

Building
a sustainable
future



Fitout calculators Guide v1

October 2012

changelog

Version	Release Date	Description of Changes
DRAFT	October 2010	Issued for public comment
1	October 2011	First issue following implementation of the Fitout Calculators
2	May 2012	Editorial changes throughout as well as clarification on documentation of walls and ceilings under the assemblies calculator
3	October 2012	Changes to the definition of flooring to include flooring installed as part of make good processes by a building owner. Changes to the definition of re-used items to include items make good processes by a building owner.



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1. Introduction

The Furniture, Assemblies and Flooring credits in Green Star rating tools are collectively referred to as Fitout Calculators. Fitout Calculators address the environmental impact and characteristics of furniture, assemblies and flooring used in building projects or interior fitouts, through the application of five criteria. Information about these items is recorded in these Fitout Calculators. A completed Fitout Calculator must be provided as part of the required documentation for the corresponding Green Star credits.

The points available for each Fitout Calculator are determined by the 'Credit Criteria' specific to the corresponding Green Star credit in each Green Star rating tool.

About this guide

This guide explains how to use the Fitout Calculators as well as how to prepare the relevant documentation for Green Star submissions.

- Section two provides an overview of documentation requirements and an example of a completed Fitout Calculator.
- Sections three to six explain how to use the furniture, assemblies and flooring Fitout Calculators.
- All Fitout Calculators give scores to fitout items based on the following five criteria:
 - 1) Re-used
 - 2) Certified product
 - 3) Product stewardship
 - 4) Re-used, recycled, or certified content
 - 5) Manufacturer ISO 14001 certification.

Section seven describes the five assessment criteria in detail

- Section eight explains how Fitout Calculators convert the scores for fitout items into Green Star points. This method is common to all Fitout Calculators. A completed example calculation is provided using the furniture Fitout Calculator.

Item Score

Through assessment against the calculator's five criteria an item score is generated for each fitout item entered. Table 1 details the variety of item scores which result from the many combinations of compliance to the five criteria. The shaded field represent criteria that are not available where products are re-used or certified by a Green Building Council of Australia recognised product certification scheme. Three of these combinations result in products achieving an item score of 100%.

Criterion 1	Criterion 2	Criterion 3	Criterion 4	Criterion 5	
Re-used	Certified Product	Product Stewardship	Re-used, Recycled, or Certified Content	Manufacturers ISO 14001 Certification	Item Score (%)
Yes					100
No	Level A	No			100
No	Level B	Yes - Leased Product			100
No	Level B	Yes - Purchased Product			85
No	Level C	Yes - Leased Product			80
No	Level B	No			75
No	No certification	Yes - Leased Product	Yes	Yes	70
No	No certification	Yes - Leased Product	Yes	No	60
No	Level C	Yes - Purchased Product			60
No	Level C	No			50
No	No certification	Yes - Purchased Product	Yes	Yes	50
No	No certification	No	Yes	Yes	40
No	No certification	Yes - Purchased Product	Yes	No	40
No	No certification	No	Yes	No	30
No	No certification	Yes - Leased Product	No	No	30
No	No certification	No	No	Yes	10
No	No certification	Yes - Purchased Product	No	No	10

Table 1: Item scores resulting from combination of the five criteria

Documentation requirements vary depending on the criteria claimed, the least amount of documentation is associated with certified products, particularly 'Level A' certified products. Further information related to item score and documentation is provided in subsequent sections of this document.

2. Documentation guidelines

This section outlines the documentation required for Green Star credits that use a Fitout Calculator. An example of a completed Fitout Calculator is also provided.

When a Credit is not applicable

If the material cost of furniture, assemblies or flooring represents less than 0.01% of the project's total contract value, the relevant credit does not apply and is considered 'not applicable'. The points available for that credit are excluded from calculations for the Materials category score.

The project contract value is defined as the dollar value that will be required to complete the works for the entire project, including site works (this may, for example, include base building, fitout, landscaping and external paving). The following must be excluded from the contract value:

- demolition works
- consultants fees, design fees, project management fees
- works outside the site area
- Any works relating to buildings or areas within the site that are not being assessed for purposes of Green Star.

DOCUMENTATION GUIDELINES- NOT APPLICABLE

Submit all the evidence and ensure it confirms that the credit is not applicable.

Statement written by a quantity surveyor or cost planner comparing the total cost of furniture, assemblies, or flooring specified, with the total contract value of the project.

Extracts from the contract that state the project's total value.

Design rating

For a design rating compliance may be documented in one of two methods. The first is where the detailed selection of fitout products and materials is unknown. The second is where the selection of specific products and materials is known. The following describes the required documentation for both cases.

Where specific products and materials selection is unknown:

DOCUMENTATION GUIDELINES - DESIGN RATING

Submit all the evidence and ensure it confirms compliance.

A completed copy of the relevant Fitout Calculator. This must be completed as per the instructions in sections three to six of this guide. All data entered must be based on the project's tender specification. Justified estimates of the number or area of item are to be used.

The project's tender fitout schedule. This must describe all items in the project that are relevant to the submitted credits. Depending on which credits are submitted, all furniture, all assemblies or all flooring in the project may be relevant. The schedule must state the product type and estimated quantity of items.

Extracts from the project's tender specification. These must stipulate how all relevant fitout items will address the criteria that are measured by the Fitout Calculator. For detailed information about these criteria and the documentation required, refer to Section seven. Specifications must not simply reference this guide, or a section of the guide, or Furniture, Flooring or Assemblies credits, but the actual criteria requirements including compliance requirements.

Where products and materials selection is known:

DOCUMENTATION GUIDELINES - DESIGN RATING

Submit all the evidence and ensure it confirms compliance.

A completed copy of the relevant fitout calculator. This must be completed as per the instructions in sections three and four of this guide. Depending on which credits are submitted, all data entered must be based on the project's furniture, assemblies, or flooring tender specification.

