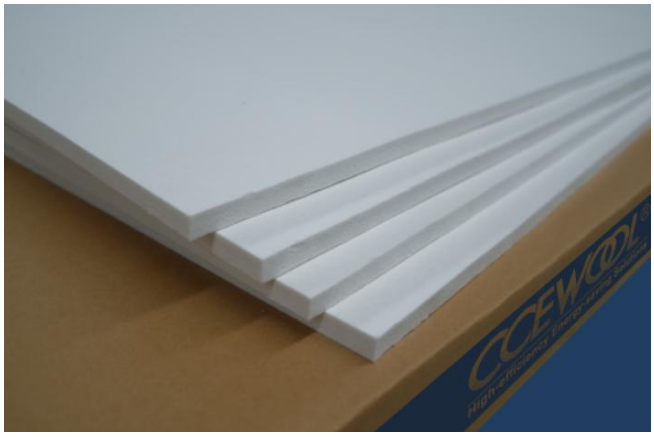
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# CCEWOOL® Low Biopersistent Fiber Board 2192



Temperature grade 1200°C (2192°F)
CCEWOOL® Low Biopersistent Fiber Board 2192 is a soluble fiber board made from a mixture of organic and inorganic binders, with a very low Fe2O3 content. Our CCEWOOL® Low Biopersistent Fiber boards can come into direct contact with fire and can be cut into various sizes according to customer requirements. It has an extremely low thermal conductivity, low heat storage capacity, and excellent resistance to thermal shock, making it suitable for applications with large temperature variations.

**Characteristics:**
Low thermal conductivity;
Low thermal storage;
High tensile strength;
Thermal shock resistance;
Lightweight;
Excellent corrosion resistance.

**Application:**
Hot face lining for furnace and oven;
Flue & chimney linings in furnaces & kilns;
Insulating backup for these products:
- Fire brick
- Insulating brick
- Refractory castable;

Insulation for electric appliance and heat treatment.

**TDS**

| CCEWOOL® Low Biopersistent Fiber Board 2192 | |
|---|---|
| Classification Temperature (°C) | 1200°C(2192°F) |
| Color | Light Bluish |
| Density (kg/m³) | 300 |
| Modules of Rupture (MPa) | ≥0.25 |

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| | |
|---|---|
| Compressive Strength (MPa, 10% relative deformation) | 0.15 |
| Loss of Ignition (%) | ≤7 |
| Permanent Linear Shrinkage (%) | 1100℃ x 24h ≤2.0 |
| Thermal Conductivity (W/m·K) | |
| 200°C | 0.05 |
| 400°C | 0.08 |
| 600°C | 0.10 |
| 800°C | 0.12 |
| 1000°C | 0.14 |

## CCEWOOL® Low Biopersistent Fiber Board 2372




Temperature grade 1300°C (2372°F) CCEWOOL® Low Biopersistent Fiber Board 2372 is the latest development in soluble fiber products, made from a blend of soluble fiber cotton, organic, and inorganic binders, forming a hard board. In use, Low Biopersistent Fiber Board maintains high compressive strength and low thermal conductivity, with physical properties remaining stable. It can withstand temperatures up to 1300℃ (2372℉), providing stability to the entire refractory lining system. CCEWOOL® Low Biopersistent Fiber Board 2372 exhibits excellent chemical stability and can resist attack from most acids and corrosive agents, except hydrofluoric acid, phosphoric acid, and concentrated alkalis.

**Characteristics:**
High temperature stability;
Low thermal conductivity;
Resistance to thermal shock;
Good handling strength;
Easy to cut with standard tools.

**Application:**
Hot gas duct linings;
Rigid high temperature gaskets and seals;

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Heat shields;
Shapes for domestic appliances;
Molten metal transfer systems.

**TDS**

| CCEWOOL® Low Biopersistent Fiber Board 2372 | |
|---|---|
| Classification Temperature (°C) | 1300°C(2372°F) |
| Color | Light Bluish |
| Density (kg/m³) | 300 |
| Modules of Rupture (MPa) | ≥0.25 |
| Compressive Strength (MPa, 10% relative deformation) | 0.15 |
| Loss of Ignition (%) | ≤7 |
| Permanent Linear Shrinkage (%) | 1260℃ x 24h ≤2.0 |
| Thermal Conductivity (W/m·K) | |
| 200°C | 0.05 |
| 400°C | 0.07 |
| 600°C | 0.10 |
| 800°C | 0.11 |
| 1000°C | 0.14 |

## CCEWOOL® 1900 Back-Up Board for Fabrication



Temperature Grades 1900°F (1050°C), 2100°F (1150°C) CCEWOOL® 1900 Back-Up Board for Fabrication is a high-performance ceramic fiber board specifically designed for backup insulation layers in industrial furnace lining systems. The product is manufactured using high-purity aluminosilicate ceramic fiber wool combined with selected refractory raw materials. Produced on a fully automated continuous production line, a small amount of binder is added during processing, and the material is formed into rigid boards through pressing,

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curing, and precision cutting processes.
Compared with conventional industrial-grade fiber boards, CCEWOOL® 1900 Back-Up Board for Fabrication features a more uniform fiber distribution and enhanced structural stability, enabling more reliable thermal insulation performance in furnace lining systems. As a backup insulation material within multilayer furnace linings, the board offers low thermal conductivity and low heat storage capacity, effectively reducing furnace heat loss, improving thermal efficiency, lowering overall lining weight, and enhancing structural stability.
The board has a uniform structure, smooth surface, and precise dimensional tolerances, providing good mechanical strength and excellent thermal shock resistance. It is suitable for a wide range of backup insulation applications in industrial furnace systems.
In addition, the material provides excellent Fabrication compatibility. The board can be easily cut, drilled, and mechanically machined, and CCEWOOL® also offers Fabrication customization services, including custom dimensions, thicknesses, and complex-shaped components. This allows the product to be adapted to various furnace designs and engineering requirements in high-temperature industrial equipment.

**Characteristics:**
Engineering-grade furnace back-up insulation board;
Excellent thermal stability and thermal shock resistance;
Low thermal conductivity and low heat storage;
Lightweight structure, reducing furnace load;
Good mechanical strength and compressive resistance;
Excellent moisture resistance and corrosion resistance;
Uniform structure with precise dimensional tolerance;
Easy Fabrication, machining, and installation.

**Applications:**
Primarily used as a back-up insulation layer in industrial furnace lining systems, including:
**Industrial Kilns and Furnaces**
Cement kiln back-up insulation
Ceramic kiln back-up insulation
Glass furnace wall and back-up insulation
**Heat Treatment Equipment**
Heat treatment furnace back-up insulation
Electric furnace insulation layers
**Metallurgical and Petrochemical Equipment**
Metallurgical furnace back-up insulation
Petrochemical process heater insulation layers
**Other High-Temperature Equipment**
Back-up insulation for high-temperature reaction equipment
Thermal insulation structures for high-temperature pipelines and equipment

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**STD:**

| CCEWOOL® 1900 Back-Up Board for Fabrication | | |
|---|---|---|
| Classification Temperature | 1900°F (1050°C) | 2100°F (1150°C) |
| Continuous Temperature Use Limit (°C) | 1750°F (950°C) | 1850°F (1000°C) |
| Color | White | White |
| Modulus of Rupture (MPa) | ≥0.3 | ≥0.3 |
| Compressive Strength (MPa, 10% relative deformation) | ≥0.1 | ≥0.2 |
| Loss on Ignition (%) | ≤7 | ≤7 |
| Permanent Linear Shrinkage (%) | 950°Cx24h≤2.0 | 1000°Cx24h≤2.0 |
| Thermal Conductivity (W/m·K) | | |
| 800°C | ≤0.116 | - |
| 1000°C | -- | ≤0.135 |

## CCEWOOL® Ceramic Fiber Board DB



Temperature Grade 1100℃ (2012℉)
CCEWOOL® Ceramic Fiber Board DB is a refractory ceramic fiber backboard made primarily from alumina-silica fiber , natural refractory materials, and a small amount of organic binders. It is processed using a fully automated continuous production line. The product has a high fiber content and features characteristics such as high-temperature resistance, lightweight, and thermal shock resistance. It can be used in various applications, including industrial kiln and furnace lining, wall lining, lining materials, insulation for electric heating furnaces, ceramic shuttle kilns, tunnel kilns, and roller kilns, providing strong support for energy saving, consumption reduction, high quality, and high yield in kilns.

