

# WATERPROOFING MEMBRANES



## INNOVATIVE SOLUTIONS FOR CERAMIC AND STONE TILE

### BONDED WATERPROOF MEMBRANES AND VAPOR RETARDERS

Ceramic and stone tiles are durable, easy to maintain, and hygienic, representing ideal surface coverings in wet areas. However, since tiles and grout are not inherently waterproof, it is essential to protect the substrate from moisture penetration.

#### Application and Function

**8.1 Schluter®-KERDI** is a pliable, sheet-applied, bonded waterproof membrane and vapor retarder with limited crack-bridging capabilities. It is made of soft polyethylene, which is covered on both sides with a special fleece webbing to anchor the membrane in the thin-set mortar. The gridlines, which are printed on the surface, are helpful for neat and quick cuts and installation.

KERDI was developed as a waterproofing membrane to be used in conjunction with ceramic and stone tile coverings. Tiles can be installed directly on KERDI using the thin-bed method. Other trowel-applied covering materials, such as plaster, can also be used.

**Schluter®-KERDI-DS** is a bonded waterproofing membrane and vapor retarder with very low water vapor permeance for use in continuous use steam rooms and similar applications.

Various KERDI waterproofing accessories are available. Use KERDI-BAND, in widths of 5" (12.5 cm), 7-1/4" (18.5 cm), or 10" (25 cm) to seal butt joints or corner joints. KERDI-FLEX, in 5" (12.5 cm) or 10" (25 cm) widths, is used to seal expansion joints or flexible edge joints.

Preformed, seamless corners include the following. KERDI-KERECK-F are used to



**8.1 Schluter®-KERDI**  
**8.1 Schluter®-KERDI-DS**

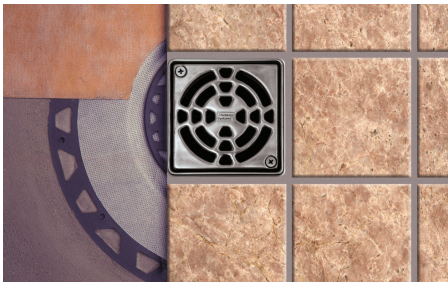
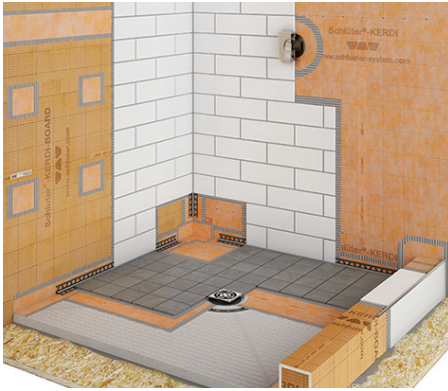
seal 90° inside and outside corners. KERDI-KERS-B are used to seal 135° corners at triangular shower benches and neo-angle shower curbs. KERDI-KERS are used to seal floor/wall/shower base connections in curbless shower applications where the KERDI-LINE linear drain is installed adjacent to the wall.

KERDI-SEAL-PS/-MV are prefabricated sections of KERDI with overmolded rubber gaskets that are used to seal pipe protrusions through the KERDI waterproofing membrane (e.g., at showerheads and tub spouts) and protect moisture-sensitive backing panels at the mixing valve.



#### Material Properties and Areas of Application

KERDI features a modified polyethylene (PEVA) core with non-woven polypropylene on both sides. The surface of the KERDI has gridlines consisting of 3/8" x 3/8" (10 mm x 10 mm) squares printed on one side. KERDI-DS features a high-density polyethylene (HDPE) core with non-woven polypropylene on both sides. The material is physiologically safe and does not require special disposal. KERDI is 8-mil thick and has a water vapor permeance of 0.90 perms, when tested according to ASTM



Schluter®-KERDI-DRAIN assembly with Schluter®-KERDI waterproofing membrane.

E96, using Procedure E at 90% relative humidity. KERDI-DS is 20-mil thick and features additives to produce a water vapor permeance of 0.19 perms.

KERDI and KERDI-DS are waterproof and resistant to most chemicals commonly encountered in tiled environments. They are resistant to aging and will not rot. KERDI and KERDI-DS are highly resistant to saline solutions, acid and alkaline solutions, many organic solvents, alcohols, and oils. Information regarding their resistance to specific substances can be provided if concentration, temperature, and duration of exposure are known. For acid-resistant coverings, use an epoxy adhesive to set and grout the tile.