The project's tender fitout specification. This must describe all items in the project that are relevant to the submitted Fitout Calculator, including suppliers and product names or brand names. Depending on which Fitout Calculator is submitted, all furniture, all assemblies or all flooring in the project may be relevant. The schedule must state the type and quantity of these items.

Evidence of compliance to the five criteria. Evidence that correlates with data entered in the submitted Fitout Calculator. This evidence is described in Section seven of this document for each of the Fitout Calculators' criteria under the As Built requirement section.

As Built rating

DOCUMENTATION GUIDELINES - AS BUILT RATING

Submit all the evidence and ensure it confirms compliance.

A completed copy of the relevant Fitout Calculator. This must be completed as per the instructions in this guide. All data entered must be based on the project's construction or as-built provisions.

The project's fitout schedule. This must describe all items in the project that are relevant to the submitted Fitout Calculator. Depending on which calculator is submitted, all furniture, all assemblies or all flooring in the project may be relevant. The schedule must state the type and quantity of these items.

Evidence of compliance to the five criteria. Evidence that correlates with data entered in the submitted Fitout Calculator. This evidence is described in Section seven of this document for each of the Fitout Calculators' criteria.

Confirmation from the head contractor or sub contractors that the products listed in the fitout schedule have been installed in the project.

Multiple Building projects

If a project is registered for a Green Star multiple building rating, the above documentation requirements apply. In addition, the documentation must address every building in the project.

When a 'multiple building' project involves buildings with similar fitout components, geometry, construction and size, they can be represented by a 'typical building'. Fitout Calculators and supporting evidence can be provided, for the 'typical building' instead of the group. In this situation, documentation must be submitted that clearly demonstrates:

- which buildings are in the group represented by the 'typical building';
- all buildings in the group have equal or better performance than the 'typical building'.

Completed fitout calculator EXAMPLE

Example 1: Green Star – Furniture Fitout Calculator

The following example shows a completed Fitout Calculator. The method used to determine scores for this example is described in Section eight.

For a project containing 1200 individual furniture items, all items have been entered in this furniture credit Fitout Calculator. The types of furniture items entered are as follows:

Item entry 1: Tenco, Z10 task chairs

Item entry 2: Tenco, Z6 task chairs

Item entry 3: Vandaley Industries, Lisa chairs

Item entry 4: Under the Hammer Auction House, re-used workstations

Item entry 5: Tenco, Live workstations

Item entry 6: Task, Hang On storage units

Item entry 7: Snow Gum Design, 180° Tables

The furniture credit Fitout Calculator has generated an 'item score' for each item entry, based on their performance under the five criteria used by the Fitout Calculators.

The 'overall score' is **86%**.

detail on			Total number of furniture items in the project: 1200		Points Generated: 2.9		Overall score: 86 %	
							Total items documented 1200 items	
			Criterion-1	Criterion-2	Criterion-3	Criterion-4	Criterion-5	
#	Name of Supplier and Brief Description of Item	Total Number of Items	Re-used	Certified Product	Product Stewardship	Re-used, Recycled, or Certified Content	Manufacturers ISO 14001 Certification	Item Score (%)
1	Tenco, Z10 task chair	250		Level C	Yes - Leased Product			80
2	Tenco, Z6 task chair	190		Level B				75
3	Vandaley Industries, Lisa chair	100				Yes		30
4	Under the Hammer Auction House, re-used workstations	160	Yes					100
5	Tenco, Live workstations	180		Level A				100
6	Task, Hang On storage units	200		Level B	Yes - Leased Product			100
7	Snow Gum Design, 180° Tables	120		Level A				100

3. How to use the fitout calculators

This section provides a guide to the three fitout calculators, the furniture, assemblies and flooring, credits, definitions and examples are provided. The steps required to complete the calculators are described, these are:

- Step 1: entering all items in the project.
- Step 2: entering a description of the item's type and the name of the supplier.
- Step 3: entering the total number of items of that type.

Section seven explains the fourth step, which involves entering a response to one or more of the five criteria.

Figure 1 shows the steps to take when using a Fitout Calculator.

