

MEETING MINUTES

Valuation Technical & Practitioner Committee

Meeting type: Quarterly Meeting

Date: September 5, 2024

Location: Virtual

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This paper has been prepared for discussion of the Valuation Technical and Practitioner Committee (VTPC).

The mandate of the Valuation Technical and Practitioner Committee (VTPC) is to direct, validate, and approve the impact accounting research and methodology produced by the cooperation of International Foundation for Valuing Impacts (IFVI) and the Value Balancing Alliance (VBA). The VTPC has been established under Terms of Reference to ensure independence and multi-stakeholder perspectives.

This paper does not represent the views of IFVI, the Value Balancing Alliance, or any individual member of the VTPC. Any comments in the paper do not purport to set out what would be an acceptable or unacceptable application of impact accounting methodology.

Objective:

- The objective of the meeting was to formally vote on the approval of the final draft of the GHG Emissions Topic Methodology.
- Additional objectives include a discussion on Adequate Wages and Wage Equity Research, Waste and Circularity Research Topic Methodologies as well as the Product Impact General Framework. There were no formal votes related to the Topic Methodologies and the General Framework.

Meeting Agenda:

Time (Eastern Time)	Topic
9:00 – 9:10 a.m.	Welcome and Updates
9:10 – 9:35 a.m.	GHG Emissions Final Review
9:35 – 10:00 a.m.	General Product Framework Discussion
10:00 – 10:25 a.m.	Adequate Wages and Wage Equity Discussion
10:25 – 10:50 a.m.	Waste and Circularity Discussion
10:50 – 11:00 a.m.	Conclusions; Updated Workplan Through End of Year

Welcome and Introduction Updates

- All members of the VTTPC (“member” or “members” hereinafter) are welcomed to the meeting and the Chair of the VTTPC provided the following comments:
 - September and October represent a significant milestone in the development of the impact accounting methodology including the following:
 - a) anticipated final GHG Emissions Topic Methodology (pending approval),
 - b) OHS, Water Consumption and GM2 exposure draft releases for public comment period (September 24th - December 7th), and
 - c) interim environmental methodologies (water pollution, air pollution, and land use and waste).
 - These announcements will be phased throughout September and early October, and will also be discussed at a public event hosted by IFVI and GSG in New York City on September 25th
 - All VTTPC members have been invited; let the technical staff know if you or your colleagues would like to attend.

Topic Methodology: GHG Emissions

- The technical staff presented the following recurring themes that appeared in public comment letters:
 - The Social Cost of Carbon (SCC) approach and 2% dynamic discount rate
 - a) 8/11 letters were supportive of the SCC approach with additional comments around concerns the value is too low and clarification around averaging two models.
 - b) 6/12 letters were supportive of a 2% dynamic discount rate, matching prevailing understanding. Several asked for further detail around why this was chosen.
 - c) 2 letters, each expressed concern that the discount rate was too high or too low. These arguments were mostly around the implications for the value factor.
 - Scope 3 emissions: data gaps and separate presentation
 - a) 6/11 were supportive of the presentation and guidance of data gaps in scope 3 including the alignment with the GHG Protocol. 3 letters asked for more detail in filling data gaps.
 - b) 13/14 letters were supportive of the separation of upstream and downstream emissions.
 - Clarity of content
 - a) All 9 letters expressed general praise for the clarity and structure. 4 letters further encouraged more detail around filling GHG data gaps and real-world examples of the decision-usefulness of GHG impact accounts.
 - b) 4 letters asked for more detail about how the value factor was derived to be put in the main text. No letters expressed concern about the equations or calculations.
 - Offset projects, purchased carbon credits, renewable energy certificates, and/or avoided emissions
 - a) 6/10 letters were supportive of future development of these topics and consider them necessary and urgent. 2 letters said these should not be considered at all.
 - Additional feedback
 - a) Other topics mentioned in feedback included concerns about converting methane to CO₂e, establishing mapping relationships to other frameworks (SEAA, Global Biodiversity Framework, SDGs), and providing multiple

value factors at different discount rates or climate projections.

- The technical staff also presented the following aggregated feedback from the VBA piloting of the GHG Topic Methodology:
 - Use of Social Cost of Carbon (SCC) for Valuation of GHG:
 - a) Feedback
 - Widely acknowledged for estimating societal impacts from GHG emissions.
 - Transparency in calculation and regular updates are appreciated.
 - b) Conclusion of final methodology:
 - Support for presented methodology.
 - Additional information on SCC approach
 - a) Feedback
 - Detailed insights into the contributions of various models (e.g., GIVE, DSCIM) and the extent to which individual impacts contribute to the total value.
 - Comparison to other SCC methodologies, alongside relevant research, is encouraged.
 - b) Conclusion of final methodology:
 - Expended details provided in Appendix B: Methodology Details.
 - Comparison of other SCC approaches outside of main methodology statement, e.g., in blog post or additional material.
 - Application across the value chain
 - a) Feedback
 - Straightforward for Scope 1 and 2; however, Scope 3 emissions (both upstream and downstream) pose greater challenges due to assumptions involved in modeling.
 - Disaggregating Scope 1, 2, and 3 emissions is crucial to avoid conflating values of varying accuracy and influence.
 - b) Conclusion of final methodology:
 - Separate guidance documents will help addressing data gaps and value chain estimations.

