Ceramic Tile from India

Investigation Nos. 701-TA-720 and 731-TA-1688 (Preliminary)

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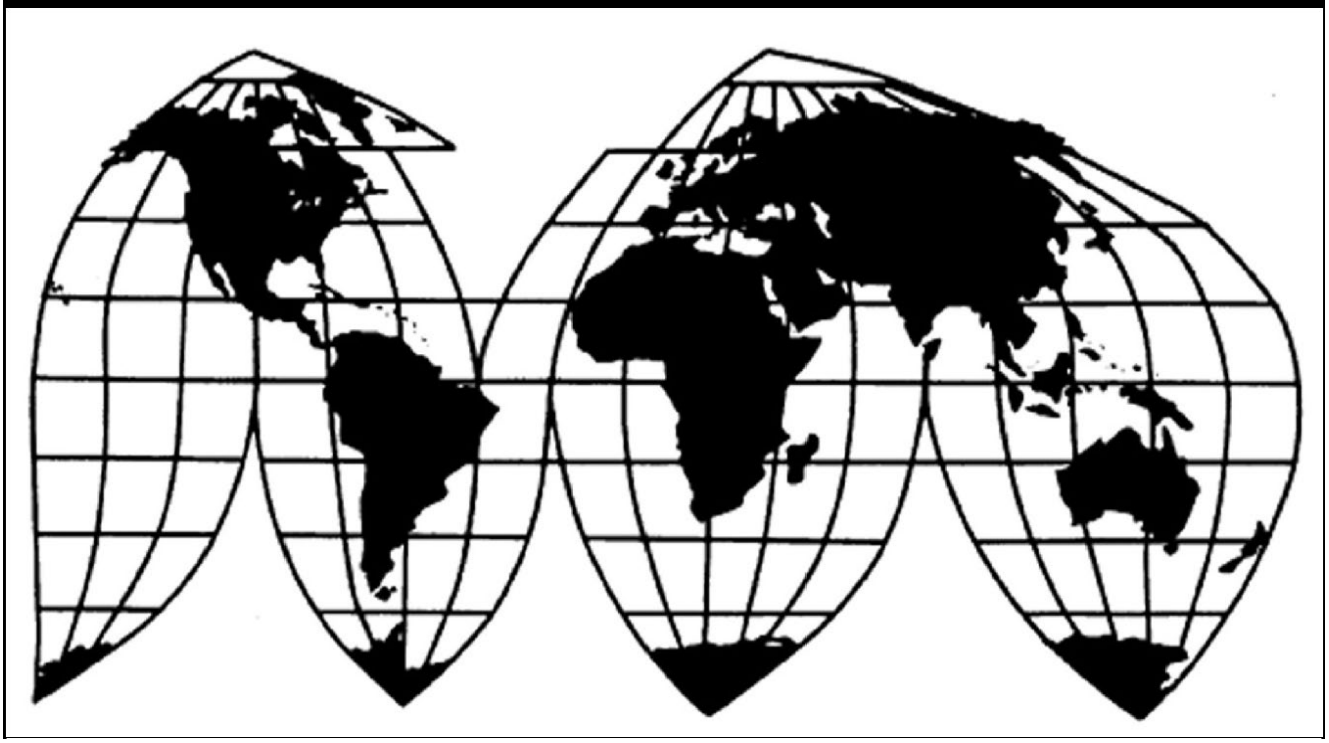
U.S. International Trade Commission



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U.S. International Trade Commission

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Note.—Information that would reveal confidential operations of individual concerns may not be published. Such information is identified by brackets in confidential reports and is deleted and replaced with asterisks (***) in public reports.

UNITED STATES INTERNATIONAL TRADE COMMISSION

Investigation Nos. 701-TA-720 and 731-TA-1688 (Preliminary)

Ceramic Tile from India

DETERMINATIONS

On the basis of the record[1] developed in the subject investigations, the United States International Trade Commission ("Commission") determines, pursuant to the Tariff Act of 1930 ("the Act"), that there is a reasonable indication that an industry in the United States is materially injured by reason of imports of ceramic tile from India, provided for in subheadings 6907.21.10, 6907.21.20, 6907.21.30, 6907.21.40, 6907.21.90, 6907.22.10, 6907.22.20, 6907.22.30, 6907.22.40, 6907.22.90, 6907.23.10, 6907.23.20, 6907.23.30, 6907.23.40, 6907.23.90, 6907.30.10, 6907.30.20, 6907.30.30, 6907.30.40, 6907.30.90, 6907.40.10, 6907.40.20, 6907.40.30, 6907.40.40, and 6907.40.90 of the Harmonized Tariff Schedule of the United States, that are alleged to be sold in the United States at less than fair value ("LTFV") and imports of the subject merchandise from India that are alleged to be subsidized by the government of India.[2] [3]

COMMENCEMENT OF FINAL PHASE INVESTIGATIONS

Pursuant to section 207.18 of the Commission's rules, the Commission also gives notice of the commencement of the final phase of its investigations. The Commission will issue a final phase notice of scheduling, which will be published in the *Federal Register* as provided in § 207.21 of the Commission's rules, upon notice from the U.S. Department of Commerce ("Commerce") of affirmative preliminary determinations in the investigations under §§ 703(b) or 733(b) of the Act, or, if the preliminary determinations are negative, upon notice of affirmative final determinations in those investigations under §§ 705(a) or 735(a) of the Act. Parties that filed entries of appearance in the preliminary phase of the investigations need not

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[1] The record is defined in § 207.2(f) of the Commission's Rules of Practice and Procedure (19 CFR 207.2(f)).

[2] 89 FR 42836, 89 FR 42841 (May 16, 2024).

[3] Chairman David S. Johanson determined that there is a reasonable indication that a U.S. industry is threatened with material injury by reason of subject imports from India.

enter a separate appearance for the final phase of the investigations. Any other party may file an entry of appearance for the final phase of the investigations after publication of the final phase notice of scheduling. Industrial users, and, if the merchandise under investigation is sold at the retail level, representative consumer organizations have the right to appear as parties in Commission antidumping and countervailing duty investigations. The Secretary will prepare a public service list containing the names and addresses of all persons, or their representatives, who are parties to the investigations. As provided in section 207.20 of the Commission's rules, the Director of the Office of Investigations will circulate draft questionnaires for the final phase of the investigations to parties to the investigations, placing copies on the Commission's Electronic Document Information System (EDIS, https://edis.usitc.gov), for comment.

BACKGROUND

On April 19, 2024, by the Coalition for Fair Trade in Ceramic Tile[4] filed petitions with the Commission and Commerce, alleging that an industry in the United States is materially injured or threatened with material injury by reason of subsidized imports of ceramic tile from India and LTFV imports of ceramic tile from India. Accordingly, effective April 19, 2024, the Commission instituted countervailing duty investigation No. 701-TA-720 and antidumping duty investigation No. 731-TA-1688 (Preliminary).

Notice of the institution of the Commission's investigations and of a public conference to be held in connection therewith was given by posting copies of the notice in the Office of the Secretary, U.S. International Trade Commission, Washington, DC, and by publishing the notice in the *Federal Register* of April 25, 2024 (89 FR 31770). The Commission conducted its conference on May 10, 2024. All persons who requested the opportunity were permitted to participate.

[4] The Coalition for Fair Trade in Ceramic Tile is comprised of Crossville, Inc., Crossville, TN; Dal-Tile Corporation, Dallas, TX; Del Conca USA, Inc., Loudon, TN; Wonder Porcelain, Lebanon, TN; Landmark Ceramics – UST, Inc., Mount Pleasant, TN; Florim USA, Clarksville, TN; Florida Tile, Lexington, KY; Portobello America Manufacturing LLC, Pompano Beach, FL; and StonePeak Ceramics Inc., Chicago, IL.

Views of the Commission

Based on the record in the preliminary phase of these investigations, we determine that there is a reasonable indication that an industry in the United States is materially injured by reason of imports of ceramic tile from India that are allegedly sold in the United States at less than fair value ("LTFV") and subsidized by the Government of India.[1]

I. The Legal Standard for Preliminary Determinations

The legal standard for preliminary antidumping and countervailing duty determinations requires the Commission to determine, based upon the information available at the time of the preliminary determinations, whether there is a reasonable indication that a domestic industry is materially injured or threatened with material injury, or that the establishment of an industry is materially retarded, by reason of the allegedly unfairly traded imports.[2] In applying this standard, the Commission weighs the evidence before it and determines whether "(1) the record as a whole contains clear and convincing evidence that there is no material injury or threat of such injury; and (2) no likelihood exists that contrary evidence will arise in a final investigation."[3]

[1] Chairman David S. Johanson determines that there is a reasonable indication that a U.S. industry is threatened with material injury by reason of subject imports from India. *See* Concurring Views of Chairman David S. Johanson.

[2] 19 U.S.C. §§ 1671b(a), 1673b(a) (2000); *see also American Lamb Co. v. United States*, 785 F.2d 994, 1001-04 (Fed. Cir. 1986); *Aristech Chem. Corp. v. United States, 2*0 CIT 353, 354-55 (1996). No party argues that the establishment of an industry in the United States is materially retarded by the allegedly unfairly traded imports.

[3] *American Lamb Co.,* 785 F.2d at 1001; *see also Texas Crushed Stone Co. v. United States*, 35 F.3d 1535, 1543 (Fed. Cir. 1994).

II. Background

The petitions in these investigations were filed on April 19, 2024, by the Coalition for Fair Trade in Ceramic Tile ("Coalition" or "Petitioners"), a trade association consisting of domestic producers of ceramic tile.[4] Several members of the Coalition appeared at the staff conference and Petitioners submitted a postconference brief.[5]

Several respondent entities participated in these investigations. MS International, Inc. ("MSI") and Bedrosians Tile & Stone ("Bedrosians"), importers of subject merchandise, appeared remotely at the staff conference accompanied by counsel and submitted a postconference brief.[6] Comet Granito Pvt. Ltd. ("Comet"), an Indian producer and exporter, appeared remotely through counsel at the staff conference and submitted a postconference brief.[7]

The following firms also filed postconference briefs: Simpolo Vitrified Private Limited ("Simpolo") and Nexion Surfaces Private Limited ("Nexion"), Indian producers and exporters of subject merchandise;[8] Skera, Inc. ("Skera"), an Indian producer of subject merchandise;[9] and

[4] The Coalition consists of the following nine members: Crossville, Inc.; Dal-Tile Corporation; Del Conca USA, Inc.; Wonder Porcelain; Landmark Ceramics - UST, Inc.; Florim USA; Florida Tile; Portobello America Manufacturing LLC; and StonePeak Ceramics Inc. Confidential Report, INV-WW-052 (May 24, 2024) ("CR"); *Ceramic Tile from India*, Inv. Nos. 701-TA-720 and 731-TA-1688 (Preliminary), USITC Pub. 5515 (June 2024) ("PR") at I-1, n.1.

[5] *See* Petitioners' Confidential Post Conf. Br., EDIS Doc. 821552 (May 15, 2024) (Petitioners' Post Conf. Br.").

[6] *See* MSI's and Bedrosians' Confidential Post Conf. Br., EDIS Doc. 821538 (May 15, 2024) ("MSI's Post Conf. Br.").

[7] *See* Comet's Confidential Post Conf. Br., EDIS Doc. 821536 (May 15, 2024) ("Comet's Post Conf. Br.").

[8] *See* Nexion's Public Post Conf. Br., EDIS Doc. 821557 (May 15, 2024) ("Nexion Post Conf. Br.").

[9] *See* Skera's Public Post Conf. Br., EDIS Doc. 821631 (May 16, 2024) ("Skera's Post Conf. Br."). The Director of Investigations found good cause for Skera's late filing.

Varmora Granito Pvt. Ltd. ("Varmora"), an Indian producer and exporter of subject merchandise.[10]

Data Coverage. U.S. industry data are based on the questionnaire responses of ten firms that accounted for approximately 95 percent of U.S. production of ceramic tile in 2023.[11] U.S. import data are based on official U.S. Commerce statistics (which were used to calculate subject imports volume and apparent U.S. consumption) and the questionnaire responses of 17 firms, which accounted for approximately *** percent of subject imports from India and nearly all imports from nonsubject sources in 2023.[12] U.S. purchaser data are based on the questionnaire responses of four firms that responded to the Commission's lost sales and lost revenue survey.[13] Foreign producer/exporter data are based on the questionnaire responses of 138 producers and/or exporters whose exports accounted for nearly all of U.S. imports of ceramic tile from India in 2023.[14]

III. Domestic Like Product

In determining whether there is a reasonable indication that an industry in the United States is materially injured or threatened with material injury by reason of imports of the subject merchandise, the Commission first defines the "domestic like product" and the

[10] *See* Varmora's Public Post Conf. Br., EDIS Doc. 821483 (May 15, 2024) ("Varmora's Post Conf. Br.").

[11] CR/PR at I-4.

[12] CR/PR at I-4. Official import statistics are based on HTS statistical reporting numbers 6907.21.1005, 6907.21.1011, 6907.21.1051, 6907.21.2000, 6907.21.3000, 6907.21.4000, 6907.21.9011, 6907.21.9051, 6907.22.1005, 6907.22.1011, 6907.22.1051, 6907.22.2000, 6907.22.3000, 6907.22.4000, 6907.22.9011, 6907.22.9051, 6907.23.1005, 6907.23.1011, 6907.23.1051, 6907.23.2000, 6907.23.3000, 6907.23.4000, 6907.23.9011, 6907.23.9051, 6907.30.1005, 6907.30.1011, 6907.30.1051, 6907.30.2000, 6907.30.3000, 6907.30.4000, 6907.30.9011, 6907.30.9051, 6907.40.1005, 6907.40.1011, 6907.40.1051, 6907.40.2000, 6907.40.3000, 6907.40.4000, 6907.40.9011, and 6907.40.9051. *Id.* at Table IV-2 Source.

[13] CR/PR at V-15.

[14] CR/PR at I-4.

"industry."[15] Section 771(4)(A) of the Tariff Act of 1930, as amended ("the Tariff Act"), defines the relevant domestic industry as the "producers as a whole of a domestic like product, or those producers whose collective output of a domestic like product constitutes a major proportion of the total domestic production of the product."[16] In turn, the Tariff Act defines "domestic like product" as "a product which is like, or in the absence of like, most similar in characteristics and uses with, the article subject to an investigation."[17]

By statute, the Commission's "domestic like product" analysis begins with the "article subject to an investigation," *i.e.*, the subject merchandise as determined by the U.S. Department of Commerce ("Commerce").[18] Therefore, Commerce's determination as to the scope of the imported merchandise that is subsidized and/or sold at less than fair value is "necessarily the starting point of the Commission's like product analysis."[19] The Commission then defines the domestic like product in light of the imported articles Commerce has identified.[20] The decision regarding the appropriate domestic like product(s) in an investigation

[15] 19 U.S.C. § 1677(4)(A).

[16] 19 U.S.C. § 1677(4)(A).

[17] 19 U.S.C. § 1677(10).

[18] 19 U.S.C. § 1677(10). The Commission must accept Commerce's determination as to the scope of the imported merchandise that is subsidized and/or sold at less than fair value. *See*, *e.g.*, *USEC, Inc. v. United States*, 34 Fed. App'x 725, 730 (Fed. Cir. 2002) ("The ITC may not modify the class or kind of imported merchandise examined by Commerce."); *Algoma Steel Corp. v. United States,* 688 F. Supp. 639, 644 (Ct. Int'l Trade 1988), *aff'd*, 865 F.3d 240 (Fed. Cir.), *cert. denied*, 492 U.S. 919 (1989).

