FLEXIROCKS®

Safer Surfacing®

INSTALLATION INSTRUCTIONS

SURFACE PREPARATION

STEP 1

"Green" or *newly poured* concrete must be left to cure for a minimum of 30 days after being poured. The surface must be free of loose debris and dry before rubber surfacing is applied.

The moisture from the newly poured concrete must fully evaporate before the surface can be laid. If there is moisture still present in the concrete it will cause the resin to cure faster and results in a higher risk of de-lamination.

Even if a drying accelerator is used it can cause the rubber surfacing to cure too quickly and cause improper bonding.

You must always wait 30 days after concrete has been poured to apply rubber surfacing.

EXISTING CONCRETE & OTHER MASONRY SURFACES

Ensure all loose substrates have been removed. This includes loose aggregate, oils, glues, paints or concrete seal coatings.

Some chemicals react poorly with the resin and cause a weak bond between the rubber and the substrate. Taking the time in the beginning to ensure that your substrate is free from foreign materials will ensure that you have a strong and smooth bond the first time.

Pressure washing or scarifying may be needed for some jobs to remove foreign materials.

TILES OR GLAZED SUBSTRATES

When installing rubber surfacing on top on glazed substrate you first must remove the glazed surface or coating.

It is recommended to do a test patch in a small, hidden area of the substrate to see if the product will adhere before beginning the full installation. If the rubber does not stick, it is likely that the glazed coating is still present.

CARPET

Rubber surfacing cannot be installed on top of carpet. All carpet, glue and other components must be removed before installation.

JOINTS, BORDERS & EDGES

As rubber surfacing is designed to expand and contract up to 40% expansion joints must be cleaned and ground prior to installing the rubber surface.

A key joint necessary to finish the surface when troweled to a completed edge. Key joints are cut using an angle grinder at 45º to a 3/8" depth.

A border material such as aluminum or plastic angle (3/8" profile) is adequate protection for leading or wearing edge.

PREPARING EDGES & COPING

Tape off any areas that may come in contact with resin, these include: coping, pool stairs, concrete surrounds, and any other edges that should remain the same after installation.

MIXING WITH MORTAR MIXER (4-GALLON)

STEP 2

When mixing with a paddle mortar mixer or a low speed drill, pour 18 liters of rubber granules in the mixer and 2 liters of resin into an approx 14 gallon mixer bucket (9:1 ratio). Mix the rubber and resin for 1 – 2 minutes, ensuring to properly coat every rubber granule with resin. Do not exceed 3 minutes of mixing. Over mixing occurs when pressure builds up in the mixer causing the resin to cure prematurely.

Once the rubber is fully coated with resin it must be troweled within 15 minutes. If the mixture is left to sit untouched for longer than 15 minutes it can begin to cure and will have to be discarded. Each installation time will vary depending on individual installers' experience and skill. It is important for the designated mixer to monitor the troweler(s) progress and time the mixes accordingly. This is especially important nearing the end of installations to reduce the amount of excess rubber waste.

MIXING COLORS

Some installations may require two or more colors to be combined to create a custom colored surface.

Bucket Mixing

This process consists of marking off an 18 liter (5-gallon) buckets using tape to the appropriate ratios for each color. Then the buckets are labeled with their correct color names. The mixer then uses the marked bucket as measuring guides to pour each of the necessary colors into the mixer and adding resin.

Bucket mixing allows for the mixing station to remain clean, which is why it is the recommended way to mix colors.

SANITATION

During the mixing process, every third mix the bucket must be cleared using a margin trowel. This is done by scraping the stuck rubber off the edges and sides of the bucket. This rubber can remain in the mixer and be mixed in with the next batch.

After the mixing is done, it is vitally important to clean the mixer with a brush and Xylene as a solvent. This eliminates rubber and resin from curing inside the bowl. The excess rubber can be made into samples or discarded as waste.

WARNING!

Mixing time and capacity can change depending on the type of mortar mixer used. Ensure to read all instructions and manuals before beginning mixing.

FLEXIROCKS®

Safer Surfacing®

PRIMING THE SURFACE

STEP 3

The substrate must be properly primed before installing rubber surfacing. Prime the substrate with a very light application of resin using any 3/8" nap roller.

Priming is done in approximately 20 square feet at a time. As the primer will soak into the substrate, it is important to work in sections when completing a job to not allow the primer to soak completely into the substrate or dry before the rubber granules are poured.

Do a test patch before priming the substrate to test how long the primer is soaking into the substrate. Apply the primer to a small section of the substrate and wait 10 minutes. If the primer is soaking into the substrate too quickly it can result in de-lamination. If this occurs decrease the size of the section being primed at one time to ensure that the rubber can be troweled before the primer is absorbed. Applying another coat of primer is recommended in situations where the substrate is quickly absorbing the primer.