- Methodology requires a separate presentation of Scope 1, 2, and 3; similar to ESRS, a total GHG impact value might be required for certain use cases.
 - Clarity of methodology statement
 - a) Feedback
 - Clear alignment with Standards such as ESRS and GRI, simplifies application for corporate users.
 - Support for presented methodology and Table 1: Alignment with reporting standards.
 - b) Conclusion of final methodology:
 - Support for presented methodology and Table 1: Alignment with reporting standards.
 - Future considerations
 - a) Feedback
 - Further exploration is needed on the role of offsets and carbon credits, especially given their importance in business practices.
 - Reflections on incentives given by global value although regionally different effects from climate change exist.
 - b) Conclusion of final methodology:
 - Listed as avenues for further research in Section 5: Future Development
 - To be discussed in publications outside of the methodology statement, e.g., in blog post or additional material.
- Thereafter, the technical staff provided an overview of the most significant changes which can be found in the Basis for Conclusions.
 - Topic: Additional details provided about the SCC models and development of the value factor
 - a) Summary of Revisions
 - Several comments asked for more details around how the SCC models and value factors handled various considerations. These comments were addressed by (1) moving some details that were in the Appendix to the main text and (2) adding some details in the Appendix and clearly referencing them in the main text.

- Notable updates include additional details about:
 - The climate scenarios used to project emissions
 - Background on the Ramsey equation including determination of key parameters
 - Breakdown of how each impact influences the overall value factor
 - Rationale for the increasing value factor and handling of intergenerational equity
- Topic: The inclusion of renewable energy certificates (RECs) for Scope 2 accounting
 - a) Summary of Revisions
 - Because the GHG Protocol requires location-based and market-based (which include RECs) Scope 2 reporting, there was concern that not including them in the GHG Methodology would lead to lack of alignment with the GHG Protocol and standardized approaches used by entities.
 - Additional debate and research determined that there is a clearly defined method for determining market-based emissions and that there are many contexts where they are useful.
 - For these reasons, RECs are now included within the scope of the GHG Methodology.
 - Updated document structure to closely align with the guidance in General Methodologies
- Topic: The inclusion of renewable energy certificates (RECs) for Scope 2 accounting
 - a) Summary of Revisions
 - To better align with the principles of the impact pathway laid out in the General Methodologies, the organization of section 4 was updated.
 - The section previously titled 'Value Factor' was separated into two sections. '4.2 Outcomes and Impacts', and '4.3 Monetary Valuation'. This structure allows preparers to better understand how the determination of outcomes and impacts is done separately from monetary valuation.

- The restructuring also brings added detail to sections 4.2 and 4.3 which address many of the public comments and VBA piloting feedback asking for clarity about the value factor and how the two models contribute to the estimated value.
- The technical staff asked members whether they had any comments or questions.
 - A member inquired whether there were any reservations in the document until the end.
 - The technical staff clarified that there were no major reservations because there were multiple responses both supporting and opposing some questions.
 - The technical staff also noted that as research progresses, the value factors might increase and thus will need updating periodically. However, this is a more forward-looking concern.
 - Additionally, the technical staff observed that feedback regarding the price of carbon was diverse. Some comments suggested that the price should be higher, while others advocated for a lower price. This balanced distribution reassured that the science supports the proposal in the Methodology.
- Members were asked to vote on the final version of the GHG Emissions Topic Methodology.
- All member voted, with no objections, the final version of the GHG Emissions Topic Methodology was approved for publication.

Industry Specific Methodology: General Framework for Product Impacts

- The technical staff provided an overview of the General Framework which included the following:
 - In accordance with General Methodology, impact accounts should provide a comprehensive assessment of the societal value created and/or eroded by an entity.
 - For the Methodology to enable a comprehensive assessment, it must consider impacts linked to the products of entities across the value chain.
 - a) Product impacts are complex, requiring analysis of effects on consumers and business customers across diverse industries and product portfolios.
 - b) Product impacts may also be significant in magnitude.

- The purpose of the *General Framework for Product Impacts* statement:
 - a) Build on GM1 and GM2 and clarify the concepts, definitions, methods, and principles for the unique requirements of product impacts.
 - b) Inform and explain the process for developing Industry-specific Methodologies.
 - c) Guide preparers to develop impact pathways for industries and products in the absence of official impact pathways.
- The technical staff proceeded to explain the key proposals in the pre-exposure draft:
 - Measurement Approach
 - a) Considerations
 - Should product impacts be measured using an impact pathway per the General Methodology or should scalable methods be considered given the diversity of product impacts?
 - Impact pathways are established and the default tool in the impact management ecosystem.
 - Several alternative methods use top-down approaches that rely on large data models to estimate the effects of products.
 - b) Feedback (VTPC Small Groups and Expert Interviews)
 - Skepticism exists, particularly from practitioners and investors, as to the usefulness of large data, top-down approaches.
 - Top-down approaches are opaque and theoretical, reducing the interpretability of results.
 - One feedback provider said that top-down approaches may be used to complement an impact pathway approach.
 - The data produced from top-down approaches are less adaptable/flexible to customized analysis.
 - c) Proposal(s)
 - An impact pathway approach is described as the default approach for product impacts.