KERDI and KERDI-DS are used on wall and floor surfaces where protection against the penetration of moisture or other harmful substances is necessary. KERDI is suitable for use in showers, intermittent use steam showers, tub surrounds, and areas surrounding interior swimming pools. Industrial applications include the food industry, breweries, and dairies. KERDI-DS is suitable for use in continuous use steam rooms and other applications with similar vapor management requirements. Before placing the membranes, verify that the substrate is clean, even, and load bearing.

Surfaces that inhibit proper adhesion must be removed or appropriately treated.

KERDI and KERDI-DS meet the American National Standard for Load Bearing, Bonded, Waterproof Membranes for Thin-Set Ceramic Tile and Dimension Stone Installations (ANSI A118.10). The membranes are listed by cUPC® and evaluated by ICC-ES (Report Nos. ESR-2467 and PMG-1204). For copies of these documents, please contact Schluter®-Systems at 800- 472-4588 (USA) or 800-667-8746 (Canada) or by e-mail at [info@schluter.com](mailto:info@schluter.com). Links to the documents can also be accessed at [www.schluter.com](http://www.schluter.com).

KERDI and KERDI-DS have been evaluated according to the "Standard Method for the Testing and Evaluation of Volatile Organic Chemical Emissions from Indoor Sources Using Environmental Chambers, Version 1.1" for California Specification 01350 and found to comply with the VOC requirements. California Specification 01350 is referenced by various green building standards and rating systems.

### Installation

1. The substrate must be clean, even, and load bearing. The thin-set mortar used for bonding KERDI must be appropriate for the substrate, and it must penetrate and engage the KERDI fleece. Cut KERDI to size prior to application.
2. Apply thin-set mortar to the substrate using a 1/4" x 3/16" (6 x 5 mm) V-notched trowel or the KERDI-TROWEL, which features a 1/8" x 1/8" (3 x 3 mm) square-notched design (Note the open time of the mortar). Press KERDI fully into the bond coat. Work the KERDI into the mortar by applying pressure to the membrane with the flat side of the trowel (held at an angle) in smooth, diagonal sweeps. Air bubbles must be avoided.
3. Seams can be constructed by overlapping the edges of the KERDI 2" (5 cm) using Schluter SET®, Schluter ALL-SET®, Schluter FAST-SET®, or unmodified thin-set mortar, or by abutting the edges and covering the joint with KERDI-BAND using Schluter SET®, Schluter ALL-SET®, Schluter FAST-SET®, or an unmodified thin-set mortar.
4. For inside and outside corners, adhere pre-formed KERDI-KERECK-F corners. For floor/wall connections, use KERDI-BAND. Install KERDI-SEAL-PS pipe seals at showerhead, body sprays,

etc. and KERDI-SEAL-MV at the mixing valve. As an alternative to KERDI-SEAL-PS/-MV, KERDI-FIX or other suitable sealant can be used to seal pipe protrusions and protect moisture-sensitive solid backing panels at the mixing valve.

5. Connections to fixed building elements can be achieved by using KERDI, KERDI-BAND, or KERDI-FLEX in conjunction with KERDI-FIX, suitable trowel-applied waterproofing materials (such as urethane or similar), that require atmospheric moisture to cure, or other suitable sealing compounds.
6. KERDI shall be separated at existing expansion, structural, and flexible edge joints. Cover the joints with KERDI-FLEX. To allow for greater movement, the center section of the KERDI-FLEX can be tucked into the cavity of the expansion joint prior to bonding.
7. Once the entire membrane—with seams, corners, and connections—has been completely bonded, and therefore waterproofed, the covering may be applied.

#### **Note: Water testing of the assembly**

Prior to setting tile, wait 24 hours to allow for final set of the mortar before testing to ensure waterproof performance of the assembly at seams and connections.

8. For tile installations using the thin-bed method, apply unmodified thin-set mortar directly to the exposed KERDI surface and install the tiles, ensuring full coverage. For acid-resistant coverings, use an epoxy adhesive to set and grout the tile.