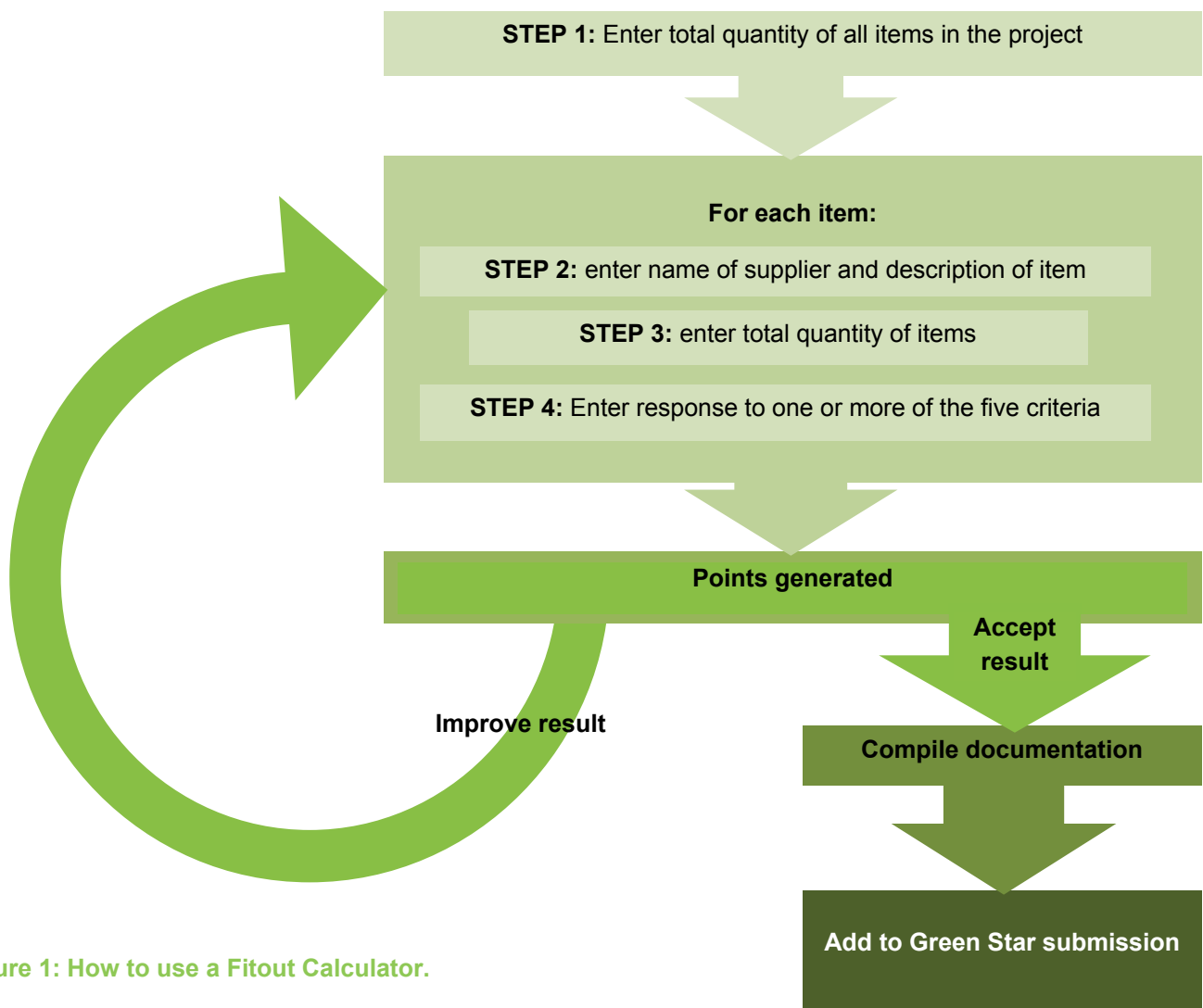


Figure 1: How to use a Fitout Calculator.

4. How to use a furniture fitout calculator

Total quantity of all items

STEP 1: Enter the total number of furniture items in the project. 'Total number of furniture items in the project' is displayed at the top centre of the furniture Fitout Calculator.

Scope and definitions

Furniture items in the project must include all seatings, surfaces, work settings, beds and storage items used within project floor areas that are permanently covered and protected from the elements. Exclusions apply and are listed below.

The following inclusions, exclusions and definitions apply:

- **Seating**
Seating refers to benches, chairs, stools, chaise lounge or other lounges, ottomans, couches, stools and recliners.
- **Surface**
Surface refers to all tables, desks and work settings.
- **Work Setting**
A work setting is a workbench or workstation. A work setting includes both the work surface and the structure supporting the work surface. Storage, shelving and screening elements which form part of the work setting, must be documented along with the work setting, such elements form an integral part of the work setting. Other elements attached to the work setting, such as paper trays or other shelves or monitor arms are excluded.
- **Storage unit**
Storage unit refers to filing cabinets, stationery cabinets, compactus units, tambour cabinets, wardrobes, lockers, dressers, closets, chests, bookcases and pantries. This only includes items which are purchased 'off-the-shelf', whether they are assembled offsite or onsite.
- **Exclusions**
 - Electrical appliances;
 - Custom made storage units are assessed under the Assemblies Fitout Calculator as joinery.

Name of supplier and brief description of item

STEP 2: Enter the name of supplier, the product's brand name and type, in the column called 'Name of Supplier and Brief Description of Item'. One entry may represent a single furniture item or a group of similar furniture items. Each entry must represent furniture that is sourced from the same supplier.

For reused items, in compliance with Criterion 1, enter "re-used tables" or "re-used chairs" etc.

For projects applying for a Green Star – Design rating

If the supplier has not been specified, enter a brief description of the item type.

If the supplier has been specified, enter the supplier's name, followed by the item description.

If various components of an item are sourced from different suppliers, the item entry must include all suppliers' names, followed by a brief description of the item.

For projects applying for a Green Star – As Built rating

Enter the supplier's name and the product name followed by a brief description of the item.

If various components of an item are sourced from different suppliers, the item entry must include all suppliers' names, followed by a brief description of the item.

Example 2: Name of supplier and brief description of item

This is an example of how the 'Name of Supplier and Brief Description of Item' column may look when completed for three furniture items. Data entered is in blue text.

- 'Lisa Chair' supplied by 'Vandaley Industries'
- Reused workstations are supplied by 'Under the Hammer Auction House'
- Workstations made up of 'Funky' table tops supplied by 'Superb Surfaces' and 'Sturdy' table legs supplied by 'Legs Eleven Inc'

#	Name of Supplier and Brief Description of Item
1	Vandaley Industries, Lisa chair
2	Under the Hammer Auction House, Re-used workstations
3	Workstations: Superb Surfaces, Funky table top; Legs Eleven Inc., Sturdy table legs

Total number of each item

STEP 3: Enter information in the column called 'Total Number of Items'. A total must be entered for each item listed in a Furniture Calculator.

Please note the following rules:

- Chairs which are joined together, such as theatre or auditorium seating, must be counted as one chair for every seat.
- A work setting designed to accommodate more than one user must be counted as one work setting per user.

Response to the five criteria

STEP 4: Enter information about an item type under one or more of the five criteria columns. Please refer to Section seven for further information about the five criteria.

5. How to use an assemblies fitout calculator

Total quantity of all items

STEP 1: Enter the total area of assembly items in the project in square metres. The following sections define which items are relevant and the method for calculating the area of assembly items.

'Total Area of Assembly Items in the Project' is displayed at the top centre of each assemblies Fitout Calculator.

Scope and definitions

Assemblies items in the project must include all internal walls, partitions, ceilings and joinery used within project floor areas that are permanently covered and protected from the elements. Exclusions apply and are listed below.