- Alternative approaches are not included in the body of the statement.
 - A call-out box is included in the statement that introduces top-down approaches, such as estimating consumer surplus, as an alternative.
 - Statement requires that any departures from an impact pathway approach are disclosed.
- Scope of Product Impacts
 - a) Considerations
 - The technical staff considered whether all products have impacts.
 - General Methodology 2 establishes that impact is not the same concept as value represented by a market price and consumer surplus.
 - Questions raised included:
 - What is the threshold for determining whether a product has an impact?
 - What does it mean if a customer purchases a product at the market price, but the product has no impact?
 - b) Feedback (VTPC Small Groups and Expert Interviews)
 - A majority of feedback providers said that just because a product has value that does not imply that it necessarily has an impact on well-being.
 - Some feedback providers felt that in well-functioning markets, the combination of market price and consumer surplus provides a useful proxy of impact.
 - Several feedback providers expressed concern that using market price as a proxy does not properly account for differences in purchasing power.
 - c) Proposal(s)
 - No explicit statement is made that all products have an impact. Further, no statement is made saying that products exist that have no impact.
 - This approach preserves flexibility as Industry-specific Methodologies are developed.

- Whether a product has an impact is determined by taking an evidence-based, similar to approaches described in ESRS, IFRS, and SASB.
 - The concepts of impact, market price, and consumer surplus and expounded upon to avoid confusion and promote conceptual clarity in Industry-specific Methodologies.
- Risk of False Claims
 - a) Considerations
 - The risk of false claims and the overstatement of impacts is greater for products impacts.
 - Methodologies are less established.
 - Claims of product impact may be directly related to business development.
 - Impacts may be significant in magnitude.
 - b) Feedback (VTPC Small Groups and Expert Interviews)
 - No feedback solicited.
 - c) Proposal(s)
 - Section 1 includes a sub-section titled “The risks of false claims and overstatement of product impacts”
 - The section reinforces the application of the qualitative characteristics, particularly faithful representation, and describes how they should be applied to reduce the risk of overstatement.
 - Default Reference Scenario
 - a) Considerations
 - The General Methodology establishes that impact accounting measures gross impact.
 - The default reference scenario in the Methodology assumes that the entity’s activities do not exist, and no comparable substitutes exist.
 - b) Feedback (VTPC Small Groups and Expert Interviews)
 - The default reference scenario leaves room for interpretation, is ambiguous, and may reduce the comparability of impact information.

- Product impacts that measure only the “additionality” against the next best alternative may be useful.
- c) Proposal(s)
- A gross approach is maintained to be consistent with the General Methodology but also to ensure that comparability of product impacts over time and between companies.
 - The statement clarifies that by assuming that no comparable substitutes exist, that does not imply that no alternative impact drivers exist, or that economic systems collapse.
- o Categories of Products Impacts
- a) Considerations
- The scope and methods for product impacts may vary considerably depending on the nature of the entity.
 - Specifically, an entity’s location in the value chain and whether an end-user is either a business customer or consumer have implications for measurement and valuation.
 - The technical staff considered whether to organize the statement in various categories of impacts or take a generalized approach.
- b) Feedback (VTPC Small Groups and Expert Interviews)
- No feedback solicited.
 - The technical staff found that some data providers have created customized classification systems for products.
- c) Proposal(s)
- Categories are not developed in the statement.
 - Key terms are developed to clearly articulate, in this statement and future statements, categories of entities and product impacts.
 - Terms developed include business customer, consumer, customer, end-user, final product, intermediate product, product, and use phase (see Section 2.1).

- Additional specifics are deferred to Industry-specific Methodologies.
- Members provided the following comments:
 - A member asked how a product can have no impact and whether this topic is a philosophical question. The member also stated that for a product to have no impact is puzzling as if there was no one involved in producing the product.
 - Thereafter, the member asked the technical staff to define the term 'product impact' and whether the impact is attributed to the product or the company.
 - a) The technical staff defined product impact as the change in one or more dimensions of people's well-being as a result from the use of a product
 - b) The technical staff also stated that it is possible to use a product which does not have an impact on the well-being of the consumer. The goal is to move away from the philosophical debate and have a more robust definition. Thus, each impact that is measured and valued should be evidence based, resulting in a more robust definition of the impact.
 - The member voiced whether the technical staff is referring to consumer impact rather than product impact. As the term product impact is misleading.
 - a) The technical staff noted their willingness to receive feedback on changes related to the name of the Methodology. However, product impact is a broader term for examples such as B2B businesses that do not have direct consumers but also generate an impact.
 - b) The technical staff stated that there has been ongoing conversations between the existing terminologies, product impact versus consumer impact. The technical staff also noted that it has been challenging to find a term that captures the scope of the Methodology. Consumer impact is too narrow whereas product impact is too broad.
 - c) The technical staff also noted that the Methodology focuses on the final product which applies to consumers or businesses. The important aspect is the end of the value chain or downstream but excludes intermediate goods. This does not mean that entities producing intermediate goods are out of the scope of the methodology, but that the lens through which their impact is measured and

valued are directed to the final product and the well-being changes produced during the use-phase.