Primer is applied to all substrates and contacting edges. Use a paint brush to cover all edges of the installation area with primer. This includes concrete pathways, manhole covers, and other contacting edges. Then use a roller to apply a layer of primer to the rest of the selected substrate area.

Priming can also be done in smaller sections so that the trowelers are not kneeling in primer during installation. Although this process is cleaner, it is often more time consuming for beginners.

USE TAPE TO PROTECT BOARDERS. PRIMER AND RESIN STAIN ALL MATERIALS THEY TOUCH. BEWARE OF WALKING THROUGH PRIMED SECTIONS.

APPLICATION

STEP 4

Start with an area no larger than 20 square feet. Pour 1/3 of the rubber and resin mixture directly onto the primed substrate. Starting from one end press out the rubber evenly and firmly. Trowel forward with the trowel at a 1mm angel (almost flat) to ensure the rubber does not catch the trowel. The pull the trowel back to you at a 15º angel, applying pressure to spread the granules level. These motions will be repeated until the slightest resistance is felt. Between these motions it may be required to use Xylene as a solvent if the rubber granules are sticking to the trowel.

To achieve a certain thickness, you can use a piece of rebar or wood as a tool to ensure consistent thickness application. Lay the tool between yourself and the area to be resurfaced for easier visual guidance during the troweling process.

DIESEL FUEL IS NOT RECOMMENDED AS A SOLVENT AND WILL AFFECT THE CURE RATE AND PERFORMANCE AND CURE RATE OF THE RESIN. THE USE OF DIESEL FUEL DURING INSTALLATION WILL VOID ANY AND ALL WARRANTY CLAIMS.

When satisfied with the surface, clean the trowel a last time using solvent. Then go over the area for a last time to give it a shiny, even, smooth finish.

Look from several different view points to ensure no uneven areas or trowel marks are present. The mixer is also responsible for looking for any imperfections that the troweler(s) may not see during installation. The mixer should survey the site between mixes looking for imperfections on the surface. Clean the mixer bucket at least every third mix to ensure dried rubber does not accumulate and blemish new batches.

Take photos of your installation to identify shadows in the surface. These are often open spots that will need to be closed before proceeding.

Trowel marks, mistakes and thin spots are easier to fix during installation rather than after. Rubber surfacing cannot be shaved or sanded to fix imperfections. All imperfections that are visible after installation must be cut out and new rubber applied.

MULTI-DAY INSTALLATIONS

For installations lasting longer than one day the placement of the cold joint must be decided prior to beginning installation.

The narrowest place in the installation is best place as it is less visible when smaller. Once the cold joint spot is reached, leave a jagged or natural edge at full thickness. On the next day of installation, lay freshly mixed rubber and trowel into the cold joint. A screwdriver may also be used to break away some of the rubber from the cured edge to create a more seamless bond. This may be necessary for installations where the cold joint is large or in a noticeable place.

Prime the newly cut edge with a brush before troweling new rubber up to it to ensure a strong bond.

Avoid cold joints if possible and become proficient at blending them when they occur. If more than one solid color is being used during installation it is best to put the cold joint between the colors.

VERTICAL APPLICATIONS

Stairs, risers, curbs and coping are all examples of the need for vertical work. These applications are usually done first before any flat work has begun.

Using resin, add silica powder, 1-cup at a time until a thick, peanut butter like substance is made, this is typically a 1:1 ratio. This substance is commonly referred to as the mixing matrix. Mix small quantities at a time as the mixing matrix cures quickly, especially in warm temperatures.

Wear a long rubber chemical glove and spread a thin, even layer of the matrix onto the vertical surface. If mixing matrix is spread too thick it can show through the dried rubber and create blotchy effect called blowback.

After spreading 2 - 3 feet of matrix begin troweling the rubber, starting from the bottom of the vertical. Lift and spread the rubber in a upwards motion, applying pressure to ensure the rubber adheres to the mixture. Rubber can be applied with hand or by trowel, but must be closed using the trowel.

For each new vertical area that is being done, overlap the mixture by 1/4 - 1/2" and trowel until blended.

Do not apply mixing matrix in areas that will take longer than 10 minutes to complete as the matrix will begin to cure within 10 minutes. If the rubber is not adhering to the vertical surface, it is likely the matrix has cured and the process will have to be done again.

FLEXIROCKS®

Safer Surfacing®

SITE CLEAN UP SECURING THE SITE

STEP 6

Rubber surfacing cures in 24-48 hours depending on different environmental factors. Although this curing time is low compared to alternatives, the surface must still be protected for at least 24 hours after installation.