The following inclusions, exclusions and definitions apply:

- Internal walls and partitions
Internal walls and partitions are non-load bearing space dividers that are not part of the building envelope.
- Joinery
Joinery refers to the following items, which must be custom made:

Toilet partitions; shower partitions including shower screens; doors; bench seats; vanities; lockers; kitchens; laundry cupboards; shelving units; bumper rails; decorative trim; built-in wardrobes; cupboards; and internal stairs.
- Ceilings
Ceilings only include suspended ceilings. Reference to ceilings in the fitout calculators relates to the face material only, not the grid and other components of the suspended ceiling.
- Exclusions
 - Wall coverings, such as ceramic tiles, paint, vinyl and textile, are excluded from assessment under the assemblies calculator.
 - Some wall components are excluded, this includes the studs, insulation, skirting and cornices. Hardware such as light switches is also excluded from the assessment of internal walls
 - Storage units that are 'off-the-shelf' items are excluded from the Assemblies Fitout Calculator. These are assessed under the furniture Fitout Calculator as storage units.

Name of supplier and brief description of item

STEP 2: Enter the name of supplier, the product's brand name and type, in the column called 'Name of Supplier and Brief Description of Item'. One entry may represent a single assemblies item or a group of similar assemblies items. Each entry must represent assemblies sourced from the same supplier.

For reused items, in compliance with Criterion 1, enter "re-used storage units" or "re-used shelving unit" etc.

For projects applying for a Green Star – Design rating

If the supplier has not been specified, enter a brief description of the item type.

If the supplier has been specified, enter the supplier's name, followed by the item description. If various components of an item are sourced from different suppliers, the item entry must include all suppliers' names, followed by a brief description of the item.

For projects applying for a Green Star – As Built rating

Enter the supplier's name and the product name followed by a brief description of the item.

If various components of an item are sourced from different suppliers, the item entry must include all suppliers' names, followed by a brief description of the item.

Refer to Example 1 in Furniture Fitout Calculator.

Total area of each item

STEP 3: Enter information in the column called 'Total Number of Items'. A total must be entered for each item listed in an Assemblies Fitout Calculator. See inclusions and exclusions above.

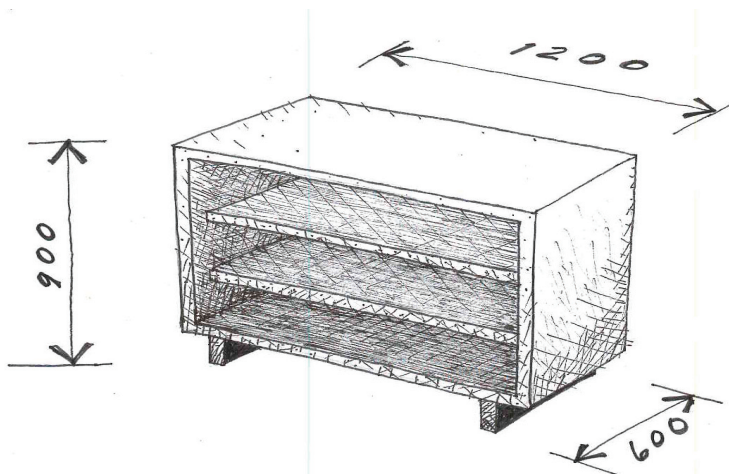
Definition of area

For the purposes of the Assemblies Fitout Calculator, the area of an assembly item is defined as:

- Area of ceilings = area shown in ceiling plan.
- Area of walls, partitions and joinery = the total length of the item multiplied by its total height as shown in example 3.

Example 3: calculating an assembly item area – Assemblies Fitout Calculator

A rectangular shelving unit is 900mm high and 1200mm wide.



The area of the shelving unit = 1.2m x 0.9m = 1.08m²

Response to the five criteria

STEP 4: Enter information about an item type under one or more of the five criteria columns. Please refer to Section seven for further information about the five criteria.

6. How to use a flooring fitout calculator

Total quantity of all items

STEP 1: Enter the total area of flooring items in the project in square metres. The following sections define which items are relevant and the method for calculating the area of flooring items.

'Total Area of Flooring Items in the Project' is displayed at the top centre of each flooring Fitout Calculator.

Scope and definitions

Flooring items in the project must include all internal exposed concrete and internal floor coverings used within project floor areas that are permanently covered and protected from the elements. Exclusions apply and are listed below.

The following inclusions, exclusions and definitions apply:

- Floor covering
Floor covering refers to fixed, supported, or floating flooring and includes: carpet, flooring underlay, timber, resilient flooring, hard flooring and exposed concrete.

Exposed concrete is an area of concrete floor surface that is uncovered, this may be polished or sealed as needed.

Flooring underlay must be counted as a separate item to the floor coverings. The area of underlay must be counted separately to the area of a floor covering.

Flooring includes those installed by a building owner as part of a tenancy make good processes prior to prior to fitout works by the tenant.

- Wall covering
In some cases flooring materials such as vinyl and tiles are used as a wall covering, these materials should also be documented in the Flooring calculator.
- Exclusions:
Rugs, sealants and paint finishes are excluded from assessment. Floor coverings in car parks and plant rooms are also excluded.

Name of supplier and brief description of item

STEP 2:

Enter the name of supplier, the product's brand name and type, in the column called 'Name of Supplier and Brief Description of Item'. One entry may represent a single flooring item or a group of similar flooring items. Each entry must represent flooring that is sourced from the same supplier.

For reused items, in compliance with Criterion 1, enter "re-used carpet floor" or "re-used underlay" etc.

For projects applying for a Green Star – Design rating

If the supplier has not been specified, enter a brief description of the item type.

If the supplier has been specified, enter the supplier's name, followed by the item description. If various components of an item are sourced from different suppliers, the item entry must include all suppliers' names, followed by a brief description of the item.

For projects applying for a Green Star – As Built rating

Enter the supplier's name and the product name followed by a brief description of the item.

If various components of an item are sourced from different suppliers, the item entry must include all suppliers' names, followed by a brief description of the item.

Refer to Example 1 in Furniture Fitout Calculator.

Total area of each item

STEP 3: Enter information in the column called 'Total Area of Items'. A total must be entered for each item listed in a Flooring Fitout Calculator.

Enter the total area in square metres for each type of internal flooring type including the area of:

- flooring
- underlay separately to the area of floor finishes
- exposed concrete floor surfaces.