- A member noted that that performing a Life Cycle Assessment (LCA) into upstream and downstream value chain would cover a wide range of products.
 - a) The technical staff stated that the impact occurs in the use phase. However, upstream entities are also subject to the Methodology. In such cases, there will be two challenges: determining attribution and identifying and valuing product impact.
- A member provided a grocery retailer example. The idea that if a grocery store did not exist, people will die is not sensible. The member suggested looking into whether the food provided by the grocery store contributes to a healthy diet and the associated healthy benefits. The member asked whether this aspect would be gross or net impacts.
 - a) The technical staff stated that this concept is like other Topic Methodologies. In the case of the GHG Emissions Topic Methodology, if the company did not exist that ton of GHG emissions produced would not have existed. If a company producing an apple did not exist, the alternative would be that the apple would not have existed. This aspect would be gross which is the total impacts.
- A member voiced that this concept is very important and makes a big difference. In the case of companies selling food, if assumed that if the company did not exist, people will not eat and die then everything the company sells will have a positive impact because it enables people to live. The challenge for a grocery food is about contributing to a social problem such as whether they sell food that contributes to an unhealthy diet.
 - a) The technical staff noted that the grocery store is not the final product. The final product is the apple which affects the consumer. The reference scenario is that the consumer did not eat the apple. Additionally, the consumer receives two benefits: caloric and nutrition benefits. These benefits will be attributed back to the value chain including the farmer, distributor and grocery store. In addition, the technical staff noted that the conversation may be better contextualized if, instead of discussing products, the conversation considers the well-defined outcomes and

affected stakeholders that are trying to be measured and valued.

- A member voiced that the goal is to improve well-being. It was noted that product impacts related to food can vary by region, particularly areas with caloric shortages. Additionally, grocery stores do not have to be included in the attribution of the impact, but this topic can be discussed another time.
- Members voiced that there should be other examples apart from the food industry.
- A member stated that consumer impact can be separated from attribution. There is a difference between producing an apple and consuming the apple. This method takes away the complexities.
- The technical staff provided conclusive comments, including practical examples beyond the food industry and noted that the VTTC members will have the opportunity for further discussion once the pre-exposure draft has been sent.
- The technical staff also noted that the General Framework sets the stage for Industry Topic Methodologies. The initial intent is maintaining consistency with default reference scenario as well as maintaining flexibility in the interpretation of the default reference scenario.

Adequate Wages and Wage Equity Topic Methodologies

- The technical staff provided background context of the Adequate Wages and Wage Equity Topic Methodologies which included the following:
 - While Adequate Wages and Wage Equity are two distinct topics, they have natural overlaps.
 - A few key measurement and valuation issues to be resolved for Adequate Wages post-public comment also apply to Wage Equity. Today's discussion will cut across both topics for efficiency and to ensure consistency between the two.
- The technical staff provided an overview of the worker-related Topic Methodologies:
 - Adequate Wages
 - a) Scope: Exposure Draft covers remuneration impact and living wage deficit impact of wage payments.
 - b) Status: Exposure Draft underwent public exposure. Because feedback showed substantive divergences of opinion, team is conducting a listening tour with some

commenters to help inform next steps, including a prospective virtual roundtable.

- Occupational Health& Safety
 - a) Scope: Exposure Draft covers human health, healthcare cost, and lost wage impacts of non-fatal and fatal occupational injuries and illnesses.
 - b) Status: Exposure Draft received VTPC approval and will be released for public comment in late September 2024.
- Wage Equity:
 - a) Scope: To be discussed.
 - b) Methodology development began in July 2024.
- The technical staff also provided an overview of the challenges highlighted by public feedback on Adequate Wages Topic Methodologies.
 - Challenge 1: Remuneration Impact
 - a) Previously discussed at multiple VTPC meetings
 - b) Feedback was divided on whether to recognize any remuneration impact for wages below a living wage.
 - c) Those opposed found the Exposure Draft at odds with a human rights framework.
 - d) Those in favor viewed remuneration as a significant impact on society.
 - Challenge 2: Subjective Well-being
 - a) Previously discussed at multiple VTPC meetings
 - b) Feedback was divided on the use of subjective well-being as the outcome measure.
 - c) Those opposed were skeptical of the credibility and clarity of subjective well-being.
 - d) Those in favor cited evidence of the validity of subjective well-being and believed opponents were partially misguided.
 - Challenge 3: Technical Inconsistency
 - a) According to the OECD ([read the letter HERE](#)), the well-being utility of income (WUI) function and the well-being-year (WELLBY) valuation function “contradict each other

mathematically.” The same would be true of any of the ‘...UI’ approaches (e.g., HUI), not just WUI.

