



International Product Assurance
LABORATORIES

100 Clemson Research Blvd., Anderson, SC USA 29625
P: +1 855-IPA-LABS E: testing@IPALaboratories.com
www.IPALaboratories.com

January 8, 2025

MS International
Attn: Luis Silva
2095 N Batavia Street
Orange, CA 92865
USA

Dear Luis Silva,

International Product Assurance Laboratories has tested the samples you submitted. Test report IPAL-0904-24 is enclosed. If you have any questions or concerns, please contact us.

Best Regards,

INTERNATIONAL PRODUCT ASSURANCE LABORATORIES,

Damon McDowell
Laboratory Supervisor
Enclosures



IPAL TEST REPORT NUMBER: IPAL-0904-24

PAGE: 1 OF 3

TEST REQUESTED BY: MS International

TEST METHOD: ASTM C1027-19: “Standard Test Method for Determining Visible Abrasion Resistance of Glazed Ceramic Tile”

Informal Test Method Description: This test method is designed to measure the resistance of tile surfaces to visible surface abrasion. Certain irregular surfaces may not be evaluated properly by this test method because of wear patterns. The abrasion resistance of tile surfaces is determined by rotation of an abrasive load on the surface and the assessment of the resultant wear by means of visual comparison of the abraded test specimens and non-abraded tiles.

This summary is provided for the reader’s convenience and is not a complete description of the method. See ASTM C1027 for all method details and information.

TEST SUBJECT MATERIAL: Identified by client as: “**Legions Quartz White**”
Approximate Size as Received: 4" x 4"
Product color: Legions Quartz White

TEST DATE: 1/2/2025 - 1/7/2025

TEST PROCEDURE NOTES:

- Sample prep: None
- A Gabbrielli Abrasimeter ISO was used to abrade the tile.
- 10% Hydrochloric acid was used to remove any metal oxide staining.

TEST RESULTS:

There was no apparent visual difference in gloss or color after **12000** revolutions when viewed in the viewing box by more than one technician. The specimen also passed staining per section 7.3 of the test method.

COMMENTS: None



IPAL TEST REPORT NUMBER: IPAL-0904-24 **PAGE: 2 OF 3**

TEST REQUESTED BY: MS International

TEST SUBJECT MATERIAL: Identified by client as: “Legions Quartz White”

TEST METHOD: ASTM C1027-19: “Standard Test Method for Determining Visible Abrasion Resistance of Glazed Ceramic Tile”

ANSI SPECIFICATIONS*:

| ANSI standard | Tile Type | Specification |
|-----------------------------|--------------------|----------------|
| ANSI A 137.1 (Ceramic Tile) | Pressed Floor Tile | No requirement |
| ANSI A 137.1 (Ceramic Tile) | Porcelain Tile | No requirement |
| ANSI A 137.1 (Ceramic Tile) | Glazed Wall Tile | No requirement |
| ANSI A 137.2 (Glass Tile) | All Glass Tile | No requirement |

**For more detailed information, refer to ANSI A137.1 Specifications for Ceramic Tile and ANSI A137.2 Specifications for Glass Tile*

IMAGE OF PRODUCT TESTED:





IPAL TEST REPORT NUMBER:

IPAL-0904-24

PAGE: 3 OF 3

DISCLAIMER AND LIMITATION OF LIABILITY

This report is provided by Tile Council of North America, Inc. DBA International Product Assurance Laboratories ("IPA Laboratories") for the sole use of the client and no one else. It is intended for professional use by a knowledgeable professional. If published by the client, it must be published in full, including this disclaimer and limitation of liability.

This report is not an endorsement, recommendation, approval, certification, or criticism by IPA Laboratories of any particular product or its application. IPA Laboratories recommends that anyone considering the use or installation of a particular product consult with the manufacturer or an industry professional for advice specific to the person's needs and consider any applicable laws, statutes, codes, or regulations relevant to the particular product. IPA Laboratories does not know all the different manners and applications in which a client's particular product might be used, and, therefore, it disclaims any and all duty to provide warnings or to further investigate the suitability of the use of a particular product in a particular situation.

Unless otherwise expressly stated, IPA Laboratories tested the specific test subject material provided by the client and identified in the lab report, as indicated by the client. IPA Laboratories does not independently verify the information provided by the client, and it makes no representation that similar results would be achieved with other, untested materials, even if such other materials purportedly have the same product name, are purportedly of the same or similar type of product made by the client, or are purportedly from the same batch of product. Nor does IPA Laboratories state that the date in this report is representative of production occurring at the same time or at any other time. Only the manufacturer may make that claim, based on sampling and quality control parameters beyond the knowledge and control of IPA Laboratories. IPA Laboratories does not provide any supervision, review, management, or quality control of any manufacturer's production.

IPA Laboratories makes no representation that the client's products are uniform or identical to the test subject material, that the test subject material is suitable for any particular use, application, or installation, or that it will exhibit the same properties when installed or used in a particular manner. The data provided in this report results from standardized laboratory testing performed under laboratory conditions. As such it does not represent all conditions under which the products may be used or subjected. For testing on actual materials being used or considered for a job site, contact IPA Laboratories for sampling provisions and possible testing.

This report is intended solely to provide the results of the test procedure stated above as performed on the test subject material provided by the client and may not be relied on for any other purpose. IPA LABORATORIES MAKES NO OTHER REPRESENTATIONS OR WARRANTIES OF ANY KIND, WHETHER EXPRESS OR IMPLIED. ALL IMPLIED WARRANTIES, INCLUDING, WITHOUT LIMITATION, IMPLIED WARRANTIES OF MERCHANTABILITY, OR FITNESS FOR A PARTICULAR PURPOSE, ARE HEREBY EXPRESSLY DISCLAIMED. IN THE EVENT OF A DISPUTE CONCERNING THIS REPORT, THE EXCLUSIVE REMEDY FOR CLIENT SHALL BE FOR IPA LABORATORIES TO REPEAT THE TEST REQUESTED, BUT IN NO EVENT SHALL IPA LABORATORIES BE LIABLE FOR AN AMOUNT GREATER THAN THE AMOUNT IT RECEIVED FROM CLIENT FOR THE TEST. UNDER NO CIRCUMSTANCES WILL IPA LABORATORIES BE LIABLE TO CLIENT FOR ANY OTHER DAMAGES (NOR SHALL IT BE LIABLE TO ANY OTHER PERSON OR BUSINESS ENTITY FOR ANY DAMAGES), INCLUDING WITHOUT LIMITATION ANY AND ALL DIRECT, INDIRECT, SPECIAL, INCIDENTAL, CONSEQUENTIAL, OR EXEMPLARY DAMAGES, RESULTING, IN WHOLE OR IN PART, FROM ANY USE OF, REFERENCE TO, OR RELIANCE UPON THE REPORT, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGES. IPA LABORATORIES DISCLAIMS ALL LIABILITY TO ANY THIRD PARTY CONCERNING THIS REPORT. THE FOREGOING LIMITATION OF LIABILITY IS A FUNDAMENTAL ELEMENT OF IPA LABORATORIES' AGREEMENT TO CONDUCT AND PROVIDE THE REPORT.

1/8/2025

Damon McDowell
Laboratory Supervisor