[19] *Cleo Inc. v. United States*, 501 F.3d 1291, 1298 (Fed. Cir. 2007); *see also Hitachi Metals, Ltd. v. United States*, 949 F.3d 710, 717 (Fed. Cir. 2020) (the statute requires the Commission to start with Commerce's subject merchandise in reaching its own like product determination).

[20] *Cleo*, 501 F.3d at 1298 n.1 ("Commerce's {scope} finding does not control the Commission's {like product} determination."); *Hosiden Corp. v. Advanced Display Mfrs.,* 85 F.3d 1561, 1568 (Fed. Cir. 1996) (the Commission may find a single like product corresponding to several different classes or kinds defined by Commerce); *Torrington Co. v. United States*, 747 F. Supp. 744, 748-52 (Ct. Int'l Trade 1990), *aff'd*, 938 F.2d 1278 (Fed. Cir. 1991) (affirming the Commission's determination defining six like products in investigations where Commerce found five classes or kinds).

is a factual determination, and the Commission has applied the statutory standard of "like" or "most similar in characteristics and uses" on a case-by-case basis.[21] No single factor is dispositive, and the Commission may consider other factors it deems relevant based on the facts of a particular investigation.[22] The Commission looks for clear dividing lines among possible like products and disregards minor variations.[23] The Commission may, where appropriate, include domestic articles in the domestic like product in addition to those described in the scope.[24]

A. Scope Definition

In its notice of initiation, Commerce defined the imported merchandise within the scope of the investigations as follows:

> The merchandise covered by th{ese} investigations is ceramic flooring tile, wall tile, paving tile, hearth tile, porcelain tile, mosaic tile, flags, decorative tile, finishing tile, and the like (hereinafter ceramic tile). Ceramic tiles are articles containing a mixture of minerals including clay

[21] *See, e.g.*, *Cleo Inc. v. United States*, 501 F.3d 1291, 1299 (Fed. Cir. 2007); *NEC Corp. v. Dep't of Commerce*, 36 F. Supp. 2d 380, 383 (Ct. Int'l Trade 1998); *Nippon Steel Corp. v. United States*, 19 CIT 450, 455 (1995); *Torrington Co. v. United States*, 747 F. Supp. 744, 749 n.3 (Ct. Int'l Trade 1990), *aff'd*, 938 F.2d 1278 (Fed. Cir. 1991) ("every like product determination 'must be made on the particular record at issue' and the 'unique facts of each case'"). The Commission generally considers a number of factors including the following: (1) physical characteristics and uses; (2) interchangeability; (3) channels of distribution; (4) customer and producer perceptions of the products; (5) common manufacturing facilities, production processes, and production employees; and, where appropriate, (6) price. *See Nippon*, 19 CIT at 455 n.4; *Timken Co. v. United States*, 913 F. Supp. 580, 584 (Ct. Int'l Trade 1996).

[22] *See*, *e.g.*, S. Rep. No. 96-249 at 90-91 (1979).

[23] *See*, *e.g.*, *Nippon*, 19 CIT at 455; *Torrington*, 747 F. Supp. at 748-49*; see also* S. Rep. No. 96-249 at 90-91 (Congress has indicated that the like product standard should not be interpreted in "such a narrow fashion as to permit minor differences in physical characteristics or uses to lead to the conclusion that the product and article are not 'like' each other, nor should the definition of 'like product' be interpreted in such a fashion as to prevent consideration of an industry adversely affected by the imports under consideration.").

[24] *See*, *e.g.*, *Pure Magnesium from China and Israel*, Inv. Nos. 701-TA-403 and 731-TA-895-96 (Final), USITC Pub. 3467 at 8 n.34 (Nov. 2001); *Torrington,* 747 F. Supp. at 748-49 (holding that the Commission is not legally required to limit the domestic like product to the product advocated by the petitioner, co-extensive with the scope).

> (generally hydrous silicates of alumina or magnesium) that are fired so the raw materials are fused to produce a tile that is less than 3.2 cm in thickness, exclusive of decorative features. All ceramic tile is subject to the scope regardless of end use, surface area, and weight, regardless of whether the tile is glazed or unglazed, regardless of the water absorption coefficient by weight, regardless of the extent of vitrification, and regardless of whether or not the tile is on a backing. Subject merchandise includes ceramic tile "slabs" or "panels" (tiles that are larger than 1 meter2 (11 ft2)).
>
> Subject merchandise includes ceramic tile that undergoes minor processing in a third country prior to importation into the United States. Similarly, subject merchandise includes ceramic tile produced that undergoes minor processing after importation into the United States. Such minor processing includes, but is not limited to, one or more of the following: beveling, cutting, trimming, staining, painting, polishing, finishing, additional firing, affixing a decorative surface to the tile, or any other processing that would otherwise not remove the merchandise from the scope of the investigation if performed in the country of manufacture of the in-scope product.[25]

Ceramic tile is a masonry product containing hydrous silicates of alumina (and other metals) that is fired at high temperatures to bond together the constituent particles.[26] Ceramic tile is often flat with beveled edges, and is available in various shapes, sizes, and colors.[27] Tiles can be formed as large as 5 feet by 15 feet or more (often referred to as "slabs" or "panels") and smaller than 1 inch by 1 inch.[28] Thickness can exceed 3 cm (1.2 inches) or be as thin as 2 mm (0.8 inch), or even thinner.[29]

[25] Ceramic Tile from India: Initiation of Countervailing Duty Investigation, 89 Fed. Reg. 42841 (May 16, 2024); Ceramic Tile from India: Initiation of Less-Than-Fair- Value Investigation, 89 Fed. Reg. 42836 (May 16, 2024).

[26] CR/PR at I-9.

[27] CR/PR at I-9.

[28] CR/PR at I-10.

[29] CR/PR at I-10.

Ceramic tile is used to cover surfaces such as interior and exterior floors, walls, counter- and table-tops, shower stalls, and swimming pools, among numerous other applications.[30] The residential sector uses ceramic tile in kitchens, bathrooms, and entrances while the commercial sector uses it in floors and wall applications.[31]

[30] CR/PR at I-10.

[31] CR/PR at I-10. Ceramic tile used for floors and walls can be distinguished based on physical performance characteristics for particular end uses. CR/PR at I-11-I-12. Porcelain ceramic tile is a specific type of ceramic tile that has lower porosity (0.5 percent or less for water absorption) than other ceramic tile. CR/PR at I-12 to I-13. Ceramic tile sold as part of a combination of different ceramic tiles or other materials (stone, glass, etc.) is known as "mosaic tile." CR/PR at I-12. Ceramic tile can be glazed or unglazed and polished or unpolished. CR/PR at I-14.

B. Party Arguments

Petitioners argue that the Commission should define a single domestic like product consisting of all ceramic tile, coextensive with the scope of the investigation, based on what they view as the similarities between and among all in-scope tiles in terms of the Commission's six like product factors.[32]

Indian respondents Skera, Comet, and Varmora argue that the Commission should find ceramic slabs to be a separate like product.[33] According to these respondents, slabs are larger, have different uses than ceramic tile, and are made in different manufacturing facilities with different equipment and employees.[34] The Indian respondents further argue that slabs are not interchangeable with ceramic tile because only slabs are used as countertops and in furniture, slabs are priced higher and sold in different channels of distribution, and customers perceive them as a distinct product.[35]

C. Analysis

Based on the record, we define a single domestic like product consisting of all ceramic tile, including slabs, coextensive with the scope.

Physical Characteristics and Uses. All ceramic tiles, including slabs, are masonry products containing clays and other minerals that are fired at high temperatures to bond together the constituent particles.[36] Ceramic tile and slabs are often flat, may have beveled

[32] Petitioners' Post Conf. Br. at 2-4.

[33] MSI did not contest Petitioners' proposed definition of the domestic like product for purposes of the preliminary investigation. MSI's Post Conf. Br. at 4.

[34] Comet's Post Conf. Br. at 1-2; Skera's Post Conf. Br. at 3-5; Varmora's Post Conf. Br. at 10-11.

[35] Comet's Post Conf. Br. at 2-3; Skera's Post Conf. Br. at 5-6; Varmora's Post Conf. Br. at 11-12.

[36] CR/PR at I-9.

edges, and are available in various shapes, sizes and colors.[37] As the Commission previously found, ceramic tile can be formed into "slabs" or "panels" as large as 5 feet by 15 feet or more and into pieces smaller than 1 inch by 1 inch.[38] Ceramic tile thickness can be larger than 3 centimeters or as thin as two millimeters or less.[39] Ceramic tile and slabs are used in the residential and commercial sector to cover surfaces, including floors, walls, and counters.[40] The record indicates that ceramic tiles come in a wide variety of dimensions and thicknesses.

Manufacturing Facilities, Production Processes and Employees. The manufacturing process for all ceramic tiles and slabs consists of eight successive basic stages, which includes the crushing of raw materials, mixing and milling, spray drying, shaping, drying, glazing and/or digital printing, firing, and post-firing operations.[41] All ceramic tile, including slab, are generally produced using the same basic raw materials and production equipment, with some technological variations within each of the stages.[42] Certain domestic producers reported producing slabs and other types of ceramic tile in the same manufacturing facilities.[43]

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[37] CR/PR at I-9.

[38] Ceramic Tiles from China, Pub. 5053 at 6.

[39] CR/PR at I-10.

[40] CR/PR at I-10.

[41] CR/PR at I-15.

[42] Although the process for manufacturing slabs and ceramic tile is the same, the equipment may be different, with some production lines capable of producing both ceramic tile and slabs. CR/PR at n. 66. Information available on the current record suggests at least certain domestic producers may manufacture both tile and slab on the same equipment. Petitioners' Post Conf. Br. at 5 & Ex. 2, Product Brochures; Tr. at 68-69 (Mr. Haynes) (testifying Florim uses a continual press and can make large or smaller tiles on it). We have noted respondents' assertions that ceramic tiles are made with hydraulic presses and dies, whereas slabs are made on a continuous line, and that in some of their facilities, slab and ceramic tiles are made by different employees. Skera's Post Conf. Br. At 6; Comet's Post Conf. Br. at 2; Varmora's Post Conf. Br. At 10-11. However, these observations appear to be directed at specific stages of the eight-stage production process, and do not detract from the overlap in most other stages. We also note that respondents' observations about production employees appear to characterize foreign producers' operations, and not those of domestic producers.

[43] Tr. at 68-69 (Mr. Haynes).

Consequently, the available information indicates that slabs and other types of ceramic tiles are generally producing using similar production processes and employees, in some of the same manufacturing facilities.

Channels of Distribution. Skera asserts that slabs are sold to fabricators who cut and install it.[44] U.S. producers made *** to *** percent of their U.S. shipments to contactors/builders during the POI, which would include fabricators, but these data do not distinguish between shipments of ceramic tile and slabs in the contractor/builder channel, or in any of the other channels into which U.S. producers sold ceramic tile.[45] Consequently, the information on the current record does not contain information that would allow us to determine whether slabs are sold to fabricators while other types of tiles are not, or whether fabricators are a channel of distribution distinct from contractors/builders.

Interchangeability. Although some applications may require distinct performance characteristics that may limit the interchangeability of slabs and other types of ceramic tiles in such applications, absent such requirements, slabs and various other types of ceramic tile can be used interchangeably to cover floors, walls, and countertops.[46] Consequently, the information available suggests slabs and other types of ceramic tile are interchangeable for most end uses.

[44] Skera's Post Conf. Br. at 5. We note that it is unclear whether Skera is referring to the domestically produced slabs or subject merchandise.

[45] CR/PR at Table II-1. As noted, respondents raised a like product argument for the first time in their postconference briefs.

[46] Petitioners' Post Conf. Br. at 5 & Atts. 2&3 (showing slabs being used to cover walls, floors, and countertops).

Producer and Customer Perceptions. Petitioners submitted product catalogues from U.S. producers containing both slabs and other types of ceramic tile as evidence that producers and customers perceive the products similarly, notwithstanding respondents' arguments to the contrary.[47]

Price. Prices for ceramic tile may vary depending on size, thickness, design, and a variety of other factors.[48]

Conclusion. All ceramic tiles within the scope, including slabs, are produced using the same basic raw materials, which impart similar physical characteristics; have the same range and overlap in end uses; and are generally produced through the same production processes at the same facilities using the same employees. While different equipment and employees may be used to produce slabs during a portion of the production process, the record indicates that certain U.S. producers are capable of manufacturing slabs and other types of ceramic tile using the same equipment and employees in the same manufacturing facilities. U.S. producers perceive slabs and other types of ceramic tile to be similar and include them in the same product brochures, suggesting that customers also regard the products similarly. Although slabs are characterized by their large size and may, therefore, be priced relatively higher than smaller-size ceramic tiles, the wide range of ceramic tile products encompassed by the scope is consistent with a continuum of ceramic tile products, with no clear dividing line between slabs and other types of ceramic tile.

[47] Petitioners' Post Conf. Br. at Atts. 2 & 3, Domestic Producer Product Brochures.
[48] CR/PR at Table V-9.

Based on the preponderance of similarities between slabs and other types of ceramic tile in terms of the like product factors, we define a single domestic like product consisting of ceramic tile, coextensive with the scope, for purposes of these preliminary investigations.[49]

IV. Domestic Industry

The domestic industry is defined as the domestic "producers as a whole of a domestic like product, or those producers whose collective output of a domestic like product constitutes a major proportion of the total domestic production of the product."[50] In defining the domestic industry, the Commission's general practice has been to include in the industry producers of all domestic production of the like product, whether toll-produced, captively consumed, or sold in the domestic merchant market.

We consider whether any producer of the domestic like product should be excluded from the domestic industry pursuant to Section 771(4)(B) of the Tariff Act. This provision allows the Commission, if appropriate circumstances exist, to exclude from the domestic industry producers that are related to an exporter or importer of subject merchandise or which are themselves importers.[51] Exclusion of such a producer is within the Commission's discretion based upon the facts presented in each investigation.[52]

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[49] In comments on the draft final phase questionnaires, parties that anticipate making arguments for a different or separate domestic like products are asked to suggest any information and data the Commission should collect for its final phase analysis.

[50] 19 U.S.C. § 1677(4)(A).

[51] *See Torrington Co. v. United States*, 790 F. Supp. 1161, 1168 (Ct. Int'l Trade 1992), *aff'd mem.*, 991 F.2d 809 (Fed. Cir. 1993); *Sandvik AB v. United States*, 721 F. Supp. 1322, 1331-32 (Ct. Int'l Trade 1989), *aff'd mem.,* 904 F.2d 46 (Fed. Cir. 1990); *Empire Plow Co. v. United States*, 675 F. Supp. 1348, 1352 (Ct. Int'l Trade 1987).

[52] 19 U.S.C. § 1677(4)(B). The primary factors the Commission has examined in deciding whether appropriate circumstances exist to exclude a related party include the following:

(1) the percentage of domestic production attributable to the importing producer;
(Continued…)

The record indicates that *** are subject to possible exclusion from the domestic industry under the related party provision because they imported subject merchandise during the period of investigation ("POI").[53]

Petitioners maintain that appropriate circumstances do not exist to exclude any domestic producers from the domestic industry pursuant to the related parties provision.[54] Respondents do not address the issue of related parties.