- In the Exposure Draft, WUI transforms $\$ \rightarrow \text{WELLBY}$ and a universal WELLBY value transforms $\text{WELLBY} \rightarrow \$$.
 - Per the OECD, the $\$ \rightarrow \text{WELLBY}$ function should be the inverse of the $\text{WELLBY} \rightarrow \$$ function, as a mathematical rule. If so, the two functions should reverse each other, creating no need for either to be applied to an already-monetary outcome.
 - If the Draft were to keep a UI function as is, despite the redundancy the OECD describes, then the WELLBY function would need to vary with income.
- b) OECD recommended an alternative method currently being researched and validated.
- The technical staff presented an alternative method being researched in response to challenge 3.
 - Social Welfare Function Approach (SWF)
 - a) SWFs have been a mainstay in welfare economics since the 1930s, with roots in moral philosophy. Seminal papers by [Atkinson](#) (1970), [Foster et al.](#) (1984), and [Atkinson](#) (1987) cemented the use of SWFs to explicitly account for inequality and poverty. Recent work by [OECD](#) (2023) and [UNDP](#) (2024) applies these concepts to corporate and international contexts.
 - b) SWFs are a flexible tool for calculating the total well-being of a given population (e.g., a company, community, country) based on both the well-being of individuals within that population and how individuals fare relative to one another given their different starting points and needs.
 - c) SWFs can explicitly incorporate values like fairness, care for vulnerable groups, and universal human rights. These values can be drawn from survey evidence, empirically observed behavior, ethical standards upheld by intergovernmental instruments, and other sources.
 - d) A SWF approach to calculating wage impact starts with the total wage bill of a company, then incorporates a series of ‘well-being’ adjustments like a living wage adjustment and a diminishing marginal utility adjustment. It can also directly incorporate wage inequality and equity.

- The technical staff then proceeded to explain the definition of wage equity and provided statistics on the topic.
 - Wage Equity Statistics
 - a) Women paid ~20% less than men, on average, globally.
 - b) While gender pay gap is most well-studied, pay gaps can also exist by other dimensions, e.g., race, disability, sexual orientation.
 - c) Intent of Wage Equity Methodology is to apply across different dimensions of diversity — but full scope is to be determined.
 - d) Other dimensions of diversity can intersect with gender, resulting in even wider gender pay gaps.
 - Wage Equity definitions
 - a) Definitions below used provisionally for the sole purpose of this presentation. Many tend to use these terms inconsistently and interchangeably.
 - Wage equity: Equal pay for work of equal value
 - Wage equality: Equal pay for all workers
 - b) Outside the context of wages, 'equity' and 'equality' have their own meanings.
 - Equity: Situationally different treatment in service of equality of opportunity
 - Equality: Formally equal treatment
- The technical provided an example to when people may be paid differently for the following reasons.
 - Reason 1: Skills-related
 - a) E.g., mechanical engineer paid more than retail store cashier because mechanical engineer requires more skills.
 - Reason 2: Discrimination-related
 - a) E.g., male mechanical engineer paid more than female mechanical engineer with equal training, experience, and duties
- The technical staff noted the following:
 - Perfect wage equality would mean eliminating both reason 1 and reason 2.
 - Perfect wage equity would mean eliminating reason 2.

- Skills are predicted by dimensions of diversity. E.g., women and minoritized workers can face barriers to access to education. This makes “pure” wage equity very hard to measure.
- Whereas Adequate Wages captures well-being impacts of wages themselves and the adequacy of wages relative to local living wage, Wage Equity captures the extent to which a company pays workers doing work of equal value differently based on dimensions of diversity.
- The technical staff summarized methods that wage equity impacts can be measured and valued.
 - Method 1: Utility of Income (UI)
 - a) Step 1: Impact Drivers
 - Gather data on average wages, by job level and dimensions of diversity
 - Select reference wage (such as wage of highest-paid gender-race subgroup within job level, e.g., white males)
 - Calculate gaps to reference wage for each job level
 - b) Step 2: Measurement
 - Multiply gaps per job level by a ‘utility of income’ factor (e.g., WUI)
 - c) Step 3: Valuation
 - Multiply outcomes (in WELLBYs) by universal value of a WELLBY
 - Social Welfare Function (SWF)
 - a) Step 1: Impact Drivers
 - Gather data on average wages, by job level and dimensions of diversity
 - If full wage distribution unknown, assume log-normal shape (common assumption for income distributions)
 - Measure the amount of inequity and inequality at each job level and dimension of diversity using a 0-1 index, where 0 is perfect equality and 1 is perfect inequality (Atkinson inequality index)
 - b) Step 2: Measurement and Valuation

- Multiply 0-1 indices by entity's total wage bill to convert into monetary value
 - The result is a deduction (i.e., negative) from entity's SWF. *Wage Equality* and *Living Wage Deficit* would also be negatives; *Remuneration Impact* would be a positive.
- The technical staff also provided a comparison of the two measurement and valuation methods:
 - Similarities
 - a) Both have similar data requirements. Both would likely require some expansion upon GRI and ESRS disclosures due to data-intensive nature of topic
 - b) Both explicitly or implicitly apply a universal value to well-being.
 - c) Both do not stop at pay gaps themselves; instead, they use a measure of pay gaps to calculate the monetary value of inequity.
 - d) UI conducts measurement and valuation in two distinct steps. SWF conducts measurement and valuation in one step. But both (disaggregated or collapsed) accepted by GM 2.
 - e) Both can be applied to Adequate Wages and Wage Equity. Both would still require a decision about whether to recognize any remuneration impact for wages below a living wage.
 - Differences
 - a) UI method is well-established in the impact valuation ecosystem and accepted by users (e.g., WifOR & Deloitte use UI in their gender pay gap methodologies).
 - b) SWF method is well-established in academia, public sector, and among international organizations. In impact valuation ecosystem, SWF has been tested out by Bridgewater Associates only.
 - c) Any UI approach faces same mathematical incompatibility critique as Adequate Wages faces on the WUI and WELLBY functions. SWF more sound, accurate, and uses a consistent default reference scenario.
 - d) UI aligned with current version of Adequate Wages Methodology. SWF would align all wage impacts

(Remuneration, Living Wage Deficit, Wage Equity, Wage Equality) in a common framework.