Definition of area

For the purposes of a flooring Calculator, the area of a flooring item is the area shown in plan view. The plan view is a two dimensional drawing of an object showing how it would look from above.

Example 4: Total area of items

This is an example of how the 'Total Number of Items' column will look when completed for three flooring items:

- 1100m² of Greentuft carpet supplied by Co-Name
- 1100m² of Sofffriendly underlay supplied by Underlay Experts
- 750m² of exposed concrete floor.

#	Name of Supplier and Brief Description of Item	Total Area of Items
1	Co-Name, Greentuft carpet	1100
2	Underlay Experts, Sofffriendly underlay	1100
3	Existing, exposed concrete floor	750

Response to the five criteria

STEP 4: Enter information about an item type under one or more of the five criteria columns. Please refer to Section seven for further information about the five criteria.

7. The five criteria

The fourth step when completing the Fitout Calculator is to enter a response to the following five criteria for each item type:

- 1) Re-used.
- 2) Certified product.
- 3) Product stewardship.
- 4) Re-used, recycled, or certified content.
- 5) Manufacturer ISO 14001 certification.

Positive responses to any of the five criteria add to an 'item score'. A high item score indicates preferred environmental attributes.

It is possible to respond to more than one criterion; however, it is not necessary to respond to all five criteria.

The maximum item score is 100%. The following sections explain how responses must be entered and documented for each of the five criteria.

Criterion 1: re-used

How to enter an item as re-used

- Select **Yes** for items that are re-used.
- Select **No** (or leave blank) for all other items.

For flooring, also select **Yes** for areas of exposed concrete floor, as defined in 'Scope and definitions' in Section six.

Item score

- Selecting **Yes** adds **100%** to the item score.

Definition of re-used items

For the purposes of the Fitout Calculators, re-used items include items:

- purchased from a second-hand retailer, such as an auction house.
- that were used on the current site by a previous occupant or installed by a building owner as part of make good processes prior to fitout works by the tenant.
- relocated to the site from the new tenant's, or occupant's, previous fitout or building.

For a product to be classified as 'Re-used' at least 80% by area, length, volume or mass of the item must be retained (the metric chosen must be justified); the rest can be refurbished or new, as in the case of new upholstery, foam, paint, laminate, etc.

For flooring, areas of exposed concrete are rewarded under Criterion 1: Re-used.

Documentation requirements

DOCUMENTATION GUIDELINES - DESIGN RATING

Submit all the evidence and ensure it confirms compliance.

Re-used items

An extract from the specification, stipulating that the items are re-used and that any substitutes for these items must also be re-used.

Exposed concrete (for Flooring Fitout Calculator only)

Written statement from the architect or interior designer confirming that the 'exposed concrete' area entered in the Flooring Fitout Calculator will be provided without any floor covering.

OR

Tender or as-built drawings that clearly indicate the area of exposed concrete. These must correlate with the 'exposed concrete' area entered in the Flooring Fitout Calculator.

DOCUMENTATION GUIDELINES - AS BUILT RATING

Submit all the evidence and ensure it readily confirms compliance.

Re-used items

A furniture/assemblies/flooring schedule showing clearly that the items are re-used.

Supporting evidence that demonstrates that the items are re-used. Evidence must take the following forms:

For products purchased from a second-hand retailer:

- Purchase receipts, removalist's inventory or delivery receipts.

For products that were used on the current site by a previous tenant or occupant:

- A statement from the interior designer or architect declaring that the items were in use onsite prior to the project works and that they have now been re-installed onsite.

For products installed by a building owner as part of make good processes prior to fitout works by a tenant

- Receipts for the item dated prior to commencement of fitout works by the tenant

For products relocated to the site from the new tenant's, or occupant's, previous fitout or building:

- Removalist's inventory from the previous location.
- OR Furniture/Assemblies/Flooring inventory from the previous fitout showing clearly the items that have been re-used in the new fitout.

Exposed concrete (for Flooring Fitout Calculators only)

Written statement from the architect confirming that the 'exposed concrete' area entered in the Flooring Fitout Calculator has been provided without any floor covering.

OR

As-built architectural drawings that clearly indicate the area of exposed concrete. These must correlate with the 'exposed concrete' area entered in the Flooring Fitout Calculator.

Criterion 2: Certified products

How to enter certified products

- Select **Level A** for items that are certified by a product certification standard that is recognised as Level A by the Green Building Council of Australia.
- Select **Level B** for items that are certified by a product certification standard that is recognised as Level B by the Green Building Council of Australia.
- Select **Level C** for items that are certified by a product certification standard that is recognised as Level C by the Green Building Council of Australia.
- Select **No** (or leave blank) for all other items.

Item score

- Selecting **Level A** adds **100%** to the item score.
- Selecting **Level B** adds **75%** to the item score.
- Selecting **Level C** adds **50%** to the item score.

Definition of certified products

For the purposes of the Fitout Calculators, certified products are items certified by a product certification standard recognised by the Green Building Council of Australia as being compliant with the Green Building Council of Australia's '[Assessment Framework for Product Certification Schemes](#)'. A List of recognised product certification standards can be found on the Green Building Council of Australia [website](#). Product certification standards are recognised at Level A, B or C. Further product certification schemes may apply for recognition.

Where at least 90% of an item's total mass is certified to a Green Building Council of Australia recognised standard, the whole item can be entered as a certified product at Level A, B or C.

An item with at least 90% of its total mass made from components that are certified to different levels of recognised standards may be entered as a certified product. However, the certification level of the component achieving the lowest level of recognition must be entered for the entire item.

Documentation requirements

DOCUMENTATION GUIDELINES - DESIGN RATING

Submit all the evidence and ensure it confirms compliance.

An extract from the specification, stipulating that the items are certified by a Green Building Council of Australia recognised product certification standard at the level entered in the Fitout Calculator.

An extract from the specification, stipulating that any substitutes for these items must be certified to a Green Building Council of Australia recognised standard at the same recognition level.