We discuss below whether appropriate circumstances exist to exclude either domestic producer from the domestic industry.

****.* *** is a ***,[55] and was the *** domestic producer of ceramic tile in 2023, accounting for *** percent of U.S. production.[56] *** subject imports were equivalent to ***

(2) the reason the U.S. producer has decided to import the product subject to investigation (whether the firm benefits from the LTFV sales or subsidies or whether the firm must import in order to enable it to continue production and compete in the U.S. market);

(3) whether inclusion or exclusion of the related party will skew the data for the rest of the industry;

(4) the ratio of import shipments to U.S. production for the imported product; and

(5) whether the primary interest of the importing producer lies in domestic production or importation. *Changzhou Trina Solar Energy Co. v. USITC*, 100 F. Supp.3d 1314, 1326-31 (Ct. Int'l. Trade 2015), *aff'd*, 839 F.3d 1377 (Fed. Cir. 2018); *see also Torrington Co.*, 790 F. Supp. at 1168.

[53] CR/PR at III-3. *** may also qualify for possible exclusion because it purchased subject merchandise from unaffiliated importers. *Id.* at Table III-14. A domestic producer that does not itself import subject merchandise or does not share a corporate affiliation with an importer may nonetheless be deemed a related party if it controls a purchaser of large volumes of subject imports. *See* SAA at 858. The Commission has found such control to exist, for example, where the domestic producer's purchases were responsible for a predominant proportion of an importer's subject imports and the importer's subject imports were substantial. S*ee*, *e.g.*, *Iron Construction Castings from Brazil, Canada, and China*, Inv. Nos. 701-TA-248, 731-TA-262-263, 265 (Fourth Review), USITC Pub. 4655 at 11 (Dec. 2016); *Chlorinated Isocyanurates from China and Spain*, Inv. Nos. 731-TA-1082-1083 (Second Review), USITC Pub. 4646 at 12 (Nov. 2016). ***'s purchases from *** accounted for less than *** percent of *** imports of subject merchandise. CR/PR at Table III-14. Because *** was not responsible for a predominant proportion of *** imports, we also find *** does not qualify for exclusion under the related parties provision by virtue of its purchases.

[54] Petitioners' Post Conf. Br. at 9-11.

[55] CR/PR at Table III-1.

[56] CR/PR at Table III-1.

percent of its U.S. production in 2021, *** percent in 2022, and *** percent in 2023.[57] *** reported that it ***.[58]

In view of *** very low ratio of subject imports to domestic production, as well as its status as ***, *** primary interest would appear to be in domestic production. Nor is there any evidence that *** imports of subject merchandise have benefitted its operations such that its inclusion in the domestic industry would mask injury to the domestic industry. For these reasons, and in the absence of any contrary argument, we find that appropriate circumstances do not exist to exclude *** from the domestic industry.

****.* *** is a *** that was the seventh largest domestic producer of ceramic tile in 2023, accounting for *** percent of domestic production in that year.[59] *** ratio of subject imports to domestic production was below *** percent in 2021 and 2022, and *** percent in 2023.[60] *** reported that it ***.[61]

In view of *** very low ratio of subject imports to domestic production, as well as ***, *** primary interest would appear to be in domestic production. Nor is there any evidence that *** imports of subject merchandise have benefitted its operations such that its inclusion in the domestic industry would mask injury to the domestic industry. For these reasons, and in the absence of any contrary argument, we find that appropriate circumstances do not exist to exclude *** from the domestic industry.

[57] CR/PR at Table III-12.
[58] CR/PR at Table III-14.
[59] CR/PR at Table III-1.
[60] CR/PR at Table III-13.
[61] CR/PR at Table III-13.

In sum, consistent with our definition of the domestic like product, we define the domestic industry as all domestic producers of ceramic tile.

V. Reasonable Indication of Material Injury by Reason of Subject Imports[62]

A. Legal Standard

In the preliminary phase of antidumping and countervailing duty investigations, the Commission determines whether there is a reasonable indication that an industry in the United States is materially injured or threatened with material injury by reason of the imports under investigation.[63] In making this determination, the Commission must consider the volume of subject imports, their effect on prices for the domestic like product, and their impact on domestic producers of the domestic like product, but only in the context of U.S. production operations.[64] The statute defines "material injury" as "harm which is not inconsequential, immaterial, or unimportant."[65] In assessing whether there is a reasonable indication that the domestic industry is materially injured by reason of subject imports, we consider all relevant economic factors that bear on the state of the industry in the United States.[66] No single factor

[62] Pursuant to Section 771(24) of the Tariff Act, imports from a subject country of merchandise corresponding to a domestic like product shall be deemed negligible if they account for less than three percent of all such merchandise imported into the United States during the most recent 12 months for which data are available preceding the filing of the petition. *See* 19 U.S.C. §§ 1673b(a), 1677(24)(A)(i).

During the 12-month period preceding the filing of the petition (April 2023 – March 2024), subject imports from India accounted for 21.0 percent of total imports of ceramic tile. CR/PR at Table IV-9. Because subject imports from India are above the statutory threshold, we find that ceramic tile from India subject to the antidumping and countervailing duty investigations are not negligible.

[63] 19 U.S.C. §§ 1671b(a), 1673b(a).

[64] 19 U.S.C. § 1677(7)(B). The Commission "may consider such other economic factors as are relevant to the determination" but shall "identify each {such} factor … and explain in full its relevance to the determination." 19 U.S.C. § 1677(7)(B).

[65] 19 U.S.C. § 1677(7)(A).

[66] 19 U.S.C. § 1677(7)(C)(iii).

is dispositive, and all relevant factors are considered "within the context of the business cycle and conditions of competition that are distinctive to the affected industry."[67]

Although the statute requires the Commission to determine whether there is a reasonable indication that the domestic industry is "materially injured or threatened with material injury by reason of" unfairly traded imports,[68] it does not define the phrase "by reason of," indicating that this aspect of the injury analysis is left to the Commission's reasonable exercise of its discretion.[69] In identifying a causal link, if any, between subject imports and material injury to the domestic industry, the Commission examines the facts of record that relate to the significance of the volume and price effects of the subject imports and any impact of those imports on the condition of the domestic industry. This evaluation under the "by reason of" standard must ensure that subject imports are more than a minimal or tangential cause of injury and that there is a sufficient causal, not merely a temporal, nexus between subject imports and material injury.[70]

In many investigations, there are other economic factors at work, some or all of which may also be having adverse effects on the domestic industry. Such economic factors might

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[67] 19 U.S.C. § 1677(7)(C)(iii).

[68] 19 U.S.C. §§ 1671b(a), 1673b(a).

[69] *Angus Chemical Co. v. United States*, 140 F.3d 1478, 1484-85 (Fed. Cir. 1998) ("{T}he statute does not 'compel the commissioners' to employ {a particular methodology}."), *aff'g,* 944 F. Supp. 943, 951 (Ct. Int'l Trade 1996).

[70] The Federal Circuit, in addressing the causation standard of the statute, observed that "{a}s long as its effects are not merely incidental, tangential, or trivial, the foreign product sold at less than fair value meets the causation requirement." *Nippon Steel Corp. v. USITC*, 345 F.3d 1379, 1384 (Fed. Cir. 2003). This was further ratified in *Mittal Steel Point Lisas Ltd. v. United States*, 542 F.3d 867, 873 (Fed. Cir. 2008), where the Federal Circuit, quoting *Gerald Metals, Inc. v. United States*, 132 F.3d 716, 722 (Fed. Cir. 1997), stated that "this court requires evidence in the record 'to show that the harm occurred "by reason of" the LTFV imports, not by reason of a minimal or tangential contribution to material harm caused by LTFV goods.'" *See also Nippon Steel Corp. v. United States*, 458 F.3d 1345, 1357 (Fed. Cir. 2006); *Taiwan Semiconductor Industry Ass'n v. USITC*, 266 F.3d 1339, 1345 (Fed. Cir. 2001).

include nonsubject imports; changes in technology, demand, or consumer tastes; competition among domestic producers; or management decisions by domestic producers. The legislative history explains that the Commission must examine factors other than subject imports to ensure that it is not attributing injury from other factors to the subject imports, thereby inflating an otherwise tangential cause of injury into one that satisfies the statutory material injury threshold.[71] In performing its examination, however, the Commission need not isolate the injury caused by other factors from injury caused by unfairly traded imports.[72] Nor does the "by reason of" standard require that unfairly traded imports be the "principal" cause of injury or contemplate that injury from unfairly traded imports be weighed against other factors,

[71] SAA at 851-52 ("{T}he Commission must examine other factors to ensure that it is not attributing injury from other sources to the subject imports."); S. Rep. 96-249 at 75 (1979) (the Commission "will consider information which indicates that harm is caused by factors other than less-than-fair-value imports."); H.R. Rep. 96-317 at 47 (1979) ("in examining the overall injury being experienced by a domestic industry, the ITC will take into account evidence presented to it which demonstrates that the harm attributed by the petitioner to the subsidized or dumped imports is attributable to such other factors;" those factors include "the volume and prices of nonsubsidized imports or imports sold at fair value, contraction in demand or changes in patterns of consumption, trade restrictive practices of and competition between the foreign and domestic producers, developments in technology and the export performance and productivity of the domestic industry"); *accord Mittal Steel*, 542 F.3d at 877.

[72] SAA at 851-52 ("{T}he Commission need not isolate the injury caused by other factors from injury caused by unfair imports."); *Taiwan Semiconductor Industry Ass'n,* 266 F.3d at 1345 ("{T}he Commission need not isolate the injury caused by other factors from injury caused by unfair imports ... Rather, the Commission must examine other factors to ensure that it is not attributing injury from other sources to the subject imports." (emphasis in original)); *Asociacion de Productores de Salmon y Trucha de Chile AG v. United States*, 180 F. Supp. 2d 1360, 1375 (Ct. Int'l Trade 2002) ("{t}he Commission is not required to isolate the effects of subject imports from other factors contributing to injury" or make "bright-line distinctions" between the effects of subject imports and other causes.); *see also Softwood Lumber from Canada*, Inv. Nos. 701-TA-414 and 731-TA-928 (Remand), USITC Pub. 3658 at 100-01 (Dec. 2003) (Commission recognized that "{i}f an alleged other factor is found not to have or threaten to have injurious effects to the domestic industry, *i.e*., it is not an 'other causal factor,' then there is nothing to further examine regarding attribution to injury"), *citing Gerald Metals,* 132 F.3d at 722 (the statute "does not suggest that an importer of LTFV goods can escape countervailing duties by finding some tangential or minor cause unrelated to the LTFV goods that contributed to the harmful effects on domestic market prices.").

such as nonsubject imports, which may be contributing to overall injury to an industry.[73] It is clear that the existence of injury caused by other factors does not compel a negative determination.[74]

Assessment of whether material injury to the domestic industry is "by reason of" subject imports "does not require the Commission to address the causation issue in any particular way" as long as "the injury to the domestic industry can reasonably be attributed to the subject imports."[75] The Commission ensures that it has "evidence in the record" to "show that the harm occurred 'by reason of' the LTFV imports," and that it is "not attributing injury from other sources to the subject imports." [76] The Federal Circuit has examined and affirmed various Commission methodologies and has disavowed "rigid adherence to a specific formula."[77]

The question of whether the material injury threshold for subject imports is satisfied notwithstanding any injury from other factors is factual, subject to review under the substantial

[73] S. Rep. 96-249 at 74-75; H.R. Rep. 96-317 at 47.

[74] *See Nippon Steel Corp*., 345 F.3d at 1381 ("an affirmative material-injury determination under the statute requires no more than a substantial-factor showing. That is, the 'dumping' need not be the sole or principal cause of injury.").

[75] *Mittal Steel*, 542 F.3d at 876 &78; *see also id.* at 873 ("While the Commission may not enter an affirmative determination unless it finds that a domestic industry is materially injured 'by reason of' subject imports, the Commission is not required to follow a single methodology for making that determination ... {and has} broad discretion with respect to its choice of methodology."), *citing United States Steel Group v. United States*, 96 F.3d 1352, 1362 (Fed. Cir. 1996) and S. Rep. 96-249 at 75. In its decision in *Swiff-Train v. United States*, 793 F.3d 1355 (Fed. Cir. 2015), the Federal Circuit affirmed the Commission's causation analysis as comporting with the Court's guidance in *Mittal*.

[76] *Mittal Steel*, 542 F.3d at 873 (quoting from *Gerald Metals*, 132 F.3d at 722), 877-79. We note that one relevant "other factor" may involve the presence of significant volumes of price-competitive nonsubject imports in the U.S. market, particularly when a commodity product is at issue. In appropriate cases, the Commission collects information regarding nonsubject imports and producers in nonsubject countries in order to conduct its analysis.

[77] *Nucor Corp. v. United States*, 414 F.3d 1331, 1336, 1341 (Fed. Cir. 2005); *see also Mittal Steel*, 542 F.3d at 879 ("*Bratsk* did not read into the antidumping statute a Procrustean formula for determining whether a domestic injury was 'by reason' of subject imports.").

evidence standard.[78] Congress has delegated this factual finding to the Commission because of the agency's institutional expertise in resolving injury issues.[79]

B. Conditions of Competition and the Business Cycle

The following conditions of competition inform our analysis of whether there is a reasonable indication of material injury by reason of subject imports.

1. Demand Conditions

U.S. demand for ceramic tile is driven primarily by demand in the construction sector, both for new homes and for remodeling/removing and replacement ("R&R").[80] Most market participants reported that demand for ceramic tile is seasonal with peaks in the spring and fall and valleys in the winter.[81] Several substitutes exist for ceramic tile, particularly in flooring applications, including luxury vinyl tile ("LVT"), carpet, wood (typically hardwood), and stone.[82]

The vast majority of U.S. producers (seven out of nine) reported a decrease in demand for ceramic tile since January 1, 2021.[83] The responses by U.S. importers were mixed, with seven reporting that demand steadily increased or fluctuated up and seven reporting that demand steadily decreased or fluctuated down (with the remaining two reporting no change).[84]

Apparent U.S. consumption of ceramic tile steadily declined over the POI from 3.1 billion square feet in 2021, to 3.0 billion square feet in 2022, and 2.8 billion square feet in 2023, a level

[78] We provide in our discussion below a full analysis of other factors alleged to have caused any material injury experienced by the domestic industry.

[79] *Mittal Steel*, 542 F.3d at 873; *Nippon Steel Corp*., 458 F.3d at 1350, *citing U.S. Steel Group*, 96 F.3d at 1357; S. Rep. 96-249 at 75 ("The determination of the ITC with respect to causation is ... complex and difficult, and is a matter for the judgment of the ITC.").

[80] CR/PR at II-1.

[81] CR/PR at II-1.

[82] CR/PR at II-1.

[83] CR/PR at Table II-4.

[84] CR/PR at Table II-4.