- e) UI may be easier for corporations and investors to understand. SWF requires some mathematical abstraction, which may be harder to understand.
- Members provided the following comments:
 - A member voiced that the method could depend on the type of decision being made. The most important aspect is that everyone is treated equally. For example, for a worker in Ivory Coast, a global average coefficient used for monetization can overestimate impacts compared to a consumer in Paris, France. However, this issue can be solved using dollar equivalence.
 - Thereafter, the member stated that theoretically the two approaches are not incompatible but additive. The SWF for a group of a people is the sum of the utility of individuals which is an adequate assumption.
 - The technical staff stated that the member is correct in saying the two approaches are similar conceptually. Both methods are not taking the money value of wages at face value rather take the notion of what is the utility from the wage itself and the distribution of those wages. However, the SWF relies on extensive research, allowing the Methodology to achieve the same goal without the mathematical inconsistencies.
 - A member asked whether one WELLBY will get a different monetization factor in different countries.
 - The technical staff stated that it is possible to have a universal WELLBY value under either approach. However, in the SWF approach it would be an implicit WELLBY value whereas in the UI approach having a universal WELLBY value would contribute to the mathematical inconsistency.
 - The technical asked whether the member is in favor of a universal WELLBY.
 - The member stated yes, if there was equivalency between countries, they would value a universal WELLBY. The member asked how the SWF approach has the WELLBY implicitly.
 - The technical staff stated that under the SWF approach, there is no use of the WELLBY, it is an implied universal WELLBY. The approach starts with the total wage value and then makes the adjustments. On the conceptual level,

there is no explicit translation of utility back to money like the UI approach.

- A member voiced that there are situations where wages should be adjusted, and situations where it should not be adjusted. In an ideal world, it would depend on the use case.
- The member also voiced that they do not understand the OECD's concern. The end value is different, but this is a logical process. The member voiced their hesitation on the SWF approach. Additionally, Adequate Wages and Wage Equity are two separate concepts and should be look at differently. Wage Equity is more about diversity, equity and inclusion whereas Adequate Wages is related to the different levels of pay.
- A member voiced that they agree on the SWF approach. They have used the SWF before on specific cases. Additionally, the background research on SWF is stronger and has more recognition among economists. Nevertheless, because the SWF method is very complex, a working group should be created to work through this approach.
- The member also voiced that their main concern is that the Methodology should not account for positive remuneration impact under the living wage; however, neither the UI nor the SWF approach resolves that concern.
- The technical staff stated the following reflections:
 - The presumption in the OECD critique is that the driver of those final numbers are based on flawed use of the log function rather than the issue with the final numbers itself.
 - The technical staff has discussed the implications of the actual presentation of the Methodology. It should not be assumed that by using the SWF approach that all wage-related topic methodologies will be presented together. The SWF can be an underlying welding for the topic methodologies, but each can be presented separately from one another.
 - Universality is the preferred approach; as a complimentary analysis, country-specific analysis can be another option. There is nothing inherent about SWF or UI on whether the Methodology takes a universal value of a WELLBY or not.
 - A simple way of thinking about the OECD concern is that the red bar (total wage bill) from the graphic should stay put and if one decided to manipulate that value, they

should do so in separate adjustments. The OECD's concern is a technicality regarding the calculation, not a difference in intent between the end results of the SWF and UI approaches.

- The technical staff acknowledged that a working group should be created to work through the nuances.

Topic Methodology: Waste and Circularity

- The technical staff provided an overview of environmental methodologies to date which included the following:
 - GHG Emissions
 - a) Scope: GHG Emissions covers all emissions, defined by the GHG protocol, along the full value chain.
 - b) Status: Final Draft prepared pending approval by VTPC
 - Water Consumption
 - a) Scope: Exposure Draft covers all water consumption along the full value chain.
 - b) Exposure Draft received VTPC approval and will be released for public comment in late September 2024.
 - Other notes included interim Methodologies. Air pollution, water pollution, land use and waste
 - a) IFVI will be publicly releasing 4 interim methodologies in mid-September. This will improve the overall transparency of methodologies in the ecosystem and enable and accelerate adoption of impact accounting.
 - b) Interim Methodologies, along with other current approaches, will also inform the official development of VTPC-approved methodologies.
 - c) The VTPC-approved workplan has identified "Resource Use (Scope TBD)" as the next methodologies which most broadly aligns with "Waste".
- The technical staff also provided a brief overview of the waste interim Methodology.
 - a) requires data of solid waste disposal, classified as hazardous or non-hazardous, that goes to incineration, landfills, or open dumpsites.
 - b) quantifies outcomes of emissions to air, undesirable environment, and leachate.

