

Cordia Bench is constructed of durable materials. The frame is comprised of 100% recyclable solid cast aluminum containing high recycled content. The seat is available in corrosion resistant aluminum slats as well as FSC® 100% Jatoba hardwood slats with a natural oiled finish. All powdercoat finishes are low- or no-VOC. The bench is ergonomic, low maintenance and easy to disassemble.

**Recycled Content & Certifications**

<b>Configurations</b>	<b>Post-Industrial Recycled Content</b>	<b>Post-Consumer Recycled Content</b>	<b>Total Recycled Content</b>	<b>3<sup>rd</sup> Party Certifications</b>
Backless, aluminum slats, no intermediate arms	33%	7%	40%	-
Backless, aluminum slats, 1 or 2 intermediate arms	31%	9%	40%	-
Backless, FSC 100% Jatoba hardwood slats, no intermediate arms	34%	7%	41%	FSC 100%
Backless, FSC 100% Jatoba hardwood slats, 1 or 2 intermediate arms	32%	9%	41%	FSC 100%
Backed, aluminum slats, no intermediate arms	26%	5%	31%	-
Backed, aluminum slats, 1 or 2 intermediate arms	25%	6%	31%	-
Backed, FSC 100% Jatoba hardwood slats, no intermediate arms	27%	6%	33%	FSC 100%
Backed, FSC 100% Jatoba hardwood slats, 1 or 2 intermediate arms	25%	7%	32%	FSC 100%

FSC License Code: FSC-C004453

**Green Building Standards**

<p><b>LEED® v3</b></p> <p><i>MR2: Construction Waste Management</i> – packaging is designed to be reusable or recyclable. See below for details.</p> <p><i>MR4: Recycled Content</i> – this product contains recycled material. Recycled content is shown above for all standard options.</p> <p><i>MR5: Regional Materials</i> – we have manufacturing facilities in Pittsburgh, PA, Carpinteria, CA and Pune, India. Contact for details.</p> <p><i>MR7: Certified Wood</i> - wood used in this product is certified by the Forest Stewardship Council (SCS-COC-001461).</p>
<p><b>LEED v4</b></p> <p><i>MRp2/MR5: Construction Waste Management</i> – packaging is designed to be reusable or recyclable. See below for details.</p> <p><i>MR3: Sourcing of Raw Materials (wood)</i> – wood used in this product is certified by the Forest Stewardship Council (SCS-COC-001461).</p> <p><i>(recycled content)</i> – this product contains recycled material. recycled content is shown above for all standard options.</p> <p><i>(regional materials)</i> – we have manufacturing facilities in Pittsburgh, PA, Carpinteria, CA and Pune, India. Contact for details.</p> <p><i>MR4: Material Ingredients</i> – this product has a Health Product Declaration. Contact for details.</p> <p><i>EQ2: Low-emitting Materials</i> – inherently non-emitting sources. Contact for details.</p>
<p><b>Green Globes™</b></p> <p><i>3.5.2.2 Interior Fit-Outs</i> - wood used in this product is certified by the Forest Stewardship Council (SCS-COC-001461).</p> <p><i>3.5.4.1 Construction Waste</i> – packaging is designed to be reusable or recyclable. See below for details.</p> <p><i>3.5.6.3 Deconstruction and Disassembly</i> – this product can be disassembled to separate recyclable components</p> <p><i>3.7.2.1 Volatile Organic Compounds</i> - inherently non-emitting sources. Contact for details.</p>
<p><b>Estidama Pearl Rating System: Design &amp; Construction, Version 1.0</b></p> <p><i>LBI-2.5: Material Emissions: Formaldehyde Reduction</i> – inherently non-emitting sources. Contact for details.</p> <p><i>SM-R1: Hazardous Material Elimination</i> – product contains no ACMs and no CCA-treated timber</p> <p><i>SM-R2/SM-13: Construction Waste Management</i> - packaging is designed to be reusable or recyclable. See below for details.</p> <p><i>SM-1: Non-Polluting Materials</i> - product does not contain materials with designated R-phrases.</p> <p><i>SM-4: Design for Disassembly</i> - this product can be disassembled to separate recyclable components</p> <p><i>SM-12: Reused or Certified Timber</i> - wood used in this product is certified by the Forest Stewardship Council (SCS-COC-001461).</p>