9.0 percent lower than in 2021.[85] This occurred as new home construction and remodeling activity slowed during the POI.[86]

2. Supply Conditions

The domestic industry was the second largest source of supply in the U.S. market during the POI.[87] The domestic industry's share of apparent U.S. consumption increased from 27.8 percent in 2021 to 28.3 percent in 2022 and 28.6 percent in 2023, for an overall increase of 0.9 percentage points during the period.[88]

Responding domestic producers reported several changes to their operations during the POI. ***.[89] ***.[90] ***.[91] Several other producers reported production curtailments.[92] Overall, the domestic industry increased its practical capacity by 5.0 percent over the POI, from 1.0 billion square feet in 2021 and 2022 to 1.1 billion square feet in 2023.[93]

Subject imports were the third largest source of supply to the U.S. market throughout the POI, although their market share increased during the POI.[94] Subject imports' share of apparent U.S. consumption increased by 7.4 percentage points during the POI, from 7.1 percent in 2021 to 9.3 percent in 2022 and 14.5 percent in 2023.[95]

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[85] CR/PR at Tables IV-10 & C-1.

[86] CR/PR at II-6 to II-7. The number of new housing units decreased by 2.5 percent over the period of investigation, while the remodeling market index ("RMI") for R&R activity decreased by 19.2 percent over the POI. *Id.*

[87] CR/PR at Tables IV-10 and C-1.

[88] CR/PR at Tables IV-9 & C-1.

[89] CR/PR at Table III-3.

[90] CR/PR at Table III-3.

[91] CR/PR at Table III-3.

[92] CR/PR at Table III-4. ***. *Id.* ***. *Id.*

[93] CR/PR at III-6 and Table III-5. Portobello opened a new plant which became operational in the summer of 2023. CR/PR at Table III-3. *** underwent an expansion starting in 2022. CR/PR at III-8.

[94] CR/PR at Tables IV-10 & C-1.

[95] CR/PR at Tables IV-10 & C-1.

Nonsubject imports were the largest supply source of supply to the U.S. market during the POI.[96] Nonsubject imports' share of apparent U.S. consumption declined by 8.3 percentage points during the POI, from 65.2 percent in 2021 to 62.3 percent in 2022 and 56.9 percent in 2023.[97] The largest sources of nonsubject imports during the POI were Spain, Mexico, Italy, Brazil, and Turkey.[98] Nonsubject imports from China became subject to antidumping and countervailing duty orders in June 2020 and subsequently declined to minimal levels during the POI.[99]

3. Substitutability and Other Conditions

Based on the current record, we find that there is a high degree of substitutability between domestically produced ceramic tile and subject imports.[100] Nearly all responding U.S. producers (9 of 10) and most responding importers (10 of 15) reported that the domestic like product and subject imports were always or frequently interchangeable.[101] The record also indicates that U.S. shipments of both domestically produced ceramic tile and subject imports consisted primarily of floor tiles, with substantial overlap in terms of U.S. shipments of large non-mosaic, small/medium non-mosaic, and mosaic ceramic tile.[102]

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[96] CR/PR at Tables IV-10 & C-1.

[97] CR/PR at Tables IV-9 & C-1.

[98] CR/PR at II-5 and Table IV-3. MSI argues that U.S. demand exceeds the domestic industry's ability to supply it and that any increase in the volume of subject imports was at the expense of nonsubject imports. MSI Post Conf. Br. at 14 (*citing* Ex. 6, U.S. Census Data: Annual U.S. Imports of Ceramic Tile by Country (2021-2023) and Ex. 2, 2021 U.S. Ceramic Tile Market Update, Tile Council of North America Inc. (Apr. 6, 2022). We address the significance of subject import volumes in Section V.E below.

[99] CR/PR at I-5 & Table E-1. The volume of nonsubject imports from China was 7.7 million square feet in 2021, 2.2 million square feet in 2022, and 1.3 million square feet in 2023. *Id.* at Table E-1.

[100] CR/PR at II-10 & Table II-8.

[101] CR/PR at Table II-8.

[102] CR/PR at Table D-4.

The record in the preliminary phase of this investigation also indicates that price is an important factor in purchasing decisions for ceramic tile, among other important factors. Purchasers responding to the Commission's lost sales and lost revenue survey identified trend, quality, availability, production capacity, market brand preference, distribution network, service, innovation, compliance, reliability of supply, and price as the main factors that they considered in making purchasing decisions for ceramic tile, with price the most often-cited third most important factor.[103] One of the two responding purchasers that reported that they purchased subject imports instead of the domestic like product during the POI also reported that price was a primary reason for that choice.[104] The vast majority of responding domestic producers (7 of 10) and the majority of responding U.S. importers (8 of 15) reported that differences other than price were only sometimes or never significant in choosing between purchasing domestically produced ceramic tile and subject imports.[105]

Responding U.S. producers and importers reported shipments through similar channels of distribution, including to big box/home center retailers (the predominant channel, accounting for *** percent of domestic industry U.S. shipments and *** percent subject import U.S. shipments in 2023), distributors, other retailers, contractors/builders, and other end users.[106] Producers reported that *** percent of their U.S. shipments were made pursuant to spot sales with most of the remainder through long-term and annual contracts, which

[103] CR/PR at Table II-7. Quality was the most often cited top factor (2 of 4 purchasers), followed by design trend (1 of 4 purchasers) and all other factors (1 of 4 purchasers). *Id.*

[104] CR/PR at V-16, Table V-14.

[105] CR/PR at Table II-9.

[106] CR/PR at Tables II-1 & D-1 to D-3.

accounted for 13.6 and 14.6 percent of their U.S. shipments, respectively.[107] Importers reported that most of their U.S. shipments, *** percent, were made pursuant to spot sales, with most of the remainder, *** percent, through long-term contracts.[108]

The primary raw material used to produce ceramic tile is clay, followed by glazing, decorating and other surfacing materials, then by silica, feldspar, and other minerals.[109] Raw material costs were the second largest component of U.S. producers' total cost of goods sold ("COGS") during the POI, increasing irregularly as a share of the domestic industry's total COGS from 30.8 percent in 2021 to 32.9 percent in 2022 and then declining to 32.8 percent in 2023.[110]

C. Volume of Subject Imports

Section 771(7)(C)(i) of the Tariff Act provides that the "Commission shall consider whether the volume of imports of the merchandise, or any increase in that volume, either in absolute terms or relative to production or consumption in the United States, is significant."[111]

The volume of subject imports increased by 85.9 percent from 2021 to 2023, from 217.8 million square feet in 2021 to 283.9 million square feet in 2022 and 404.9 million square feet in 2023.[112]

[107] CR/PR at Table V-4.
[108] CR/PR at Table V-4.
[109] CR/PR at Table VI-4.
[110] CR/PR at VI-18 and Table VI-1. Petitioners indicated that in addition to inflation impacting the cost of raw materials, a large part of the increase is attributable to transportation costs. Tr. at 54 (Mr. Caselli).
[111] 19 U.S.C. § 1677(7)(C)(i).
[112] CR/PR at Tables IV-2 & C-1.

Subject imports as a share of apparent U.S. consumption increased by 7.4 percentage points from 2021 to 2023, from 7.1 percent of apparent U.S. consumption in 2021 to 9.3 percent in 2022 and 14.5 percent in 2023.[113]

Based on the record in the preliminary phase of this investigation, we find that the volume of subject imports and the increase in that volume are significant, both in absolute terms and relative to U.S. consumption.[114]

D. Price Effects of the Subject Imports

Section 771(7)(C)(ii) of the Tariff Act provides that, in evaluating the price effects of subject imports, the Commission shall consider whether –

> (I) there has been significant price underselling by the imported merchandise as compared with the price of domestic like products of the United States, and
>
> (II) the effect of imports of such merchandise otherwise depresses prices to a significant degree or prevents price increases, which otherwise would have occurred, to a significant degree.[115]

As addressed in section IV.B.4. above, we have found that there is a high degree of substitutability between domestically produced ceramic tile and subject imports and that price is an important factor in purchasing decisions, among other important factors.

The Commission collected quarterly pricing data from U.S. producers and importers for the total quantity and f.o.b. values of four pricing products shipped to unrelated U.S. customers

[113] CR/PR at Tables IV-3 & C-1.

[114] Subject imports as a share of U.S. production increased by 22.2 percentage points from 2021 to 2023, increasing from 24.4 percent of U.S. production in 2021 to 31.7 percent in 2022 and 46.6 percent in 2023. Derived from CR/PR at Table C-1.

[115] 19 U.S.C. § 1677(7)(C)(ii).

during the POI.[116] All ten domestic producers and 7 importers provided usable pricing data, although not all firms reported pricing for all products for all quarters.[117] Pricing data reported by these firms accounted for 32.8 percent of U.S. producers' U.S. shipments of ceramic tile in and 5.9 percent of importers' U.S shipments of ceramic tile from India in 2023.[118]

The pricing data show that subject imports undersold domestically produced ceramic tile in 31 of 36 quarterly comparisons, at margins ranging from 2.2 to 38.8 percent and averaging *** percent.[119] On a volume basis, there were *** square feet of reported subject import sales in quarters of underselling.[120] Subject imports oversold domestically produced ceramic tile in 5 of 36 quarterly comparisons, involving *** million square feet of subject imports, at margins ranging from *** to *** percent and averaging *** percent.[121] Thus, subject imports undersold the domestic like product in 86.1 percent of quarterly comparisons,

[116] CR/PR at V-5. The four pricing products are as follows:

Product 1.--Porcelain tile, rectangular, 6"–8" in width by 24"–36" in length (excluding mosaic ceramic tile and finishing ceramic tile), sold to home centers

Product 2.--Porcelain tile, rectangular, 12" in width by 24" in length (excluding mosaic ceramic tile and finishing ceramic tile), sold to regional distributors/floor covering wholesalers

Product 3.--Non-porcelain ceramic tile, square or rectangular, 3"–6" in width by 6"–12" in length (excluding mosaic ceramic tile and finishing ceramic tile), sold to other retailer (e.g. manufacturer-owned stores, importer-owned stores, kitchen/bath/flooring stores)

Product 4.—Porcelain tile, square or rectangular, 24"-48" in width by 24"-48" in length (excluding mosaic ceramic tile and finishing ceramic tile), sold to distributors *Id.*

[117] CR/PR at V-5.

[118] CR/PR at V-5. In any final phase of the investigations, we invite the parties to address in their comments on the draft questionnaires how best to increase the coverage of the pricing data.

[119] CR/PR at Table V-12.

[120] CR/PR at Table V-12.

[121] CR/PR at Table V=12

with 86.3 percent of the reported sales volume of subject imports in the quarters of underselling.[122]

We have also considered U.S. purchaser responses regarding lost sales. Two of four purchasers reported purchasing subject imports instead of the domestic like product during the POI.[123] Both of these purchasers reported that subject imports were priced lower than the domestic like product, with one reporting that it had purchased *** square feet of subject imports in lieu of the domestic like product based on price.[124]

Given the high degree of substitutability between subject imports and the domestic like product, the importance of price in purchasing decisions, the pervasive underselling by subject imports in terms of both quarterly comparisons and reported sales volume, we find that there has been significant underselling by subject imports during the POI.

The underselling by subject imports enabled their growth in U.S. market share and prevented the domestic industry from gaining much of the market share ceded by imports from China after the orders were imposed on imports from that country. Although imports from China largely exited the U.S. market following the imposition of antidumping and countervailing duty orders in June 2020, the domestic industry gained only a slight 0.9 percentage points of market share over the three full years of the POI.[125] Thus, the significant underselling also had

[122] Derived from CR/PR at Table V-12. Respondents argue that subject import underselling margins reflect differences in quality between subject imports and the domestic like product that serve to attenuate subject import competition. *See* MSI Post Conf. Br. at 17-18, 28; Nexion Post Conf. Br. at 8-10. In any final phase of these investigations, we intend to investigate further respondents' claims with respect to the quality of subject imports.

[123] CR/PR at Table V-14.

[124] CR/PR at Table V-14.

[125] CR/PR at Tables IV-10, C-1.

the effect of preventing the domestic industry from increasing its market share following the investigation and imposition of orders on unfairly trade imports from China, despite the industry's substantial capital investments in new and expanded capacity. In addition, significant subject import underselling caused subject imports to gain 4.4 percentage points of market share from the domestic industry in the retail channel of distribution from 2021 to 2023.[126]

We have also considered price trends. During the POI, domestic prices generally increased for all four pricing products.[127] Between the first and last quarters of the POI, domestic producer sales prices for the four pricing products increased by *** percent to *** percent depending on the pricing product.[128] Subject imports sales prices declined by *** percent) for pricing product 1 but increased by *** percent for pricing product 2 and *** percent for pricing product 4.[129]

We have also examined whether subject imports prevented price increases which otherwise would have occurred to a significant degree. The record shows that the domestic industry's ratio of COGS to net sales steadily increased by 2.3 percentage points from 2021 to

[126] The retailers channel accounted for the vast majority of Indian imports as well as being the largest distribution channel of the domestic industry. In that channel, the *** percentage point loss in market share by the domestic industry was directly attributable to subject imports. *See* CR/PR at Table D-2. In the second largest distribution channel for the domestic industry (to distributors), Indian imports also gained a small amount of market share albeit with relatively small volumes compared to the domestic industry. Nevertheless, that gain was also directly at the expense of the domestic industry. *See* CR/PR at Table D-1. In fact, in the only distribution channel in which the domestic industry gained some market share (to end users), subject import volume was the smallest of the three distribution channels. *See* CR/PR at Table D-3.

[127] CR/PR at Table V-9

[128] CR/PR at Table V-9. Notably, prices for domestic sales of pricing product 3 increased the *** (by *** percent) and there were *** sales of subject imports in that product during the POI. *Id.* In the pricing product with the highest volume of subject import sales (pricing product 2), domestic producers' sales prices increased by just *** percent. *Id.*

[129] CR/PR at Table V-9.

2023, increasing from 66.4 percent in 2021 to 67.4 percent in 2022 and 68.7 percent in 2023.[130] On the other hand, the domestic industry's per unit net sales value increased by $0.22 per square foot from 2021 to 2023, which exceeded the $0.18 per square foot increase in the industry's unit COGS over the same period (with raw materials accounting for only $0.08square feet of the total increase in per unit COGS, while other factory costs ("OFC") also accounted for $0.08).[131] In addition, the 9.0 percent decline in apparent U.S. consumption from 2021 to 2023 may have contributed to the domestic industry's inability to raise prices.[132] In light of the foregoing evidence, in particular the rise in COGS to net sales ratio, and the significant and increasing volume of low-priced subject imports in the U.S. market, for purposes of these preliminary determinations, we cannot conclude that subject imports did not suppress prices for the domestic like product to a significant degree during the POI.

In sum, based on the record of the preliminary phase of this investigation, we find that subject imports significantly undersold the domestic like product. The underselling caused the domestic industry to gain less market share from 2021 to 2023 than it would have otherwise, and we cannot conclude that it did not suppress domestic producer prices to a significant degree. Accordingly, we find that subject imports had significant adverse price effects.

[130] CR/PR at Tables VI-1 & C-1. We find it instructive that domestic sales prices increased the most on pricing product 3 (*** percent), for which there was no subject import competition, and the least for pricing product 2 (*** percent), which faced the highest volume of subject imports competition. CR/PR at Table V-9.

[131] CR/PR at Table VI-12. No responding purchaser reported that domestic producers had to reduce their prices to compete with subject imports. CR/PR at V-16.

[132] CR/PR at Table C-1.