- c) measures the impacts on human health, disamenity, agriculture, and other ecosystem services.
- The technical staff also provided proposed areas of research that may lead to updates based on the VBA Piloting and initial research.
 - Based on recent VBA piloting processes, key pieces of feedback on waste methodologies include:
 - a) Desire for value factors that quantify impacts of recycling.
 - b) Application of the methodology for specific types of waste (e.g., e-waste, mineral waste).
 - c) Standardized definitions of hazardous and non-hazardous waste.
 - d) Value factor should offer necessary transparency to understand how each impact contributes to the total impact (Particularly if specific impacts can dominate the overall value).
 - e) Data availability is still very limited (e.g., hazardous, upstream, shared dumpsters, waste-recycling recovery).
 - f) Data should continue to align with ESRS data requirements
 - Building upon the Waste Interim Methodology and VBA piloting, opportunities for updates include:
 - a) reconsidering the level of detail in data requirements.
 - b) circularity/recycling impacts: the Interim Methodology only captures waste sent to landfill, incineration, or dump sites. But a significant and growing amount of solid waste goes through circular pathways likely leading to material impacts.
 - c) littered (marine plastic) impacts: the Interim Methodology does not currently capture impacts of solid waste that ends up littered or leaked, including marine plastics. This is seen as an area with significant material impacts that are being explored.
 - d) fly ash impacts: incineration leads to the production of fly ash (material that did not burn) that has potential impacts not captured in the Interim Methodology.
 - e) general updates to valuation data and approaches.
- The technical staff provided an overview of the data requirements for overflows, including potential updates, which included the following:

- Determining waste and circularity impacts requires (1) the type of waste and (2) the treatment of waste. Both ESRS and GRI have some data reporting requirements that align with these two components.
 - a) Waste Type
 - For ESRS and GRI: tonnage reporting categories include hazardous/non-hazardous.
 - Both include details of waste type (e.g. materials in waste such as metals, plastics, textiles etc.) but (1) this isn't tied to reporting of weight of waste and (2) a comprehensive framework for waste categories is not presented.
 - Applying the methodology with more detailed categories of waste types would lead to greater accuracy of the estimation of impacts but also lead to more complexity.
 - b) Waste Treatment
 - For ESRS and GRI: waste streams are categorized by incineration, landfilling, other disposal operations, preparation for reuse, recycling, and other recovery operations.
 - Detail about landfill locations or exact practices would improve methodology but these concerns can, and have previously been, addressed using national level statistics to make assumptions.
- The technical staff provided a list of the new avenues of waste and circularity research
 - a) Circularity Impacts
 - Reported positive benefits related to circular economy practices are often presented compared to the equivalent waste going to landfill. Based on reference scenarios in GM1, this would be “less of a negative impact” rather than a “positive impact”. However, some circularity impacts may go beyond this and also represent positive impacts with research continuing to explore this domain.
 - Potential impacts of recycling outflows being researched include: GHG emissions from recycling processes, increased access of resources to future

generations, and affected ecosystem services from reduced usage of land for landfills or material extraction.

- Challenges exist about the allocation of circularity-related impacts: should they be attributed to the entity recycling materials, the entity incorporating recycled materials, or both? In some cases, it may be difficult to partition circularity related impacts.

b) Litter and Leakage: Marine Plastics Waste

- A significant amount of waste is mismanaged leading to significant leakage and litter. While some impacts from mismanaged waste may be difficult to determine, one has recently developed enough to potentially explore marine plastic waste.
- The aggregation of marine plastics has become a growing global issue. Potential well-being impacts include:
 - Negative human health from plastic ingestion – research is still developing on these impacts
 - Reduced marine ecosystem services
- Recently, the WWF, developed a framework that estimates impacts from plastics via a loss in marine ecosystem services (WifOR has also utilized this approach). Research is exploring assumptions made in this method and ways to build upon this approach.
- One area of exploration uses a water flow model to predict the probability that plastic waste arrives in oceans for many countries across the globe.
- Members provided the following comments:
 - A member voiced the following:
 - The impact value for recycling is currently considered a zero value because an entity has not created end-of-life associated with impact of waste but rather the waste goes back into the supply chain.
 - Recycling polyester as an input material, rather than using virgin polyester, results in a lower impact in the supply chain compared to first time use. To avoid double counting, if it is in the supply chain for whoever is using the source,

