



SCIENCE
BASED
TARGETS

DRIVING AMBITIOUS CORPORATE CLIMATE ACTION

info@sciencebasedtargets.org
www.sciencebasedtargets.org



www.twitter.com/sciencetargets

SBTi Criteria and Recommendations

TWG-INF-002 | Version 4.0

April 2019



SCIENCE
BASED
TARGETS

DRIVING AMBITIOUS CORPORATE CLIMATE ACTION

PARTNER ORGANIZATIONS



Table of Contents

Introduction	- 3 -
Effective Dates of Updated Criteria	- 3 -
1. GHG Emissions Inventory and Science-based Target Boundary	- 4 -
2. Timeframe	- 5 -
3. Ambition	- 5 -
4. Scope 2	- 7 -
5. Scope 3	- 7 -
6. Sector-specific guidance	- 9 -
7. Reporting	- 9 -
8. Recalculation and target validity	- 10 -
Annual Timeline for Revising Criteria	- 11 -
Document History	- 11 -

Introduction

All of the criteria listed below must be met in order for target(s) to be recognized by the Science Based Targets initiative (SBTi). In addition, companies should follow the [GHG Protocol Corporate Standard](#), [Scope 2 Guidance](#), and [Corporate Value Chain \(Scope 3\) Accounting and Reporting Standard](#). Recommendations are important for transparency and best practices, but are not required.

The [Target Validation Protocol](#) describes the underlying principles, process, and criteria followed to assess targets and to determine conformance with the SBTi criteria.

While every effort is made to keep companies informed of the latest criteria and recommendations, the initiative reserves the right to make adjustments as needed to reflect the most recent emissions scenarios, policies, and greenhouse gas accounting practices.

The initiative also reserves the right to withdraw the validation of an approved target if it becomes apparent that incorrect information was communicated during the target validation process that results in any of the criteria existing during the assessment not being met, or if requirements following the approval of the target are not respected (i.e. target reporting and recalculation).

Unless otherwise noted (including specific sections), all criteria apply to scopes 1, 2, and 3.

Effective Dates of Updated Criteria

This criteria version 4.0 will be in effect as of October 15th 2019. All submissions received by the SBTi prior to October 15th 2019 can be assessed against the criteria version 3.0 or 4.0. Criteria, recommendations and best practices denoted with an asterisk (*) are refinements and additions to/clarifications of pre-existing criteria and recommendations, which are already in effect.

1. GHG Emissions Inventory and Science-based Target Boundary

Criteria

C1 - Scopes: The targets must cover company-wide scope 1 and scope 2 emissions, as defined by the GHG Protocol Corporate Standard.

C2 - Significance thresholds: Companies may exclude up to 5% of scope 1 and scope 2 emissions combined in the boundary of the inventory and target.

C3 - Greenhouse gases: The targets must cover all relevant GHGs as required per the GHG Protocol Corporate Standard.

***C4 - Bioenergy accounting:** Direct emissions from the combustion of biomass and biofuels, as well as GHG removals associated with bioenergy feedstock¹, must be included alongside the company's inventory and must be included in the target boundary when setting a science-based target and when reporting progress against that target. If biogenic emissions from biomass and biofuels are considered climate neutral, the company must provide justification of the underlying assumptions.

Recommendations and additional guidance

R1 - Subsidiaries: It is recommended that only the parent company submit targets; however, subsidiaries may submit separate targets if they so wish. In cases where both parent companies and subsidiaries submit targets, they must make it clear whether the parent company's target includes or excludes the target of the subsidiary. Please see boundary criteria above.

R2 - Direct land use change emissions: When relevant, companies are encouraged to account for land use change emissions and include them in their target boundary. Since methods to calculate land use change can widely differ, companies should disclose the method used to calculate these impacts in their GHG inventory.

¹ Non-bioenergy related biogenic emissions must be reported alongside the inventory and must be included in the target boundary. GHG removals that are not associated with bioenergy feedstock are currently not accepted to count as progress towards SBTs or to net emissions in the inventory.

2. Timeframe

Criteria

C5 - Base and target years: Targets must cover a minimum of 5 years and a maximum of 15 years from the date the target is submitted to the SBTi for an official validation².