E. Impact of the Subject Imports[133]

Section 771(7)(C)(iii) of the Tariff Act provides that the Commission, in examining the impact of the subject imports on the domestic industry, "shall evaluate all relevant economic factors which have a bearing on the state of the industry." These factors include output, sales, inventories, capacity utilization, market share, employment, wages, productivity, gross profits, net profits, operating profits, cash flow, return on investment, return on capital, ability to raise capital, ability to service debt, research and development ("R&D"), and factors affecting domestic prices. No single factor is dispositive and all relevant factors are considered "within the context of the business cycle and conditions of competition that are distinctive to the affected industry."[134]

The domestic industry's performance generally deteriorated from 2021 to 2023 as the volume of low-priced subject imports increased in absolute and relative terms, and apparent U.S. consumption declined by 9.0 percent.[135] Although the domestic industry's share of apparent U.S. consumption increased slightly, increasing volumes of subject imports pervasively undersold the domestic like product and gained market share to a much greater degree, preventing the industry from capitalizing on its capital investments following the imposition of antidumping and countervailing duty orders on imports from China and causing its performance to worsen by most measures.[136]

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[133] Commerce initiated the antidumping duty investigation based on estimated dumping margins of 328.14 to 489.36 percent for subject imports from India. *Ceramic Tile from India: Initiation of Less-Than-Fair-Value Investigation*, 89 Fed. Reg. 42836, 42839 (May 9, 2024).

[134] 19 U.S.C. § 1677(7)(C)(iii).

[135] CR/PR at Table C-1.

[136] CR/PR at Table C-1.

The domestic industry's practical capacity increased by 5.0 percent from 2021 to 2023.[137] The industry's production declined by 2.5 percent from 2021 to 2023.[138] Its capacity utilization declined by 6.4 percentage points over the POI, from 88.5 percent in 2021, to 86.6 percent in 2022 and 82.1 percent in 2023.[139]

The domestic industry's number of production and related workers ("PRWs"), hourly wages, and wages paid, all increased from 2021 to 2023.[140] Its total hours worked also increased irregularly during the period.[141] However, the domestic industry's productivity declined irregularly from 2021 to 2023.[142]

The domestic industry's U.S. shipments decreased by 6.2 percent from 2021 to 2023.[143] As noted above, the industry's market share increased modestly from 27.8 percent in 2021 to 28.3 percent in 2022 and 28.6 percent in 2023, for an overall increase of 0.9 points during the POI.[144]

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[137] CR/PR at Table C-1. The domestic industry's practical capacity increased from 1.0 billion square feet in 2021 and 2022 to 1.1 billion square feet in 2023. *Id*.

[138] CR/PR at Table C-1. The domestic industry's production increased from 892 million square feet in 2021 to 896 million square feet in 2022, before declining to 802 million square feet in 2023. *Id*.

[139] CR/PR at Table C-1. The domestic industry's capacity utilization rate was 88.5 percent in 2021, 86.6 percent in 2022, and 82.1 percent in 2023. *Id.*

[140] CR/PR at Table C-1. The domestic industry's number of PRWs increased from 3,679 PRWs in 2021 to 3,779 PRWs in 2022 and 3,976 PRWs in 2023. *Id*. Wages paid increased from $211.5 million in 2021 to $224.7 million in 2022 and $244.2 million in 2023. *Id*. Hourly wages increased from $28.06 per hour in 2021 to $29.89 per hour in 2021 and $30.74 per hour in 2023. *Id*.

[141] CR/PR at Table C-1. Total hours worked declined from 7.54 million hours in 2021 to 7.52 million hours in 2022 and then increased to 7.9 million hours in 2023. *Id*.

[142] CR/PR at Table C-1. Productivity increased from 118.3 square feet per hour in 2021 to 119.2 square feet per hour in 2022 and then declined to 109.4 square feet per hour in 2023. *Id*.

[143] CR/PR at Table C-1. The domestic industry's U.S. shipments increased from 855 million square feet in 2021 to 862 million square feet in 2022, before declining to 802 million square feet in 2023. *Id*.

[144] CR/PR at Table C-1.

The domestic industry's end-of-period inventories increased by 8.9 percent during the POI.[145] As a ratio to total shipments, the domestic industry's end-of-period inventories increased steadily from 34.2 percent in 2021 to 35.1 percent in 2022 and 39.5 percent in 2023, for an overall increase of 5.3 percentage points for the POI.[146]

The domestic industry's financial performance indicia generally deteriorated overall from 2021 to 2023. The industry's net sales revenues increased by 8.4 percent from 2021 to 2023.[147] Its gross profit also increased by 1.1 percent during the POI, but its operating income declined by 77.4 percent and its net income in 2021 and 2022 became a net loss of $17.7 million in 2023.[148] As a ratio to net sales, the industry's operating income declined from 5.2 percent in 2021 to 4.2 percent in 2022, and 1.1 percent in 2023, for an overall decrease of 4.1 percentage points during the POI.[149] Similarly, the industry's net income as a share of net sales declined from 4.1 percent in 2021 to 3.2 percent in 2022 and to a net loss of 1.3 percent in 2023.[150]

The domestic industry's capital expenditures increased from $42 million in 2021 to $147 million in 2022, and $221 million in 2023.[151] Its R&D expenses increased by 16.4 percent from

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[145] CR/PR at Tables III-11 & C-1. The domestic industry's end-of-period inventories increased from 296 million square feet in 2021 to 308 million square feet in 2022 and 322 million square feet in 2023. *Id*.

[146] CR/PR at Tables III-11 & C-1.

[147] CR/PR at Table C-1. The domestic industry's net sales by value increased from $1.23 billion in 2021 to $1.35 billion in 2022 and declined to $1.33 billion in 2023. *Id*.

[148] The domestic industry's gross profit increased from $420 million in 2021 to $448 million in 2022 and declined to $424 million in 2023. The domestic industry's operating income declined from $65 million in 2021 to $57 million in 2022 and $15 million in 2023. The domestic industry's net income declined from $51 million in 2021 to $43 million in 2022 and to an operating loss of 18 million in 2023.

[149] CR/PR at Table C-1.

[150] CR/PR at Table C-1.

[151] CR/PR at Table VI-5. ***. CR/PR at VI-23, nn. 29-32. Portobello opened a new plant. CR-PR at Table III-3.

2021 to 2023.[152] Its operating return on assets decreased from 3.0 percent in 2021 to 2.9 percent in 2022 and 0.7 percent in 2023.[153] Nine of ten domestic producers reported negative effects on their investment and growth and development due to subject imports.[154]

In conclusion, we have found that subject imports entered the U.S. market in significant and increasing volumes during the POI, gaining 7.4 percentage points of market share, as they significantly undersold the domestic like product. The significant increase in low-priced subject imports prevented the domestic industry from gaining as much market share as they would have otherwise given the disciplining effects of the order on nonsubject imports from China, and also caused a *** percentage point shift in market share from the domestic industry to subject imports in the retail channel of distribution.[155] Further, as explained above, we cannot conclude that subject imports did not prevent price increases that would have otherwise occurred. As a consequence, the domestic industry's U.S. shipments, market share, revenues, operating income, and net income were lower than they would have been but for subject imports. Despite investing in new capacity, the domestic industry's production declined over the POI, as did its capacity utilization rate, productivity, and U.S. shipments while inventories increased. The domestic industry's operating income fell and positive net income at the beginning of the POI turned into a net loss at the end. Accordingly, we find that subject imports had a significant impact on the domestic industry.

[152] The domestic industry's industry R&D expenses increased from $10.0 million in 2021 to $10.5 million in 2022 and $11.7 million in 2023. CR/PR at Table C-1.

[153] CR/PR at Table VI-10.

[154] CR/PR at Tables VI-12 & VI-13.

[155] CR/PR at Tables C-1 & D-2. In addition, we cannot conclude that subject imports underselling did not suppress domestic producer prices to a significant degree, causing domestic producer revenues, operating income, and net income to be lower than they otherwise would be.

We have also considered whether there are other factors that may have had an impact on the domestic industry to ensure that we are not attributing injury from such other factors to subject imports. As discussed in section V.B.2 above, although nonsubject imports were the largest source of supply in the U.S. market throughout the POI, their share of apparent U.S. consumption declined from 62.6 percent in 2021 to 59.2 percent in 2023.[156] In addition, the AUVs of nonsubject imports increased during the POI and were well above those of subject imports, whose AUVs declined irregularly.[157] We therefore find, for purposes of this preliminary determination, that nonsubject imports do not explain the injury to the domestic industry during the POI.

We recognize that apparent U.S. consumption of ceramic tile declined by 9 percent during the POI.[158] As discussed in Section V.B.1 above, demand for ceramic tile is closely tied to construction activity and both new home construction and R&R activity declined from 2021 to 2023.[159] We find, however, that declining demand cannot fully account for the injury that we have attributed to subject imports, as increasing volumes of low-priced subject imports gained significant market share and prevented the industry from obtaining greater market share from nonsubject imports as imports from China receded.

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[156] CR/PR at Tables IV-10 & C-1.

[157] CR/PR at Table IV-2. The AUVs of nonsubject imports increased from $1.16 per square foot in 2021, to $1.42 per square foot in 2022, and $1.44 per square foot in 2023. CR/PR at Table C-1. The AUVs of subject imports increased from $0.76 per square in 2021, to $0.87 per square foot in 2022, before declining to $0.64 per square foot in 2023. *Id.* Respondents pointed to nonsubject imports' market share loss to subject imports as mitigating the significance of the increase in subject import volumes, not as an alternative cause of injury. MSI's Post Conf. Br. at 15.

[158] CR/PR at Table C-1.

[159] CR/PR at II-6 to II-7. MSI points to the rise in interest rates and decline in home sales and mortgage refinancing in the second half of the POI as factors unrelated to subject imports that affected the domestic industry's financial performance. MSI's Post Conf. Br. at 22-23.

MSI argues that the increasing popularity of LVT adversely affected the domestic industry by taking share from ceramic tile and, thereby, reducing U.S. producers' sales.[160] Contrary to this argument, however, MSI submitted information concerning a major retailer's sales of ceramic tile and LVT showing that LVT sales did not increase at the expense of ceramic tile sales during the POI, with ceramic tile's share of the retailer's sales flat at 23 percent during the period, while LVT's share of the retailer's sales increased in 2022 before returning to the 2021 level of 26 percent in 2023.[161] Further, competition from LVT cannot explain the domestic industry's inability to capitalize on its capital investments as subject imports increased by 85.9 percent in absolute terms, gained *** percentage points of market share at the domestic industry's expense in the retail channel, and gained 7.4 percentage points of market share overall in a declining market.[162]

MSI also argues the U.S. ceramic tile market is segmented, with the U.S. producers serving what it characterizes as the high-end segment, while subject and nonsubject imports serve what it characterizes as the mass-market segment.[163] For purposes of these preliminary

[160] MSI's Post Conf. Br. at 30-32 (*citing* Ex. 2, Darius Helm, *Annual Report 2022: Product locked in transit had an outsized impact on this year's flooring market – May 2022*, Floor Daily; Darius Helm, *Annual Report 2023: Commercial gains offset residential losses last year, driving another year of industry growth – May 2023*, Floor Daily; Ex. 4, Luxury Flooring Installation Costs, M S International, Inc.; Ex. 4, Rebecca Denis, Luxury Vinyl Flooring vs. Tile Comparison Guide, Revive (Aug. 7, 2023); Ex. 4, Vinyl Flooring Installation Cost Guide, The Home Depot.

[161] MSI's Post Conf. Br. at 19.

[162] CR/PR at Table C-1.

[163] MSI's Post Conf. Br. at 13, 17 (*citing* Tr. at 102 (Mr. Shah); Tr. at 155 (Mr. Bedrosian); Tr. at 142 (Mr. Shah); Ex 1, FCNews Staff, *Florim USA introduces digital texture glaze technology,* Floor Covering News (Mar. 19, 2024); Ex. 2, Jennifer Bardoner, *Executive Outlook: Residential demand isn't expected to bounce back until later next year, but executives remain focused and optimistic - Dec 2023*, Floor Daily). Nexion makes the same essential argument under the rubric of "attenuated competition," relying on MSI's Staff Conference testimony. Nexion's Post Conf. Br. at 9-10. Varmora argues that it makes tiles with finishes that the U.S. producers do not make, and that it its integrated stone technology (Continued…)

determinations, the record does not support MSI's claims. Two of the leading Indian producers and exporters, Comet and Varmora, use continuous press technology, which is the latest and most advanced technology for the production of ceramic tile.[164] In addition, as discussed in Section V.B.3 above, we have found a high degree of substitutability between subject imports and the domestic like product, based on the substantial majorities of responding domestic producers and importers reporting that subject and domestic ceramic tile is always or frequently interchangeable.

MSI also contends that the domestic industry had insufficient capacity to satisfy demand in the U.S. market during the POI, necessitating increased subject imports.[165] While the reported practical production capacity of the domestic industry was less than apparent U.S. consumption in each year of the POI, domestic practical capacity increased by 5 percent over the period,[166] while the industry's capacity utilization rate declined in each year of the POI from 88.5 percent in 2021 to 86.6 percent in 2022, and 82.1 percent in 2023.[167] As such, the domestic industry had an increasing amount of excess capacity throughout the POI with which to serve the U.S. market. In addition, eight of ten responding U.S. producers reported that they had not experienced any supply constraints during the POI.[168] Consequently, the domestic

creates slabs with unique appearances and performance characteristics. Varmora's Post Conf. Br. at 7-8 and 12-15.

[164] Comet's Post Conf. Br. at 2; Varmora's Post Conf. Br. at 11-12; Tr. at 68 (Mr. Haynes); Tr. at 69 (Mr. Astrachan); Tr. at 138 (Mr. Bedrosian).

[165] MSI Post Conf. Br. at 10-11.

[166] CR/PR at Table C-1.

[167] CR/PR at Table III-7.

[168] CR/PR at II-5.

industry had the ability to produce and sell additional volumes of ceramic tile throughout the POI, but was limited in its ability to do so by increasing volumes of low-priced subject imports.

VI. Conclusion

For the reasons stated above, we determine that there is a reasonable indication that an industry in the United States is materially injured by reason of imports of ceramic tile from Indian that are allegedly sold in the United States at LTFV and subsidized by the Government of India.

SEPARATE AND CONCURRING VIEWS OF CHAIRMAN DAVID S. JOHANSON

I join Sections I through V.B of the majority opinion. Nevertheless, I write separately as I find there is a reasonable indication that an industry in the United States is threatened with material injury, rather than finding that an industry is materially injured.

I. LEGAL STANDARD

Sections 703(a)(1)(A)(ii) and 723(a)(1)(A)(ii) of the Tariff Act provide for Commission preliminary determinations as to whether there is a reasonable indication that an industry in the United States is threatened with material injury by reason of subject imports.

[169] Section 771(7)(F) of the Tariff Act directs the Commission to determine whether the domestic industry is threatened with material injury by reason of the subject imports by analyzing whether "further dumped or subsidized imports are imminent and whether material injury by reason of imports would occur unless an order is issued or a suspension agreement is accepted."[170] The Commission may not make such a determination "on the basis of mere conjecture or supposition" and considers the threat factors "as a whole" in making its determination whether dumped or subsidized imports are imminent and whether material injury by reason of subject imports would occur unless an order issues.[171] In considering the existence of threat of material injury for purposes of Section 771(7)(G)(ii)(IV), I consider all factors set forth as relevant in Section 771(7)(F).[172]

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[169] 19 U.S.C. §§ 1671b(a)(1)(A)(ii) & 1673b(a)(1)(A)(ii).