**Product Materials**

Material	Description	Maintenance (0-5)*	Inherent Value (0-5)**	Biodegradable	Corrosion/Wear Resistant	Rapidly Renewable	Recyclable	Scratch Resistant
Aluminum	Corrosion-resistant metal that is suitable for many fabrication methods.	3	3		x		x	
Stainless Steel	Steel that is alloyed with chromium and other metals to improve corrosion-resistance.	3	4		x		x	
Wood – Jatoba	Tropical hardwood valued for its appearance, strength, and high resistance to insects and decay. Native to Central and South America.	3	1	x				

\*Maintenance ratings are assigned as follows: 0 – High level of maintenance required to keep up product performance and aesthetics; 5 – Absolutely no maintenance required to keep up product’s visual appearance and performance characteristics;

\*\*Inherent value ratings are assigned based on the material’s scrap value: 0 – No scrap value, or negative scrap value, and/or no scrap market; 5 – High scrap value, accompanied by robust scrap market

**Processes**

Process	Description
Aluminum Making	A two-step process by which the aluminum is first dissolved in a caustic bath and then precipitated out in crystals. This two-step process can be circumvented by using recycled scrap that is melted down to form new parts.
Aluminum Treatment	Aluminum receives a treatment to improve corrosion resistance and coating adhesion.
Casting	The process of creating a solid object by pouring molten metal into a mold and allowing it to cool.
Cutting	A variety of methods may be used to cut through various materials.
Extruding	Process in which heated metal is pushed through a cross-sectional die to create a linear part with a specific shape.
Machining	A form of subtractive or additive manufacturing often requiring specialty tooling to physically remove or add material to achieve a desired geometry.
Powdercoating	A solvent-free finishing method in which electrically charged particles of pigmented resins are sprayed onto a product. Electrical grounding of the coated object causes the charged powder to adhere to the surface. When baked in a curing oven the deposited powder melts and fuses together to form a durable, cross-linked coating
Sand Blasting	The process of smoothing, shaping and cleaning a hard surface by forcing solid particles across that surface at high speeds to provide an even finish.
Steel Making	Steel and stainless steel are made in one of two types of furnace: a Basic Oxygen Furnace (BOF) or an Electric Arc Furnace (EAF). A BOF is used to make steel from iron ore or from scrap steel; an EAF is used primarily to reprocess scrap steel.
Wood Finishing	Wood is cut and sanded smooth. Finishes are applied to adjust the wood's color, enhance its appearance or to protect it from staining or weathering.
Wood Processing	Wood milled from trees and turned into lumber.

**Packaging Materials**

Material	Type	Description	Disposal
Cardboard	Box	Small or light products products are packaged in cardboard boxes. Reused for shipping.	Reuse/Recycle
Foam	Sheets	Micro foam sheets are used to protect the finish on products.	Reuse
Foam	Soy Sheets	Soy foam sheets are used to protect the finish on products.	Biodegradable
Plastic	Shrink wrap	Shrink wrap is used to protect the finish on products and also to hold padding to products.	Recyclable
Wood	Crate	Made to fit onsite. Reused when possible. Wood scraps are recycled into mulch.	Reuse/Recycle
Wood	Pallet	Used in shipping. Reused onsite until no longer serviceable, then recycled.	Reuse/Recycle

**Transport**

Method	Type	Description
Boat	Overseas	Some product components are shipped by cargo ship from overseas
Ground	Truck/Rail	Some incoming shipments and almost all outgoing shipments to customers are sent via ground transportation. This can include truck and often rail transport depending on the final destination.

**Maintenance & Use**

Maintenance or Use	Description	Chemicals Required
Clean with Water and Mild Cleaner	This product requires a damp cloth and a mild, nontoxic cleaner for maintenance.	Mild, water-based cleaner
Ergonomic	Product is designed for ergonomic use, which will contribute to service life.	NA
Wood Finishing	Wood in this product can be allowed to weather, but must be refinished with wood oil to retain the original look.	Wood oil

**Disposal**

Method	Description
Biodegradable	Some components of this product are biodegradable
Disassemble	Product can be disassembled to separate recyclable components
Recyclable - Fully	Benches with aluminum slats are fully recyclable
Recyclable - Partially	Benches with wood slats are partially recyclable
Recycling - Scrap	Materials can be sold for scrap
Reuse	This item can be reused in the same or different function