#### **Connection to Schluter®-KERDI-DRAIN**

KERDI-DRAIN is a floor drain specifically designed to allow connections to KERDI or other bonded waterproof membranes, typically in shower applications. When adhering KERDI to KERDI-DRAIN, the membrane must be held back to the step in the fleeced bonding flange. Apply Schluter SET®, Schluter ALL-SET®, Schluter FAST-SET®, or unmodified thin-set mortar to the bonding flange using a 1/4" x 3/16" (6 x 5 mm) V-notched trowel or the KERDI-TROWEL, which features a 1/8" x 1/8" (3 x 3 mm) square-notched design. Firmly press KERDI into the mortar with the flat side of the trowel to ensure 100% coverage and a watertight seal. When using the stainless steel KERDI-DRAIN bonding flange, KERDI is adhered to the flange with KERDI-FIX. The flange must be clean and free of grease



or other contaminants prior to KERDI-FIX application.

Relevant industry standard guidelines for floor drains with integrated bonding flange include method B422 in the Tile Council of North America's (TCNA) Handbook for Ceramic, Glass and Stone Tile Installation and Method 326DR in the Terrazzo, Tile and Marble Association of Canada (TTMAC) Specification Guide 09300 Tile Installation Manual. Please contact Schluter®-Systems for the Schluter®-Shower System installation video and Floor Drains Technical Data Sheet.

**Notes:**

1) For complete installation guidelines and warranty criteria for showers, steam showers, steam rooms, and bathtub surrounds, please contact Schluter®-Systems for a copy of the Schluter®-Shower System Installation Handbook (USA: 800-472-4588; Canada: 800-667-8746), or download it from our website at [www.schluter.com](http://www.schluter.com).

2) Various configurations of KERDI-DRAIN and KERDI-LINE are listed by ICC-ES (Report No. PMG-1204), UPC® (IGC 195) and CSA (B79). For copies of the above listings, please contact Schluter®-Systems at 800-472-4588 (USA) or 800-667-8746 (Canada) or by e-mail at [info@schluter.com](mailto:info@schluter.com). Links to the above listings can also be accessed at [www.schluter.com](http://www.schluter.com).

**Product Item Numbers**



8.1 Schluter®-KERDI			Waterproofing membrane	
Item No.	Length	Area	Thickness	
Roll width: 1 m - 3' 3"				
KERDI 200/5M	16' 5" - 5 m	54 ft <sup>2</sup> - 5 m <sup>2</sup>	8 mil	
KERDI 200/7M	23' - 7 m	75 ft <sup>2</sup> - 7 m <sup>2</sup>	8 mil	
KERDI 200/10M	33' - 10 m	108 ft <sup>2</sup> - 10 m <sup>2</sup>	8 mil	
KERDI 200/20M	65' 7" - 20 m	215 ft <sup>2</sup> - 20 m <sup>2</sup>	8 mil	
KERDI 200	98' 5" - 30 m	323 ft <sup>2</sup> - 30 m <sup>2</sup>	8 mil	
Roll width: 2 m - 6' 7"				
KERDI 200200/15M	49' 2-1/2" - 15 m	323 ft <sup>2</sup> - 30 m <sup>2</sup>	8 mil	
KERDI 200200	98' 5" - 30 m	646 ft <sup>2</sup> - 60 m <sup>2</sup>	8 mil	

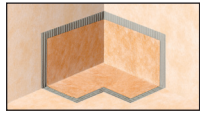
8.1 Schluter®-KERDI-DS			Waterproofing membrane	
Item No.	Width	Length	Area	Thickness
KERDI-DS	3' 3" - 1 m	98' 5" - 30 m	323 ft <sup>2</sup> - 30 m <sup>2</sup>	20 mil



8.1 Schluter®-KERDI-BAND			Waterproofing strip	
Item No.	Width	Length	Thickness	
KEBA 100/125/5M	5" - 12.5 cm	16' 5" - 5 m	4 mil	
KEBA 100/125/10M	5" - 12.5 cm	33' - 10 m	4 mil	
KEBA 100/185/5M	7-1/4" - 18.5 cm	16' 5" - 5 m	4 mil	
KEBA 100/250/5M	10" - 25 cm	16' 5" - 5 m	4 mil	
KEBA 100/125	5" - 12.5 cm	98' 5" - 30 m	4 mil	
KEBA 100/185	7-1/4" - 18.5 cm	98' 5" - 30 m	4 mil	
KEBA 100/250	10" - 25 cm	98' 5" - 30 m	4 mil	