[170] 19 USC 1677(7)(F)(ii).

[171] 19 USC 1677(7)(F)(ii).

[172] *See* 19 USC 1677(F)(i). These factors are as follows:

(I) if a countervailable subsidy is involved, such information as may be presented to it by the

(Continued...)

Furthermore, in assessing whether there is a "reasonable indication" of threat, I apply the standard the Federal Circuit enunciated in *American Lamb Co. v. United States.*[173] Under *American Lamb*, the Commission may not issue a negative determination unless "(1) the record as a whole contains clear and convincing evidence that there is no material injury or threat of such injury; and (2) no likelihood exists that contrary evidence will arise in a final investigation."[174] In considering the likelihood that contrary evidence will arise in a final investigation, "The Commission must analyze the best information available in the record at the time of its determination and judge the likelihood that evidence contrary to that already

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administering authority as to the nature of the subsidy (particularly as to whether the countervailable subsidy is a subsidy described in Article 3 or 6.1 of the Subsidies Agreement), and whether imports of the subject merchandise are likely to increase,
(II) any existing unused production capacity or imminent, substantial increase in production capacity in the exporting country indicating the likelihood of substantially increased imports of the subject merchandise into the United States, taking into account the availability of other export markets to absorb any additional exports,
(III) a significant rate of increase of the volume or market penetration of imports of the subject merchandise indicating the likelihood of substantially increased imports,
(IV) whether imports of the subject merchandise are entering at prices that are likely to have a significant depressing or suppressing effect on domestic prices and are likely to increase demand for further imports,
(V) inventories of the subject merchandise,
(VI) the potential for product-shifting if production facilities in the foreign country, which can be used to produce the subject merchandise, are currently being used to produce other products,
...
(VIII) the actual and potential negative effects on the existing development and production efforts of the domestic industry, including efforts to develop a derivative or more advanced version of the domestic like product, and
(IX) any other demonstrable adverse trends that indicate the probability that there is likely to be material injury by reason of imports (or sale for importation) of the subject merchandise (whether or not it is actually being imported at the time).
19 U.S.C. § 1677(7)(F)(i). To organize my analysis, I discuss the applicable statutory threat factors using the same volume/price/impact framework that applies to our material injury analysis. Thus, I discuss factors (I), (II), (III), (V), and (VI) primarily in the analysis of subject import volume; factor (IV) primarily in the analysis of import price effects; and factors (VIII) and (IX) primarily in the analysis of impact. Factor (VII) concerning agricultural products does not apply in this investigation.

[173] 785 F.2d 994 (Fed. Cir. 1986).

[174] *American Lamb,* 785 F.2d at 1004.

gathered will arise in a final determination that would support an affirmative determination."[175] The purpose of preliminary determinations is to avoid the cost and disruption to trade caused by unnecessary investigations, and the "reasonable indication" standard requires more than a "possibility" the Commission would find material injury in a final investigation.[176] The Commission is not required to obtain complete questionnaire coverage to make a preliminary determination.[177]

II. THREAT OF MATERIAL INJURY BY SUBJECT IMPORTS FROM INDIA

A. Likely Volume of Subject Imports

U.S. importers' U.S. shipments of subject imports from India increased by 85.9 percent from 218 million square feet in 2021 to 405 million square feet in 2023.[178] This increase accelerated as the POI progressed: importers' shipments of subject imports increased by 30.4 percent in 2022 and by 42.6 percent in 2023.[179] Subject imports' market share growth accelerated as well, increasing by 2.3 percentage points from 7.1 percent in 2021 to 9.3 percent in 2022 then increasing by 5.1 percentage points to 14.5 percent in 2023.[180]

[175] Calabrian Corp. v. U.S. Int'l Trade Comm'n, 749 F. Supp. 377, 386 (CIT 1992).

[176] *American Lamb*, 795 F.2d at 1004.

[177] *Torrington Co. v. United States*, 790 F. Supp. 1161, 1166 (CIT 1992), *aff'd*, 991 F.2d 809 (Fed. Cir. 1993). I note that the questionnaire coverage in these investigations is unusually comprehensive for preliminary investigations. U.S. industry data are based on questionnaire responses of ten firms that accounted for approximately 95 percent of U.S. ceramic tile production in 2023; U.S. import data are based on official Commerce statistics and questionnaire responses by 17 firms representing *** percent of U.S. imports from India and nearly all imports from nonsubject sources by quantity; and foreign industry data are based on responses of 138 producers and/or exporters of ceramic tile in India whose exports to the United States accounted for nearly all U.S. imports of ceramic tile from India in 2023. CR/PR at I-4.

[178] Calculated from CR/PR at Table C-1.

[179] Calculated from CR/PR at Table C-1.

[180] CR/PR at Table C-1.

There is reason to believe this trend of increasing and even accelerating shipments of subject imports in the United States will continue in the imminent future.

First, the Indian ceramic tile industry has ample capacity to continue producing and exporting more tile. The Indian industry's practical ceramic tile production capacity increased from 4.7 billion board feet in 2021 to 5.6 billion board feet in 2023, an increase of 18.4 percent.[181] India's ceramic tile production also increased, but its capacity increased more, so that the Indian industry's excess practical ceramic tile production capacity increased by 3.6 percent from 1.23 billion board feet in 2021 to 1.28 billion board feet in 2023, or from 40.0 percent of U.S. apparent consumption to 46.0 percent.[182] This increasing capacity and increasing excess capacity gives Indian producers both the ability and the incentive to increase their exports to the United States in the imminent future.

Second, U.S. importers' inventories of subject merchandise increased, also at an accelerating rate, rising by *** percent from *** million square feet at the end of 2021 to *** million square feet at the end of 2022, then increasing *** percent to *** million square feet at the end of 2023.[183] Importers' inventories represented an expanding share of U.S. apparent consumption, increasing from *** percent of U.S. apparent consumption at the end of 2021 to *** percent at the end of 2022 and to *** percent at the end of 2023.[184] These increases in U.S. inventory will also give U.S. importers the incentive and ability to increase U.S. shipments of subject merchandise in the imminent future.

[181] CR/PR at Table VII-6.
[182] Calculated from CR/PR at Tables VII-6 & C-1.
[183] CR/PR at Table C-1.
[184] Calculated from CR/PR at Tables VII-6 & C-1.

Third, Indian producers' inventories of ceramic tile also increased, rising *** percent from *** million board feet at the end of 2021 to *** million board feet at the end of 2023, *i.e.,* from *** percent of U.S. apparent consumption to *** percent.[185] Again, these expanding inventories will also allow and encourage Indian producers to increase their exports and facilitate further increases in importers' U.S. shipments of subject merchandise.

I recognize that Indian producers and exporters anticipate that the rate of increase in total exports of ceramic tile from India to the United States will slow significantly in 2024. They predict that total exports of ceramic tile from India to the United States will increase from 309 million square feet in 2023 to 320 million square feet in 2024, leveling off at 319 million square feet in 2025.[186] Respondents argue that Indian producers will focus on producing tile for India's fast-growing construction market.[187] Yet, in light of the recent and accelerating growth trends in subject imports demonstrated in the record, evidence of growing excess capacity in India, and growing subject merchandise inventories in both India and the United States, I do not consider these predictions to demonstrate that past trends in subject import volume will cease or reverse in the imminent future, and even if subject imports do decrease in absolute terms, they could continue to increase in relation to apparent U.S. consumption if consumption continues to decline in 2024 as it did in 2023.

Accordingly, I find for purposes of this preliminary determination that imports of subject merchandise are likely to increase in the imminent future both in absolute terms and relative to

[185] Calculated from CR/PR at Tables VII-8 & C-1.

[186] CR/PR at Table VII-8.

[187] *See* Bedrosian Postconference Br. 35 ("The Indian ceramic tile industry is not export-oriented, and will continue to be focused on supplying explosive growth in domestic demand driven by the Indian housing construction boom over the next three to four years.")

U.S. consumption. In any final phase, I will consider evidence of whether import, production, and inventory trends in 2024 continue the trends observed earlier in the POI as well as any influence the pendency of these investigations may have.

B. Likely Price Effects

Subject imports undersold domestic products in 31 of 36 instances representing 30.7 million square feet of imports from 2021 through 2023, with an average margin of *** percent, and oversold domestic products in five instances representing 4.9 million square feet of imports, with an average margin of *** percent.[188] I find this underselling to be significant.[189]

[188] CR/PR at V-14.

[189] Respondents assert that the underselling was not significant because pricing products accounted for a much smaller share of shipments of subject merchandise than of the domestic like product. Specifically, while the four products considered in the preliminary phase pricing product data accounted for 32.8 percent of U.S. producers' total U.S. shipments, they represented only 5.9 percent of subject imports, *i.e.,* under *** percent of U.S. apparent consumption in each year of the POI. Calculated from CR/PR at V-5 & Table C-1. Respondents argue that because relatively few subject imports met the pricing product definitions, either the bulk of subject imports not reflected in the pricing product data do not undersell domestic like products or, if they do, most subject imports are not sufficiently similar to domestic products for price competition to be significant. *E.g.*, Bedrosian Postconference Brief 27.

Yet, there is not clear evidence that the degree of underselling reflected in the pricing product comparisons is necessarily unrepresentative of other products not reflected in the pricing product data. Moreover, the Staff Report assesses the overall level of substitutability between subject imports and domestic products as high. CR/PR at II-10. I also note that the available AUV suggest that subject imports are typically priced lower than domestic products, although the AUV data do not make clear whether this difference is due to product mix differences or to underselling (while the average margin of underselling in the pricing product comparisons was *** percent, the average unit value of importers' U.S. shipments of subject imports was between *** percent and *** percent of the average unit value of shipments of domestic like product). Calculated from CR/PR at Table C-1.

Thus, I find the record does not exclude a likelihood that subject imports pervasively undersell domestic products although I will consider further in any final phase of these investigations whether subject imports compete in a different segment of the market than domestic products as Respondents allege.

I find there is a reasonable indication that this significant level of underselling will contribute to the likely imminent increase in the volume and market share of subject imports described above.

I also consider evidence whether "imports of the subject merchandise are entering at prices that are likely to have a significant depressing or suppressing effect on domestic prices and are likely to increase demand for further imports."[190]

During the POI, the domestic industry was able to raise prices more than enough to cover the industry's increasing cost of goods sold, which rose 12.1 percent over the POI.[191] The domestic industry's unit gross profit increased steadily from $0.48/square foot in 2021 to $0.51/square foot in 2022 and to $0.52/square foot in 2023, and its overall gross profit increased irregularly from $420 million in 2021 to $448 million in 2022 and $424 million in 2023.[192] Given the high degree of questionnaire coverage of the domestic industry, I do not see any particular reason to believe that data in any final phase will show that the domestic industry's performance was significantly worse in the 2021-2023 POI than reflected in the preliminary phase data, although some changes are always possible.

Nevertheless, I conclude there is a likelihood that the domestic industry will not be able to maintain these improvements in performance in the imminent future if it faces an increased volume of subject imports that undersells the domestic industry as discussed above, particularly if apparent consumption continues to decrease. Already, the rate of increase in the

[190] 19 USC 1677(F)(i)(IV).

[191] CR/PR at Table C-1.

[192] The domestic industry's COGS/net sales ratio increased modestly, rising 2.3 percentage points, but I would expect some increase in this ratio given the combination of a 9.0 percent decrease in apparent consumption and rising prices. CR/PR at Tables V-10, V-11, & C-1.

industry's unit gross profits has decreased as subject import volume accelerated in 2023, indicating that the domestic industry's ability to cover rising costs is diminishing. Thus, assuming continuation of current trends, any price suppression by reason of subject imports that is already occurring is likely to become significant in the imminent future. Accordingly, I find there is a likelihood that significant underselling will suppress or depress the domestic industry's prices to a significant degree in the imminent future.

In sum, I find there is a likelihood that subject imports will have significant adverse price effects in the imminent future, as subject imports appear poised to continue to use underselling to gain market share, and increasing volumes of subject imports that are undersold will restrict or reverse the domestic industry's ability to increase prices to cover costs that remain high or continue to increase.

C. Likely Impact

Before addressing the likely impact of subject imports, I address two initial matters that inform my analysis.

First, I do not find the domestic industry vulnerable. The domestic industry steadily added capacity, increased research and development expenditures, and increased capital expenditures 428.4 percent despite falling consumption, showing confidence in the business environment.[193] These investments should improve the domestic industry's manufacturing capability. Only three U.S. producers reported rejection of bank loans or lowering of credit rating, and only in general terms, while none reported default or bankruptcy.[194]

[193] CR/PR at Table C-1.
[194] CR/PR at Table VI-13.

Second, Petitioner invites us to consider the materiality of the impact of subject imports in the context of our *Ceramic Tile from China* investigations, in which the Commission majority found that the domestic industry was injured by reason of unfairly traded imports of ceramic tile from China.[195]

In some past cases, the Commission has found it significant that a domestic industry did not gain more market share and experience greater improvements in financial performance following a recently completed antidumping or countervailing duty investigation leading to an order on the same type of subject merchandise. For example, in our 2021 investigations of common alloy aluminum sheet ("CAAS") from 18 countries, in which the final period of investigation covered the 2017-2019 period plus the first nine months of 2020, the Commission had recently completed an investigation of CAAS imports from China, in which the final phase period of investigation covered 2015 to 2017 plus the first six months of 2018.[196] In the later *CAAS from 18 Countries* investigations the Commission found that "while trends in the domestic industry's trade and financial performance were generally positive from 2017 to 2019, subject imports prevented the domestic industry from further benefitting from the imposition of antidumping and countervailing duty orders on imports of CAAS from China."[197] That is, the Commission found that even though a domestic industry's performance had improved during

[195] *Ceramic Tile from China*, Inv. Nos. 701-TA-621 & 731-TA-1447 (Final), USITC Pub. 5053 (May 2020).

[196] Common Alloy Aluminum Sheet from Bahrain, Brazil, Croatia, Egypt, Germany, India, Indonesia, Italy, Oman, Romania, Serbia, Slovenia, South Africa, Spain, Taiwan, and Turkey, Inv. Nos. 701-TA-639 & 641-642 and 731-TA-1475-1479, 1481-1483, & 1485-1492 (Final), USITC Pub. 5182 (April 2021) ("*CAAS from 18 Countries*"); *Common Alloy Aluminum Sheet from China*, Inv. Nos. 701-TA-591 & 731-TA-1399 (Final), USITC Pub. 4861 (Jan. 2019) ("*CAAS from China*").

[197] *CAAS from 18 Countries,* USITC Pub. 5182, at 45 (April 2021) (discussing *CAAS from China).*

the period examined, the domestic industry had been injured by a second wave of subject imports because the domestic industry's performance did not improve as much as the previous order should have allowed.

For purposes of this preliminary determination, however, I have reservations about affording importance to the findings or outcome of the *Ceramic Tile from China* investigations in the same way as in the *CAAS* investigations, for a number of reasons.