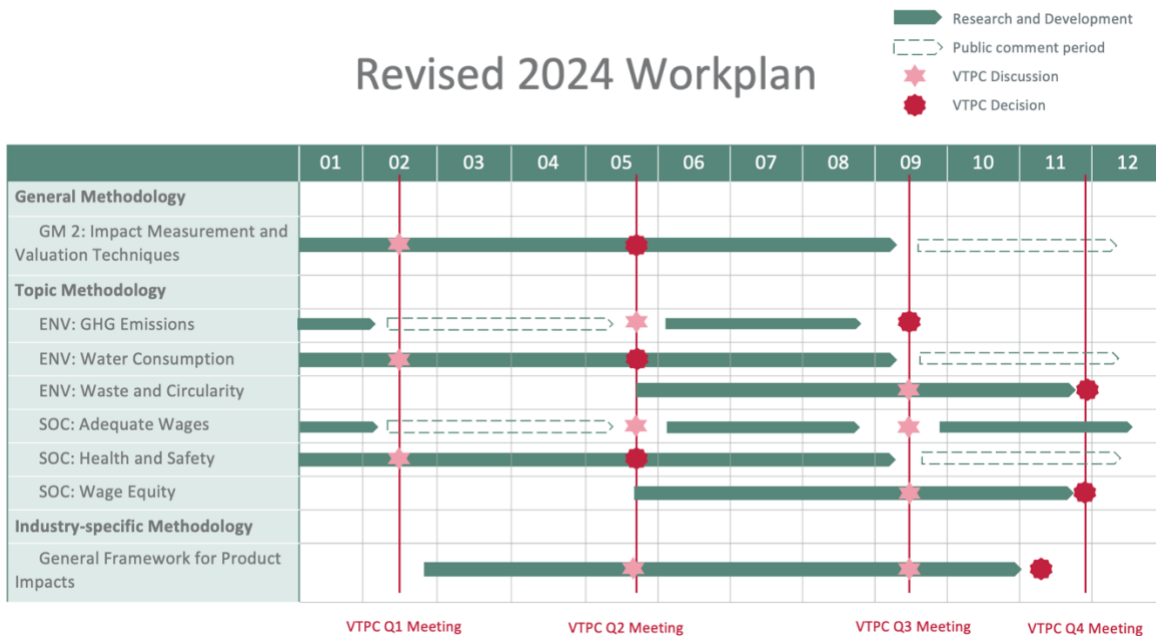
then there should be a zero value for whoever is giving it away.

- Preventing materials from ending up in a landfill could be seen as a positive impact. However, attributing a positive impact here might lead to double counting.
- To incentivize a circular economy, and for simplicity, assign a zero-impact value to waste that is recycled and used as a resource elsewhere.
- For plastic waste going into oceans, the WWF analysis that was mentioned, the rigor in the approach still needs to be improved. It raises the question on how good the research has to be in order to be included.
- A member voiced the following:
 - It is important to ensure that the connections between product impacts and circularity are streamlined and aligned with each other for this topic.
 - There are a lot of discussions on circularity such as Ellen MacArthur Foundation. There is a big problem when it comes to waste management. How do we dispose of the plastic? The infrastructure is not the same everywhere and needs to be considered when it comes to impacts.
- A technical staff responded with the following comments:
 - On the point of circularity as the baseline with recycling as zero impact, the research is slowly starting to converge into that and would reinforce circularity as a key component.
 - On the WWF analysis for marine plastics, it was agreed that there are some areas for improvement in the empirical approaches. The technical staff are exploring those updates but if they are not able to advance the modeling of those plastics, the current form of WWF would not be ideal.
 - Regarding the leakage from the waste stream, this topic raises an additional question - if the leakage comes from the landfill, should that impact attributed to the entity that gave their waste to the landfill?
 - Additionally, whether certain waste impacts are a product impact or recycling-related impact is still a topic that the technical staff is actively researching and discussing.

Conclusions and Next steps

- To conclude the meeting, the technical staff provided the following updates:
 - There has been previous conversations on Industry specific Methodologies aside from the General Framework. The Industry specific Methodologies are no longer on the VTPC workplan, but development of Industry specific Methodologies is still ongoing.
 - An additional VTPC meeting will occur at the end of October. In this meeting, the following will take place:
 - Requesting approval of the General Product Framework Pre-exposure draft.
 - Further conversation on the Methodology Architecture as well as Adequate Wages and Wage Equity and Waste Circularity.
- Other updates include:
 - General Framework for Product Impacts Pre-Exposure Draft to be shared next week for review.
 - VTPC meeting minutes will be sent out next week for review.
 - Climate Week Event - VTPC members may RSVP at their convenience.
 - The promotion of the public comment period within VTPC's network (September 17; Webinar October 29).
- The technical staff thanked the members for their participation, and the meeting was concluded.

Revised 2024 Workplan



Appendix A: Attendance

VTPC Members		
Name	Attendance	Representative (If Absent)
George Serafeim (Chair)	Present	
Sonja Haut (Vice Chair)	Present	
Mohammed Abdulrahman Al-Akil	Present	
Tom Beagent	Present	
Dr. Duoguang Bei	Absent	
Jens Berger	Absent	
Sarah Bratton Hughes	Absent	
Adrian De Groot Ruiz	Present	
Christian Hell	Present	
Klaus Hufschlag	Absent	
Amma Lartey	Absent	
Jun Suk Lee	Present	
Kelly McCarthy	Absent	
Crystal Pay	Absent	Beate Stuis
Dr. Amanda Rischbieth AM FAICD	Absent	
Dr. Marta Santamaria	Present	
Pavan Sukhdev	Absent	Karan Peer
Sebastian Welisiejko	Absent	Emilia Cerra
Observers:		
Yulia Romaschenko	Present	

Technical Staff	
Name	Organization
Dan Osusky	IFVI
Carter Berry	IFVI
Tamsin Chen	IFVI
Mosunmola Olowu	IFVI
Marah Mohamed	IFVI
Marc Rosenfield	IFVI
Michael Verbücheln	VBA
Francisco Ortin Cordoba	VBA