

Eco Mark Product Category No.137 “Building Products (Materials for Exterior Finish and Construction) Version 1.2” Certification Criteria (Draft)

Category B-1 Roofing (for Ceramic Industry)

1. Applicable Scope

- Clay rooftiles JIS A 5208

2 Certification Criteria and Certification Procedure

2-1. Environmental Criteria and Certification Procedure

- (1) For the products, the mixing ratio of recycled materials shown in Table 1 shall be no less than 50%.

Incineration ash among the materials shown in Table 1 shall be treated to become liquid slag by pre-treatment. Sewage sludge shall be treated to become incineration ash or liquid slag. For life/naturally generated sludge and industrially generated sludge, only in case that the product is molded at room temperature, it shall be treated to become incineration ash or liquid slag.

Table 1 Types of recycled materials

Waste from mines and quarries	Waste sand from quarries and ceramics, micro silica sand generated at separation of silica by water
Waste from metal industry	Steel slag, copper slag, ferronickel slag, electric furnace slag, casting slag, ceramic waste
Other industrial waste	Coal ash, shells, glass cullet, waste gypsum, recycled plastic, recycled rubber
Life/naturally generated sludge	Water supply sludge, lake sludge, molten solids of sewage sludge
Incinerated ashes	Molten solids of general waste (incineration ash)
Industrially generated sludge	Paper manufacturing sludge, aluminum sludge, plating sludge, polishing sand sludge
Eco-cement	

[Certification Procedure]

The Applicant shall fill in the names of recycled materials and their respective contents on the Attached Certificate form and submit it together with the raw materials certifications issued by the respective raw material suppliers.

- (2) The Product shall conform to the standards concerning elusion of heavy metals and other hazardous substances that are set forth in Attached Table 2 of the enforcement regulation of the Soil Contamination Countermeasures Law (2002 Ministerial Order No. 29 of the Ministry of the Environment) with respect to cadmium, lead, hexavalent chromium, arsenic, mercury, and selenium among the specified hazardous substances listed therein. In case to use waste generated from metal industry, sludge, incineration ash and/or eco-cement as recycled materials, the product shall conform to the standards with respect to boron and fluorine. However, this item is not applicable for metals, paper, fiber and wood.

[Certification Procedure]

For the elusion of applicable substances from the product, the results of tests conducted by an own company or a third party testing organization shall be submitted. In case to conduct tests for each material, for the material which does not clearly contain the applicable substances, the certification certified by a material business or an applicant which shows the product contains no applicable substances is acceptable. However, for recycled materials, tests shall be conducted.

- (3) The Product shall not contain asbestos.
The Product that is made of gypsum board recycled from the waste generated in connection with building demolition shall be made free of products that are known to have contained asbestos, arsenic, or cadmium through the process of sorting and removal. On the subject of specific waste gypsum boards to be eliminated, the Applicant should refer to “On the Inclusion of Asbestos in Gypsum Boards” published by the Gypsum Board Industry Association, “Proper Handling of Hazardous Substances

and the Like Associated with Building Demolition and the Like” published by the Construction By-products Recycling Promotion Conference, and other pertinent documents.

No analysis shall be required if the Product is made of gypsum board that is recycled from the waste coming out of the manufacturing process of gypsum board processing plants or generated at a new building construction site, because the recycled material does not contain asbestos.

[Certification Procedure]

The Applicant shall state in the Attached Certificate form the conformance (or lack thereof) to this criteria or shall show conformance by way of testing. When showing conformance by way of testing, the Applicant shall submit a document certifying the results of tests conducted by a independent testing organization or by a public body. The asbestos content shall be measured in accordance with JIS A 1481 “Measuring Method for Asbestos Content in Building Materials.” Judgment as to the presence of asbestos shall be made pursuant to the Instruction Letter No.0821002 of the Labour Standards Bureau of the Ministry of Health, Labour and Welfare dated August 21, 2006 titled “On the Analysis Method of Asbestos Content in Building Materials” and the Instruction Letter No.0821001 of the said Bureau dated the same day titled “On the Points to Be Noted in Relation to the Analysis Method of Asbestos Content in Building Materials.”