**Characteristics:**
Low heat capacity, low thermal conductivity;
High compressive strength;
Non-brittle material, good elasticity;
Accurate sizes and good flatness
Easily molded or cut, easy to install
Continuous production, even fiber distribution and stable performance;
Excellent thermal stability and thermal shock resistance.

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**Applications:**

Backing insulation for kilns in the cement and building materials industry;
Backing insulation for various kilns in the ceramics industry;
Backing, wall lining, and insulation for kilns in the petrochemical and metallurgical industries;
Wall lining and backing insulation for glass kilns;
Backing insulation for heat treatment kilns;
Refractory brick backing for aluminum reduction cells in aluminum plants;
Wall lining and backing materials for high-temperature reactors and heating equipment.

**TDS**

| CCEWOOL® Ceramic Fiber Board DB | |
|---|---|
| Classification Temperature | 1100℃(2012℉) |
| Operation Temperature | 950℃ (1742℉) |
| Color | White |
| Loss of Ignition (%) | ≤7 |
| Permanent Linear Shrinkage (%) | 950℃x24h≤2.0 |
| Modules of Rupture (MPa) | ≥0.3 |
| Compressive Strength (MPa,10% relative deformation) | |
| 220kg/m3 | ≥0.1 |
| 300kg/m3 | ≥0.2 |
| Thermal Conductivity (w/m.k) | |
| 800℃ | ≤0.116 |
| 1000℃ | ≤0.135 |
| Chemical Composition (%) | |
| Al2O3 | ≥43 |
| SiO2 | ≥52 |
| ZrO2 | - |
| Package | Carton box or pallet |

| CCEWOOL® Ceramic Fiber Board DB | |
|---|---|
| Thickness (mm) | 3 - 100 |
| Size (mm) | 1200×1000 or customized size |

| CCEWOOL® Ceramic Fiber Board DB | |
|---|---|
| Thickness (in) | 1/8” - 4” |
| Size (in) | 48”×40” or customized size |

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# CCEWOOL® Ceramic Fiber Board LD



Temperature Grade 1260℃(2300℉)
CCEWOOL® Ceramic Fiber Board LD is made from high-purity alumina-silicate fibers with a certain proportion of binders added. It is manufactured through processes such as pressing, curing, shaping, longitudinal and transverse cutting, and vacuum molding. It features a uniform structure, excellent thermal and acoustic insulation properties, low thermal conductivity, low heat capacity, high compressive strength, precise dimensions, good flatness, ease of mechanical processing, and installation. These characteristics make it ideal for use as a core material or sandwich material in the manufacturing of components where aesthetics, quality, uniformity, and performance are crucial. CCEWOOL® Ceramic Fiber Board LD is produced through a fully automatic vacuum molding process, operating continuously for 24 hours, resulting in improved compressive strength. The surface of CCEWOOL® Ceramic Fiber Board LD is flat, and it is available in various standard thicknesses for selection.

**Characteristics:**
Low heat capacity, low thermal conductivity;
Non-brittle material, good elasticity;
High compressive strength;
Excellent wind-erosion resistance, long service life;
Excellent thermal stability and thermal shock resistance;
Continuous production, even fiber distribution and stable performance;
Good sound insulation;
Good anti-stripping properties;
Easily molded or cut, easy to install;
Accurate sizes and good flatness.

**Application:**
refractory lining;
Insulating backup to dense refractory materials;
Insulating backup to brick & castable;
Furnace hot face lining in ceramic kiln, box furnace & petrochemical furnace;
Use in industrial heat processing equipment;
Rigid high-temperature gaskets & seals;
High-temperature baffles & muffles;
Flue & chimney linings in furnaces & kilns;
Molten metal trough covers;

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Hot gas duct linings;
Expansion joints;
Industrial heat shields & thermal barriers;
Industrial combustion chamber construction;
Domestic appliance & light-duty industrial combustion chamber construction.

**TDS**

| CCEWOOL® Ceramic Fiber Board LD | |
|---|---|
| Classification Temperature | 1260℃(2300℉) |
| Operation Temperature | 1050℃(1922℉) |
| Color | white |
| Loss of Ignition (%) | ≤6 |
| Permanent Linear Shrinkage (%) | 1050℃x24h≤3.0 |
| Modules of Rupture (MPa) | ≥0.3 |
| Compressive Strength (MPa,10% relative deformation) | |
| 250kg/m3 | ≥0.15 |
| 300kg/m3 | ≥0.25 |
| Thermal Conductivity (w/m.k) | |
| 400℃ | 0.08 |
| 600℃ | 0.11 |
| 800℃ | 0.14 |
| 1000℃ | 0.19 |
| Chemical Composition (%) | |
| Al2O3 | ≥44 |
| SiO2 | ≥52 |
| ZrO2 | - |
| Package | Carton box or pallet |

| CCEWOOL® Ceramic Fiber Board LD | |
|---|---|
| Thickness (mm) | 3 - 100 |
| Size (mm) | 1200×1000 or customized size |

| CCEWOOL® Ceramic Fiber Board LD | |
|---|---|
| Thickness (in) | 1/8” - 4” |
| Size (in) | 48”×40” or customized size |

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# CCEWOOL® Ceramic Fiber Board MD



Temperature Grade 1260℃(2300℉)
CCEWOOL® Ceramic Fiber Board MD is produced from high-purity alumina-silicate fibers with a certain proportion of inorganic or organic binders added. It is manufactured through processes such as pressing, curing, shaping, longitudinal and transverse cutting, resulting in a rigid board with outstanding performance. CCEWOOL® Ceramic Fiber Board MD is designed to meet the demanding requirements of modern industry, offering high strength and rigidity while exhibiting excellent insulation properties and high-temperature stability. The surface of CCEWOOL® Ceramic Fiber Board MD is flat, and it is available in various standard thicknesses for selection.

**Characteristics:**
Low heat capacity, low thermal conductivity;
Non-brittle material, good elasticity;
High compressive strength;
Excellent wind-erosion resistance, long service life;
Excellent thermal stability and thermal shock resistance;
Continuous production, even fiber distribution and stable performance;
Good sound insulation;
Good anti-stripping properties;
Easily molded or cut, easy to install;
Accurate sizes and good flatness.

**Application:**
High temperature kiln and furnace linings;
Rigid high temperature gaskets and seals;
Heat shields;
Gas boiler combustion chamber linings;
Furnace hot face lining in ceramic kiln, box furnace & petrochemical furnace;
Use in industrial heat processing equipment;
High-temperature baffles & muffles;
Flue & chimney linings in furnaces & kilns;
Industrial heat shields & thermal barriers.

**TDS**

| CCEWOOL® Ceramic Fiber Board MD | |
|---|---|
| Classification Temperature | 1260℃(2300℉) |

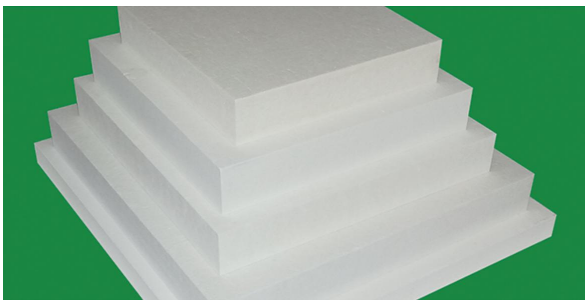
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| | |
|---|---|
| Operation Temperature | 1050℃(1922℉) |
| Color | white |
| Loss of Ignition (%) | ≤6 |
| Permanent Linear Shrinkage (%) | 1050℃x24h≤3.0 |
| Modules of Rupture (MPa) | ≥0.3 |
| Compressive Strength (MPa,10% relative deformation) | |
| 300kg/m3 | ≥0.25 |
| 360kg/m3 | ≥0.3 |
| Thermal Conductivity (w/m.k) | |
| 400℃ | 0.08 |
| 600℃ | 0.11 |
| 800℃ | 0.14 |
| 1000℃ | 0.19 |
| Chemical Composition (%) | |
| Al2O3 | ≥44 |
| SiO2 | ≥52 |
| ZrO2 | - |
| Package | Carton box or pallet |

| CCEWOOL® Ceramic Fiber Board MD | |
|---|---|
| Thickness (mm) | 3 - 100 |
| Size (mm) | 1200×1000 or customized size |

| CCEWOOL® Ceramic Fiber Board MD | |
|---|---|
| Thickness (in) | 1/8” - 4” |
| Size (in) | 48”×40” or customized size |

## CCEWOOL® Ceramic Fiber Board HD



Temperature Grade 1260℃(2300℉)
CCEWOOL® Ceramic Fiber Board HD insulation material is a high-density board product made primarily from alumina-silicate fibers with the addition of binders. This

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product has a tough texture, excellent self-supporting strength, and compressive strength, making it highly resistant to the impact of molten metals. The compressive strength of CCEWOOL® Ceramic Fiber Board HD is more than ten times that of typical refractory ceramic fiber boards. It is a high-strength fiberboard available in various standard thicknesses for selection.