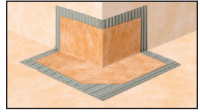


8.1 Schluter®-KERDI-FLEX			Waterproofing strip for use above movement joints	
Item No.	Width	Length	Thickness	
FLEX 125/5M	5" - 12.5 cm	16' 5" - 5 m	12 mil	
FLEX 250/5M	10" - 25 cm	16' 5" - 5 m	12 mil	
FLEX 125/30	5" - 12.5 cm	98' 5" - 30 m	12 mil	
FLEX 250/30	10" - 25 cm	98' 5" - 30 m	12 mil	



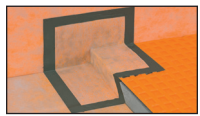
**8.1 Schluter®-KERDI-KERECK-F** Preformed corner

Item No.	Thickness	Packaging
KEREC /FI 2	4 mil	2 inside corners
KERECK/FI 10	4 mil	10 inside corners
KERECK/FA 2	4 mil	2 outside corners
KERECK/FA 10	4 mil	10 outside corners



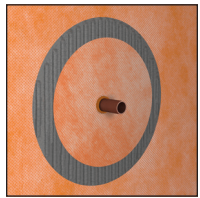
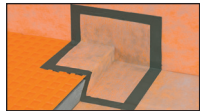
**8.1 Schluter®-KERDI-KERS-B** Preformed corner

Item No.	Thickness	Description	Packaging
KERECK 135 FI 2	4 mil	Inside corner, 135°	2 units
KERECK 135 FI 10	4 mil	Inside corner, 135°	10 units
KERSB 135 K LR	4 mil	Bench corners	1 right and 1 left
KERSB 135 K 5LR	4 mil	Bench corners	5 right and 5 left
KERSB 135 K	4 mil	Bench/ neo-angle corner kit	1 right and 1 left bench corner, and 2 135° inside corners



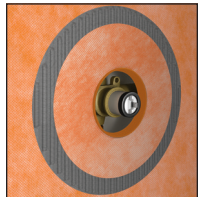
**8.1 Schluter®-KERDI-KERS** Preformed corner

Item No.	Thickness	Packaging
KERS 20 L	4 mil	Left inside corner - 20 mm
KERS 28 L	4 mil	Left inside corner - 28 mm
KERS 20 R	4 mil	Right inside corner - 20 mm
KERS 28 R	4 mil	Right inside corner - 28 mm



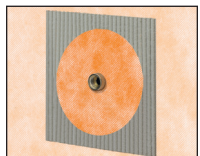
**8.1 Schluter®-KERDI-SEAL-PS** Pipe seal with over-moulded rubber gasket

Item No.	Pipe nipple opening diam.	Thickness	Packaging
KMS 185/12	1/2" - 12.5 mm	4 mil	1 unit
KMS 185/20	3/4" - 20 mm	4 mil	1 unit
KMS 10185/12	1/2" - 12.5 mm	4 mil	10 units
KMS 10185/20	3/4" - 20 mm	4 mil	10 units



**8.1 Schluter®-KERDI-SEAL-MV** Mixing valve seal with over-moulded rubber gasket

Item No.	Mixing valve opening diam.	Thickness	Packaging
KMSMV 235/114	4-1/2" - 114 mm	4 mil	1 unit
KMSMV 10235/114	4-1/2" - 114 mm	4 mil	10 units



**8.1 Schluter®-KERDI-KM** Pipe seal

Item No.	Dimensions	Thickness	Packaging
KM 5117/22	7" x 7" - 17 x 17 cm	4 mil	5 units

Hole diameter,  $\phi = 7/8" - 22 \text{ mm}$



**Schluter®-KERDI-TROWEL** Trowel

Item No.	Notch size	Packaging
TRL-KER6	1/8" x 1/8" - 3 x 3 mm	6 units
TRL-KER	1/8" x 1/8" - 3 x 3 mm	1 unit

**Schluter®-KERDI-FIX** Adhesive/sealant

Item No.	Description
KERDIFIX + <i>color*</i>	Cartridge - 9.81 oz - 290 ml
KERDIFIX 100 G	Tube - 3.38 oz - 100 ml

**\*Color Codes**



To complete the item number, add the *color* code (e.g., KERDIFIX / *BW*).