**Summary - Backless**

Category Type	Property/Component	Aluminum Slats, no intermediate arms	Aluminum Slats, 1 or 2 intermediate arms	FSC 100% Jatoba Slats, no intermediate arms	FSC 100% Jatoba Slats, 1 or 2 intermediate arms
Basic	Total Recycled Content	40%	40%	41%	41%
Basic	Post-Industrial Recycled Content	33%	31%	34%	32%
Basic	Post-Consumer Recycled Content	7%	9%	7%	9%
Basic	3rd Party Cert	-	-	FSC 100%	FSC 100%
LEED v3	MR: Construction Waste Management	x	x	x	x
LEED v3	MR: Recycled Content	x	x	x	x
LEED v3	MR: Regional Materials	Contact	Contact	Contact	Contact
LEED v3	MR: Certified Wood			x	x
LEED v4	MR: Construction Waste Management	x	x	x	x
LEED v4	MR: Sourcing of Raw Materials (wood)			x	x
LEED v4	MR: Sourcing ... (recycled content)	x	x	x	x
LEED v4	MR: Sourcing ... (regional materials)	Contact	Contact	Contact	Contact
LEED v4	MR: Material Ingredients	Contact	Contact	Contact	Contact
LEED v4	EQ: Low-emitting materials	x	x	x	x
Green Globes	3.5.2.2 Interior Fit-Outs			x	x
Green Globes	3.5.4.1 Construction Waste	x	x	x	x
Green Globes	3.5.6.3 Deconstruction and Disassembly	x	x	x	x
Green Globes	3.7.2.1 Volatile Organic Compounds	x	x	x	x
Estidama Pearl	LBi-2.5: Matl Emissions: Formaldehyde	x	x	x	x

**Summary – Backless (continued)**

Category Type	Property/Component	Aluminum Slats, no intermediate arms	Aluminum Slats, 1 or 2 intermediate arms	FSC 100% Jatoba Slats, no intermediate arms	FSC 100% Jatoba Slats, 1 or 2 intermediate arms
Estidama Pearl	SM-R1: Hazardous Material Elimination	x	x	x	x
Estidama Pearl	SM-R2/SM-13: Construction Waste Mgmt	x	x	x	x
Estidama Pearl	SM-1: Non-Polluting Materials	x	x	x	x
Estidama Pearl	SM-4: Design for Disassembly	x	x	x	x
Estidama Pearl	SM-12: Reused or Certified Timber			x	x
Materials	Aluminum	x	x	x	x
Materials	Stainless Steel (surface mount only)	x	x	x	x
Materials	Wood – Jatoba			x	x
Processes	Aluminum Making	x	x	x	x
Processes	Aluminum Treatment	x	x	x	x
Processes	Casting	x	x	x	x
Processes	Cutting	x	x	x	x
Processes	Extruding	x	x		
Processes	Machining	x	x	x	x
Processes	Powdercoating	x	x	x	x
Processes	Sand Blasting	x	x	x	x
Processes	Steel Making (surface mount only)	x	x	x	x
Processes	Wood Finishing			x	x
Processes	Wood Processing			x	x
Packaging	Cardboard – Box	x	x	x	x
Packaging	Foam Sheets	x	x	x	x
Packaging	Foam Soy Sheets	x	x	x	x
Packaging	Plastic - Shrinkwrap	x	x	x	x
Packaging	Wood – Crate	x	x	x	x
Packaging	Wood - Pallet	x	x	x	x
Transport	Boat – Overseas	x	x	x	x
Transport	Ground – Truck/Rail	x	x	x	x
Maint. & Use	Clean w/ water & mild cleaner	x	x	x	x
Maint. & Use	Ergonomic	x	x	x	x
Maint. & Use	Wood Finishing			x	x
Disposal	Biodegradable			x	x
Disposal	Disassemble	x	x	x	x
Disposal	Recyclable - Fully	x	x		
Disposal	Recyclable - Partially			x	x
Disposal	Recycling – Scrap	x	x	x	x
Disposal	Reuse	x	x	x	x

