterion 5.2b recommended by the GHGWG.

#### 5.2a GHG Emissions Reductions. The Entity shall

- i. Establish GHG emissions reduction targets that ensures a reduction pathway consistent to the achievement of 2050 average global aluminium sector intensities of  $2.5^*$  tonnes of CO<sub>2</sub>eq per tonne of primary aluminium, or  $1.5^*$  tonnes of CO<sub>2</sub>eq per tonne of semi-fabricated product. The Entity's reduction pathway must remain below the upper threshold limit of xx<sup>4</sup> and include intermediate targets covering a period no greater than five years.
- ii. These targets shall address all emissions from mine to metal<sup>#</sup>.
- iii. These targets shall be publicly disclosed.
- iv. Progress against these targets shall be publicly disclosed annually.
- b. Demonstrate that they have put in place the necessary Management System, evaluation procedures, and operating controls to achieve performance aligned to the targets developed in 5.2 (a).
- \* To be revised, following release of 1.5c warming scenario (SDS, IEA etc.)
- ^ To be determined post-consultation
- # Refer to IAI methodologies





#### 2b IAI – IEA projected pathway to 2050





#### 2b Projected pathway to 2050



- A participant noted that point 2 on previous slide contradicts and is not compatible with the thick upper blue line.
- Another participant added that 2. and 3. (on previous slide) are contradicting each other.



#### 2020 coal-fired smelter – reduction plans to 2030

- <sup>"</sup> Entity Alumina refinery, smelter and casthouse, with some semi-fabrication.
- <sup>"</sup> Titled "Greenhouse Gas Emission Reduction Implementation Plan of the Aluminum Branch"
- Initiatives include:
  - Energy saving at an 'employee level'
  - Electrolysis production management and control
  - Equipment upgrade and transformation
  - Elimination of high energy-consuming equipment
  - Reduce overall energy consumption
  - Use "purification frequency conversion technology" for induced draft fans (will achieve 28.5% reduction)
  - ▶ R&D plan for carbon-free aluminium technology to commence late 2020
  - > Overall reduction 'year on year' to 2027 of 5% each year
  - Purchase a 'portion' of green energy (i.e. wind, hydro and nuclear) through a 'direct power purchase policy'
- <sup>7</sup> Allegedly, this will achieve a 8t/t Al target.



- It was asked what does "Use purification frequency conversion technology for induced draft fans (will achieve 28.5% reduction)" meant and there was no answer to that.
- A participant asked how the verification of this criteria had been done, whether the auditor did the maths or only completed a checklist. The Secretariat answered that this audit lasted 4 days, with 59 criteria to look through. The auditor/s likely looked at the plans, dates, achievability and applicability. But crunching the numbers would take days and the auditor doesn't have time to do that.
- It was said that this a very complex topic, and it makes it difficult to verify with generalist (ie. non-GHG/energy specialist) auditors.
- One participant raised that in principle, this roadmap is a "normal" one (upgrading, optimizing technology, etc.), and in addition they are looking into carbon free aluminium technologies and changing electricity source, which is key. It was added that more and more Chinese aluminium plants are looking to transfer from coal to green energy. The participant concluded that this plan looks realistic.
- This was agreed to by a participant, who added that in principle this is what ASI wants to achieve through certification, but this still does not answer the question of how to judge the feasibility.



- <sup>"</sup> The Secretariat mentioned that the requirements for independent verification of numbers reported annually (5.1) and for public annual disclosure are indirect ways to hold the companies accountable.
- One participant suggested to have a sort of preliminary certification for smelters above 8t and then switch to the actual certification when the verification over the years shows that the plan is being implemented.
- The Secretariat said that the current certification process works on a similar model: if the plan is not implemented at the surveillance audit, the auditor would issue a minor Non-Conformance (NC). If it is still the case at the recertification audit, it becomes a major NC – the Entity is thus only issued a provisional certification. If it is still not addressed a year later, the Entity loses the certification. That would hold Entities accountable on their plan/s.
- <sup>"</sup> Allowing decarbonization to happen through extra capacity or trading certificates was discussed.
- Participants raised being against the trading certificates model and that this is an important aspect to consider as trading certificates could be a way to achieve targets through a way that is not necessarily how ASI wants to make an impact.

