

Responsible Sourcing and Supply Chain of Building Materials

Aim of Credit

To reward projects that include materials that are responsibly sourced or have a sustainable supply chain.

Credit Criteria

Steel *		
0**	Responsible Steel Maker	Conditional Requirement: 95% of the buildings steel is sourced from a Responsible Steel Maker
1	Responsible Steel Fabricator	1 point is awarded when at least 60% of the fabricated structural steelwork is supplied by a steel fabricator/steel contractor accredited to the Environmental Sustainability Charter of the Australian Steel Institute.
Timber		
2	Certified Timber	1 point where at least 95% (by cost) of all timber used in the building and construction works is either: <ul style="list-style-type: none"> • certified by a forest certification scheme that meets the GBCA's 'Essential' criteria for forest certification • is from a reused source
PVC		
3	Best Practice PVC	1 point are awarded where 90% (by cost) of the 'common uses of PVC' in a project either: <ul style="list-style-type: none"> • Meet Best Practice Guidelines for PVC • Do not contain PVC

*Criteria 0 and 1 are not applicable if the project is claiming credit Mat – Steel Sourcing and Use

**Criterion 0 is a minimum requirement if the project is claiming Material Life Cycle Impacts and steel is over 1% of the project's total value.

Compliance Requirements

Contract Value

The contract value is defined as the dollar value required to complete the works for the entire project, including site works (landscaping, external paving, etc.). The following must be excluded when determining total contract value:

- Demolition works;
- Consultants, design fees, project management fees;
- Works outside the site area; and
- Buildings or areas within the site that are not being assessed for purposes of Green Star.

Where a number of amenities or services are shared between stages in a larger development, the GBCA expects that the cost apportioned to the rated stage is equivalent to the use that the stage will have of these facilities.

0 - Responsible Steel Maker

For a steel manufacturer or a steel maker to be considered a responsible source of steel for purposes of this credit, they must show that they comply with both of the following initiatives:

The steel making facilities where the steel for the project is being sourced have a currently valid ISO 14001 Environmental Management System (EMS) in place.

Valid ISO 14001 Environmental Management System (EMS) certificates must be provided from the steel making facilities where the structural and/or reinforcing steel in the project was produced; and

The steel maker supplying the steel is a member of the World Steel Association's (WSA) Climate Action Programme (CAP). A current CAP certificate from the WSA, confirming that the steel maker is a member of the CAP, must be provided. Certificates are valid for a period of two years and must be current at the time that the Green Star documentation is submitted to achieve points for this credit.

1 - Responsible Steel Fabrication

Australian Steel Institute (ASI) Environmental Sustainability Charter (ESC)

The ASI has created the ESC as part of an overarching program of steel stewardship, seeking to engage the whole steel supply chain in adopting more environmentally sustainable behaviour. This Charter is directed at the downstream manufacturing, fabricating and supply companies who are an integral part of the entire supply chain.

For criterion compliance, 60% (by mass) of the structural steel framing shall be supplied by a fabricator / contractor who is a current member of the ASI's Environmental Sustainability Charter Group.

Innovation Opportunity

Sustainable Sourcing of Concrete Aggregates

The GBCA invites project teams submit an innovation challenge for the sustainable sourcing of concrete aggregates.

2 - Sustainable Timber

This credit addresses all timber applications within the building and construction works. No distinction is made between temperate, tropical, hardwood and softwood timbers and engineered wood products.

Typical timber uses include, but are not limited to:

- Formwork and other temporary installations of timber (e.g. hoardings);
- Structural and non-structural timber, including internal walls, floors and roof structures;
- External and internal cladding;
- Flooring, wall, and ceiling finishes;
- Internal and external joinery, windows, doors, and other specialist uses of timber, such as installed furnishings or balustrades; and
- Furniture items made from timber or including timber components

Percentage of Timber Addressed by the Credit

The credit requires 95% of the timber used in a project (measured by cost) to be compliant with the credit criteria.

Certified Timber

Currently in Australia, FSC International and PEFC-accredited certification schemes both meet the 'Essential' criteria.

Timber shall only be considered as 'certified' if it has been sourced from forests that have been certified by forest certification schemes that, at a minimum, are deemed to satisfy the requirements of the GBCA's 'Essential' criteria for forest certification.