C6 - Progress to date: Targets that have already been achieved by the date they are submitted to the SBTi are not acceptable. The SBTi uses the year the target is submitted to the initiative (or the most recent completed GHG inventory) to assess forward-looking ambition. The most recent completed GHG inventory must not be earlier than two years prior to the year of submission³.

Recommendations and additional guidance

R3 - Base year: The SBTi recommends choosing the most recent year for which data are available as the target base-year.

R4 - Target year: Targets that cover more than 15 years from the date of submission are considered long-term targets. Companies are encouraged to develop such long-term targets up to 2050 in addition to the required mid-term targets. Long-term targets must be consistent with the level of decarbonization required to keep global temperature increase to well below 2°C compared to pre-industrial temperatures to be validated and recognized by the SBTi.

R5 - Consistency: It is preferable that companies use the same base and target years for all targets within the mid-term timeframe and all targets within the long-term timeframe.

3. Ambition

Criteria

C7 - Level of ambition: At a minimum, scope 1 and scope 2 targets will be consistent with the level of decarbonization required to keep global temperature increase to well below 2°C compared to pre-industrial temperatures, though companies are encouraged to pursue greater efforts towards a 1.5°C trajectory. Both the target timeframe ambition (base year to target year) and the forward-looking ambition (most recent year to target year) must meet this ambition criteria.

² For targets submitted for an official validation in the first half of 2019 the valid target years are 2023-2033 inclusive. Those submitted in the second half of 2019 must be between 2024 and 2034.

³ For targets submitted for an official validation in 2019, the most recent inventory data submitted must be for 2016 at the earliest.

C8 - Absolute vs. intensity: Intensity targets for scope 1 and scope 2 emissions are only eligible when they lead to absolute emission reduction targets in line with climate scenarios for keeping global warming to well below 2°C or when they are modelled using an approved sector pathway⁴. Absolute reductions must be at least as ambitious as the minimum of the range of emissions scenarios consistent with the well below 2°C goal, or aligned with the relevant sector reduction pathway within the Sectoral Decarbonization Approach.

C9 - Method validity: Targets must be modelled using the latest version of methods and tools approved by the initiative. Targets modelled using previous versions of the tools or methods can only be submitted to the SBTi for an official validation within 6 months of the publication of the revised method or the publication of relevant sector-specific tools.

*C10 - Combined scope targets: Targets that combine scopes (e.g. 1+2 or 1+2+3) are permitted.

- If the combined scope 1+2+3 target is not in line with a well below 2°C scenario: the scope 1+2 portion must be in line with a well below 2°C scenario and the scope 3 portion of the target has to meet the ambition requirements outlined in C19.
- If the combined scope 1+2+3 target is in line with a well below 2°C scenario: the combined scope 1+2 portion of the target must be in line with a well below 2°C scenario, regardless of the scope 3 portion ambition.

*C11 - Offsets: The use of offsets is not counted as emissions reduction toward the progress of companies' science-based targets. The SBTi requires that companies set targets based on emission reductions through direct action within their own operations or their value chains. Offsets are only considered to be an option for companies wanting to finance additional emission reductions beyond their science-based targets.

*C12 - Avoided emissions: Avoided emissions fall under a separate accounting system from corporate inventories and do not count toward science-based targets.

Recommendations and additional guidance

R6 - Choosing an approach: The SBTi recommends using the most ambitious decarbonization scenarios that lead to the earliest reductions and the least cumulative emissions.

⁴ For a list of all approved methods and sector pathways, please consult the [SBTi website](#)

4. Scope 2

Criteria

***C13 - Approaches:** Companies shall disclose whether they are using a location or market-based approach as per the GHG Protocol Scope 2 Guidance to calculate base year emissions and to track performance against a science-based target. Companies shall use a single, specified scope 2 accounting approach (“location-based” or “market-based”) for setting and tracking progress toward an SBT.