- It was said that this is something the group needs to discuss in more detail later, when defining guidelines for calculating, but that the priority now is to define the criteria.
- The Secretariat supported this view and suggested to include in the guidance a list of measures that would be accepted and that would not. Members could consult the guidance when developing their plan, and auditors when reviewing the plan/s. It was added that that level of granularity will go in the guidance but not in the Standard, for clarity.
- A participant suggested to include a requirement for an initial effort of perhaps two years, in order to issue certifications not only based on a plan but also on the proof of the efforts already undertaken.
- The Secretariat said agreeing in principle but that the process could be as follows: start off with a conformance based on the plan and 18 months later, the numbers would be checked at the surveillance audit.
- A participant raised that external communications is key and that the narrative must be strengthened, to show that this criteria is still very strict.



- The Secretariat said that one of the mechanisms we can use in this perspective is the auditors' training. It is already planned to provide training for auditors on the revised Standards, including one specific module on GHG. For example, we could clearly state the elements that the Public Headline Statement should include for that criteria, to address the question of communication. Through the oversight process, the Secretariat can also go back to the auditor if needed to say that the report does not provide enough transparency. There are already mechanisms in place, and this has been flagged for training development.
- A participant said that when conducting her own analysis of the summary audit reports, for some criteria she thought this would be a NC while the auditor issued a conformance. It was said that having auditors saying 'yes' to everything is an issue.
- The Secretariat answered that it is a work in progress calibration training is provided to auditors to have a more standardized approach in reviewing and reporting. That is a priority forthcoming.



# 3 Key issues and concerns raised previous meeting – summary and further discussion

- <sup>"</sup> Need to ensure that performance and targets remain **auditable**.
- Agreement on inclusiveness by to what level?
- " Is there to be initial inclusiveness but tightened over time? How is this to be defined?
- <sup>"</sup> The overall **integrity and credibility** of the Criterion and the Standard overall is paramount.
- ASI is not to be developing an ASI-specific 'model' or **methodology**. Existing methodologies are to be referenced (Guidance)
- <sup>"</sup> Agreed that all Members **must continue** to reduce emissions (whether currently at 4t/t or 17t/t)
- <sup>"</sup> An **'early and notable' reduction** of emissions is desired.
- SBTi for the sector cannot be committed to YET, BUT could be an option for Members under the broader "science-based target" phrase/requirement.
- A desire for "good news stories" during the v3 period of the Performance Standard (i.e. 2022-2026)



- It was raised that one point is missing on the slide: conforming should not be made easier.
- The differentiation between SBT and science-based targets was discussed. A participant raised having never heard of science-based target methods other than the SBT ones and asked if there were others.
- The Secretariat said that the IAI is doing independent work on this, the Aluminium for Climate (WEF AfC) alluded that some other work is underway, etc. This way it allows for some flexibility if another methodology comes up.



# 3 Key issues and concerns raised previous meeting – summary and further discussion

- Agreed that the criterion will be supported by stronger, tighter **public disclosure requirements** (Criteria 5.1)
- What is the scope of Criteria 5.2a? As per current criteria will it be for smelting only? Upstream only? (i.e. bauxite and alumina), recognizing some concerns in the current pathway modelling for 'downstream' activities.
- A reminder that the criterion is not a 'locked in' commitment by ASI until 2050. There will be multiple reiterations of the Performance Standard between now and then.
- New 'step-change' technologies (and subsequent investments) may still be 10-15 years away.
   Where will the step changes come in the short-term?
- <sup>"</sup> Overall, there is a preference by the sub-committee for a **stricter standard/criteria**.



#### 4 Discussion and development of Criterion 5.2a text

#### 5.2a GHG Emissions Reductions. The Entity shall

- i. Establish GHG emissions reduction targets that ensures a reduction pathway consistent to the achievement of 2050 average global aluminium sector intensities of  $2.5^*$  tonnes of  $CO_2eq$  per tonne of primary aluminium, or  $1.5^*$  tonnes of  $CO_2eq$  per tonne of semi-fabricated product. The Entity's reduction pathway must remain below the upper threshold limit of xx^ and include intermediate targets covering a period no greater than five years.
- ii. These targets shall address all emissions from mine to metal<sup>#</sup>.
- iii. These targets shall be publicly disclosed.
- iv. Progress against these targets shall be publicly disclosed annually.
- b. Demonstrate that they have put in place the necessary Management System, evaluation procedures, and operating controls to achieve performance aligned to the targets developed in 5.2 (a).
- \* To be revised, following release of 1.5c warming scenario (SDS, IEA etc.)
- ^ To be determined post-consultation
- # Refer to IAI methodologies



