

PPG Architectural Coatings

AQUA-PEL™ Clear Water-Repellent

GENERAL DESCRIPTION

Perma-Crete Aqua-Pel Clear Water-Repellent 4-6100C is a waterborne, penetrating, non-film forming product ideal for use on the interior/exterior, aboveground, vertical and horizontal surfaces.

This product provides excellent water repellency to reduce cracking, spalling, freeze/thaw and chemical damage, mould and mildew growth and dirt pick-up, thereby lengthening substrate life and reducing maintenance cost.

Perma-Crete Aqua-Pel Clear Water-Repellent 4-6100C is ideal for use primarily on architectural concrete, concrete blocks, splitface blocks, pavers, stucco, porous and dense brick, clay tiles, exposed aggregate concrete, sandstone, and slate.

RECOMMENDED SUBSTRATES

Architectural Concrete Brick (Porous & Dense)
Clay Tile Concrete Block (CMU)
Concrete Pavers Exposed Aggregate

Sandstone Slate

Splitface Block

*See "Limitations of use"

CONFORMANCE STANDARDS

- Meets MPI #34 Water-repellent, Clear (Paintable)
- Meets MPI Green Performance Standard (GPS-1)

TINTING AND BASE INFORMATION

4-6100C Clear **DO NOT TINT.**

PACKAGING

3.78 L

PRODUCT DATA

PRODUCT TYPE: Clear Water-Repellent

Silane / Siloxane Emulsion

SHEEN: Not Applicable VOLUME SOLIDS*: $38\% \pm 2\%$ WEIGHT SOLIDS*: $35\% \pm 2\%$ VOC*: < 350 g/L (diluted)

Viscosity: Water thin DENSITY*: 0.95 kg/L

*Product data calculated on product 4-6100C.

SPREADING RATE PER COAT: See table below.

Coverage Rates and Dilution Recommendations (Clean Water)

Substrate	Coverage m²/ 3.78L	Dilution Ratio (4-6100C:Water)
Architectural concrete	14–16	1:14
Concrete block	4 - 5	1:9
Splitface Block	4	1:9
Concrete Pavers	7–9	1:9
Stucco	7–12	1:9
Porous brick	7–9	1:14
Dense brick	9–12	1:14
Clay Tile	9–12	1:14
Exposed Aggregate	12–14	1:14
Sandstone	7–9	1:9
Slate	14–16	1:14

Coverage figures do not include loss due to surface irregularities and porosity or material losses due to application method or mixing.

DRYING: Dry time @ 25°C (77°F); 50% relative humidity.

To Touch: 1 hour For Foot Traffic: 24 hours For Vehicle Service: 72 hours Full curing: 30 days

Drying times listed may vary depending on temperature, humidity, film build, and air movement.

Permissible temperatures during the application:

 Material:
 10 to 38°C
 50 to 100°F

 Ambient:
 10 to 38°C
 50 to 100°F

 Substrate:
 10 to 38°C
 50 to 100°F

CLEANUP: Remove as much product quantity as possible and clean tools with lukewarm soapy water immediately after use.

DISPOSAL: Consult your municipality in order to dispose of paint residues according to environmental regulations. Do not pour down a drain or storm sewer.

FLASH POINT: Over 93°C (200°F)

FEATURES / BENEFITS

Features Benefits

Water-repellent

Protects porous surfaces

Clear

Recoatable

Easy application

Lengthens substrate life and reduces maintenance costs.

Penetrates and seals recommended substrates.

Maintains natural appearance.

Allows flexibility for additional looks and appearances.

Turns jobs faster.

PERFORMANCE DATA

Property Test Method Results

Water repellency ASTM D4446 Passes, no water absorption
Hot Tire Koehler I.C. Passes, no staining or adhesion loss

Adhesion ASTM D3359 Passes Wet & Dry

Before use, be sure to read and follow the instructions and warnings on the label and Safety Data Sheet. See other cautions on the last page.