**Characteristics:**

Low heat capacity, low thermal conductivity;
Non-brittle material, good elasticity;
High compressive strength;
Excellent wind-erosion resistance, long service life;
Excellent thermal stability and thermal shock resistance;
Continuous production, even fiber distribution and stable performance;
Good sound insulation;
Good anti-stripping properties;
Easily molded or cut, easy to install;
Accurate sizes and good flatness.

**Application:**

Full thickness refractory lining;
Insulating backup to dense refractories;
Insulating backup to brick & castable;
Furnace hot face lining in ceramic kiln, box furnace & petrochemical furnace;
Board over blanket hot face lining;
Rigid high-temperature gaskets & seals;
High-temperature baffles & muffles;
Flue & chimney linings in furnaces & kilns;
Infrared element supports;
Glass tank side & end wall & port neck insulation;
Trough linings for conveying molten metals;
Molten metal trough covers;
Thermal insulation where high velocities are encountered;
Heat shields for personnel protection;
Hot gas duct linings;
Low- & high-temperature dryers;
Pouring forms for castable;
Expansion joints.

**TDS**

| CCEWOOL® Ceramic Fiber Board HD | |
|---|---|
| Classification Temperature | 1260℃(2300℉) |
| Operation Temperature | 1050℃(1922℉) |
| Color | white |

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| | |
|---|---|
| Loss of Ignition (%) | ≤6 |
| Permanent Linear Shrinkage (%) | 1050℃x24h≤3.0 |
| Modules of Rupture (MPa) | ≥0.3 |
| Compressive Strength (MPa,10% relative deformation) | |
| 360kg/m3 | ≥0.3 |
| Thermal Conductivity (w/m.k) | |
| 400℃ | 0.08 |
| 600℃ | 0.11 |
| 800℃ | 0.14 |
| 1000℃ | 0.19 |
| Chemical Composition (%) | |
| Al2O3 | ≥44 |
| SiO2 | ≥52 |
| ZrO2 | - |
| Package | Carton box or pallet |

| CCEWOOL® Ceramic Fiber Board HD | |
|---|---|
| Thickness (mm) | 3 - 100 |
| Size (mm) | 1200×1000 or customized size |

| CCEWOOL® Ceramic Fiber Board HD | |
|---|---|
| Thickness (in) | 1/8” - 4” |
| Size (in) | 48”×40” or customized size |

## CCEWOOL® Ceramic Fiber Board RG



Temperature Grade
1260℃(2300℉)
CCEWOOL® Ceramic Fiber Board RG insulation material is an economical and efficient insulation board. The surface of the board is coated with a hardening agent, which, after drying, provides the board with rigid characteristics. It is suitable for applications that require

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rigid strength in the product. This material offers high resistance to fracture, compressive strength, wear resistance, and resistance to thermal gas erosion.
CCEWOOL® Ceramic Fiber Board RG insulation material is ideal for use as an alternative material for dense refractories (such as refractories used in the glass industry) and can also be used as a thermal protection layer for blanket linings. The rigid surface helps suppress dust during installation and operation. Various standard thicknesses are available for selection.

**Characteristics:**
Low heat capacity, low thermal conductivity;
Non-brittle material, good elasticity;
High compressive strength;
Excellent wind-erosion resistance, long service life;
Excellent thermal stability and thermal shock resistance;
Continuous production, even fiber distribution and stable performance;
Good sound insulation;
Good anti-stripping properties;
Easily molded or cut, easy to install;
Accurate sizes and good flatness.

**Application:**
Full thickness refractory lining;
Insulating backup to dense refractories;
Insulating backup to brick & castable;
Furnace hot face lining in ceramic kiln, box furnace & petrochemical furnace;
Board over blanket hot face lining;
Use in industrial heat processing equipment;
Rigid high-temperature gaskets & seals;
High-temperature baffles & muffles;
Flue & chimney linings in furnaces & kilns;
Infrared element supports;
Glass tank side & end wall & port neck insulation;
Trough linings for conveying molten metals;
Molten metal trough covers;
Thermal insulation where high velocities are encountered;
Heat shields for personnel protection;
Hot gas duct linings;
Low- & high-temperature dryers;
Pouring forms for castable;
Expansion joints;
Industrial heat shields & thermal barriers;
Industrial combustion chamber construction;
Domesticappliance & light-duty industrial combustion chamber construction;

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Wood-burning stove backup insulation.

**TDS**

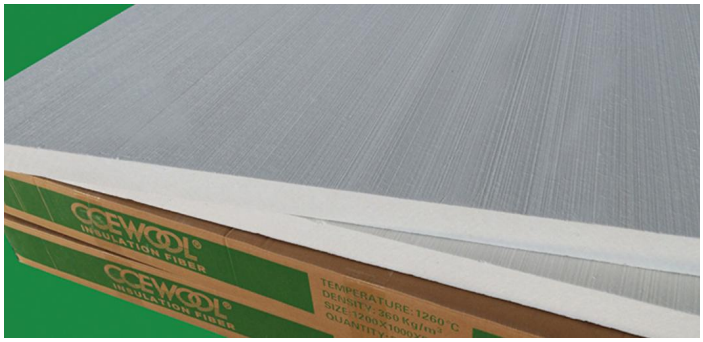
| CCEWOOL® Ceramic Fiber Board RG | |
|---|---|
| Classification Temperature | 1260℃(2300℉) |
| Operation Temperature | 1050℃(1922℉) |
| Color | white |
| Loss of Ignition (%) | ≤6 |
| Permanent Linear Shrinkage (%) | 1050℃x24h≤3.0 |
| Modules of Rupture (MPa) | ≥0.3 |
| Compressive Strength (MPa,10% relative deformation) | |
| 250kg/m3 | ≥0.15 |
| 300kg/m3 | ≥0.25 |
| 360kg/m3 | ≥0.3 |
| Thermal Conductivity (w/m.k) | |
| 400℃ | 0.08 |
| 600℃ | 0.11 |
| 800℃ | 0.14 |
| 1000℃ | 0.19 |
| Chemical Composition (%) | |
| Al2O3 | ≥44 |
| SiO2 | ≥52 |
| ZrO2 | - |
| Package | Carton box or pallet |

| CCEWOOL® Ceramic Fiber Board RG | |
|---|---|
| Thickness (mm) | 20.25.50.80.100 |
| Size (mm) | 1200×1000 or customized size |

| CCEWOOL® Ceramic Fiber Board RG | |
|---|---|
| Thickness (in) | 4/5”,1”,2”,3”,4” |
| Size (in) | 48”×40” or customized size |

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# CCEWOOL® Ceramic Fiber Board LZ




Temperature Grade 1400℃(2550℉)
CCEWOOL® Ceramic Fiber Board LZ is a zirconium alumina refractory ceramic fiber board made from low-zirconium refractory ceramic fiber spun cotton as raw material, produced through a fully automated vacuum forming process. It operates continuously for 24 hours and dries quickly, resulting in better compressive strength. The surface is smooth, the dimensions are precise, and it is easy to install. It is a refractory fiber insulation material capable of withstanding high temperatures up to 1400℃ (2550℉). There are various standard thicknesses available for selection.

**Characteristics:**
Low heat capacity, low thermal conductivity;
Non-brittle material, good elasticity;
High compressive strength;
Excellent wind-erosion resistance, long service life;
Excellent thermal stability and thermal shock resistance;
Continuous production, even fiber distribution and stable performance;
Good sound insulation;
Good anti-stripping properties;
Easily molded or cut, easy to install;
Accurate sizes and good flatness.

**Application:**
refractory lining;
Insulating backup to dense refractory materials;
Insulating backup to brick & castable;
Furnace hot face lining in ceramic kiln, box furnace & petrochemical furnace;
Use in industrial heat processing equipment;
Rigid high-temperature gaskets & seals;
High-temperature baffles & muffles;
Flue & chimney linings in furnaces & kilns;
Molten metal trough covers;
Hot gas duct linings;
Expansion joints;
Industrial heat shields & thermal barriers;
Industrial combustion chamber construction;
Domestic appliance & light-duty industrial combustion chamber construction.