#### **\*\*\*WORKING TEXT ABOVE FOR EDITING AS REQUIRED\*\*\***



- A participant suggested to split the criteria into two (focused on upstream): a performance criteria stating a performance level, and a strategy / reduction plan criteria. The performance criteria could include two options: either having a performance level below 8t, or demonstrate improvement over the last 3 years (possibly a 10% reduction). This criteria would set who could be certified, and would exclude the bad performers. The next objective is that everyone improves, thanks to the strategy criteria. For those below 8t they would have a reduction plan to move towards 2.5 t/t; and same thing for those above, with a middle step to reach 8t and then move to 2.5 t/t.
- The Secretariat noted that this proposal is consistent with the previous discussions.
- A participant raised that this approach makes sense but it does not solve the question of the reduction %.



- Looking at slide 11, it was said that the green curve is based on identified improvement opportunities with the existing technology, a fuel switch at alumina refineries, etc. But in 2030, we will have reached the technological limits and all the improvement potentials will have been used. Hence, in parallel we are looking into new technologies, lots of R&D is being undertaken. The pathway beyond 2030 is uncertain but being considered. The participant said that from the ASI perspective, we need to define a 'science based target' and a roadmap to get there. What is shown on the graph is only one example and different smelters may have different starting points and paces. Some might be able to implement step change technologies before 2030. For example, Alcoa and Rio Tinto are working on building a new smelter. So we need to frame the emissions reduction strategy so that it allows companies to move at different speeds given the technology limitations.
- This was agreed to and it was said that this aligns with SBT. But this still does not solve the scenario where a company would say it will reduce but from 2029 to 2030, and would maintain its certification until then.



- It was said that for example for a smelter starting at 16t/t, step change technology would not help to get to 8, the only option being electricity change.
- A participant commented on the plan provided as example: it includes targets per year (5% reduction) and figures for specific years. It was suggested to require something similar in the criteria: having targets covering no more than 5 years, and within those 5 years setting a certain amount of reduction planned to achieve. The participant added that for new smelters, we should stick with the present criteria that says that when starting activity after 2020, the emissions should be below 8t/t.
- This was agreed to.
- For the performance criteria, 3 elements to include were suggested:
  - For aluminium smelters into production up to and including 2020, demonstrate that the Scope 1 and Scope 2 GHG Emissions from the production of Aluminium is at a level below 8 tonnes CO<sub>2</sub> eq per metric tonne Al.
  - 2. OR demonstrate emission reductions of a minimum of 10% over a three year period.



- 3. For aluminium smelters starting production after 2020, demonstrate that the Scope 1 and Scope 2 GHG Emissions from the production of Aluminium is at a level below 8 tonnes CO<sub>2</sub> eq per metric tonne Alu.
- It was said that we can be very specific for smelters, but we also need to include wording for downstream even though it is more difficult to give precise figures.
- It was suggested to include the blue line (not the upper limit) of Slide 11, calculated as percentages. It was replied that this is challenging because a smelter at 17t/t is dependent on electricity change. It was thus suggested to say 5%. It was said that this is also complicated because a smelter at 11 t/t does not need to reduce that much while one at 30 t/t needs to reduce more significantly.
- It was suggested to require a reduction towards 8, that does not need to be a linear reduction, but making it impossible for companies to wait until the last moment.
- <sup>"</sup> It was said that using the left blue curve and the 11t/t limit is a good start.



- A participant suggested to require that in 2026 the Entity be under the average.
- Another participant suggested that in 2025 the Entity need to be at 16 or similar and in 2030 at 11.
- <sup>"</sup> This was agreed to, saying this provide for clear numbers, auditors can easily check figures, and it provides a 5 year flexibility to include more companies.
- <sup>"</sup> The Secretariat agreed that 5 years time is a good period.
- The suggested wording was refined to 16t by 2025 and 12t by 2030 and replaced Scope 1 and 2 by "mine to metal" to include up to the primary casthouse. The suggested wording is as below:
  - <sup>%</sup> For aluminium smelters into production up to and including 2020, demonstrate that mine to metal emissions from the production of Aluminium is at a level below 12 tonnes  $CO_2$  eq per metric tonne Aluminium OR if at a level above 12 tonnes  $CO_2$  eq per metric tonne Aluminium, demonstrate a minimum of 10% reduction of emissions over the previous three year period.
  - <sup> $\sim$ </sup> For aluminium smelters starting production after 2020, demonstrate that mine to metal emissions from the production of Aluminium is at a level below 8 tonnes CO<sub>2</sub> eq per metric tonne Al.