People or animals may inadvertently walk through the installation before it has cured. Warning clients of such possibilities and providing adequate barriers will help decrease the chances of this occurring.

For installations that occur in public spaces, additional security may be required. It is best to consult with your client about their own specific security needs.

TOOLS FOR CLEANING THE SURFACE

• TSP

• Strong bristle hand brush

• Hose with sprayer

• Power washer (optional)

A LIGHT CLEAN

The surface may be cleaned regularly using normal soap and water. This removes all foreign surface matter.

It is recommended to leave a small amount of the same rubber used for the surfacing with the client as the color shades vary per batch. This can be used for any future repairs.

INSIDE CLEANING

Use a steam cleaner or carpet cleaning to achieve a deep clean for indoor surfaces.

For daily cleaning, the surface can be vacuumed.

WARNING!

Do not acid wash the rubber surface. The acid will burn the surface, resulting in a brownish color is cannot be corrected.

REPAIRS

Repairs may have to be made due to granule loss, de lamination, blowback, blemishes, footprints, or trowel marks. Repairs also may need to be made to the substrate, like a pool liner.

To complete a repair you will need:

Utility knife

Chisel

Hammer

FLEXIROCKS®

Safer Surfacing®

Required amount of product for repair

With the utility knife, cut around the area to be removed or tear away the loose rubber by hand to achieve a more natural edge. Using the hammer and chisel, break away the damaged area from the substrate and surrounding surface. When removing the damaged area some of the substrate may be removed too. If this occurs extra rubber can be filled in to level out the surface.

Once the damaged area is removed, prime the surface and edges and install the new section. When the area is uniform, allow to dry.

The colors may not match due to the different UV exposure each surface has. It may take up to 3 months for the new rubber to become the same color as the pre-installed surface.

Ensure your client protects this area in the future.

If the surface is older (5-10 years), it is recommended to fix repairs by putting a design in the surface as the colors may not match due to the dying process of the rubber.

3420 Willowbend Blvd, Suite 1120
Houston, TX 77054

832-800-4772
Call/Text

www.Flexirocks.com
Sales@Flexirocks.com

FLEXIROCKS®

Safer Surfacing®

Cleaning Instructions

DO NOT "ACID" WASH YOUR SURFACE!

Acids or concentrated muriatic acids will burn the rubber, which will cause a permanent brown or purple appearance that will ruin the aesthetics of the surface.

After initial installation, the rubberized surface may appear yellow or amber in color if using aromatic resin. This is caused by ultra violet light reacting with the polyurethane resin. The yellowing effect will fade and completely disappear over a few months. This process can be accelerated with regular cleaning and usage.

General Cleaning Guidelines

Dust, dirt and debris

Use a shopvac or similar vacuum to remove as much dust, dirt and debris as possible. Sweep away larger debris. Simply water (hose) spray the surface for lightly soiled areas or use a pressure washer no more than 2500 p.s.i. for heavily soiled areas. Keep nozzle of pressure washer at least 12 inches away from rubber surface and set to a light pressure spray (similar for use on vehicle paint). You may notice with a new surface that foam will appear when washing; this is normal and will eventually diminish.

Stains

Use a mild non-biological detergent solution and a clear color hard bristle broom, with varying length bristles to remove the stain. (Do not use a wire brush). Allow detergent solution to soak on the surface for two minutes and then rinse away with clean water. Rubbing alcohol can be used instead of detergent to spot treat stubborn stains such as red-dye stains from wines or soft drinks.

Algae, Bacterial, Fungi or Mold Growth

The surface will not promote algae, bacterial, fungi or mold growth, but growth may occur around the product due to its porous composition. To prevent and/or clean algae, bacterial, fungi or mold in applications where there is standing water or abundant plant life nearby, clean every eight weeks using a 10–20% sodium hypochlorite and water solution (use liquid pool sodium hypochlorite, not household chlorine or bleach). Apply following all safety directions with a pump garden sprayer or watering can. Allow the solution to soak into the rubber for a maximum of 15 minutes, then rinse the area with a hose or pressure washer up to 2500 p.s.i.

Standing Water

Remove puddles of water (on uneven surfaces) by sweeping or using a wet/dry vacuum. This will greatly reduce staining as well as algae, bacterial, fungi or mold buildup.

REMEMBER: DO NOT USE HOUSEHOLD CHLORINE BLEACH OR ANY ACID-BASED CLEANERS AS THIS WILL INVALIDATE ANY WARRANTY.

3420 Willowbend Blvd, Suite 1120
Houston, TX 77054

832-800-4772
Call/Text

www.Flexirocks.com
Sales@Flexirocks.com