- (4) The Product shall be accompanied by a manual relating to installation, use, maintenance, disassembly, disposal and recycling that is available for reading by the builder and the building owner.

[Certification Procedure]

The Applicant shall state in the Attached Certificate form the conformance (or lack thereof) to this criteria. In addition, the Applicant shall submit a sample of a manual relating to installation, use, maintenance, disassembly, disposal and recycling. Regarding a part of the product’s lifecycle from installation to recycling which is not included in the manual, the reason shall be indicated.

- (5) Applicable environmental laws and regulations, pollution prevention agreements and any other requirements shall have been observed in the course of the Product manufacture with respect to air pollution, water contamination, noise, vibration, obnoxious odor, emission of hazardous substances, etc.

[Certification Procedure]

The Applicant shall submit a statement signed by the general manager of the manufacturing site of the Product declaring that all applicable environmental laws and regulations and the like have been observed and no violations or the like have been committed during the five-year period preceding the date of application.

2-2. Quality Criteria and Certification Procedure

- (6) The quality of the Product shall conform to JIS A 5208.

[Certification Procedure]

The Applicant shall submit a document certifying the test results and other data to show conformance with JIS A 5208. In the event the Product or the manufacturing site of the Product has been certified by JIS, submission of a copy of certificate issued by JIS shall suffice for the aforesaid purpose.

Eco Mark Product Category No.137 “Building Products (Materials for Exterior Finish and Construction) Version 1.2” Certification Criteria (Draft)
Category C-1 Jacket Materials (for Ceramic Industry)

Japan Environment Association
Eco Mark Office

1. Applicable Scope

- Siding for ceramic industry JIS A 5422
- Light-weight foam concrete panel (ALC panel) JIS A 5416

2 Certification Criteria and Certification Procedure

2-1. Environmental Criteria and Certification Procedure

- (1) For the products, the mixing ratio of recycled materials shown in Table 1 shall be no less than 50%.

Incineration ash among the materials shown in Table 1 shall be treated to become liquid slag by pre-treatment. Sewage sludge shall be treated to become incineration ash or liquid slag. For life/naturally generated sludge and industrially generated sludge, only in case that the product is molded at room temperature, it shall be treated to become incineration ash or liquid slag.

Table 1 Types of recycled materials

Waste from mines and quarries	Waste sand from quarries and ceramics, micro silica sand generated at separation of silica by water
Waste from metal industry	Steel slag, copper slag, ferronickel slag, electric furnace slag, casting slag, ceramic waste
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Life/naturally generated sludge	Water supply sludge, lake sludge, molten solids of sewage sludge
Incinerated ashes	Molten solids of general waste (incineration ash)

Industrially generated sludge	Paper manufacturing sludge, aluminum sludge, plating sludge, polishing sand sludge
Eco-cement	

[Certification Procedure]

The Applicant shall fill in the names of recycled materials and their respective contents on the Attached Certificate form and submit it together with the raw materials certifications issued by the respective raw material suppliers.

- (2) The Product shall conform to the standards concerning elusion of heavy metals and other hazardous substances that are set forth in Attached Table 2 of the enforcement regulation of the Soil Contamination Countermeasures Law (2002 Ministerial Order No. 29 of the Ministry of the Environment) with respect to cadmium, lead, hexavalent chromium, arsenic, mercury, and selenium among the specified hazardous substances listed therein. In case to use slag, waste generated from metal industry, sludge, incineration ash and/or eco-cement as recycled materials, the product shall conform to the standards with respect to boron and fluorine. However, this item is not applicable for metals, paper, fiber and wood.

[Certification Procedure]

For the elusion of applicable substances from the product, the results of tests conducted by an own company or a third party testing organization shall be submitted. In case to conduct tests for each material, for the material which does not clearly contain the applicable substances, the certification certified by a material business or an applicant which shows the product contains no applicable substances is acceptable. However, for recycled materials, tests shall be conducted.