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LIMITATIONS OF USE

PROTECT FROM FREEZING. USE WITH ADEQUATE VENTILATION. KEEP OUT OF REACH OF CHILDREN.

Perma-Crete Aqua-Pel Clear Water-Repellent 4-6100C is not recommended for below ground applications where hydrostatic pressure can be significant.

All previous sealers and paint must be removed from the substrate surface in order for the product to penetrate and react to provide water repellency.

Apply only when air and surface temperatures are above 10°C (50°F) and at least 3°C (5°F) above the dew point. Air and surface temperatures must remain above 10°C (50°F) for the next 24 hours. Avoid exterior application late in the day when dew and condensation are likely to form or when rain or snow is expected.

Do not overbuild product; two light coats "wet-on-wet" should be applied, avoiding drips and runs.

Substrates, which are coated with *Perma-Crete Aqua-Pel* 4-6100C, at dilution rates of 1:9 or higher can generally, be painted. For dilutions between 1:4 (1 part 4-6100C to 4 parts water) and 1:9 (1 part 4-6100C to 9 parts water), substrate may not be paintable. For dilutions of less than 1:4, substrate will not be paintable.

The product should be allowed to react and cure for at least 30 days prior to the application of additional coatings.

Allow to dry 24 hours before pedestrian traffic and 72 hours before vehicular traffic.

Avoid strong acids.

Clean up oil spills immediately.

This product has a shelf life of 12 months provided the undiluted 4-6100C is stored in a tightly closed container and protected from sunlight. While this product provides a mildew-resistant coating, growth may still occur if the substrate is not properly prepared prior to painting and/or if the substrate is consistently exposed to conditions conducive to mould, mildew, and algae.

Examples of these conditions include, but are not limited to areas that are consistently damp with little to no direct sunlight.

GENERAL SURFACE PREPARATION

Surfaces to be coated must be dry, clean, sound, and free from all paint and contamination including dirt, grease, oil, wax, concrete curing agents and bond breakers, chalk, efflorescence, mildew, rust, product fines, and dust. Remove loose paint, chalk, and efflorescence by wire brushing, scraping, sanding, and/or pressure washing. Putty all nail holes and caulk all cracks or open seams.

Clean the concrete surfaces per ASTM Standard Practice D4258: Standard Practice for Surface Cleaning Concrete for Coating. Vacuum cleaning, water cleaning, detergent water wash, power wash cleaning, steam cleaning, hand tool and mechanical cleaning are acceptable cleaning methods. Remove efflorescence by pressure washing or cleaning with diluted muriatic acid (following the manufacturer's instruction), or a solution of 1 part white vinegar to 4 parts water. Rinse thoroughly and allow substrate to dry to moisture content under 12%. Eliminate stains caused by mildew with a solution of household bleach (1 part household bleach to 3 parts of water).

Before use, carefully read product label and follow directions for its use.

PRECAUTION: Dry sanding will give rise to dust and/or hazardous fumes. Wet sanding should be used wherever possible. Wear suitable respiratory protective equipment when exposure cannot be avoided by adequate local ventilation. WARNING! If you scrape, sand, or remove old paint, you may release lead dust. LEAD IS TOXIC. EXPOSURE TO LEAD DUST OR FUMES CAN CAUSE SERIOUS ILLNESS, SUCH AS BRAIN DAMAGE, ESPECIALLY IN CHILDREN. PREGNANT WOMEN SHOULD ALSO AVOID EXPOSURE. Wear a properly fitted NIOSH-approved respirator and prevent skin contact to control lead exposure. Contact a regional Health Canada office for more information. Follow these instructions to control exposure to other hazardous substances that may be released during surface preparation.

BRICK: New brick and mortar should cure for at least 30 days and preferably 90 days prior to product application. The pH of the substrate

must be less than 10. Sealing glazed brick is not recommended.

CONCRETE & MASONRY BLOCK: New concrete should cure for at least 30 days and preferably 90 days prior to product application. The

pH of the substrate must be less than 10 before sealing.