## Schluter®-KERDI and Schluter®-KERDI-DS Waterproofing Membrane 10-Year Limited Warranty

**LIMITED WARRANTY COVERAGE:** Subject to the conditions and limitations as stated in this **Schluter®-KERDI and Schluter®-KERDI-DS Waterproofing Membrane 10-Year Limited Warranty** (the “**Limited Warranty**”), Schluter Systems warrants that its Schluter®-KERDI and Schluter®-KERDI-DS waterproofing membranes (the “**Products**”) will be free from manufacturing defects and will perform as described in the Schluter®-Shower System Installation Handbook and Schluter® Waterproofing Membranes Technical Data Sheet (collectively, the “**Written Materials**”) for a period of ten (10) years from the date of purchase when installed and used in accordance with the terms and conditions of the Written Materials and industry standard guidelines that are not in conflict with the Written Materials in effect at the time of installation.

For the purposes of this Limited Warranty, “**Owner**” is defined as the original end user of the property in which the Products are installed; and “**Tile Assembly**” is defined to include the Products, non-reusable tile surfaces, and applicable setting and grouting materials.

This Limited Warranty is only applicable to installations in the United States of America and Canada. Schluter Systems is not responsible or liable under any circumstances for determining the suitability of the Products for the Owner’s intended purpose. It is the responsibility of the Owner to consult with an experienced and professional installer to ensure the suitability of the Products, subfloor/substrate and all building materials in the installation and that the Written Materials are followed properly.

**RESOLUTION:** If the Products are installed and used in accordance with the terms and conditions as described hereinabove and such Products are proven defective within the applicable warranty term, the Owner’s exclusive remedy and the sole obligation of Schluter Systems, at its election, shall be to (a) reinstall or replace the failed portion of the Tile Assembly or (b) pay an amount not to exceed the original square foot cost of the installation of the Tile Assembly verified to be defective. Due to conditions beyond the control of Schluter Systems (e.g., color and shade availability, discontinuation, normal wear and tear), Schluter Systems cannot guarantee or warrant an exact match to the specific tile, stone, or other flooring materials used in the original installation. In such event, substantially similar materials may be substituted..

**EXCLUSIONS FROM COVERAGE:** This Limited Warranty excludes and in no event shall Schluter Systems have any liability for any indirect, special, incidental, punitive, exemplary, or consequential damages, including lost profits, arising out of or otherwise connected to the failure of the Products, regardless of any strict liability or active or passive negligence of Schluter Systems, and regardless of legal theory, whether in contract, tort, extra-contractual or other. This Limited Warranty further excludes any loss or damage arising out of or otherwise connected to: acts of war, terrorism, fire, explosion, natural disaster, acts of God, any failure to comply with the Written Materials, inadequate subfloor/substrate, improper preparation or other failure of subfloor/substrate, faulty or negligent penetration of the Products or subfloor/substrate, intentional acts of destruction, structural failure, misuse of or failure to maintain the Products, normal wear and tear, scratches, dents, corrosion or discoloration (whether caused by excessive heat, chemical cleaning products, abrasive agents or otherwise), efflorescence and shading which are a natural occurrence with cementitious materials and are not considered a defective condition for the purposes of this Limited Warranty, variations of texture, color or shade from those on product samples, packaging materials or other marketing materials, or other causes unrelated to the Products (e.g. excess point loading, overvoltage). This Limited Warranty excludes exterior applications, unless specifically approved in writing on a case by case basis by the Schluter Systems Technical Services Director.

This Limited Warranty is conditioned and will be considered null and void and Schluter Systems will have the right to refuse any claims if: (a) the Products have been improperly stored or installed, or (b) the Products are subject to abusive or abnormal use, lack of maintenance, or used in a manner other than that for which the Products were designed or in any way contrary to the Written Materials