***C14 - Renewable electricity:** Targets to actively source renewable electricity at a rate that is consistent with well below 2°C scenarios are an acceptable alternative to scope 2 emission reduction targets. The SBTi has identified 80% renewable electricity procurement by 2025 and 100% by 2030 as thresholds (portion of renewable energy over total energy use) for this approach in line with the recommendations of RE100. Companies that already source electricity at or above these thresholds shall maintain or increase their use share of renewable electricity to qualify.

Recommendations and additional guidance

R7 - Heat and steam: For science-based target modelling purposes, it is recommended that companies model heat and steam related emissions as if they were part of their direct (i.e. scope 1) emissions.

R8 - Efficiency: If not already embedded in the science-based target setting method, it is recommended that electricity-related scope 2 targets are modelled taking into account efficiency gains for the specific sector and the decarbonization projected for the power sector based on well below 2°C scenarios.

5. Scope 3

Criteria

C15 – Scope 3 screening: Companies must complete a scope 3 screening for all relevant scope 3 categories in order to determine their significance as per the GHG Protocol Corporate Value Chain (Scope 3) Accounting and Reporting Standard.

***C16 - Requirement to have a scope 3 target:** If a company’s relevant scope 3 emissions are 40% or more of total scope 1, 2, and 3 emissions, a scope 3 target is required. All companies involved in the sale or distribution of natural gas or other fossil fuel products shall set scope 3 targets for the use of sold products irrespective of the share of these emissions compared to the total scope 1, 2, and 3 emissions of the company.

C17 – Boundary: Companies must set one or more emission reduction targets and/or supplier or customer engagement target that collectively covers at least 2/3 of total scope 3 emissions in conformance with the GHG Protocol Corporate Value Chain (Scope 3) Accounting and Reporting Standard. .

C18 – Timeframe: Emission reduction targets must cover a minimum of 5 years and a maximum of 15 years from the date the company’s target is submitted to the SBTi for an official validation. Companies are encouraged to develop such long-term targets up to 2050 in addition to the required mid-term targets. Long-term scope 3 targets must comply with C19 to be considered ambitious.

C19 - Level of ambition for scope 3 emissions reductions targets: Emission reduction targets (covering the entire value chain or individual scope 3 categories) are considered ambitious if they fulfill any of the following:

- Absolute: Absolute emission reduction targets that are consistent with the level of decarbonization required to keep global temperature increase below 2°C compared to pre-industrial temperatures.
- Economic intensity: Economic intensity targets that result in at least 7% year-on-year reduction of emissions per unit value added.
- Physical intensity: intensity reductions aligned with the relevant sector reduction pathway within the Sectoral Decarbonization Approach; or targets that do not result in absolute emissions growth and lead to linear annual intensity improvements equivalent to 2%, at a minimum.

*C19.1 – Supplier or customer engagement targets: Company targets to drive the adoption of science-based emission reduction targets by their suppliers and/or customers are considered acceptable when the following conditions are met:

- Boundary: Companies may set engagement targets around relevant and credible upstream or downstream categories.
- Formulation: Companies shall provide information in the target language on what percentage of emissions from relevant upstream and/or downstream categories is covered by the engagement target or, if that information is not available, what percentage of annual procurement spend is covered by the target.⁵
- Timeframe: Companies’ engagement targets must be fulfilled within a maximum of 5 years from the date the company’s target is submitted to the SBTi for an official validation.
- Level of ambition: The company’s suppliers/customers shall have science-based emission reduction targets in line with SBTi resources.

⁵ If measuring coverage by spend, the company should provide an estimate of the emissions coverage associated with that spend for validation purposes to demonstrate that criterion C17 has been met.

*C19.2 - Fossil fuel sale, transmission and distribution: Companies that sell, transmit, or distribute natural gas or other fossil fuel products shall set absolute or intensity percentage-based emission reduction scope 3 targets for the use of sold products that are consistent with the level of decarbonization required to keep global temperature increase well below 2°C compared to pre-industrial temperatures.

Recommendations and additional guidance

R9 – Supplier engagement: Companies should recommend that their suppliers use the SBTi guidance and tools available to set science-based targets. SBTi validation of supplier science-based targets is highly recommended but not required.

