

VALUE CHANGE – REDEFINING SUPPLY SHED

Scope & Applicability

In 2018 Gold Standard published the '[Value Chain Intervention Guidance](#)' (henceforth 'The Guidance')– a new Guidance for quantifying, reporting and accounting for interventions (projects and programmes of mitigation action) in company supply chains. The Guidance builds on the Greenhouse Gas Protocol Scope 3 Standard and Calculation Guidance.

Through further stakeholder consultation and first pilot verification of interventions, this additional guidance addendum has been created. It focusses on the definition and application of 'supply-shed' as introduced by the Guidance. It is expected to be applicable immediately for use by companies applying the Guidance and will later be incorporated into an updated version, likely in the first quarter of 2020.

The Supply Shed concept potentially introduces a risk of double counting that will be addressed separately in the Guidance. This involves the scenario where:

- Company A, the proponent of an intervention with a group of suppliers, applies the supply shed model. They report the beneficial result of the intervention but are actually, physically purchasing goods from elsewhere.
- Company B who are not involved in the causality of the intervention are physically purchasing the goods targeted by the intervention. If they become aware of and report the beneficial impacts of the intervention on emissions and/or removals then both Company A and Company B will report the same improvement.

A further, separate update to the Guidance will therefore cover how to allocate benefits amongst companies involved and how to safeguard against double counting, for example as described above.

Context

The Guidance currently defines supply-shed as a group of suppliers providing similar goods and services that can be demonstrated to be within the company's supply chain. The Guidance acknowledged that it may not be feasible to demonstrate which specific suppliers provide the goods and services but it should be demonstrable that they are in the group that do. This approach caters to situations where a Company may not be able to directly trace sourcing to a specific supplier but it is known that sourcing comes from the group of suppliers within the 'Supplier Market' from which Company sources.

For example (per the current version of the guidance), Company A may purchase wheat from Mill 1 but is not able to trace the wheat back to specific farms that supply the mill and where intervention takes place. If it is possible to demonstrate that the farms where Company A introduces interventions provide products to a tier 1 supplier of the Company i.e. the Mill 1 from, which Company A sources then these farms can be included in Company's supply shed.

This approach however restricts the boundary of supplier market¹ to tier 1 suppliers and their suppliers (tier 2 and above) meaning that it needs to be demonstrated that tier 2 and above suppliers supply goods to actual tier 1 supplier of the company. This may prove challenging in terms of both traceability and the dynamics of market forces, for example where companies switch supply (and would thus lose the benefits of their investment).

The following new text is put forward for inclusion within the Guidance. It is intended to allow greater flexibility as to what can be deemed to be within 'supply-shed' and less restrictive in terms of demonstrating that the intervention impacts can only be accounted for if supply can be demonstrated to that specific group of suppliers.

¹A commodity market is a physical marketplace for buying, selling and trading soft commodities in bulk like agricultural products or livestock such as corn, wheat, coffee, sugar, soybean, pork etc.

Proposed updated definition of supply-shed

'Supplier market' can be defined in broader sense to include those tier 2 and above suppliers within supply shed that supply to 'potential' tier 1 suppliers of Company..

This allows that farms, where an intervention takes place and are not supplying goods to actual tier 1 supplier of the Company but to 'potential' suppliers, can be included in supply shed.

Options are provided below in decreasing order of preference to justify tier 2 and above suppliers as part of supply-shed. Please note that first preference in any case is the scenario where tier 2 and above suppliers providing similar goods and services can be demonstrated as supplying goods and services to actual tier 1 supplier of the Company.

1. Option 1 -It should be demonstrated that there is a **pre-defined market for the type and quality of specific good purchased by the Company**. Examples could include regulated areas or areas covered by industry associations.
2. Option 2 - goods are **physically transported in the market (for e.g. cooperatives) where Company buys from**.
3. Option 3 - goods are **produced in same Country where Company buys from**.
4. Option 4 - goods **are produced in a Country located in same geographical region (e.g. South Asia, SE Asia region etc.) where Company buys from**.

Example

In row-crop agriculture, the same crop is rarely grown on a given field every year. So, if a company causes an intervention on a specific field that grows a commodity purchased by the Company, the intervention will remain, but the crop may not until a future year. As outlined in the Value Chain Interventions Guidance, that field has the 'potential' to supply the Company in the future and hence can be considered within the company's supply shed.

Oat Intervention Example

- 5,000,000 kg of oats are sourced from a predetermined supply shed (e.g., USDA Land Resource Region – Northern Great Plains Spring Wheat Region, Saskatchewan and Manitoba)
- Standard oat emission factor is 0.39 kgCO₂e/kg oats for the supply shed
- Average farm emissions within the supply shed is 500 kgCO₂e/farm acre
- An intervention is made within the supply shed on 1,000 acres reducing the average farm emissions to 375 kgCO₂e/farm acre
- The average oat yield for the supply shed is 1400 kg/acre
- Company is able to demonstrate that the intervention farms in the supply shed grow or have grown oats

Pre-intervention emissions

Emissions from oats prior to intervention = 5,000,000 kg x 0.39 kgCO₂e/kg oats = 1,950,000 kgCO₂e

Impact Factor

375 kgCO₂e/farm acre after intervention/500 kgCO₂e/farm acre before intervention = 0.75

Mass of oats from 'potential' oat growing farm land in the supply shed improved:

1000 acres x 1400 kg/acre = 1,400,000 kg oats linked to intervention acres

Emissions from oats:

{(5,000,000 kg – 1,400,000 kg) x 0.39 kgCO₂e/kg oats} + {1,400,000kg x 0.39 kgCO₂e/kg oats x .75}

=1,404,000 kgCO₂e + 409,500 kgCO₂e = 1,813,500 kgCO₂e

The company's supply shed intervention resulted in a 1,950,000 – 1,813,500 = 136,500 kgCO₂e improvement in emissions linked to oats