**DISCLAIMER:** There are no warranties beyond this expressed warranty as stated herein. To the extent permitted by law, all other warranties, representations or conditions, expressed or implied, are hereby disclaimed and excluded, including but not limited to the implied warranties of **MERCHANTABILITY** or **FITNESS FOR A PARTICULAR PURPOSE** (as limited to such purposes as described in the Written Materials) or arising from a course of dealing, usage of trade or otherwise by law. ANY IMPLIED WARRANTIES ARISING BY OPERATION OF LAW ARE LIMITED IN DURATION TO THE TERM OF THIS LIMITED WARRANTY. NO REPRESENTATION, PROMISE, AFFIRMATION OR STATEMENT BY ANY EMPLOYEE OR AGENT OF SCHLUTER SYSTEMS WILL BE ENFORCEABLE AGAINST SCHLUTER SYSTEMS UNLESS IT IS SPECIFICALLY INCLUDED IN THIS LIMITED WARRANTY OR AUTHORIZED IN WRITING BY THE SCHLUTER SYSTEMS TECHNICAL SERVICES DIRECTOR. This Limited Warranty is given in lieu of any other warranty, whether expressed or implied. The remedies contained herein are the only remedies available for breach of this Limited Warranty. Schluter Systems excludes and in no event shall have any liability for any indirect, special, incidental, punitive, exemplary, or consequential damages, including lost profits, arising out of or otherwise connected to failure of the Products or Tile Assembly. This Limited Warranty extends only to the Owner and is not transferable or assignable unless authorized by written agreement and signed by the Schluter Systems Technical Services Director or otherwise prohibited by specific state or provincial law. This Limited Warranty gives you specific legal rights; some states and provinces do not allow disclaimers or other restrictions of implied warranties; some of the above disclaimers may not apply to you. **No changes or modifications of any terms or conditions of this Limited Warranty are permitted unless duly authorized in writing by the Schluter Systems Technical Services Director.** This Limited Warranty shall supersede and replace any and all prior oral or written warranties, agreements, or other representations made by or on behalf of Schluter Systems relative to the Products or the application of the Products and shall apply to any installation occurring on or after January 1, 2018. If the Schluter®-KERDI or Schluter®-KERDI-DS waterproofing membrane are used in conjunction with other Schluter products, a different Schluter warranty may apply. For the most current information and materials regarding Schluter Systems warranties and programs, please visit [https://www.schluter.com/schluter-us/en\\_US/downloadfiles](https://www.schluter.com/schluter-us/en_US/downloadfiles).

**MAKING A CLAIM:** To make a claim under this Limited Warranty, the Owner must provide Schluter Systems<sup>2</sup> with written notice within thirty (30) days of any alleged defect in the Products covered by this Limited Warranty, together with date and proof of purchase of such Products and/or all of its components and name and address of all installers and all invoices related to the original installation, failing which this Limited Warranty shall have no legal effect<sup>3</sup>. Schluter Systems reserves the right at its election and as a condition of this Limited Warranty to inspect the alleged failed and/or defective Products.

All U.S. Claims shall be sent to:

Schluter Systems L.P.  
Attn: Warranty Claims Dept.  
194 Pleasant Ridge Road  
Plattsburgh, NY 12901-5841

All Canadian Claims shall be sent to:

Schluter Systems (Canada), Inc.  
Attn: Warranty Claims Dept.  
21100 chemin Ste-Marie  
Ste-Anne-de-Bellevue, QC H9X 3Y8

<sup>1</sup> If there are any conflicting terms between any Written Materials, the most recently updated document shall be deemed to control.

<sup>2</sup> This Limited Warranty is limited to sales of the Products made in and intended for use in the United States and Canada. For the purposes of this Limited Warranty, Schluter Systems L.P. shall offer warranty coverage to Owners located in the United States, and Schluter Systems (Canada) Inc. shall offer warranty coverage to Owners located in Canada.

<sup>3</sup> In the event that Owner fails to provide such required invoices relating to the original installation, Schluter Systems shall pay Owner an amount equal to the average, reasonable costs of a comparable installation. If the parties fail to agree on such amount, such dispute shall promptly, and in the first instance, be submitted: (a) if a U.S. claim, to arbitration in Clinton County, New York, in accordance with the rules of the American Arbitration Association, or (b) if a Canadian claim, in the Province of Quebec, Canada, in accordance with the ADRIC Arbitration Rules. Any outcome of such arbitration proceeding shall be final and binding upon the parties hereto.



**Schluter Systems L.P.** • 194 Pleasant Ridge Road, Plattsburgh, NY • 12901-5841 • Tel.: 800-472-4588 • Fax: 800-477-9783  
**Schluter Systems (Canada) Inc.** • 21100 chemin Ste-Marie, Ste-Anne-de-Bellevue, QC H9X 3Y8 • Tel.: 800-667-8746 • Fax: 877-667-2410

[www.schluter.com](http://www.schluter.com)

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