- (3) The Product shall not contain asbestos.
The Product that is made of gypsum board recycled from the waste generated in connection with building demolition shall be made free of products that are known to have contained asbestos, arsenic, or cadmium through the process of sorting and removal. On the subject of specific waste gypsum boards to be eliminated, the Applicant should refer to “On

the Inclusion of Asbestos in Gypsum Boards” published by the Gypsum Board Industry Association, “Proper Handling of Hazardous Substances and the Like Associated with Building Demolition and the Like” published by the Construction By-products Recycling Promotion Conference, and other pertinent documents.

No analysis shall be required if the Product is made of gypsum board that is recycled from the waste coming out of the manufacturing process of gypsum board processing plants or generated at a new building construction site, because the recycled material does not contain asbestos.

[Certification Procedure]

The Applicant shall state in the Attached Certificate form the conformance (or lack thereof) to this criteria or shall show conformance by way of testing. When showing conformance by way of testing, the Applicant shall submit a document certifying the results of tests conducted by a independent testing organization or by a public body. The asbestos content shall be measured in accordance with JIS A 1481 “Measuring Method for Asbestos Content in Building Materials.” Judgment as to the presence of asbestos shall be made pursuant to the Instruction Letter No.0821002 of the Labour Standards Bureau of the Ministry of Health, Labour and Welfare dated August 21, 2006 titled “On the Analysis Method of Asbestos Content in Building Materials” and the Instruction Letter No.0821001 of the said Bureau dated the same day titled “On the Points to Be Noted in Relation to the Analysis Method of Asbestos Content in Building Materials.”

- (4) The Product shall be accompanied by a manual relating to installation, use, maintenance, disassembly, disposal and recycling that is available for reading by the builder and the building owner.

[Certification Procedure]

The Applicant shall state in the Attached Certificate form the conformance (or lack thereof) to this criteria. In addition, the Applicant shall submit a sample of a manual relating to installation, use, maintenance, disassembly, disposal and recycling. Regarding a part of the product's lifecycle from installation to recycling which is not included in the manual, the reason shall be indicated.

- (5) Applicable environmental laws and regulations, pollution prevention agreements and any other requirements shall have been observed in the course of the Product manufacture with respect to air pollution, water contamination, noise, vibration, obnoxious odor, emission of hazardous substances, etc.

[Certification Procedure]

The Applicant shall submit a statement signed by the general manager of the manufacturing site of the Product declaring that all applicable environmental laws and regulations and the like have been observed and no violations or the like have been committed during the five-year period preceding the date of application.

2-2. Quality Criteria and Certification Procedure

- (6) For non-burned products made by glass and concrete mixture, alkali-aggregate reactivity reduction measures shall be conducted in accordance with the alkali-aggregate reactivity reduction measures (August 2002, Ministry of Land, Infrastructure and Transport). For the products to be burned after mixing glass, applied detoxifying treatment, and used for non-burned products, detoxifying tests are not required.

[Certification Procedure]

For non-burned products made by glass and concrete mixture, it shall conform of the alkali-aggregate reactivity reduction measures, and test results of detoxifying tests for confirmation/reduction measures of alkali-aggregate reactivity by JIS A 1145 (Chemical method), JIS A 1146 (Mortar bar method) or JIS A 5308 (Ready-mixed concrete, Appendix 7&8), explanatory documents regarding to reduction measures, etc. shall be

submitted. For the products to be burned after mixing glass, applied detoxifying treatment, and used for non-burned products, it shall be indicated in the Application Form for Eco Mark Certification/Use. For the products not made by glass and concrete mixture, it shall be indicated in the Application Form for Eco Mark Certification/Use.

- (7) The quality of the Product shall conform to any applicable JIS standards.

[Certification Procedure]

The Applicant shall submit a document certifying the test results and other data to show conformance with the applicable JIS standards. In the event the Product or the manufacturing site of the Product has been certified by JIS, submission of a copy of certificate issued by JIS shall suffice for the aforesaid purpose.

Established (Version 1.0): May 5, 2007

Revised (Version 1.2): XX YY, 2007

Term of validity: December 31, 2012

Certification Criteria of this Product Category shall be revised as needed.