

Rekortan® M99

Section 02574

SYNTHETIC TRACK SURFACING- REKORTAN® M99 FULL POUR SPECIFICATION

PART 1- GENERAL

1.01 SUMMARY

- A. The contract work to be performed under this section consists of furnishing all required labor, materials, equipment, implements, parts and supplies necessary for, the surfacing in accordance with these specifications and indicated on the drawings.
 - 1. Rekortan® M99 Full Pour- a polyurethane bound layered impermeable running track surface with a broadcast EPDM rubber finish. Minimum depth of product shall be 15 mm with the depth of the top-wearing layer a minimum of 4 mm.

1.02 CODES AND STANDARDS

- A. Codes and standards follow the current guidelines set forth by the International Associations of Athletics Federations (IAAF), the National Collegiate Athletic Association (NCAA) or the National Federation of State High School Associations (NFHS).

1.03 SUBMITTALS AND SUBSTITUTIONS

- A. Request for deviations or substitutions from the specifications must be made in writing seven days prior to the bid date. Complete product data including specifications, application rates, mixing instructions and a sample shall be sent with the request to the district and/or its agent for an evaluation. Alternatives will be allowed only by addendum.
 - 1. Submit three (3) sets of manufacturer's product data sheets including installation guidelines and maintenance instructions

2. Submit three (3) representative track samples in the color of surfacing to be installed
3. Submit Material Safety Data Sheets (MSDS) for all individual components of the product being installed
4. Submit evidence that the synthetic surfacing contractor is a member of the American Sports Builders Association (ASBA)

1.04 QUALITY ASSURANCE

- A. An installer authorized by APT will apply the track surface. The contractor shall have a current contractor's license, as well as a current sales tax and use tax number if applicable.
- B. Successful contractor will provide proof of insurance as well as performance and payment bonds if required.
- C. All polyurethanes used must be manufactured by an ISO 9001 Certified company.

1.05 SITE CONDITIONS

- A. Weather: Surfacing shall not be done when the threat of freezing exists for the following 24 hours, rain is imminent or gusting winds are occurring.
- B. Site: While surfacing and striping are being done, sprinkler systems must be curtailed, shut off, or controlled so that no water falls on the track or event area surfaces. Other trades and school district personnel must stay off the wet or curing surface
- C. Do not apply rubberized topping when base surface temperature is less than 40° F
- D. Provide temporary barriers as required to prevent public entry to construction area and to protect adjacent properties from damage during construction operation.

1.06 WARRANTY

- A. Provide manufacturers standard 5 year warranty

PART 2- PRODUCTS

2.01 MANUFACTURER

- A. Advanced Polymer Technology
109 Conica Lane; PO Box 160
Harmony, PA 16037
724-452-1330

2.02 MATERIALS

- A. Rekortan® M-99 Running Track Surface: Full pour layered Qualipur polyurethane bound poured-in-place track surface with an EPDM rubber embedded broadcast finish

Materials include:

1. Qualipur Polyurethane primer
2. SBR Rubber- 1-3 mm or as specified
3. Two Component Qualipur Polyurethane
4. Melos EPDM Rubber 1-3 mm (or approved equivalent) or as specified

PART 3- EXECUTION

3.01 EXAMINATION

- A. Verify asphalt concrete paving for dimensional accuracy, strength, and surface preparation. Notify owner of any deficiencies. Recommended compaction of asphalt and sub base is 95%.
- B. It is the responsibility of the paving contractor to water flood the surface with the use of a water truck. If after 30 minutes on a 70° F day, 'bird bathes' are evident in a depth more than 1/8" the paving contractor, track surfacing contractor and the owner's representative will determine the best method of correction.
- C. Entire surface shall be clean and free of all dirt, oil, grease or any other foreign matter. It is the responsibility of the prime contractor to thoroughly clean and/or pressure wash all area of the new and/or existing asphalt or concrete base as necessary to ensure adhesion of the track surface.

- D. Minimum curing time for base prior to beginning of surfacing is 14 days for new asphalt paving and 28 days for new concrete. No concrete curing compounds are allowed.
- E. Beginning installation stipulates track installer “accepts” existing conditions. Adhesion to the existing asphalt is the surfacing contractor’s responsibility.