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**TDS**

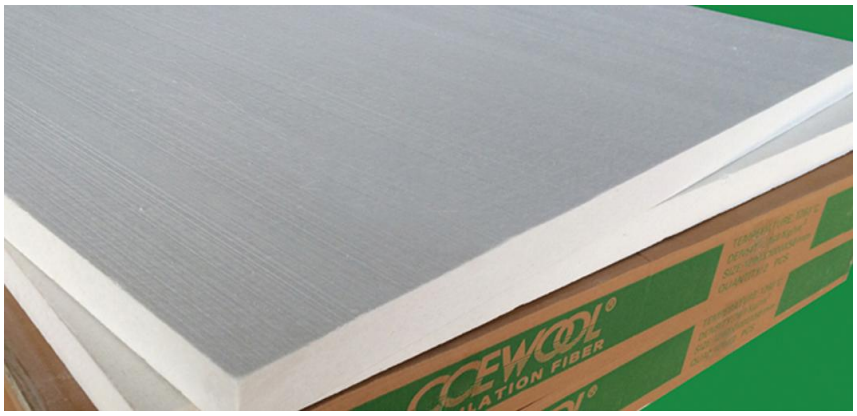
| CCEWOOL® Ceramic Fiber Board LZ | |
|---|---|
| Classification Temperature | 1400℃ (2550℉) |
| Operation Temperature | 1200℃(2192℉) |
| Color | white |
| Loss of Ignition (%) | ≤6 |
| Permanent Linear Shrinkage (%) | 1200℃x24h≤3.5 |
| Modules of Rupture (MPa) | ≥0.3 |
| Compressive Strength (MPa,10% relative deformation) | |
| 300kg/m3 | ≥0.25 |
| 360kg/m3 | ≥0.3 |
| Thermal Conductivity (w/m.k) | |
| 400℃ | 0.07 |
| 600℃ | 0.1 |
| 800℃ | 0.13 |
| 1000℃ | 0.19 |
| Chemical Composition (%) | |
| Al2O3 | ≥44 |
| SiO2 | ≥50 |
| ZrO2 | ≥5 |
| Package | Carton box or pallet |

| CCEWOOL® Ceramic Fiber Board LZ | |
|---|---|
| Thickness (mm) | 3 - 100 |
| Size (mm) | 1200×1000 or customized size |

| CCEWOOL® Ceramic Fiber Board LZ | |
|---|---|
| Thickness (in) | 1/8” - 4” |
| Size (in) | 48”×40” or customized size |

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# CCEWOOL® Ceramic Fiber Board 2600



Temperature Grade
1430℃(2600℉)
CCEWOOL® Ceramic Fiber Board 2600 is an insulating material that contains zirconium refractory ceramic fibers. Zirconium is added to the production raw materials to form a high-temperature resistant zirconium-containing insulation board, providing high stability at high temperatures. It has a long-term working temperature of approximately 1350℃ (2462℉). CCEWOOL® Ceramic Fiber Board 2600 exhibits excellent chemical stability and can resist the corrosion of most corrosive media. It can withstand oxidation and reduction at high temperatures.

**Characteristics:**
Low heat capacity, low thermal conductivity;
Non-brittle material, good elasticity;
High compressive strength;
Excellent wind-erosion resistance, long service life;
Excellent thermal stability and thermal shock resistance;
Continuous production, even fiber distribution and stable performance;
Good sound insulation;
Good anti-stripping properties;
Easily molded or cut, easy to install;
Accurate sizes and good flatness.

**Application:**
Full thickness refractory lining;
Insulating backup to dense refractories;
Insulating backup to brick & castable;
Furnace hot face lining in ceramic kiln, box furnace & petrochemical furnace;
Board over blanket hot face lining;
Rigid high-temperature gaskets & seals;
High-temperature baffles & muffles;
Flue & chimney linings in furnaces & kilns;
Infrared element supports;
Glass tank side & end wall & port neck insulation;
Trough linings for conveying molten metals;

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Molten metal trough covers;
Thermal insulation where high velocities are encountered;
Heat shields for personnel protection;
Hot gas duct linings;
Low- & high-temperature dryers;
Pouring forms for castable;
Expansion joints.

**TDS**

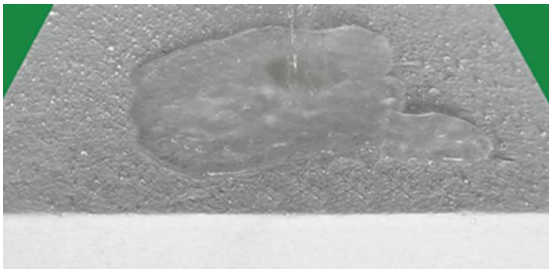
| CCEWOOL® Ceramic Fiber Board 2600 | |
|---|---|
| Classification Temperature | 1430℃ (2600℉) |
| Operation Temperature | 1350℃(2462℉) |
| Color | white |
| Loss of Ignition (%) | ≤6 |
| Permanent Linear Shrinkage (%) | 1350℃x24h≤3.5 |
| Modules of Rupture (MPa) | ≥0.3 |
| Compressive Strength (MPa,10% relative deformation) | |
| 300kg/m3 | ≥0.25 |
| 360kg/m3 | ≥0.3 |
| Thermal Conductivity (w/m.k) | |
| 400℃ | 0.07 |
| 600℃ | 0.1 |
| 800℃ | 0.13 |
| 1000℃ | 0.18 |
| Chemical Composition (%) | |
| Al2O3 | ≥35 |
| SiO2 | ≥49 |
| ZrO2 | ≥15 |
| Package | Carton box or pallet |

| CCEWOOL® Ceramic Fiber Board 2600 | |
|---|---|
| Thickness (mm) | 3 - 100 |
| Size (mm) | 1200×1000 or customized size |

| CCEWOOL® Ceramic Fiber Board 2600 | |
|---|---|
| Thickness (in) | 1/8” - 4” |
| Size (in) | 48”×40” or customized size |

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# CCEWOOL® Water Repellent Ceramic Fiber Board



Temperature Grade 1100℃ (2012℉), 1260℃ (2300℉)
CCEWOOL® Water Repellent Ceramic Fiber Board is a kind of refractory ceramic fiber board which combines water proof, thermal insulation and fire resistance in one. We added a hydrophobic formula to the raw materials, and use full automatic production line, 2 hours deep drying to dry the refractory ceramic fiber board completely which realizes the overall hydrophobicity for our refractory ceramic fiber board. The hydrophobicity of CCEWOOL® Water Repellent Ceramic Fiber Board under 200℃ is above 99%.
CCEWOOL® Water Repellent Ceramic Fiber Board is specially developed for preventing the moisture in thermal insulation. It is especially suitable for fire protection, thermal insulation, sound insulation and noise reduction in marine and other high humidity environments. It greatly improves the thermal insulation performance of the fiber and prevented problems of thermal insulation performance reducing and thermal insulation layer corrosion caused by conventional refractory ceramic fiber board's moisture absorption.

**Characteristics:**
Good hydrophobic property,hydrophobic rate more than 98%;
Low thermal conductivity, non-combustible, moisture-proof, good sound absorption;
Good rigid property,high-strength,anti-vibration, corrosion;
Convient construction,good stability,long useful life.

**Application:**
Widely used in shipping building,metallurgical machinery,petro-chemical industry;
Nuclear power,automobile;
Municipal heating system and building;
Wall composite and proof insulation;
Sound barrier;
Architectural soundproofing;
Marine (or Ships).