First, I dissented from the Commission's decision in *Ceramic Tile from China*. As I did not find that the domestic industry was materially injured by reason of imports of ceramic tile from China, I am unsurprised if the industry is not benefiting more, years later, from imposition of orders on imports from China.[198]

Second, in contrast to *CAAS from 18 Countries*, several years have passed since our previous investigation of subject merchandise, and there is no overlap even between the preliminary POI of the second set of investigations with the final POI of the first set. The current record thus does not reflect whether the domestic industry's market share and financial condition improved after orders were first imposed on imports from China, or whether improvement was prevented by underselling by imports from India or by imports from other sources, or by other factors such as the COVID pandemic which began after the *Ceramic Tile*

[198] Among other considerations, I noted that deterioration in the domestic industry's performance toward the end of the POI of our *Ceramic Tile from China* investigations was associated not with increases in subject imports from China but with increases in nonsubject imports, *e.g.,* from Brazil. *Ceramic Tile from China*, USITC Pub. 5053, at 34 (Dissenting Views of Chairman David S. Johanson). That is, I did not attribute to unfairly traded imports the injury to the industry, but rather attributed problems in part to imports from other sources not alleged to be unfairly traded. Accordingly, I find it unsurprising that imports from various nonsubject sources replaced imports from China. *Compare Ceramic Tile from China*, USITC Pub. 5053, at Table IV-2 (volumes of nonsubject imports) *and* CR/PR at Table IV-3 (volumes of imports from many of those same nonsubject sources) & Table E-1.

from China POI. Through 2021, imports from other nonsubject sources increased more than did imports from India.[199]

Third, Petitioner did not ask Commerce to investigate whether imports from India were unfairly traded prior to 2023.[200] In our present investigations, we are considering material injury by reason of imports of merchandise that are (or may be) found by Commerce to be unfairly traded, not by reason of imports that Petitioner did not allege were unfairly traded.[201]

Fourth, in the 2021 through 2023 period for which we now have data, the domestic industry gained only 0.9 percentage points of market share, which is very little, yet in the three-year period prior to imposition of orders on imports from China, the domestic industry's market share decreased only 2.0 percentage points.[202] Given that multiple factors may be affecting an industry's performance, I am reluctant to infer that domestic producers are entitled to a particular level of market share increase several years after orders were previously imposed.

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[199] CR/PR at Table E-1. In particular, Chinese products largely exited the U.S. market over two years, 2019 and 2020. CR/PR at Table E-1. In 2019, imports from China decreased by 255 million square feet, imports from India increased by 51 million feet, and imports from other sources increased by 71 million board feet, so that total imports decreased by 133 million board feet. Calculated from CR/PR at Table E-1. Similarly, in 2020, imports from China decreased by 428 million board feet, imports from India increased by 132 million board feet, and imports from other sources increased by 196 million board feet, so that total imports decreased by 100 million board feet. CR/PR at Table E-1.

[200] *Ceramic Tile from India*, Petition for the Antidumping and Countervailing Duties Pursuant to Sections 701 and 731 of the Tariff Act of 1930, as Amended, vol. 2, at 1 and vol. 3, at 6 (April 19, 2024) (proposing AD and CVD periods of investigation).

[201] 19 U.S.C. §§ 1671(a), 1673. Although we could look to data from the POI in the *Ceramic Tile from China* investigation, or any other past time, as "context" for the present investigation, Petitioner here seems to invite us to use that POI as our baseline for assessing the domestic industry's performance and injury by reason by subject imports from India in the present, and to infer that the domestic industry ought now to enjoy a higher market share and better performance than it did then because then the domestic industry was being injured by unfairly traded imports from China. Yet, if so, it raises the question of how we should view increases in various forms of nonsubject imports in the intervening years, and whether the US industry is necessarily entitled to the same market share it possessed in the past notwithstanding those imports, among other issues.

[202] CR/PR at Table C-1; *Ceramic Tile from China*, USITC Pub. 5053, at Table C-1.

Nevertheless, in any final phase, I will consider what role if any we should give the data gathered and the orders arising from the *Ceramic Tile from China* investigations in these investigations.

Bearing these considerations in mind, in this case, while the domestic industry has so far performed well in light of rising costs and falling consumption, its performance shows signs of possible imminent deterioration.

From 2022 to 2023 the domestic industry's production decreased 3.0 percent in quantity and its U.S. shipments decreased 7.0 percent in quantity and 1.6 percent in value.[203] These decreases were smaller than the decreases in apparent consumption, which fell 7.9 percent in quantity and 9.3 percent in value.[204] This relatively good performance was possible in part because increases in subject imports' market share have so far come at the expense of nonsubject imports, allowing the domestic industry to obtain small increases in market share, 0.6 percentage points in 2022 and 0.3 percentage points in 2023.[205] Yet, further increases in

[203] CR/PR at Table C-1.

[204] CR/PR at Table C-1.

[205] CR/PR at Table C-1. Petitioner argues that while the domestic industry did not lose share in the overall market, the domestic industry did lose market share in the retail channel, which represented the *** channel of distribution for the domestic industry and *** for subject imports. Petitioner Postconference Br. 24-25. Specifically, domestic producers' market share in the retailer segment decreased from *** percent in 2021 to *** percent in 2023, while subject imports' share increased from *** percent to *** percent. CR/PR at Table D-2.

At times the Commission has considered changes in market share within a particular channel of distribution for a number of different purposes. In *Ripe Olives from Spain*, Inv. Nos. 701-TA-582 & 731-TA-1377 (Final), USITC Pub. 4805 at 18-19, 21, 24 (July 2018), we noted that the retail sector was the most important sector and that subject imports captured market share in this sector directly at the expense of the domestic industry, which contributed to our findings that the increase in subject imports was significant and that underselling was significant, and that subject imports had a significant impact on the domestic industry. In *Ripe Olives*, however, unlike the present case, U.S. processors' U.S. market share steadily declined. USITC Pub. 4805 at 16. Thus, I consider that *Ripe Olives* has limited application to my analysis of materiality, although changes in share in the retail channel may confirm that (Continued...)

subject imports will likely take away the domestic industry's market share in the imminent future, given that its growth in market share already has dwindled and nearly ceased.

Similarly, the number of U.S. industry production workers, hours worked, wages paid, and hourly wages all increased in 2023, yet further increases in subject imports will make that trend more difficult to sustain. The domestic industry's net sales decreased 6.9 percent in quantity and 1.5 percent in value in 2023, which also was better than the reduction in apparent consumption. Profitability declined more markedly over the POI, as the domestic industry's operating income decreased 74.1 percent in 2023, and it incurred a net loss equal to 1.3 percent of sales.[206] While much of the reduction in industry profits went to pay higher wages to the industry's workforce,[207] further increases in subject imports are likely to eliminate any remaining profitability, end the upward trends in employment indicators, and prevent the industry from continuing to increase capital investments and research and development.

In assessing threat of injury, I also assess the role that factors other than subject imports may have had in industry trends, to avoid assuming that those trends were necessarily the result of subject imports and are necessarily indicative of the threat that subject imports pose. During the POI nonsubject imports decreased as subject imports increased. That pattern could continue, but since during the POI the domestic industry's increase in market share was very

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underselling was significant and that some degree of competition exists between domestic products and subject imports. In any final phase I will examine the role of shifts in market share within the various channels of distribution and consider any evidence that may be provided of distinctions in conditions of competition between these channels.

[206] CR/PR at Table C-1.

[207] From 2022 to 2023 the domestic industry's unit operating income decreased $0.05 per thousand square feet while unit labor costs increased $0.03 per thousand square feet. CR/PR at Table C-1.

small and getting smaller, there is a reasonable likelihood subject imports will imminently reduce the domestic industry's share of the market as well as nonsubject imports' share. Apparent consumption decreased, which played an important role in the domestic industry's performance, but for the reasons discussed above there is a reasonable indication that this trend alone will not explain further deterioration in the domestic industry's condition if the domestic industry's shipments begin to decrease as a share of consumption.

Accordingly, I conclude that there is a reasonable indication that a domestic industry is threatened with material injury by reason of subject imports from India.

Part I: Introduction

Background

These investigations result from petitions filed with the U.S. Department of Commerce ("Commerce") and the U.S. International Trade Commission ("USITC" or "Commission") by Coalition for Fair Trade in Ceramic Tile,[1] on April 19, 2024, alleging that an industry in the United States is materially injured and threatened with material injury by reason of subsidized and less-than-fair-value ("LTFV") imports of ceramic tile products ("ceramic tile")[2] from India. Table I-1 presents information relating to the background of these investigations.[3] [4]

Table I-1
Ceramic tile: Information relating to the background and schedule of this proceeding

Effective date	Action
April 19, 2024	Petitions filed with Commerce and the Commission; institution of the Commission investigations (89 FR 31770, April 25, 2024)
May 9, 2024	Commerce's notice of initiation AD (89 FR 42836, May 16, 2024), CVD (89 FR 42841, May 16, 2024)
May 10, 2024	Commission's conference
May 31, 2024	Commission's vote
June 3, 2024	Commission's determinations
June 10, 2024	Commission's views

[1] The Coalition for Fair Trade in Ceramic Tile is comprised of Crossville, Inc., Crossville, TN; Dal-Tile Corporation, Dallas, TX; Del Conca USA, Inc., Loudon, TN; Wonder Porcelain, Lebanon, TN; Landmark Ceramics – UST, Inc., Mount Pleasant, TN; Florim USA, Clarksville, TN; Florida Tile, Lexington, KY; Portobello America Manufacturing LLC, Pompano Beach, FL; and StonePeak Ceramics Inc., Chicago, IL. Petition, exhibit I-1.

[2] See the section entitled "The subject merchandise" in Part I of this report for a complete description of the merchandise subject in this proceeding.

[3] Pertinent Federal Register notices are referenced in appendix A, and may be found at the Commission's website (www.usitc.gov).

[4] A list of witnesses appearing at the conference is presented in appendix B of this report.

Statutory criteria

Section 771(7)(B) of the Tariff Act of 1930 (the "Act") (19 U.S.C. § 1677(7)(B)) provides that in making its determinations of injury to an industry in the United States, the Commission--

> *shall consider (I) the volume of imports of the subject merchandise, (II) the effect of imports of that merchandise on prices in the United States for domestic like products, and (III) the impact of imports of such merchandise on domestic producers of domestic like products, but only in the context of production operations within the United States; and. . . may consider such other economic factors as are relevant to the determination regarding whether there is material injury by reason of imports.*

Section 771(7)(C) of the Act (19 U.S.C. § 1677(7)(C)) further provides that--[5]

> *In evaluating the volume of imports of merchandise, the Commission shall consider whether the volume of imports of the merchandise, or any increase in that volume, either in absolute terms or relative to production or consumption in the United States is significant.. . .In evaluating the effect of imports of such merchandise on prices, the Commission shall consider whether. . .(I) there has been significant price underselling by the imported merchandise as compared with the price of domestic like products of the United States, and (II) the effect of imports of such merchandise otherwise depresses prices to a significant degree or prevents price increases, which otherwise would have occurred, to a significant degree.. . . In examining the impact required to be considered under subparagraph (B)(i)(III), the Commission shall evaluate (within the context of the business cycle and conditions of competition that are distinctive to the affected industry) all relevant economic factors which have a bearing on the state of the industry in the United States, including, but not limited to. . . (I) actual and potential decline in output, sales, market share, gross profits, operating profits, net profits, ability to service debt, productivity, return on investments, return on assets, and utilization of capacity, (II) factors affecting domestic prices, (III) actual and potential negative effects on cash flow, inventories, employment, wages, growth, ability to raise capital, and investment, (IV) actual and potential negative effects on the existing development and production efforts of the domestic industry, including efforts to develop a derivative or more advanced version of the domestic like product, and (V) in {an antidumping investigation}, the magnitude of the margin of dumping.*

[5] Amended by PL 114-27 (as signed, June 29, 2015), Trade Preferences Extension Act of 2015.

In addition, Section 771(7)(J) of the Act (19 U.S.C. § 1677(7)(J)) provides that—[6]

(J) EFFECT OF PROFITABILITY.—The Commission may not determine that there is no material injury or threat of material injury to an industry in the United States merely because that industry is profitable or because the performance of that industry has recently improved.

Organization of report

Part I of this report presents information on the subject merchandise, alleged subsidy/dumping margins, and domestic like product. Part II of this report presents information on conditions of competition and other relevant economic factors. Part III presents information on the condition of the U.S. industry, including data on capacity, production, shipments, inventories, and employment. Parts IV and V present the volume of subject imports and pricing of domestic and imported products, respectively. Part VI presents information on the financial experience of U.S. producers. Part VII presents the statutory requirements and information obtained for use in the Commission's consideration of the question of threat of material injury as well as information regarding nonsubject countries.

Market summary

Ceramic tile generally is used to cover floors, walkways, counter- and table-tops, walls, and shower stalls. The leading U.S. producers of ceramic tile are ***, while leading producers of ceramic tile outside the United States include *** of India. The leading U.S. importers of ceramic tile from India are ***. Leading importers of ceramic tile from nonsubject countries (mainly Spain, Mexico, and Italy) include ***. U.S. purchasers of ceramic tile are firms that are distributors, large retailers, or end users; leading responding purchasers are ***.

Apparent U.S. consumption of ceramic tile totaled approximately 2.8 billion square feet and ($3.9 billion) in 2023. Currently, 10 firms are known to produce ceramic tile in the United States. U.S. producers' U.S. shipments of ceramic tile totaled 801.7 million square feet and ($1.3 billion) in 2023, and accounted for 28.6 percent of apparent U.S. consumption by quantity and 34.1 percent by value. U.S. imports from subject sources totaled 405.0 million square feet ($259.0 million) in 2023 and accounted for 14.5 percent of apparent U.S. consumption by quantity and 6.7 percent by value. U.S. imports from nonsubject sources totaled 1.6 billion

[6] Amended by PL 114-27 (as signed, June 29, 2015), Trade Preferences Extension Act of 2015.

square feet ($2.3 billion) in 2023 and accounted for 56.9 percent of apparent U.S. consumption by quantity and 59.2 percent by value.

Summary data and data sources

A summary of data collected in these investigations is presented in appendix C, table C-1. Except as noted, U.S. industry data are based on questionnaire responses of ten firms that accounted for approximately 95 percent of U.S. production of ceramic tile during 2023.[7] U.S. imports are based on official Commerce statistics[8] and the questionnaire responses of 17 firms, representing approximately *** percent of U.S. imports from India, by quantity, and nearly all imports from nonsubject sources, by quantity, in 2023.[9] Foreign industry data and related information are based on the questionnaire responses of 138 producers and/or exporters of ceramic tile in India whose exports to the United States accounted for nearly all U.S. imports of ceramic tile from India in 2023.

Previous and related investigations

Ceramic tile has been subject to two trade remedy investigations (described below), a competitive assessment investigation of ceramic floor and wall tile industry,[10] five investigations under section 301(c)(2) of the Trade Expansion Act of 1962,[11] and one escape-

[7] Conference transcript, p. 14 (Spooner).