R10 – Indirect use phase targets: Targets to influence the behavior of end-users (e.g. education campaigns) or to drive the adoption of science-based targets on corporate customers (e.g. customer engagement targets) are not required, but are encouraged when these emissions are significant. Companies may include indirect use-phase emissions in the scope 3 target boundary but these cannot count towards the $\frac{2}{3}$ threshold defined in C17, i.e., these targets are above and beyond the company's scope 3 targets. Refer to the GHG Protocol Scope 3 Standard for a list of products that generate direct and indirect use-phase emissions.

6. Sector-specific guidance

*C20 - Requirements from sector-specific guidance: Companies should follow requirements for target setting and minimum ambition levels as indicated in relevant sector-specific methods and guidance at the latest, 6 months after the sector guidance publication. A list of the sector-specific guidance and requirements is available in the [Target Validation Protocol](#).

7. Reporting

Criteria

C21- Frequency: The company shall publicly report its company-wide GHG emissions inventory and progress against published targets on an annual basis.

Recommendation and additional guidance

Recommendation and additional guidance

R11 - Where to disclose: There are no specific requirements regarding where the inventory should be disclosed, as long as it is public. Recommendations include annual reports, sustainability reports, the company's website, and/or CDP's annual questionnaire.

8. Recalculation and target validity

Criteria

C22 - Mandatory target recalculation: To ensure consistency with most recent climate science and best practices, targets must be reviewed, and if necessary, recalculated and revalidated, at a minimum every 5 years. The latest year in which companies with already approved targets must revalidate is 2025. Companies with an approved target that requires recalculation must follow the most recently applicable criteria at the time of resubmission.

C23 - Target validity: Companies with approved targets must announce their target publicly on the SBTi website within 6 months of the approval date. Targets unannounced after 6 months must go through the approval process again, unless a different publication time frame has been agreed with the SBTi.

Recommendation and additional guidance

R12 - Triggered target recalculation: Targets should be recalculated, as needed, to reflect significant changes that could compromise relevance and consistency of the existing target. The following changes should trigger a target recalculation:

- Scope 3 emissions become 40% or more of aggregated Scopes 1, 2 and 3 emissions;
- Emissions of exclusions in the inventory or target boundary change significantly;
- Significant changes in company structure and activities (e.g. acquisitions, divestitures, mergers, insourcing or outsourcing, shifts in goods or service offerings);
- Significant adjustments to the base-year inventory or changes in data to set targets such as growth projections (e.g. discovery of significant errors or a number of cumulative errors that are collectively significant)
- Other significant changes to projections/assumptions used in setting the science-based targets

R13 - Validity of target projections: The SBTi recommends that companies check the validity of target-related projections annually. The company should notify the SBTi of any significant changes and report these major changes publicly, as relevant.

Annual Timeline for Revising Criteria

Target validation criteria will be updated on an annual basis as per the timeline below starting in 2019. For further information on the target validation process and CDP's scoring of science-based targets in its climate change questionnaire, please see the [Call to Action Guidelines](#).

Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	
Revised criteria, submission form, and Call to Action Guidelines published	Grace period for revised criteria	CDP Scoring Season				Results provided to CDP responders by climate change questionnaire response deadline	Results provided to non-CDP responders who submitted during or shortly before CDP scoring season	SBTi assesses how to improve the criteria and seeks Technical Advisory Group feedback on revisions				
		Revised criteria go into effect one day after submission deadline for CDP scoring (May 15th for 2019).										

Document History

Version	Change/update description	Date finalized	Effective Dates
1.0	Original version of Science Based Targets Initiative Criteria and Recommendations	May 2015	May 2015 to 16 April 2017
2.0	Updated version of criteria and recommendations to reflect current best practice and latest experience.	February 24 2017	From 24 February 2017
3.0	Updated version of criteria and recommendations to provide greater clarity and reflect current best practices. Updates denoted with an asterisk (*).	May 23 2018	From 23 May 2018
Guidance for 3.0	Supplementary guidance and clarifications to V3.0.	February 28 2019	Criteria are in effect. Updates provide clarity.
4.0	Updated version of criteria and recommendations to reflect current developments of climate science and best practices. This version integrates clarifications to relevant criteria included in Guidance for 3.0.	April 17 2019	From 15 October 2019