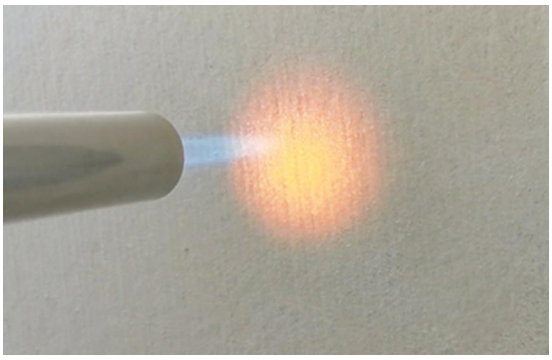
**TDS**

| CCEWOOL® Water Repellent Ceramic Fiber Board | | |
|---|---|---|
| Type(℃) | 1100 | 1260 |
| Permanent Linear Change on Heating (%) | 950℃x24h<=-2.5 | 1050℃x24h<=-2 |
| Theoretic Heat Conductivity Co-efficient (w/m.k) (800℃) | <=0.116 | <=0.135 |
| Theoretical density (kg/m3) | 220 | 300 |

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| | |
|---|---|
| Water content (%) | <=1 |
| organic content (%) | <=6 |
| Hydrophobicity | >=98% |
| Regular Size (mm) | 1200x600mm (47”*24”)<br>Thickness: 25/50mm (1”/2”) |
| Package | Carton/Pallet |

## CCEWOOL® Inorganic Ceramic Fiber Board



Temperature Grade 1260℃ (2300℉)
CCEWOOL has developed pure inorganic ceramic fiber boards and inorganic shaped pieces tailored to market demands. These products are manufactured on a proprietary production line with the addition of an inorganic binder. Used in domestic appliances and smoke-free thermal equipment (such as electric heating stoves, wall-mounted boilers, and spinning ducts), these fire-resistant insulation materials do not blacken at high temperatures and are smokeless and odorless. They also boast excellent strength and hardness, with no significant reduction in post-fire strength.

**Characteristics:**
Low heat capacity, low thermal conductivity;
Non-brittle material, good elasticity;
High compressive strength;
Excellent wind-erosion resistance, long service life;
Excellent thermal stability and thermal shock resistance;
Continuous production, even fiber distribution and stable performance;
Good sound insulation;
Good anti-stripping properties;
Easily molded or cut, easy to install;
Accurate sizes and good flatness.

**Application:**
Iron and steel industry: All heat treatment furnace lining, expansion joints, backing insulation, thermal insulation and mold insulation, steel mill ladle, tundish, ladle and refined ladle back linings;
Non-ferrous metals industry: Firebrick back lining for tundish, slot cover and aluminum plant electrolytic reduction cell;

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Ceramics industry: lightweight kiln car structure and the furnace hot face lining, separation and fire position for all kiln temperature zones;
Glass industry: As furnace hearth back insulation lining, burner blocks;
Kiln construction: Hot surface refractories, heavy refractory back linings, expansion joints.
Light industry: Industrial and household boiler combustion chamber lining;
Petrochemical industry: as high-temperature furnace hot surface lining material;
Craft glass: As craft glass or other deep-processed and molded products mold;
Cement and construction materials: furnace back thermal insulation lining.

**TDS**

| CCEWOOL® Inorganic Ceramic Fiber Board | |
|---|---|
| Classification Temperature | 1260℃(2300℉) |
| Density (kg/m3) | 320/360 |
| Loss on ignition (%) | ≤ 2 |
| Normal temperature compressive strength (MPa) | ≥0.15 |
| Post-Firing Compressive Strength (MPa) | ≥0.15 |
| Surface Hardness (Hc) | ≥60 |
| Thermal Conductivity (W/m-K) | ≤0.135 (500℃) |
| Common Specifications and Dimensions (mm) | 900×600×20-50 (47”×24”×4/5”-2”) |

## CCEWOOL® 1900 LTC Fiber Board




Temperature Grade 1260℃(2300℉), 1400℃(2552℉)
CCEWOOL® 1900 LTC Fiber Board, independently developed by our company, combining micro-nano technology and infrared shielding technology, achieves lower thermal conductivity and better insulation performance. Its thermal insulation performance is 20-50% better than traditional lightweight fire-resistant materials. The thermal insulation principle of CCEWOOL® 1900 LTC Fiber Board is through compositing refractory ceramic fiber and high efficient thermal insulation agent to reduce heat conduction, heat convection and heat radiation, thus resulting in lower thermal conductivity. CCEWOOL® 1900 LTC Fiber Board provides high strength stability and excellent workability. We can produce water repellent ultra low thermal conductivity board which has good water resistance, so the board will not absorb the moisture of adjacent fire-resistant materials. Due to its ultra-low thermal conductivity it

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has better thermal insulation performance than most of the other insulation materials on market, it will surely replace most of the refractory ceramic fiber boards in future.

**Characteristics:**

Ultra-low thermal conductivity;
Low thermal storage;
High tensile strength;
Excellent thermal shock resistance;
Excellent corrosion resistance.

**Application:**

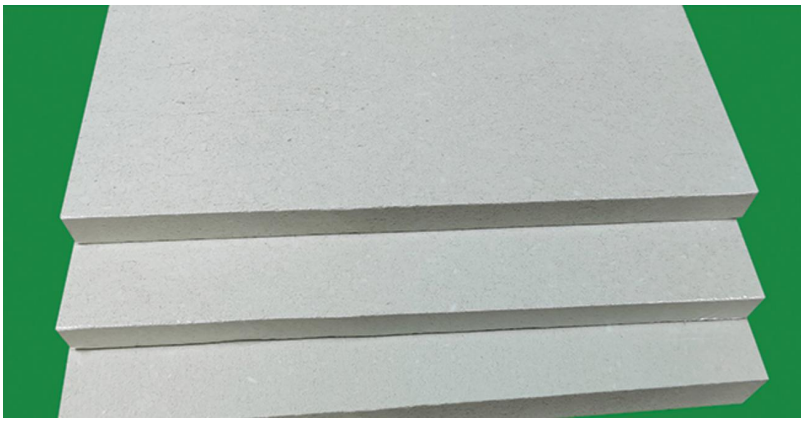
Refractory Lining;
Back lining insulation for dense refractory materials;
Back ling insulation for refractory bricks and castables;
Hot surface lining of ceramic kilns, box furnaces, and petrochemical furnace;
Used in industrial heat processing equipment;
Rigid high-temperature sealing gasket;
High temperature shields;
Insulation lining for flues and chimneys;
Molten metal tank covers;
Hot gas pipe lining;
Expansion joints;
Industrial insulation covers and insulation layers;
Industrial combustion chamber;
Light industrial combustion chamber.

**TDS**

| CCEWOOL® 1900 LTC Fiber Board | | |
|---|---|---|
| Product Name | 1260 LTC | 1400 LTC |
| Classification temperature (℃) | 1260 | 1400 |
| Theoretical Bulk Density (Kg/m3) | 300 | 320 |
| Cold Compressive Strength (MPa) | ≥0.15 | |
| Compressive Strength After Heating (MPa) | ≥0.1 | |
| Permanent Linear Change After Heating (%) | ≤3(1050℃×24h) | ≤3(1200℃×24h) |
| Thermal Conductivity W/(m·K) | 0.09(Average 500℃) | 0.1(Average600℃) |
| Regular Size (L×W×T)mm | 900×600×25/50mm (35"*24"*1"/2")<br>1200×600×25/50mm (47"*24"*1"/2") | |

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# CCEWOOL® Super Duty Ceramic Fiber Board



CCEWOOL® Super Duty Ceramic Fiber Board is a new type of refractory and heat insulation material, which is made of refractory ceramic fiber bulk as the main raw material. It can maintain high strength and low thermal conductivity at high temperature.
CCEWOOL® Super Duty Ceramic Fiber Board has tough texture.The bearing capacity at normal temperature is greater than 80 t/m2 and the bearing capacity at high temperature is greater than 40 t/m2. Its compressive strength is more than ten times that of general refractory ceramic fiber board. Its thermal insulation performance is basically the same as that of general refractory ceramic fiber board. It is a kind of high-strength thermal insulation fiber board.

**Characteristics:**

Excellent load bearing capacity;
Excellent thermal stability;
Excellent thermal shock resistance;
Low thermal conductivity;
Low heat storage;
Can be machined,cut and shaped easily.

**Application:**

Back lining in ladle, tundish, torpedo car and hot metal ditch;
Load-bearing of kiln trolley;
Load-bearing of aluminum reduction cell bottom;
Cover plate for reformer floor tubes;
High temperature flange gasket for heat treatment furnace.

**TDS**

| CCEWOOL® Super Duty Ceramic Fiber Board | | |
|---|---|---|
| Description | 600 Super Duty Board | 900 Super Duty Board |
| Density (kg/m*) | 600 | 900 |
| Modules of Rupture (MPa) | ≥2.0 Before Firing | ≥4.0 Before Firing |
| | ≥0.8 Afer Firing | ≥1.2 Afer Firing |
| Compressive Strength (MPa,10% relative deformation) | ≥0.8 Before Firing | ≥4.0 Before Firing |
| | ≥0.4 Afer Firing | ≥2.5 Afer Firing |
| Permanent Linear Shrinkage (%) | 1100℃X24h≤3.0 | 1100℃X24h≤3.0 |

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| Thermal Conductivity (W/m·K) | | |
|---|---|---|
| 300℃ | 0.08 | 0.12 |
| 400℃ | 0.09 | 0.13 |
| 500℃ | 0.1 | 0.14 |

## CCEWOOL® Polycrystalline Wool Fiber Board




Temperature Grade 1600℃（2912℉）
CCEWOOL® Polycrystalline Wool Fiber Board is manufactured in a wet forming process using CCEWOOL® Polycrystalline fiber bulk and binders. This product is designed for various applications that require excellent stability and high temperature resistance. It has excellent insulation performance and unparalleled heat resistance, wear resistance, and chemical erosion resistance.