DOCUMENTATION GUIDELINES - AS BUILT RATING

Submit all the evidence and ensure it confirms compliance.

A copy of the certification licence(s) for the items issued by the scheme. The licence and recognition of the certification standard must be current at the time of the installation of the item in the fitout. The certification standard must be recognised by the Green Building Council of Australia at the level entered in the Fitout Calculator.

Criterion 3: Product stewardship

How to enter product stewardship

- Select **Yes – Leased Item** for leased items with a product stewardship contract.
- Select **Yes – Purchased Item** for purchased items with a product stewardship contract.
- Select **No** (or leave blank) for all other items.

Item score

- Selecting **Yes – Leased Item** adds **30%** to the item score.
- Selecting **Yes – Purchased Item** adds **10%** to the item score.

Definition of product stewardship

Product stewardship is a product-centred approach to environmental protection. It requires all parties involved in a product's life cycle to share responsibility for that product's environmental impacts. These parties include product manufacturers, suppliers and users.

Product stewardship is demonstrated in the form of product stewardship contracts. An example of a compliant product stewardship contract can be downloaded from the Green Building Council of Australia [website](#).

Leased items with a product stewardship contract

For the purposes of the Fitout Calculators, a product stewardship contract for a leased item is a contractual agreement between the supplier and the occupant/ tenant. The supplier agrees to collect the item when it is no longer needed by the occupant/tenant, for re-lease, re-use or recycling.

Purchased items with a product stewardship contract

For the purposes of the Fitout Calculators, a product stewardship contract for a purchased item is a contractual agreement between the manufacturer/supplier and the occupant/tenant. The manufacturer/supplier agrees to collect the item when it is no longer needed by the occupant/tenant, for re-use or recycling.

Exemptions related to limitations of timing of product return, or minimum quantity of product to be accepted, stipulated in the product stewardship contract, must not be made.

Documentation requirements

DOCUMENTATION GUIDELINES - DESIGN RATING

Submit all the evidence and ensure it confirms compliance.

Leased items:

An extract from the specification, stipulating that the items will be leased under an agreement that includes a product stewardship contract.

Purchased items:

An extract from the specification, stipulating that the items will be purchased under an agreement that includes a product stewardship contract.

DOCUMENTATION GUIDELINES - AS BUILT RATING

Submit all the evidence and ensure it confirms compliance.

Leased items:

A copy of the product stewardship contract. This must show that the items have been leased by the building occupant or tenant under an agreement that includes a product stewardship contract.

Purchased items:

A copy of the product stewardship contract. This must show that the items have been purchased by the building occupant or tenant under an agreement that includes a product stewardship contract.

Criterion 4: re-used, recycled or certified content

How to enter re-used, recycled or certified content

- Select **Yes** for items where at least 40% of the item's mass consists of any combination of the following:
 - re-used components
 - independently verified recycled content
 - components certified by a product certification standard recognised by the Green Building Council of Australia
 - timber components that are certified by a forest certification scheme recognised by the Green Building Council of Australia
- Select **No** (or leave blank), for all other items.

Item score

- Selecting **Yes** adds **30%** to the item score.

Definition of re-used components

The definitions and guidance provided in Section seven\Criterion 1: 'Re-used' apply to the re-used components.

Definition of recycled content

For the purposes of the Fitout Calculators, recycled content is material that has been diverted from landfill. Materials such as rework, regrind, or scrap, generated in a manufacturing process and capable of being reclaimed within the same process that generated it, are not considered recycled.

To be recognised as recycled content, evidence of independent verification must be provided from a qualified environmental auditor. The auditor must have 'Environmental Auditor' certification issued by RABQSA or equivalent. Equivalents to RABQSA include the International Registry of Certified Auditors (IRCA). Please note that Provisional Auditor grade will not be accepted.

For further information about RABQSA Environmental Auditor qualifications, please refer to the 'Find a Professional' section of the RABQSA [website](#).

Independent verification of recycled content requires a signed letter from the qualified environmental auditor confirming the manufacturer's claimed percentage of recycled material content in the product. This letter must include an expiry date 12 months from the date of issue.

For products that have been manufactured for at least 12 months, this verification must be based on documentation of inputs of recycled material content in the product production over the past 12 months, as well as projected 12-month material inputs.

For products that are new in the market (i.e. less than 12 months), this verification must be based on documentation of inputs of recycled material content in the product production over at least 3 months, as well as projected 12 months material inputs.

When documenting material inputs, the auditor must ensure that records of supply of recycled and virgin material are kept, and substantiate the manufacturer's claimed recycled content in the item. Material inputs must be measured by weight.

Definition of certified components

For the purposes of the Fitout Calculators, certified components are defined as:

- timber and timber products that are 'chain of custody' certified by a Green Building Council of Australia recognised forest certification scheme.
- item components that are certified by a [product certification scheme](#) recognised by the Green Building Council of Australia.

Chain of custody

Evidence of chain of custody certification must demonstrate a complete chain of custody from the forest, through the supply chain, to the building project.

Guidelines for demonstrating a complete chain of custody are set by forest certification schemes. When documenting chain of custody for timber products, chain of custody requirements developed by Green Building Council of Australia recognised forest certification schemes must be followed.

Green Building Council of Australia recognised product certification standards

Section seven under criterion 2 details how products certified against the product certification standards recognised by the Green Building Council of Australia are awarded points differently for Level A, B or C certification in Criterion 2 (Certified Products). However, for Criterion 4, content certified to level A, B and C is rewarded equally.

Refer to Criterion 2 for further details about the product certification standards recognised by the Green Building Council of Australia.

Green Building Council of Australia recognised forest certification schemes are listed in Table 2.

Forest certification scheme	Chain of custody guidelines
Forest certification schemes accredited by the Forest Stewardship Council International (FSC)	FSC Guidelines
Forest certification schemes accredited by the Programme for Endorsement of Forest Certification Schemes (PEFC)	Individual Scheme Guidelines

Table 2: Forest certification schemes recognised by the Green Building Council of Australia

Please refer to the ['Revised Timber credit' page](#) on the Green Building Council of Australia website for further information including relevant links.