3.02 PRODUCT AND MATERIAL DESCRIPTION

- A. Rekortan® M99 is a 3-layer, 15 mm, impermeable full pour system. It consists of a self-leveling flood coat, a unique central force-reduction layer and a flood and chip topcoat of Qualipur polyurethane and embedded EPDM rubber granules.
- B. Rubber (SBR): The rubber in the bottom and middle layers shall be specifically graded Styrene Butadiene Rubber (SBR). Final gradation is to be 1.0- 3.0 mm granulated SBR. SBR is to be dried to no less than 2.5% moisture and sealed in bags.
- C. Colored Rubber (EPDM): Must be Melos rubber (or approved equivalent). Unless specified, black rubber is not allowed in the wearing course. Color: Red unless otherwise specified.
- D. Full Pour Polyurethane: The 3 layers of Qualipur polyurethane shall be made of a two-component polyurethane with no solvents or fillers added. The specified products are Qualipur 5050 (A & B) in the base and top layers and Qualipur 5050-SA (A & B) in the middle layer, or approved equals. No product shall be considered an equal if the Polyol to Isocyanate mix ratio exceeds 3 to 1. Proposed alternative systems using an 8 to 1 mix ratio are not allowed as an equal to the Rekortan® M99 system.

3.03 APPLICATIONS PROCEDURES

- A. The entire surface shall be clean and free of dirt, oil, grease or any other matter upon arrival of the installation team. Any dirt, etc. shall be pressure washed off the base by the general contractor.
- B. Prime entire surface area with a compatible Qualipur polyurethane primer. Qualipur 1020 for asphalt and Qualipur 1220 for concrete or over an existing surface at an approximate rate of .16 kgs/m² (.30 lbs/yd²).

- C. Base Layer: After the primer and any detail applications have cured to tack-free, but no longer than 24 hours, flow apply the mixed Qualipur 5050-A and Qualipur 5050-B polyurethane coating at a rate of 2.00 kgs/m² (3.69 lbs/yd²) using a notched trowel or squeegee.

Mixing ratio: Qualipur 5050 is 2.12:1 A&B

Broadcast to excess with 1-3 mm Black SBR rubber, using a flat shovel or machine spreader ensuring all of the coating is covered. Approximately 3.80 kgs/m² (7.01 lbs/yd²) will be needed for thorough coverage. Ensure the rubber is totally dry.

- D. Middle Layer: After the base layer has fully cured or is tack-free, but no longer than 24 hours, flow apply the mixed Qualipur 5050- SA-A and Qualipur 5050-SA-B polyurethane coating at a rate of 2.99 kgs/m² (5.53 lbs/yd²) using a notched trowel or squeegee. Broadcast to excess with 1-3 mm Black SBR rubber, using a flat shovel or machine spreader ensuring all of the coating is covered. Approximately 3.80 kgs/m² (7.01 lbs/yd²) will be needed for thorough coverage.

Mixing Ratio: Qualipur 5050 SA 2:1 A & B.

- E. Top Layer: After the second layer is fully cured or tack free, but no longer than 24 hours, remove any rubber that is not bonded to the coating using a sweeper or vacuum/blower. Flow apply the final coat of mixed Qualipur 5050 A and Qualipur 5050 B at a rate of 2.99 kgs/m² (5.53 lbs/yd²) by using a notched trowel or squeegee. Broadcast to excess with 1-3 mm colored EPDM rubber ensuring all of the coating is covered. Approximately 4.19 kgs/m² (7.74 lbs/yd²) of EPDM rubber will be needed for thorough coverage. After initial cure the excess rubber granules are removed by means of mechanical sweeper. The estimated reclaim of the rubber is measurable at an approximate rate of 1.19 kgs/m² (2.21 lbs/yd²). Depth to measure a minimum of 4mm.

Mixing Ratio: Qualipur 5050 2.27:1 A & B.

3.04 STRIPING AND RACE MONUMENTATION

- A. The contractor shall consult with the owner prior to the start of their calculations for determination of the finish line location, events to be run, location of lane numbers and additional paint markings.
- B. All line marking paint is to be approved by the synthetic surfacing manufacturer. Only an experienced track striping specialist shall perform the line striping.

END OF SPECIFICATION – REKORTAN® M-99