CCEWOOL® Polycrystalline Wool Fiber Board has superior thermal stability and insulation performance compared with refractory ceramic fiber board at extremely high working temperatures, which can reduce energy costs and enhance efficiency.

CCEWOOL® Polycrystalline Wool Fiber Board has higher rigidity and fracture resistance compared to refractory ceramic fiber board, making it very suitable for applications where sag resistance is critical

We offer standard sizes and shapes required in the market. We also make customized sizes as per your specific application.

**Characteristics:**

High rigidity and lightweight;
Resistance to particle and hot gas erosion;
High strength;
High temperature resistance;
Low thermal conductivity and low heat capacity;
Highly resistant to thermal shock;
Can resist most chemical attacks;
No wetting to molten aluminum, non-ferrous metals and other substances;
Easy to cut, handle, and install;
Excellent thermal shock resistance;

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Low thermal conductivity;
Low heat capacity.

**Application:**

High temperature laboratory;
High temperature furnaces and kilns;
Aerospace Industry;
Spare insulation layer for dense refractory lining;
Expansion joint;
Hot surface lining of furnace;
Alternative insulation materials for amorphous refractory materials and brick refractory materials;
Ladle lining and cover;
Aluminum groove liner and special shapes;
Riser sleeve, tapping cone, and hot top;
Combustion chamber of boiler and heater;
Hot gas pipeline, flue, and chimney lining;
Heat treated insulation;
Rounded ceramic tiles;
Burner block;
Thermal insulation for glass regenerators, tank sides, end walls, and port necks;
Backup insulation for ladle, tundish, and torpedo car.

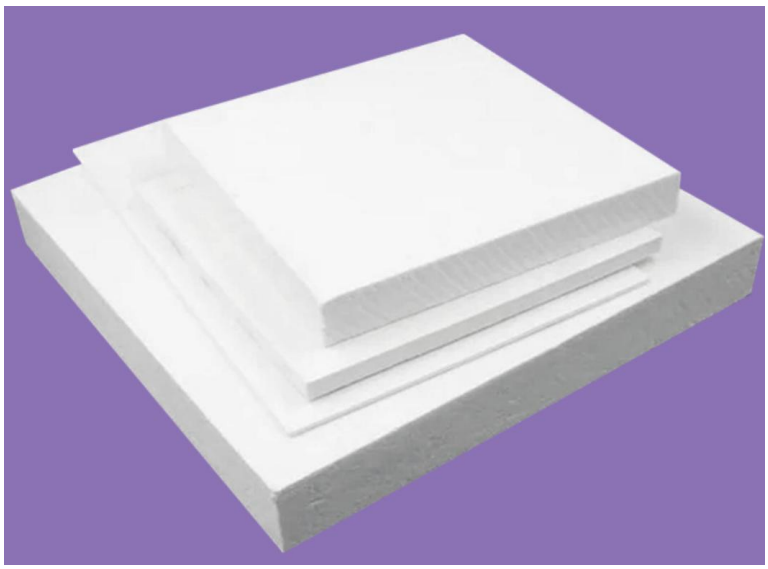
**TDS**

| CCEWOOL® Polycrystalline Wool Fiber Board | | | | |
|---|---|---|---|---|
| Description | PCW1400 Board | PCW1450 Board | PCW1600 LD Board | PCW1600 HD Board |
| Classification Temperature (℃) | 1600(2912℉) | 1600(2912℉) | 1700(3092℉) | 1700(3092℉) |
| Continuous Temperature Use Limit (℃) | 1400(2552℉) | 1450(2642℉) | 1600(2912℉) | 1600(2912℉) |
| Chemical Composition (%) | | | | |
| Al2O3 | 60 | 62 | 70 | 70 |
| Al2O3+SiO2 | 98 | 98 | 98.5 | 98.5 |
| Color | White | White | White | White |
| Density (kg/m³)(lb/ft³) | 300 | 300 | 250 | 400 |
| Modules of Rupture(MPa) | ≥0.3 | ≥0.3 | ≥0.3 | ≥0.3 |
| Compressive Strength (MPa,10% relative deformation) | 0.25 | 0.25 | 0.15 | 0.3 |
| Loss of lanition (%%) | ≤8 | ≤8 | ≤8 | ≤8 |
| Permanent Linear Shrinkage (%) | 1400℃ x 24h ≤2.0 | 1450℃ x 24h ≤2.0 | 1600℃ x 24h ≤1.5 | 1600℃ x 24h ≤1.5 |

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| Thermal Conductivity (W/m-K) | | | | |
|---|---|---|---|---|
| 400℃ | 0.08 | 0.08 | 0.08 | 0.08 |
| 600℃ | 0.1 | 0.1 | 0.12 | 0.09 |
| 800℃ | 0.13 | 0.13 | 0.14 | 0.12 |
| 1000℃ | 0.16 | 0.15 | 0.17 | 0.15 |
| 1200℃ | 0.19 | 0.19 | 0.2 | 0.19 |

## CCEWOOL® Alumina Fiber Board 2732 for Fabrication



Temperature Grades 1500°C (2732°F)
CCEWOOL® Alumina Fiber Board 2732 for Fabrication is a high-performance alumina fiber insulation board developed for demanding high-temperature engineering applications. The product is manufactured from high-purity alumina fibers using a wet vacuum forming process, followed by controlled high-temperature treatment to create a stable fiber structure. This manufacturing process enables the board to maintain excellent thermal stability and structural integrity in operating environments up to 1500°C (2732°F).
Compared with conventional industrial-grade fiber boards, CCEWOOL® Alumina Fiber Board 2732 for Fabrication features improved fiber purity, enhanced structural uniformity, and superior dimensional stability. These optimizations provide lower shrinkage and higher mechanical strength under elevated temperature conditions. The uniform and dense fiber structure also makes the board particularly suitable for Fabrication and secondary processing, allowing it to be cut, drilled, or machined into various engineered insulation components.
CCEWOOL® also provides Fabrication customization services for this product. Based on equipment configurations or engineering drawings, boards can be supplied in customized dimensions, thicknesses, or complex shapes to meet the specific requirements of high-temperature industrial equipment, laboratory furnaces, and aerospace thermal protection systems.

**Characteristics:**
Excellent high-temperature stability;
Outstanding thermal shock resistance;
High mechanical strength and structural rigidity;
Low thermal conductivity;
Low heat storage capacity;
Excellent compatibility with Fabrication and machining processes.

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**Applications:**

Industrial furnace linings;
Insulation structures for heating and reaction furnaces;
Linings for flues and high-temperature equipment;
High-temperature laboratory furnaces;
Laboratory heating systems;
Thermal insulation structures for high-temperature testing equipment;
Engineered high-temperature insulation components;
Thermal protection structures for aerospace systems;
Back-up insulation layers behind dense refractory linings;
High-temperature expansion joint filling materials.

**STD:**

| CCEWOOL® Alumina Fiber Board 2732 for Fabrication | | | | | |
|---|---|---|---|---|---|
| Classification temp. °C (°F) | 1500(2732) | 1600(2912) | 1700(3092) | 1800(3272) | 1900(3452) |
| Continuous duty temperature, °C(°F) | 1350(2462) | 1400(2732) | 1500(2732) | 1650(3000) | 1800(3272) |
| Density approx. kg/m3 | 350/400 | 350/400 | 350 | 350/400 | 650/700 |
| Linear shrinkage, %(24 hours at max. continuous duty temperature) | | | | | |
| 1400°C | **＜0.5** | | | | |
| 1500°C | | **＜0.1** | | | |
| 1600°C | | | **＜0.5** | | |
| 1700°C | | | | **＜0.5** | |
| 1750°C | | | | | **＜0.2** |
| Chemical Composition (%) | | | | | |
| Al2O3 | 62 | 64 | 75 | 75 | 87 |
| SiO2 | 37 | 35 | 24.5 | 24.5 | 12.5 |
| Other | **＜1** | **＜1** | **＜0.5** | **＜0.5** | **＜0.5** |
| Cr2O3 | - | - | - | - | |
| Thermal conductivity, W/m.K | | | | | |
| 600°C (1120°F) | 0.11 | 0.14 | 0.12 | 0.12 | 0.11 |
| 800°C (1472°F) | 0.15 | 0.17 | 0.15 | 0.16 | 0.14 |
| 1000°C (1832°F) | 0.27 | 0.24 | 0.18 | 0.19 | 0.17 |

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# CCEWOOL® PCW Board 2912 for Fabrication



Temperature Grades 1600°C (2912°F)
CCEWOOL® PCW Board 2912 for Fabrication is a high-performance polycrystalline wool (PCW) insulation board developed for demanding high-temperature engineering applications. The product is manufactured from high-purity polycrystalline fibers using a wet vacuum forming process, creating a dense and uniform fiber structure throughout the board. This structure enables the material to maintain excellent dimensional stability and structural integrity in operating environments up to 1600°C (2912°F).