Documentation requirements

DOCUMENTATION GUIDELINES - DESIGN RATING

Submit all the evidence and ensure it confirms compliance.

An extract from the specification, stipulating that at least 40% of the item's mass is re-used, recycled, or certified by a forest or product certification scheme recognised by the Green Building Council of Australia.

An extract from the specification, stipulating that any substitutes for these items must also have at least 40% of their mass made from content that is re-used, recycled, or certified by a forest or product certification scheme.

Specification extracts must include commitments to provide independent verification for all products with recycled content.

DOCUMENTATION GUIDELINES - AS BUILT RATING

Submit all the evidence and ensure it readily confirms compliance.

For all items with at least 40% re-used, recycled, or certified content:

Calculations showing how the proportion of re-used, recycled, or certified content was derived.

An example of acceptable calculations is shown below. A uniform method of measurement and calculation must be applied to all items documented for this criterion. The method of calculation must include the following information:

- All components in the item.
- Mass of each component.
- Mass of re-used, recycled, or certified content in each component.
- Percentage of re-used, recycled, or certified content for an item.

For each re-used component:

Supporting evidence that clearly demonstrates the components are re-used. Evidence must follow the documentation requirements detailed in Section seven Criterion 1: Re-used.

For recycled content:

Supporting evidence that clearly demonstrates the item's content is recycled. Evidence must take the following forms:

- Manufacturer's or supplier's declaration of the mass of recycled content in the item.
- Qualified auditor confirmation, providing independent verification of the mass of recycled content in the item. Confirmation that the auditor has 'Environmental Auditor' certification issued by RABQSA or equivalent current at the time of project registration, Provisional Auditor grade will not be accepted.

For all components certified by a product certification scheme:

A copy of the product certification license for the component. This must be current at the time of project submission or registration and must be issued in accordance with a Green Building Council of Australia recognised certification standard as level A, B or C.

For all timber products sourced from a Green Building Council of Australia recognised certified forest management operation: Chain of custody evidence.

Calculating re-used, recycled, and certified content

Example 5 shows how to calculate the proportion of re-used, recycled and certified content for a workstation made from several components.

Example 5:

Each 'Live' workstation from UpTown Furniture' is made up of the following four components:

1. Worktop made from timber that has a chain of custody certification from a forest certification scheme.
100% of the worktop's mass is counted towards re-used, recycled, or certified content calculations.
2. New aluminium frame with no recognised documentation to show that it contains re-used, recycled or certified content.
0% of the frame's mass is counted towards re-used, recycled or certified content calculations.
3. Polymer screens supplied as part of each workstation, containing 20% independently verified recycled content.
20% of the screen mass is counted towards re-used, recycled or certified content calculations.
4. Storage unit as part of each workstation, certified by a GBCA-recognised product certification scheme.
100% of the storage component's mass is counted towards re-used, recycled or certified content calculations.

Criterion 4: Re-used, recycled and certified content calculation				
UpTown Furniture's 'Live' workstation				
All components	Material	Mass (kg)	Re-used, recycled, or certified content	Mass of re-used, recycled, and certified content(kg)
worktop	timber	8	Yes	8
frame	aluminium	6.5	-	-
screens	polymer	9	Yes	1.8
storage unit	steel	9	Yes	9
TOTAL:		32.5		18.8
TOTAL PERCENTAGE OF RE-USED, RECYCLED, OR CERTIFIED CONTENT: (18.8kg/32.5kg)			58%	

58% of the 'Live' workstation mass is re-used, recycled, or certified content. This exceeds the requirement of minimum 40% mass. Therefore, UpTown Furniture's 'Live' workstation can be entered as containing re-used, recycled, or certified content.

Criterion 5: Manufacturer ISO 14001 certification

How to enter an item with Manufacturer ISO 14001 Certification

- Select **Yes** for items that have at least 90% of the mass of their total content sourced from manufacturing facilities that are certified to ISO 14001.
- Select **No** for all other items.

Item score

- Selecting **Yes** adds **10%** to the item score.

Definitions

ISO 14001 certification

An ISO 14001 certification is a management tool designed to help an organisation administer and control its environmental impact and compliance with regulations. ISO 14001 does this by helping to develop and implement policies, objectives and processes.

Compliant ISO 14001 certification

To be recognised for this criterion the ISO 14001 certified Environmental Management System (EMS) must address the following aspects:

- Waste minimisation
Document the waste disposal and recycling rates of all waste generated from the product manufacturing process and ensure these are measured, reviewed and reported, at least once every three months.
- Energy
Document energy consumption of the product manufacturing process and ensure this is measured, reviewed and reported, at least once every three months.
- Emissions
Document liquid emissions from the product manufacturing process, and ensure these are measured, reviewed, and reported, at least once every three months.
- Materials minimisation
Document product material inputs including packaging, and ensure these are measured, reviewed and reported, at least once every three months.

Aspect

The term 'aspect' is used in ISO 14001 to describe an area of environmental impact.

Manufacturer

For the purposes of the Fitout Calculators, this is the maker who delivers a finished product. If there are several key manufacturers for a given product, ISO 14001 certification will be required from each manufacturer. This does not include parties who process or extract raw materials e.g. foresters, miners, etc.

Manufacturing facility

For the purposes of this criterion, a 'manufacturing facility' is where product components are manufactured from raw materials, whilst the final product may be assembled in this facility, a manufacturing facility is not the same as the warehousing or assembly only facility.

Documentation requirements

DOCUMENTATION GUIDELINES - DESIGN RATING

Submit all the evidence and ensure it readily confirms compliance.

Items provided from ISO 14001 certified manufacturing facilities:

- An extract from the specification, stipulating that the items will be manufactured in facilities that are certified to ISO 14001.
- An extract from the specification, stipulating that any substitutes for these items must also be manufactured in facilities that are certified to ISO 14001.

DOCUMENTATION GUIDELINES - AS BUILT RATING

Submit all the evidence and ensure it readily confirms compliance.