CRITERIA	OBJECTIVE
1) Chain of Custody	Ensures timber can be traced to source and that no substitutions for uncertified timber are made along the supply chain.
2) Governance	Ensures schemes use a stakeholder governance model.
3) Standard Development and Revision	Ensures standards are developed robustly, independently, and continuously improved over time .
4) Auditing and Certification Decisions	Ensures auditing and certification processes remain transparent and independent from one another

5) Verification of Legality	Ensures projects do not use timber from illegal logging; includes verification of timber used in Mixed Sources products
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In addition, timber and timber products sourced from certified forests must be accompanied by a relevant Chain of Custody (CoC) in order to be recognised as certified timber. Further information relating to CoC is provided below in Additional Guidance.

Reused Timber

Reused timber is defined as timber that is pre-existing in a fitout or building, or timber and / or timber products (flooring, walls and cladding, ceiling finishes, joinery, etc.) procured from a second hand source. Reused timber sources may include second hand retailers, removalists, auction houses, and demolition works from previous sites. New painting or coating may be applied to a reused item.

Recycled Timber

If a timber product is produced from 100% post-consumer recycled timber without the incorporation of any virgin timber content, then this shall be termed 'reused timber' for the purposes of this credit. Third-party verification, in the form of a signed statement, is required to confirm the percentage of post-consumer recycled content in such product(s) in order for them to be recognised as 'reused timber'. The third-party verification statement must be provided by an auditor registered by the Registrar Accreditation Board Quality Society of Australasia (RABQSA), or other equivalent national or international auditor accreditation system.

Virgin Timber

Virgin timber refers to timber and wood-derived products that are not recycled. Sawmill co-products are deemed to fall within the category of virgin timber.

Formwork

New formwork must be certified by a forest certification scheme recognised by the GBCA.

Formwork that is purchased as new for a project that is not certified by a forest certification scheme recognised by the GBCA, and is reused within the same project may not be claimed as reused and does not comply with the credit criteria irrespective of the number of times it is reused on the same project.

Formwork that has been previously used in another project and is used again in a new project can be claimed as reused.

3 - Sustainable PVC

Common uses of PVC

This credit addresses the common uses of PVC in buildings. This refers only to:

- Pipes, conduit and associated fittings;
- PVC coated window frames (if used in the project)*
- Wire and cable insulation; and
- Flooring** and resilient wall covering products that contain PVC.

*If PVC window frames are not used in the building, this use of PVC is not applicable and is not included in the total PVC cost

**Flooring refers to vinyl flooring or a carpet containing PVC backing.

Common uses of PVC products that are re-used are excluded from this credit. Any PVC product not included in common uses of PVC is not addressed by this credit (for example PVC windows) and is neither positively nor negatively treated by the credit.

Non PVC Products

A material safety data sheet (MSDS) or a material data sheet that describe the composition of the products is the means to establish the product does not contain PVC. Costs of non PVC items must be accounted for as required for PVC.

Calculating PVC in Products Cost:

The 'total cost of PVC in products' for the purpose of providing cost calculations shall be determined by the cost of the entire product (excluding installation costs) and the percentage of PVC in the product.

Evidence of Independent Verification

Documenting compliance of a PVC product to the Guidelines shall be demonstrated using any of the following pathways:

- ISO 14001 certified EMS that includes the requirements of the Best Practice Guidelines;
- Independently audited manufacturer's declaration of compliance to the Best Practice Guidelines; or
- Product third party certification of compliance to the guidelines (ISO type 5 certificate or eco label).

Best Practice Guidelines for PVC in the Built Environment

The Best Practice Guidelines for PVC in the Built Environment (Guidelines) have been developed by the PVC Expert Reference Panel (appointed February – September 2009) and the GBCA as part of the 'PVC Minimisation' credit review. The Guidelines cover environmental impacts and health risks associated with the manufacture and end of life management of the common uses of PVC products used in buildings. Full details of the Guidelines are provided in the *Literature Review and Best Practice Guidelines for the Life Cycle of PVC Building Products* available on the GBCA website.

Manufacturers and suppliers of common uses of PVC products should obtain independent

third-party verification to demonstrate that their products fully comply with the Best Practice Guidelines.

Independent third party verification of compliance with the Best Practice Guidelines is intended to provide the market with simple methods to demand, and be assured of receiving, PVC products that have been manufactured, sold, tracked and will potentially be reclaimed according to best practice environmental and health impact minimisation criteria.