This product belongs to the polycrystalline fiber board for Fabrication category. Compared with standard industrial-grade fiber boards, it features higher fiber purity, improved structural uniformity, and superior dimensional stability. As a result, the board exhibits lower thermal shrinkage and improved long-term stability under sustained high-temperature operating conditions.

CCEWOOL® PCW Board 2912 also offers excellent Fabrication compatibility. The dense and homogeneous board structure allows precise cutting, drilling, and machining, making it suitable for manufacturing a wide range of high-temperature insulation components. CCEWOOL® additionally provides Fabrication customization services, supplying boards in custom dimensions, thicknesses, or special shapes according to equipment structures or engineering drawings to meet the design requirements of high-temperature industrial systems.

**Characteristics:**

Engineering-grade polycrystalline fiber insulation board with superior quality;
Stable structure in operating temperatures up to 1600°C (2912°F);
High mechanical strength and structural rigidity;
Low thermal conductivity and low heat storage;
Excellent thermal shock resistance;
Minimal shot content and ultra-low dust generation;
Excellent Fabrication and machining capability.

**Applications:**

High-temperature laboratory furnaces;
Experimental thermal processing equipment;
Insulation structural components for industrial furnaces;
Back-up insulation behind dense refractory linings;

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High-temperature insulation panels;
Furnace doors and structural insulation assemblies.

**STD:**

| CCEWOOL® PCW Board 2912 for Fabrication | | | | | |
|---|---|---|---|---|---|
| Classification temp. °C (°F) | 1500(2732) | 1600(2912) | 1700(3092) | 1800(3272) | 1900(3452) |
| Continuous duty temperature, °C(°F) | 1350(2462) | 1400(2732) | 1500(2732) | 1650(3000) | 1800(3272) |
| Density approx. kg/m3 | 350/400 | 350/400 | 350 | 350/400 | 650/700 |
| Linear shrinkage, %(24 hours at max. continuous duty temperature) | | | | | |
| 1400°C | **＜0.5** | | | | |
| 1500°C | | **＜0.1** | | | |
| 1600°C | | | **＜0.5** | | |
| 1700°C | | | | **＜0.5** | |
| 1750°C | | | | | **＜0.2** |
| Chemical Composition (%) | | | | | |
| Al2O3 | 62 | 64 | 75 | 75 | 87 |
| SiO2 | 37 | 35 | 24.5 | 24.5 | 12.5 |
| Other | **＜1** | **＜1** | **＜0.5** | **＜0.5** | **＜0.5** |
| Cr2O3 | - | - | - | - | |
| Thermal conductivity, W/m.K | | | | | |
| 600°C (1120°F) | 0.11 | 0.14 | 0.12 | 0.12 | 0.11 |
| 800°C (1472°F) | 0.15 | 0.17 | 0.15 | 0.16 | 0.14 |
| 1000°C (1832°F) | 0.27 | 0.24 | 0.18 | 0.19 | 0.17 |

## CCEWOOL® PCW Board 3092 for Fabrication



Temperature Grades 1700°C (3092°F)
CCEWOOL® PCW Board 3092 for Fabrication is an advanced polycrystalline wool (PCW) insulation board developed for high-temperature hot-face applications and environments exposed to high-velocity gas flow. The product is manufactured from high-purity polycrystalline fibers using a wet vacuum forming process followed by controlled high-temperature stabilization, resulting in a stable crystalline fiber structure with excellent high-temperature performance.
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belongs to the polycrystalline fiber board category. Compared with conventional industrial-grade fiber boards, it provides higher structural strength, improved dimensional accuracy, and significantly lower shrinkage at elevated temperatures. Under operating conditions up to 1700°C (3092°F), the board maintains excellent structural stability and demonstrates strong resistance to high-velocity gas flow erosion, making it suitable for hot-face areas or environments with intense thermal gas movement.
CCEWOOL® PCW Board 3092 also offers excellent Fabrication compatibility. Its uniform and dense fiber structure allows precise machining, including cutting, drilling, and shaping into engineered components such as burner blocks, flame baffles, and high-temperature insulation assemblies.
CCEWOOL® additionally provides Fabrication customization services, supplying boards in custom thicknesses, special shapes, and complex structural components according to equipment configurations or engineering drawings to meet the design requirements of high-temperature industrial systems.

**Characteristics:**
Engineering-grade polycrystalline fiber insulation board;
Stable structure in operating temperatures up to 1700°C (3092°F);
Excellent resistance to high-velocity gas flow erosion;
High mechanical strength and modulus of rupture;
Outstanding thermal shock resistance;
Minimal shot content and ultra-low dust generation;
Excellent Fabrication and machining capability.

**Applications:**
Hot-face insulation components for industrial furnaces;
Combustion chamber structural parts;
High-temperature gas flow erosion zones;
Burner blocks and flame baffles;
Furnace doors and flame deflection panels;
High-temperature flues and hot gas ducts.

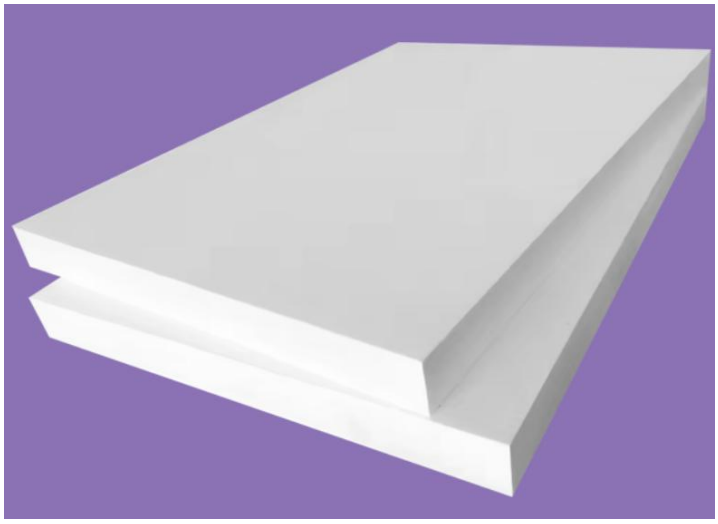
**STD：**

| CCEWOOL® PCW Board 3092 for Fabrication | | | | | |
|---|---|---|---|---|---|
| Classification temp. °C (°F) | 1500(2732) | 1600(2912) | 1700(3092) | 1800(3272) | 1900(3452) |
| Continuous duty temperature, °C(°F) | 1350(2462) | 1400(2732) | 1500(2732) | 1650(3000) | 1800(3272) |
| Density approx. kg/m3 | 350/400 | 350/400 | 350 | 350/400 | 650/700 |

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| Linear shrinkage, %(24 hours at max. continuous duty temperature) | | | | | |
|---|---|---|---|---|---|
| 1400°C | ＜**0.5** | | | | |
| 1500°C | | ＜**0.1** | | | |
| 1600°C | | | ＜**0.5** | | |
| 1700°C | | | | ＜**0.5** | |
| 1750°C | | | | | ＜**0.2** |
| Chemical Composition (%) | | | | | |
| Al2O3 | 62 | 64 | 75 | 75 | 87 |
| SiO2 | 37 | 35 | 24.5 | 24.5 | 12.5 |
| Other | ＜**1** | ＜**1** | ＜**0.5** | ＜**0.5** | ＜**0.5** |
| Cr2O3 | - | - | - | - | |
| Thermal conductivity, W/m.K | | | | | |
| 600°C (1120°F) | 0.11 | 0.14 | 0.12 | 0.12 | 0.11 |
| 800°C (1472°F) | 0.15 | 0.17 | 0.15 | 0.16 | 0.14 |
| 1000°C (1832°F) | 0.27 | 0.24 | 0.18 | 0.19 | 0.17 |