CONCRETE/MASONRY BLOCK: Mortar should cure for at least 30 days and preferably 90 days prior to painting. The pH of the substrate

must be less than 10.

Contact your local representative for any additional surface preparation guidelines.

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RECOMMENDED PRIMERS

None

Refer to surface preparation for specific recommendations.

APPLICATION INFORMATION

KEEP OUT OF REACH OF CHILDREN. USE WITH ADEQUATE VENTILATION. Read all label and Safety Data Sheet (SDS) information prior to use. SDS are available from your retailer, through our website or by calling 1-800-463-7426.

Stir thoroughly before use and occasionally when in use. *Perma-Crete Aqua-Pel* Clear Water-Repellent 4-6100C must be blended with water (tap water is suitable) to achieve the desired concentration before application.

Two light coats of the solution should be applied using a "wet-on-wet" procedure to ensure complete coverage.

Can be applied by brushing, spraying or dipping.

To achieve the best results for vertical applications, start at the bottom of the wall and work in left/right — right/left and upward.

Maximum water repellency is realized in 72 hours, depending on curing conditions. The beading effect generally improves over time.

Note: Cover or protect surrounding surfaces where the product is not desired.

Application Equipment: Apply by airless sprayer, conventional sprayer, conventional garden sprayer or high quality brush.

Thinning: Recommended dilutions and approximate coverage rates are shown in the table in "Product Data" section.

Note: For optimum performance, all diluted material must be applied within the same day of preparation.

For most applications, a dilution ratio of 1:9 (1 part 4-6100C to 9 parts water) is recommended and will provide good performance depending on the absorbency of the substrate.

Dilution and coverage ratios have been established to US Federal Specification SS-W-110C performance requirements.

For dilutions of less than 1:9 (1 part 4-6100C to 9 parts water), substrate may not be paintable.

The product should be allowed to react and cure for at least 30 days prior to the application of additional coatings (see Limitations of Use).

PRECAUTIONS

Keep out of the reach of children. Keep containers tightly closed and sealed until ready for use.

Before using the products listed in this publication, carefully read each product label and follow directions for its use. Use personal protective equipment as required. Avoid the inhalation of dust, particulates, spray or mist arising from the application of this preparation.

CAUSES BURNS. DANGEROUS FUMES FORM WHEN MIXED WITH OTHER PRODUCTS. Do not mix with acid. Do not swallow. Do not get in eyes. Do not get on skin or clothing. Do not breathe fumes. Use only in a well-ventilated area. Handle with care. Wear protective gloves and eye/ face protection: Chemical splash goggles or face shield. Use chemical resistant, impervious gloves. Wear appropriate respirator when ventilation is inadequate.

The product may not be stable under certain conditions of storage or use: high temperature/pressure hazard.

FIRST AID: If swallowed, rinse mouth with water (only if the person is conscious). Call physician immediately. Do not induce vomiting unless directed to do so by medical personnel. If in eyes, rinse with water for 15 minutes. Check for and remove any contact lenses. In case of contact, immediately flush skin with plenty of water while removing contaminated clothing and shoes. Get medical attention if irritation develops. If inhaled, remove to fresh air. If experiencing respiratory symptoms call poison centre or doctor/physician. For workplace use, an SDS are available from your retailer, through our website or by calling 1 800 463-7426.

EMERGENCY SPILL INFORMATION: 1 514 645-1320 or 1 800 463-7426.

LIMITED WARRANTY

PPG Architectural Coatings Canada, Inc. warrants performance of its products to its intended use if properly applied in accordance with the label directions and the specifications of the technical data sheet. Having no control over the application methods and conditions or the circumstances related to its use, no other warranty, expressed or implied, statutory or otherwise is given. This limited warranty extends only to the original purchaser of the product and is not transferable or assignable. If the product fails to conform to this limited warranty, we will, at your option, furnish replacement product or refund the purchase price. This limited warranty excludes (1) labour or costs of labour for the application or removal of any product and (2) all other direct, incidental, special or consequential damages.

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