- <sup>7</sup> It was clarified that the number is going up from 8 to 12 because it includes Scope 3 emissions.
- A participant suggested to keep only scope 1 and 2 for new smelters and not mine to metal.
   Another participant did not recommend that to avoid operating with different scopes. It was said that this needs to be clarified though.
- It was said that this model somehow implies that smelters have leverage to push for change over their suppliers. It was discussed that this is the case, smelters have influence when purchasing their alumina. If the customers start differentiating low carbon and high carbon products when sourcing alumina, it will drive change. It was raised that this is not the case for small smelters though.
- Regarding the emissions reductions target, it was said that it would apply to smelters below 12 and for those above, it would only apply from 2030 onwards. The below wording was drafted:
  - For Aluminium smelters above 12t/t establish GHG emissions reduction targets that ensures a reduction pathway where mine to metal emissions from the production of Aluminium is at a level below 16 tonnes CO<sub>2</sub> eq per metric tonne Aluminium by 2025 and below 12 tonnes CO<sub>2</sub> eq per metric tonne Aluminium by 2030.

- It was said that mine to metal excludes the downstream part, so we need to include an additional paragraph for downstream Entities to also show reductions. It was discussed that this is difficult as there is not a defined pathway for transformation and recycling; and it is complicated to include car makers, etc. as they have different pathways that relies on electrification, etc.
- A participant explained that the extruders from his company have established sourcing targets.
   Sourcing metal has a significant impact.
- It was said that for a small downstream company, the focus should be on energy efficiency and on sourcing.
- <sup>"</sup> It was said that the black text (on next slide) applies to the whole value chain.
- It was discussed to replace 2.5 and 1.5 degrees in the text by a reference to the Paris Agreement, and to specify what we mean in the Guidance.
- It was concluded that there is agreement on the principles, that are reflected in the text drafted on the next slide. The Secretariat will share that draft with the group to fine tune the language and it will be finalised at the January 7<sup>th</sup> meeting.



#### MINIMUM PERFORMANCE REQUIREMENTS

For Aluminium smelters in production up to and including 2020, demonstrate that mine to metal<sup>#</sup> emissions from the production of Aluminium is at a level below 12 tonnes  $CO_2$ -eq per metric tonne Aluminium OR if at a level above 12 tonnes  $CO_2$ -eq per metric tonne Aluminium, demonstrate a minimum 10% reduction of emissions over the previous three year period. For Aluminium smelters starting production after 2020, demonstrate that the mine to metal<sup>#</sup> emissions from the production of Aluminium is at a level below 12 tonnes  $CO_2$ -eq per metric tonne Aluminium.

# Scope 1, 2 AND 3 emissions.

#### **EMISSIONS REDUCTION TARGETS**

For <u>Aluminium smelters</u> above 12 t/t establish GHG emissions reduction targets that ensure a reduction pathway where mine to metal\* emissions from the production of Aluminium is at a level below 16 tonnes  $CO_2$ -eq per metric tonne Aluminium by 2025 and below 12 tonnes  $CO_2$ -eq per metric tonne Aluminium by 2030.

For <u>all Entities</u>, establish a GHG emissions reduction plan that ensures a reduction pathway consistent to the achievement of 2050 average global aluminium sector intensities of  $2.5^*$  tonnes of CO<sub>2</sub>eq per tonne of primary aluminium, or  $1.5^*$  tonnes of CO<sub>2</sub>eq per tonne of semi-fabricated product. The Entity's reduction pathway must include intermediate targets covering a period no greater than five years.

- i. These targets shall address all emissions from mine to "saleable product"
- ii. These targets shall be publicly disclosed.
- iii. Progress against these targets shall be publicly disclosed annually.
- b. Demonstrate that they have put in place the necessary Management System, evaluation procedures, and operating controls to achieve performance aligned to the targets developed in 5.2 (a).



#### 5 Agreed Upon Actions & Close

- a. Agree actions
  - Secretariat to provide tidied up text from Slide 29 as a separate page to SC-GHG.
- b. Secretariat thanks to all participants and close of meeting
- c. Upcoming Meetings for GHG-SC:
  - > 7 January: Cut-off for decisions made by this sub-committee on 5.2a.
  - > 13 January: PS 5. All decisions made by this date.
  - > 21 January: Final Review and All documents Approved for Consultation
  - February: Review of consultation documents and planning for SC process for post consultation
  - March: Benchmarking/Indicators/Verifiers Discussion



## Thank you