## CCEWOOL® PCW Board 3272 for Fabrication



Temperature Grades 1800°C (3272°F)
CCEWOOL® PCW Board 3272 for Fabrication is a high-performance polycrystalline wool (PCW) insulation board developed for extreme high-temperature furnace lining systems. The product is manufactured from high-purity polycrystalline fibers using a wet vacuum forming process followed by high-temperature sintering, resulting in a highly stable fiber structure with excellent performance in severe thermal environments.
CCEWOOL® PCW Board 3272 for Fabrication belongs to the high-temperature polycrystalline fiber board category. Compared with conventional industrial-grade fiber boards, it offers higher material purity and a more stable crystalline structure. As a result, the board exhibits extremely low linear shrinkage and superior long-term stability when exposed to elevated temperatures. Even under operating conditions

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up to 1800°C (3272°F), the board maintains excellent structural integrity while providing strong resistance to thermal shock and high-velocity gas flow erosion.
CCEWOOL® PCW Board 3272 also provides excellent Fabrication compatibility. The homogeneous structure and high mechanical strength allow the material to be easily cut, drilled, or machined into engineered components such as furnace door panels, flame baffles, and high-temperature structural insulation parts. CCEWOOL® additionally offers Fabrication customization services, supplying boards in custom thicknesses, dimensions, and complex shapes according to furnace lining designs or engineering drawings.

**Characteristics:**
Engineering-grade polycrystalline fiber insulation board;
Maximum operating temperature up to 1800°C (3272°F);
Extremely low linear shrinkage at high temperatures;
Excellent thermal shock resistance;
High mechanical strength and structural stability;
Capable of direct flame exposure;
Minimal shot content and ultra-low dust generation;
Excellent Fabrication and machining capability.

**Applications:**
High-temperature laboratory furnaces
Vacuum furnaces and controlled atmosphere furnaces
High-temperature sintering furnaces
Ceramic kilns
Glass industry furnaces
Hot-face linings for high-temperature equipment
Structural insulation components for extreme temperature environments.

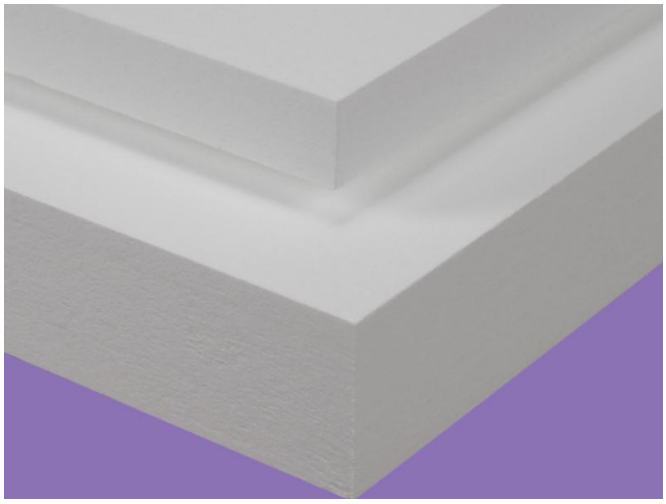
**STD：**

| CCEWOOL® PCW Board 3272 for Fabrication | | | | | |
|---|---|---|---|---|---|
| Classification temp. °C (°F) | 1500(2732) | 1600(2912) | 1700(3092) | 1800(3272) | 1900(3452) |
| Continuous duty temperature, °C(°F) | 1350(2462) | 1400(2732) | 1500(2732) | 1650(3000) | 1800(3272) |
| Density approx. kg/m3 | 350/400 | 350/400 | 350 | 350/400 | 650/700 |
| Linear shrinkage, %(24 hours at max. continuous duty temperature) | | | | | |
| 1400°C | ＜**0.5** | | | | |
| 1500°C | | ＜**0.1** | | | |
| 1600°C | | | ＜**0.5** | | |
| 1700°C | | | | ＜**0.5** | |

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| | | | | | |
|---|---|---|---|---|---|
| 1750°C | | | | | ＜**0.2** |
| Chemical Composition (%) | | | | | |
| Al2O3 | 62 | 64 | 75 | 75 | 87 |
| SiO2 | 37 | 35 | 24.5 | 24.5 | 12.5 |
| Other | ＜**1** | ＜**1** | ＜**0.5** | ＜**0.5** | ＜**0.5** |
| Cr2O3 | - | - | - | - | |
| Thermal conductivity, W/m.K | | | | | |
| 600°C (1120°F) | 0.11 | 0.14 | 0.12 | 0.12 | 0.11 |
| 800°C (1472°F) | 0.15 | 0.17 | 0.15 | 0.16 | 0.14 |
| 1000°C (1832°F) | 0.27 | 0.24 | 0.18 | 0.19 | 0.17 |

## CCEWOOL® PCW Board 3452 for Fabrication



Temperature Grades 1900°C (3452°F)
CCEWOOL® PCW Board 3452 for Fabrication is an advanced polycrystalline wool (PCW) insulation board specifically developed for ultra-high temperature industrial and research equipment. The product is manufactured from high-purity polycrystalline mullite fibers using a wet vacuum forming process followed by high-temperature stabilization treatment. This manufacturing process produces a highly stable fiber structure capable of maintaining structural integrity in extreme temperature environments.

CCEWOOL® PCW Board 3452 for Fabrication belongs to the polycrystalline fiber board category. Compared with conventional industrial fiber boards, it offers significantly higher raw material purity and a more stable crystalline structure. Even under operating conditions up to 1900°C (3452°F), the material maintains very low thermal shrinkage and stable mechanical properties, making it suitable for ultra-high temperature experimental equipment and specialized industrial systems.

CCEWOOL® PCW Board 3452 also provides excellent Fabrication compatibility, allowing precise machining for engineered insulation components. The board can be cut, drilled, or mechanically processed to manufacture complex high-temperature structural parts. CCEWOOL® additionally offers Fabrication customization services, providing boards in custom thicknesses, dimensions, and special shapes according to engineering requirements and equipment designs.

**Characteristics:**

Engineering-grade polycrystalline fiber insulation board;
Ultra-high temperature stability up to 1900°C (3452°F);
Extremely low thermal shrinkage;

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Excellent thermal shock resistance;
High mechanical strength and structural stability;
Capable of direct flame exposure;
Minimal shot content and ultra-low dust generation;
Excellent Fabrication and machining capability.

**Applications:**
Ultra-high temperature laboratory furnaces;
Advanced materials research equipment;
Vacuum high-temperature furnaces;
Specialized ultra-high temperature furnace systems;
Aerospace thermal testing equipment;
High-temperature structural insulation components;
Ultra-high temperature insulation structures;
Custom high-temperature structural insulation parts.

**STD：**

| CCEWOOL® PCW Board 3452 for Fabrication | | | | | |
|---|---|---|---|---|---|
| Classification temp. °C (°F) | 1500(2732) | 1600(2912) | 1700(3092) | 1800(3272) | 1900(3452) |
| Continuous duty temperature, °C(°F) | 1350(2462) | 1400(2732) | 1500(2732) | 1650(3000) | 1800(3272) |
| Density approx. kg/m3 | 350/400 | 350/400 | 350 | 350/400 | 650/700 |
| Linear shrinkage, %(24 hours at max. continuous duty temperature) | | | | | |
| 1400°C | ＜**0.5** | | | | |
| 1500°C | | ＜**0.1** | | | |
| 1600°C | | | ＜**0.5** | | |
| 1700°C | | | | ＜**0.5** | |
| 1750°C | | | | | ＜**0.2** |
| Chemical Composition (%) | | | | | |
| Al2O3 | 62 | 64 | 75 | 75 | 87 |
| SiO2 | 37 | 35 | 24.5 | 24.5 | 12.5 |
| Other | ＜**1** | ＜**1** | ＜**0.5** | ＜**0.5** | ＜**0.5** |
| Cr2O3 | - | - | - | - | |
| Thermal conductivity, W/m.K | | | | | |
| 600°C (1120°F) | 0.11 | 0.14 | 0.12 | 0.12 | 0.11 |
| 800°C (1472°F) | 0.15 | 0.17 | 0.15 | 0.16 | 0.14 |
| 1000°C (1832°F) | 0.27 | 0.24 | 0.18 | 0.19 | 0.17 |