**Summary - Backed**

Category Type	Property/Component	Aluminum Slats, no intermediate arms	Aluminum Slats, 1 or 2 intermediate arms	FSC 100% Jatoba Slats, no intermediate arms	FSC 100% Jatoba Slats, 1 or 2 intermediate arms
Basic	Total Recycled Content	31%	31%	33%	32%
Basic	Post-Industrial Recycled Content	26%	25%	27%	25%
Basic	Post-Consumer Recycled Content	5%	6%	6%	7%
Basic	3rd Party Cert	-	-	FSC 100%	FSC 100%
LEED v3	MR: Construction Waste Management	x	x	x	x
LEED v3	MR: Recycled Content	x	x	x	x
LEED v3	MR: Regional Materials	Contact	Contact	Contact	Contact
LEED v3	MR: Certified Wood			x	x
LEED v4	MR: Construction Waste Management			x	x
LEED v4	MR: Sourcing of Raw Materials (wood)	x	x	x	x
LEED v4	MR: Sourcing ... (recycled content)	Contact	Contact	Contact	Contact
LEED v4	MR: Sourcing ... (regional materials)	Contact	Contact	Contact	Contact
LEED v4	MR: Material Ingredients	x	x	x	x
LEED v4	EQ: Low-emitting materials	x	x	x	x
Green Globes	3.5.2.2 Interior Fit-Outs			x	x
Green Globes	3.5.4.1 Construction Waste	x	x	x	x
Green Globes	3.5.6.3 Deconstruction and Disassembly	x	x	x	x
Green Globes	3.7.2.1 Volatile Organic Compounds	x	x	x	x
Estidama Pearl	LBI-2.5: Matl Emissions: Formaldehyde	x	x	x	x
Estidama Pearl	SM-R1: Hazardous Material Elimination	x	x	x	x
Estidama Pearl	SM-R2/SM-13: Construction Waste Mgmt	x	x	x	x
Estidama Pearl	SM-1: Non-Polluting Materials	x	x	x	x
Estidama Pearl	SM-4: Design for Disassembly	x	x	x	x
Estidama Pearl	SM-12: Reused or Certified Timber			x	x
Materials	Aluminum	x	x	x	x
Materials	Stainless Steel (surface mount only)	x	x	x	x
Materials	Wood – Jatoba			x	x
Processes	Aluminum Making	x	x	x	x
Processes	Aluminum Treatment	x	x	x	x
Processes	Casting	x	x	x	x
Processes	Cutting	x	x	x	x
Processes	Extruding	x	x		
Processes	Machining	x	x	x	x
Processes	Powdercoating	x	x	x	x
Processes	Sand Blasting	x	x	x	x
Processes	Steel Making (surface mount only)	x	x	x	x
Processes	Wood Finishing			x	x
Processes	Wood Processing			x	x
Packaging	Cardboard – Box	x	x	x	x
Packaging	Foam Sheets	x	x	x	x
Packaging	Foam Soy Sheets	x	x	x	x
Packaging	Plastic - Shrinkwrap	x	x	x	x
Packaging	Wood – Crate	x	x	x	x
Packaging	Wood - Pallet	x	x	x	x
Transport	Boat – Overseas	x	x	x	x

**Summary – Backed (continued)**

Category Type	Property/Component	Aluminum Slats, no intermediate arms	Aluminum Slats, 1 or 2 intermediate arms	FSC 100% Jatoba Slats, no intermediate arms	FSC 100% Jatoba Slats, 1 or 2 intermediate arms
Transport	Ground – Truck/Rail	x	x	x	x
Maint. & Use	Clean w/ water & mild cleaner	x	x	x	x
Maint. & Use	Ergonomic	x	x	x	x
Maint. & Use	Wood Finishing			x	x
Disposal	Biodegradable			x	x
Disposal	Disassemble	x	x	x	x
Disposal	Recyclable - Fully	x	x		
Disposal	Recyclable - Partially			x	x
Disposal	Recycling – Scrap	x	x	x	x
Disposal	Reuse	x	x	x	x

Forms+Surfaces is dedicated to environmental responsibility. We maintain an Environmental Management System and are continually working to improve our impact through efficiency, material selection, vendor education, employee involvement, and an unwavering commitment to being exemplary corporate citizens. If you would like additional information on our Environmental Management System or if you don't see the information you need for your project on this page, please contact our Sustainability Team at [green@forms-surfaces.com](mailto:green@forms-surfaces.com).