Items provided from ISO 14001 certified manufacturing facilities:

A schedule of product components that includes:

- each component's weight.
- confirmation of whether or not each component is sourced from manufacturing facilities that are ISO 14001 certified.
- reference to the following supporting documentation: A signed statement by the auditor of the ISO 14001 certified manufacturing facility stating what facility is covered in the certification and whether the certification includes consideration of materials minimisation, emissions, energy and waste minimisation requirements of this criterion.

8. Points calculation

This section describes the processes used to calculate the number of Green Star credit points generated in the Fitout Calculators. An example of a completed Fitout Calculator is provided. The example is accompanied by the equations used to arrive at the estimate of 'Points Generated'. The process used can be described as follows:

- a) calculating the 'item score'
- b) calculating the 'weighted item score'
- c) calculating the 'overall score'
- d) calculating the 'points generated'.

Item score

Table 3 lists the scores for different responses to the five criteria and their contribution to an item score. The maximum item score possible is 100%.

Criterion	Response	Contribution to item score
Criterion 1 Re-used item (Exposed concrete for Flooring Fitout Calculator)	Yes	100%
Criterion 2 – not available if criterion 1 is claimed Certified product	Level A	100%
	Level B	75%
	Level C	50%
Criterion 3 – not available if criterion 1 or Level A certified product are claimed Product stewardship	Yes – Leased Item	30%
	Yes – Purchased Item	10%
Criterion 4 – not available if criterion 1 or 2 are claimed Re-used, recycled, or certified content	Yes	30%
Criterion 5 – not available if criterion 1 or 2 are claimed Manufacturers ISO 14001 certification	Yes	10%

Table 3: Score contributions for responses to the 5 criteria

Weighted item score

A weighted score is calculated for each item by multiplying the item score with the quantity of that item. The weighted item score is not displayed in the calculator.

Example 6: weighted item score

'Lisa' chairs from Vandaley Industries generate an item score of 70%.

'Total number of items' for 'Lisa' chairs from Vandaley Industries = 120.

Item impact = 70% x 120 = 84

Overall score

The overall score is calculated by adding all the weighted item scores in the calculator and dividing them by the total quantity of relevant items in the project. The overall score is calculated as follows:

$$\text{Overall score} = \frac{\text{Total of all weighted item scores}}{\text{Total quantity of relevant items in the project}}$$

Credit Points generated

The number of 'Points Generated' is calculated based on the overall score. This number is displayed in the 'Points Generated' field at the top of the calculator. The number of points available varies for each Fitout Calculator and is defined in the 'Credit Criteria' for the relevant Green Star credit.

The Overall score required in each calculator to achieve full credit points is 90%. Where more than 1 point is available the overall score determines the points generated as follows:

$$\text{Points Generated} = \frac{\text{Overall Score}}{90} \times \text{Number of points available}$$

A 90% overall score will generate full points in any of the fitout calculators. An overall score greater than 90% will not generate additional points. Where the overall score is lower than 90%, points are awarded as a percentage of the points available. The final score is rounded to include one decimal point.

Example of points calculation

Example 7: Green Star – Furniture Fitout Calculator

Step 1: Calculating the item score

- Item entry 1: 'Z10' task chairs **item score = 80%**
- Item entry 2: 'Z6' task chairs **item score = 75%**
- Item entry 3: 'Lisa' chairs **item score = 30%**
- Item entry 4: re-used workstations **item score = 100%**
- Item entry 5: 'Live' workstations **item score = 100%**
- Item entry 6: 'Hang On' storage units **item score = 100%**
- Item entry 7: '180⁰' tables **item score = 100%**

These item scores must appear in the 'item score' column at the far right of the calculator.

Step 2: Calculating the overall score

- Item entry 1: 'Z10' task chairs **weighted item score = 80% x 250 = 200**
- Item entry 2: 'Z6' task chairs **weighted item score = 75% x 190 = 142.5**
- Item entry 3: 'Lisa' chairs **weighted item score = 30% x 100 = 30**
- Item entry 4: re-used workstations **weighted item score = 100% x 160 = 160**
- Item entry 5: 'Live' workstations **weighted item score = 100% x 180 = 180**
- Item entry 6: 'Hang On' storage units **weighted item score = 100% x 200 = 200**
- Item entry 7: '180⁰' tables **weighted item score = 100% x 120 = 120**

Total of weighted scores = 200 + 142.5 + 30 + 160 + 180 + 200 + 120 = 1,032.5

Overall score = 1032/1200 = 86%

'86' will appear in the 'overall score' field at the top right of the Furniture Fitout Calculator.

Step 3: Calculating the points generated

- The points generated in a Fitout Calculator are determined by the overall score, in this example, **3 points are available.**
 - **The points generated therefore = $(86/90) \times 3 = 2.9$**
 - The 'Points Generated' will not automatically be recognised by the GBCA, the requirements of Section two, and documentation requirements, Section seven, must be submitted.
-

Possible Innovation

- A fitout where at least 90% of all flooring, assemblies and furniture are re-used and documented as such in the relevant fitout calculators

Total number of furniture items in the project:			1200		Points Generated:		2.9		Overall score:		86 %	
									Total items documented		1200 items	
#	Name of Supplier and Brief Description of Item	Total Number of Items	Criterion-1 Re-used	Criterion-2 Certified Product	Criterion-3 Product Stewardship	Criterion-4 Re-used, Recycled, or Certified Content	Criterion-5 Manufacturer's ISO 14001 Certification	Item Score (%)				
1	Tenco, Z10 task chair	250		Level C	Yes - Leased Product			80				
2	Tenco, Z6 task chair	190		Level B				75				
3	Vandaley Industries, Lisa chair	100				Yes		30				
4	Under the Hammer Auction House, re-used workstations	160	Yes					100				
5	Tenco, Live workstations	180		Level A				100				
6	Task, Hang On storage units	200		Level B	Yes - Leased Product			100				
7	Snow Gum Design, 180° Tables	120		Level A				100				