Evidence of Independent Verification

Documenting compliance of a PVC product to the Best Practice Guidelines shall be demonstrated using any of the following pathways:

1	Environmental Management System (EMS)	<p>Inclusion of the Best Practice Guidelines for PVC in the Built Environment in the manufacturer or supplier's independently audited ISO 14001, Environmental Management Systems (EMS). Audits must be conducted by a JAS-ANZ (or equivalent) accredited certification body.</p> <p>The compliance certificate issued by the auditor serves as the documentation needed to establish compliance with the credit via the EMS option. This certificate shall be valid for up to three years</p>
2	Product Declaration	<p>Manufacturer or supplier product declaration that the producer-specific and product performance-specific criteria of the Best Practice Guidelines for PVC in the Built Environment have been met for a specific product. An example of a product declaration is available at the Green Building Council of Australia website.</p> <p>The product declaration must be independently audited by either an accredited auditor registered by RABQSA or another equivalent national or international auditor accreditation system, or a JAS-ANZ (or equivalent) accredited certification body. A copy of the compliance certificate issued to the manufacturer/supplier by the auditor must be included in the Green Star submission along with a copy of the product declaration. This certificate shall be valid for up to two years. These two items serve as the documentation required to establish compliance with the credit via the Product Declaration option</p>
3	Product Certification	<p>Independent accreditation program(s) or product certification schemes that integrate the producer-specific and product performance-specific criteria of the Best Practice Guidelines for PVC in the Built Environment into standard(s) or certification criteria (e.g. Type 5 ISO product certification, and eco labels). Independent accreditation programs and product certification schemes must either be JAS-ANZ accredited or pre-qualify for Green Building Council of Australia recognition by demonstrating full compliance with Part I, Section A – Governance and Transparency of the Green Building Council</p>

		<p>of Australia Assessment Framework for Product Certification Schemes.</p> <p>Evidence of independent accreditation of the product(s)(e.g. to an ISO Type 5 certification such as an Australian Standard or to a Green Building Council of Australia recognised eco label) must be provided to Green Star project teams for inclusion in Green Star submissions and serves as the documentation needed to establish compliance with the credit via the Product Certification option. This certificate shall be valid for up to five years.</p> <p>The Green Building Council of Australia will list relevant standards or eco labels as these become available, on the Green Building Council of Australia website.</p>
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Note: An auditor verification guidance document is available on the Green Building Council of Australia website, this document provides the means by which the auditor is to establish compliance.

Reused PVC

Reused PVC is defined as PVC products pre-existing in a building or fitout, or PVC products procured from a second hand source. Reused PVC product sources may include, but are not limited to second hand retailers, removalists, auction houses, and demolition works from previous sites.

Reused PVC products may be excluded from documentation in this credit.

Recycled content in PVC products

Products containing recycled PVC content shall be documented in the credit and comply with the Best Practice Guidelines as even PVC products with high recycled content require some virgin PVC in their production. Claims of recycled content in such products by suppliers or manufacturers must be independently verified. This requirement is incorporated in the Best Practice Guidelines for PVC in the Built Environment.

PVC Schedule

For Green Star submissions, the percentage (by cost) of PVC products addressed by this credit and installed in the building, shall be demonstrated using the following PVC schedule template. Project teams should enter the type of product(e.g. pipe), supplier name, indication of compliance, type of compliance documentation provided, reference to compliance documentation attachments and quantities of each product into the PVC schedule. At the bottom of the PVC schedule, project teams must add up all of the line item costs of the compliant and non-compliant products as well as the combined total costs of all PVC products listed in the schedule. The percentage of PVC products that comply with the Best Practice Guidelines for PVC must be at least 60% to achieve one point and at least 90% to achieve two points.

Documentation requirements

‘Design review’ Submission (Optional)

Project teams are to submit information/documentation marker with an asterisk* for ‘Design review’

As Built Submission

All project teams are to submit the following documentation:

Submission Template*

- Total mass of steel used in the building
- Details of steel that has been sourced from a responsible steel maker*
- Details of steel that have been supplied by a responsible steel fabricator*
- Completed timber schedule*
- Completed PVC schedule*

Project teams are required to provide documentation supporting credit compliance. The following documents may be used to demonstrate compliance:

- **Structural drawings**
- **Structural Specifications**
- Steel Producer’s **ISO14001 certificate**
- Details of **Steel Fabricators membership of ASI Environmental Sustainability Charter**
- **Product data sheets**
- **Invoices** confirming types of timber or PVC products
- **Bill of Quantities / Report** from Quantity Surveyor / Cost Planner / Project Manager or other qualified professional

Please provide your feedback on the technical content of this credit: