


<b>Author</b>	EnviroSpec Verification Services
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<b>Validity</b>	Updated on 26/02/2015– Valid only for the following Green Star NZ tools: <ul style="list-style-type: none"> <li>- Office 2009</li> <li>- Interiors 2009</li> <li>- Education 2009 + V3</li> <li>- Industrial 2009</li> <li>- Homestar</li> </ul>
<b>Client</b>	Forman Building Systems
<b>Product name</b>	Armstrong RH99 Dune Ceiling Tiles
<b>Product description</b>	<p>Armstrong RH99 Dune (including Dune Max) is a medium absorption acoustic ceiling panel for suspended ceiling grid which combines acoustics and a fine texture visual. This product is GreenTag Green Rate Level A certified as well as Low VOC and low formaldehyde as tested by CETEC laboratories based on Greenguard standards and combines HumiGuard Plus no sag performance with BioBlock paint to inhibit surface growth of mold and mildew.</p> 

Manner in which the product may contribute towards points in Green Star NZ	Legend of Symbols in EnviroSpec
• Products must meet specific criteria (e.g. Paint VOC emissions, carpets, etc)	✓
• Products may help achieve points by their very nature, if they are specified and included in the design in accordance with Green Star NZ requirements (e.g. bicycle racks)	●
• Products may help achieve an outcome but they must be used in a specific manner (e.g. lighting control and zoning systems) <b>OR</b> This product can contribute towards the outcome but many other products or factor influence that same outcome (E.g. Potable Water Calculator)	○

## Disclaimer

### Please read this carefully

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The information presented in this report is valid for the Green Star® NZ tools nominated herein only. As and when the NZGBC brings out new Green Star® NZ tools, the information may require updating. EnviroSpec will only update information in this report upon receiving written consent from the Manufacturer, Supplier or upon request from the NZGBC. **It is the responsibility of the reader to check for regular updates.**

Green Star NZ tool	Credit category	Points available <sup>1</sup>	Contribution symbol	Contribution Potential (points) <sup>1</sup>	Detail
<b>Office Design and Built 2009</b>	IEQ - 8	3	○	Contributing factor	This credit rewards buildings that maximize daylight. Armstrong Dune and Dune Max Ceiling tiles have a Light Reflectance Value of 85% (average) which may help improve the floor area with a daylight factor above 2.5%.
	IEQ - 11	3	✔○	2 (Contributing factor)	This credits rewards for good visual comfort and lighting design. To achieve 2 point or more, the light reflectance of Ceilings must be minimum 75%. Armstrong Dune and Dune Max Ceiling tiles have a Light Reflectance Value of 85% (average), thus satisfying this requirement. The remaining items in this credit are based on lighting design and are not product-dependent.
	IEQ - 13	2	○	Contributing factor	This credit rewards buildings that maintain adequate noise levels. Armstrong Dune Ceiling tiles have a CAC of 32 and NRC of 0.50 (30 and 0.70 for Dune Max) which may assist in maintaining suitable noise levels.
	ENE- 4	3	○	Contributing factor	This credit rewards design options that lessen lighting energy consumption while maintaining adequate lighting levels. Armstrong Dune and Dune Max Ceiling tiles have a Light Reflectance Value of 85% (average) which may assist in reducing the lighting output required to obtain a given lighting level in a space.
	MAT - K	2	✔	2 Points	This credit rewards the use of eco-preferred and/or low VOC/formaldehyde emitting products for ceiling tiles, engineered wood products and gypsum plasterboard. The nominated product is GreenTag Green Rate Level A certified, thus satisfying the full point requirements for ceiling tiles.
<b>Education 2009 + V3</b>	IEQ - 8	4	○	Contributing factor	This credit rewards buildings that maximize daylight. Armstrong Dune and Dune Max Ceiling tiles have a Light Reflectance Value of 85% (average) which may help improve the floor area with a daylight factor above 2.5%.
	IEQ - 11	3	✔○	2 (Contributing factor)	This credits rewards for good visual comfort and lighting design. To achieve 2 point or more, the light reflectance of Ceilings must be minimum 75%. Armstrong Dune and Dune Max Ceiling tiles have a Light Reflectance Value of 85% (average), thus satisfying this requirement. The remaining items in this credit are based on lighting design and are not product-dependent.
	IEQ - 13	2	○	Contributing factor	This credit rewards buildings that maintain adequate noise levels. Armstrong Dune Ceiling tiles have a CAC of 32 and NRC of 0.50 (30 and 0.70 for Dune Max) which may assist in maintaining suitable noise levels.
	MAT - B	3	✔	Up to 3 points (unweighted product calculator score)	<b>When used for Ceiling tiles:</b> * Ceiling tiles without finish required (i.e. Prefinished approved eco-label certified ceiling tiles) = 3 points. ** Ceiling tiles requiring additional paint or finish = 1.5 points (with the additional 1.5 points achievable if the paint/finish also has an approved eco label.)
<b>Homestar</b>	MAT -1	9	✔	1 Merit	This credit rewards the use selection of eco-preferred and responsibly sourced materials. Ceilings are amongst thirteen possible construction types eligible for 1 merit each. The nominated products are GreenTag GreenRate Level A certified and satisfy the requirements for this credit.

<b>Industrial 2009</b>	IEQ - 8	4	○	Contributing factor	This credit rewards buildings that maximize daylight. Armstrong Dune and Dune Max Ceiling tiles have a Light Reflectance Value of 85% (average) which may help improve the floor area with a daylight factor above 2.5%.
	IEQ - 11	3	✓○	1 (Contributing factor)	This credits rewards for good visual comfort and lighting design. To achieve the first point, the light reflectance of Ceilings must be minimum 65%. Armstrong Dune and Dune Max Ceiling tiles have a Light Reflectance Value of 85% (average), thus satisfying this requirement. The remaining items in this credit are based on lighting design and are not product-dependent.
	IEQ - 13	2	○	Contributing factor	This credit rewards buildings that maintain adequate noise levels. Armstrong Dune Ceiling tiles have a CAC of 32 and NRC of 0.50 (30 and 0.70 for Dune Max) which may assist in maintaining suitable noise levels.
	MAT - K	2	✓	2 Points	This credit rewards the use of eco-preferred and/or low VOC/formaldehyde emitting products for ceiling tiles, engineered wood products and gypsum plasterboard. The nominated product is GreenTag Green Rate Level A certified, thus satisfying the full point requirements for ceiling tiles.
<b>Office Interiors 2009</b>	IEQ - 8	3	○	Contributing factor	This credit rewards projects that maximize daylight. Armstrong Dune and Dune Max Ceiling tiles have a Light Reflectance Value of 85% (average) which may help improve the floor area with a daylight factor above 2.5%.
	IEQ - 11	3	✓○	2 (Contributing factor)	This credits rewards for good visual comfort and lighting design. To achieve 2 point or more, the light reflectance of Ceilings must be minimum 75%. Armstrong Dune and Dune Mac Ceiling tiles have a Light Reflectance Value of 85% (average), thus satisfying this requirement. The remaining items in this credit are based on lighting design and are not product-dependent.
	IEQ - 13	2	○	Contributing factor	This credit rewards buildings that maintain adequate noise levels. Armstrong Dune Ceiling tiles have a CAC of 32 and NRC of 0.50 (30 and 0.70 for Dune Max) which may assist in maintaining suitable noise levels.
	ENE- 4	3	○	Contributing factor	This credit rewards design options that lessen lighting energy consumption while maintaining adequate lighting levels. Armstrong Dune and Dune Max Ceiling tiles have a Light Reflectance Value of 85% (average) which may assist in reducing the lighting output required to obtain a given lighting level in a space.
	MAT - B	7	✓	Up to 7 points (unweighted product calculator score)	<b>When used for Ceiling tiles:</b> " Ceiling tiles without finish required (i.e. Prefinished approved eco-label certified ceiling tiles) = 7 points. " Ceiling tiles requiring additional paint or finish = 3.5 points (with the additional 3.5 points achievable if the paint/finish also has an approved eco label.)

<sup>1</sup> Points available and points achieved are considered pre-weighting. Final Green Star NZ category weightings for each tool still apply.

<sup>2</sup> Post – September 2013, the NZGBC released updated credit classifications with the VOC/ Formaldehyde emission limits on products now being incorporated into the MAT category.