[8] U.S. import statistics of the U.S. Department of Commerce Census Bureau using statistical reporting numbers 6907.21.1005, 6907.21.1011, 6907.21.1051, 6907.21.2000, 6907.21.3000, 6907.21.4000, 6907.21.9011, 6907.21.9051, 6907.22.1005, 6907.22.1011, 6907.22.1051, 6907.22.2000, 6907.22.3000, 6907.22.4000, 6907.22.9011, 6907.22.9051, 6907.23.1005, 6907.23.1011, 6907.23.1051, 6907.23.2000, 6907.23.3000, 6907.23.4000, 6907.23.9011, 6907.23.9051, 6907.30.1005, 6907.30.1011, 6907.30.1051, 6907.30.2000, 6907.30.3000, 6907.30.4000, 6907.30.9011, 6907.30.9051, 6907.40.1005, 6907.40.1011, 6907.40.1051, 6907.40.2000, 6907.40.3000, 6907.40.4000, 6907.40.9011, and 6907.40.9051.

[9] Coverage calculated by dividing total quantity of subject and nonsubject imports as reported in questionnaires into official Commerce import statistics.

[10] Competitive Assessment of the U.S. Ceramic Floor and Wall Tile Industry, No. 332-156, USITC Publication 1442, October 1993.

[11] Ceramic Mosaic Tile Workers' Petition For Adjustment Assistance, Inv. No. TEA-W-5, TC Publication 115, November 25, 1963; Tariff Commission Reports To The President On Petition For Adjustment Assistance By The National Tile & Manufacturing Co., Inv. No. TEA-F-5, TC Publication 145, December 21, 1964; Ceramic Floor and Wall Tile: Certain Workers of The Cambridge Tile Mfg. Co., Inv. No. TEA-W-11, TC Publication 318, March 1970; Ceramic Wall Tile: Workers of The Cambridge Tile Mfg. Co., Inv. No. TEA-W-134, TC Publication 481, May 1972.

clause investigation under provisions of Section 7 of the Trade Agreements Extension Act of 1951.[12]

In April 1971, the United States Tariff Commission (predecessor to the Commission) determined that an industry in the United States was being injured by the importation of ceramic wall tile from the United Kingdom.[13] In August 1973, the United States Tariff Commission determined that an industry in the United States was not being or was not likely to be injured by the importation of ceramic glazed wall tile from the Philippines.[14]

On April 10, 2019, Commerce and the USITC received petitions from the Coalition for Fair Trade in Ceramic Tile, alleging that an industry is being materially injured and threatened with material injury by reason of subsidized and less-than-fair-value ("LTFV") imports of ceramic tile from China. On April 7, 2020, Commerce issued an affirmative final determination, and on May 28, 2020, the Commission issued an affirmative final determination. [15] [16] On June 1, 2020, Commerce issued its antidumping and countervailing duty orders on imports of ceramic tile from China with the final weighted-average dumping margins ranging from 229.04 to 356.02 percent and net subsidy margins ranging from 203.71 to 330.69 percent.[17]

Nature and extent of alleged subsidies and sales at LTFV

Alleged subsidies

On May 16, 2024, Commerce published a notice in the Federal Register of the initiation of its countervailing duty investigation on ceramic tile from India.[18]

Alleged sales at LTFV

On May 16, 2024, Commerce published a notice in the Federal Register of the initiation of its antidumping duty investigation on ceramic tile from India.[19] Commerce has initiated an

[12] Ceramic Mosaic Tile, Inv. No. 7-100, TC Publication 16, May 1961.

[13] Ceramic Wall Tile from the United Kingdom, Inv. No. AA1921-68, TC Publication 381, April 1971, p. 2.

[14] Ceramic Glazed Wall Tile from the Philippines, Inv. No. AA1921-120, TC Publication 599, August 1973, p. 2.

[15] 85 FR 19425, April 7, 2020.

[16] 85 FR 32048, May 28, 2020.

[17] 85 FR 33089, June 1, 2020.

[18] For further information on the alleged subsidy programs see Commerce's notice of initiation and related CVD Initiation Checklist. 89 FR 42841, May 16, 2024.

[19] 89 FR 42836, May 16, 2024.

antidumping duty investigation based on estimated dumping margins of 328.14 to 489.36 percent for ceramic tile from India.

The subject merchandise

Commerce's scope

In the current proceeding, Commerce has defined the scope as follows:[20]

> *The merchandise covered by this investigation is ceramic flooring tile, wall tile, paving tile, hearth tile, porcelain tile, mosaic tile, flags, decorative tile, finishing tile, and the like (hereinafter ceramic tile). Ceramic tiles are articles containing a mixture of minerals including clay (generally hydrous silicates of alumina or magnesium) that are fired so the raw materials are fused to produce a tile that is less than 3.2 cm in thickness, exclusive of decorative features. All ceramic tile is subject to the scope regardless of end use, surface area, and weight, regardless of whether the tile is glazed or unglazed, regardless of the water absorption coefficient by weight, regardless of the extent of vitrification, and regardless of whether or not the tile is on a backing. Subject merchandise includes ceramic tile "slabs" or "panels" (tiles that are larger than 1 meter2 (11 ft2)).*
>
> *Subject merchandise includes ceramic tile that undergoes minor processing in a third country prior to importation into the United States. Similarly, subject merchandise includes ceramic tile produced that undergoes minor processing after importation into the United States. Such minor processing includes, but is not limited to, one or more of the following: beveling, cutting, trimming, staining, painting, polishing, finishing, additional firing, affixing a decorative surface to the tile, or any other processing that would otherwise not remove the merchandise from the scope of the investigation if performed in the country of manufacture of the in-scope product.*

Tariff treatment

Based upon the scope set forth by Commerce, information available to the Commission indicates that the merchandise subject to these investigations are provided for in the Harmonized Tariff Schedule of the United States ("HTS" or "HTSUS") under the following statistical reporting numbers of HTS heading 6907:[21] 6907.21.1005, 6907.21.1011,

[20] 89 FR 42836, May16, 2024.

[21] Prior to January 1, 2017, ceramic tile was provided for in HTS subheadings 6907.10.00 and 6907.90.00 for unglazed ceramic tile, and HTS subheadings 6908.10.10, 6908.10.20, 6908.10.50, and (continued...)

6907.21.1051, 6907.21.2000, 6907.21.3000, 6907.21.4000, 6907.21.9011, 6907.21.9051, 6907.22.1005, 6907.22.1011, 6907.22.1051, 6907.22.2000, 6907.22.3000, 6907.22.4000, 6907.22.9011, 6907.22.9051, 6907.23.1005, 6907.23.1011, 6907.23.1051, 6907.23.2000, 6907.23.3000, 6907.23.4000, 6907.23.9011, 6907.23.9051, 6907.30.1005, 6907.30.1011, 6907.30.1051, 6907.30.2000, 6907.30.3000, 6907.30.4000, 6907.30.9011, 6907.30.9051, 6907.40.1005, 6907.40.1011, 6907.40.1051, 6907.40.2000, 6907.40.3000, 6907.40.4000, 6907.40.9011, and 6907.40.9051. The 2024 general rate of duty is 10 percent ad valorem for HTS subheadings 6907.21.10, 6907.21.20, 6907.21.30, 6907.22.10, 6907.22.20, 6907.22.30, 6907.23.10, 6907.23.20, 6907.23.30, 6907.30.10, 6907.30.20, 6907.30.30, 6907.40.10, 6907.40.20, and 6907.40.30; and 8.5 percent ad valorem for HTS subheadings 6907.21.40, 6907.21.90, 6907.22.40, 6907.22.90, 6907.23.40, 6907.23.90, 6907.30.40, 6907.30.90, 6907.40.40, and 6907.40.90.[22]

The subject merchandise may also be imported under the following HTS provisions 6905.10.00, 6905.90.00, 6913.90.2000, 6914.10.80, and 6914.90.80.[23] The 2019 column 1-general rate of duty is 13.5 percent ad valorem for HTS subheading 6905.10.00 and 3.2 percent ad valorem for HTS subheading 6905.90.00;[24] Free for HTS subheading 6913.90.20;[25] and 9.0 percent ad valorem for HTS subheading 6914.10.80 and 5.6 percent ad valorem for HTS subheading 6914.90.80.[26]

6908.90.00 for glazed ceramic tile. The general rate of duty was 10 percent ad valorem for all subheadings but 6908.10.50 and 6908.90.00, which were 8.5 percent ad valorem. HTSUS (2017) Basic Edition, USITC Publication 4660, February 2017, Change Record, pp. 60–62; HTSUS (2016) Basic Edition, USITC Publication 4588, March 2016, pp. 69-5 – 69-6.

Effective January 1, 2017, the HTS subheadings were reorganized and expanded into five new primary groups of HTS subheadings 6907.21.10 to 6907.21.90 for ceramic tile with a water absorption coefficient not exceeding 5 percent by weight; HTS subheadings 6907.22.10 to 6907.22.90 for ceramic tile with a water absorption coefficient exceeding 5 percent but not 10 percent by weight; HTS subheadings 6907.23.10 to 6907.23.90 for ceramic tile with a water absorption coefficient exceeding 10 percent by weight; HTS subheadings 6907.30.10 to 6907.30.90 for ceramic mosaic cubes; and HTS subheadings 6907.40.10 to 6907.40.90 for finishing (e.g., edge, corner, etc.) ceramic tiles. Within each of these five groups are further subgroups to distinguish unglazed versus glazed ceramic tiles. Finally, within each subgroup, there are further breakouts for surface-area size ranges. HTSUS (2017) Basic Edition, USITC Publication 4660, February 2017, Change Record, pp. 60–62.

[22] HTSUS (2024) Revision 1, USITC Publication 5491, January 2024, pp. 69-4 – 69-9.

[23] HTSUS (2024) Revision 1, USITC Publication 5491, January 2024, pp. 69-4, 69-17.

[24] HTSUS (2024) Revision 1, USITC Publication 5491, January 2024, p. 69-4.

[25] HTSUS (2024) Revision 1, USITC Publication 5491, January 2024, p. 69-17.

[26] HTSUS (2024) Revision 1, USITC Publication 5491, January 2024, p. 69-17.

(continued...)

Effective May 10, 2019, ceramic tile originating in China, in addition to being subject to existing antidumping and countervailing duty orders,[27] is also subject to an additional 25 percent ad valorem duty under section 301 of the Trade Act of 1974, as amended.[28]

Decisions on the tariff classification and treatment of imported goods are within the authority of U.S. Customs and Border Protection.

The product

Description and applications

Ceramic tile is a masonry product containing hydrous silicates of alumina (and/or other metals) that is fired at high temperatures to bond together the constituent particles.[29] They are

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Large-size slab tile or panel tile may be imported under HTS statistical reporting numbers 6914.10.8000 and 6914.90.8000. Petition, p. 11.

The temporary column-1 general rate of duty was 4.7 percent ad valorem (provided for in subheading HTS 9902.14.74) for certain stoneware ceramic slabs provided for in HTS subheading 6914.90.80 that were imported on or before December 31, 2020. HTSUS (2024) Revision 1, USITC Publication 5491, January 2024, p. 99-II-130.

[27] Commerce issued antidumping and countervailing duty orders on ceramic tile originating in China, effective June 1, 2020. 85 FR 33089, June 1, 2020; 85 FR 33119, June 1, 2020.

[28] HTS subheadings 6907.21.10, 6907.21.20, 6907.21.30, 6907.21.40, 6907.21.90, 6907.22.10, 6907.22.20, 6907.22.30, 6907.22.40, 6907.22.90, 6907.23.10, 6907.23.20, 6907.23.30, 6907.23.40, 6907.23.90, 6907.30.10, 6907.30.20, 6907.30.30, 6907.30.40, 6907.30.90, 6907.40.10, 6907.40.20, 6907.40.30, 6907.40.40, 6907.40.90, 6905.10.00, 6905.90.00, 6914.10.80, and 6914.90.80 were included in the Office of the United States Trade Representative's ("USTR's") third enumeration ("Tranche 3" or "List 3") of products originating in China that became subject to an additional 10 percent ad valorem duty (Annexes A and C of 83 FR 47974, September 21, 2018), effective September 24, 2018. Escalation of this duty to 25 percent ad valorem was rescheduled from January 1, 2019 (Annex B of 83 FR 47974, September 21, 2018) to March 2, 2019 (83 FR 65198, December 19, 2018), but was subsequently postponed until further notice (84 FR 7966, March 5, 2019), and then was implemented, effective May 10, 2019 (84 FR 20459, May 9, 2019). A subsequent modification was provided for subject goods exported from China prior to May 10, 2019, not to be subject to the escalated 25 percent duty for such goods entered into the United States prior to June 1, 2019 (84 FR 21892, May 15, 2019) with the entry date subsequently being extended to prior to June 15, 2019 (84 FR 26930, June 10, 2019).

See also HTS heading 9903.88.03 and U.S. notes 20(e) and 20(f) to HTS Subchapter III of Chapter 99 and related tariff provisions for this duty treatment. Effective January 1, 2024, no exemptions have been granted for ceramic tile products originating in China. USITC, HTSUS (2024) Revision 1, USITC Publication 5491, January 2024, pp. 99-III-27 – 99-III-28, 99-III-45, 99-III-225, 99-III-231 – 99-III-241, 99-III-244, 99-III-245 – 99-III-246, 99-III-301, 99-III-303, 99-III-305 – 99-III-307, 99-III-309.

[29] Petition, p. 8, exhibit I-14: "ASTM C1232−23, Standard Terminology for Masonry, December 15, 2023."

often flat, with beveled edges, and are available in various shapes, sizes, and colors.[30] Tiles can currently be formed as large as 5-feet by 15-feet or more (often referred to as "slabs" or "panels") and smaller than 1-inch by 1-inch. Thicknesses can exceed 3 cm (1.2 inches) or be as thin as 2 mm (0.8 inch), with some tiles even beyond these dimensions.[31] "Paving tile" or "pavers" are flat tile used for flooring or walking surfaces.[32] "Finishing tile" are available in various shapes— including bases, caps, corners, moldings, angles, etc.— to complete the installation of ceramic tile to meet sanitary and/or architectural design requirements.[33]

The durable and hard-wearing surface renders ceramic tile suitable for covering surfaces such as interior and exterior floors, walls, counter- and table-tops, shower stalls, and swimming pools, among numerous other applications. Ceramic tile is commonly used by the residential sector, especially in kitchens, bathrooms, and entrances; as well as by the commercial sector in various floor and wall applications.[34]

Floor and wall ceramic tiles

Ceramic tile may be distinguished between "floor tile" and "wall tile" based on the different physical-performance requirements for the various end-use applications. The American National Standard Institute ("ANSI") specification A137.1 provides the physical and performance criteria to distinguish floor tile from wall tile.[35] Product-performance standards may be more rigorous for (or are specifically applicable to) floor tile than wall tile, such as higher breaking strength, quality and thickness, slip resistance, and abrasion resistance.

Tile Grades for quality and thickness are based on ANSI standard 137.1:

- Grade 1 ("standard grade")— Highest quality and thickest (¾-inch) tile available, suitable for both floors and walls;
- Grade 2 ("secondary grade")— Some facial imperfections and about ½-inch thick, but still suitable for both floors and walls; and

[30] Petition, p. 10.

[31] Petition, p. 11.

[32] Flags" appears in the HTSUS article description but it is considered a synonymous but obsolete term by the ceramic tile industry for flooring and paving tile. Petition, p. 9.

[33] Petition, pp. 8-9, exhibit I-15, exhibit I-16: "ANSI A137.1—2022, American National Standard Specifications for Ceramic Tile, July 2022," July 2022, "ANSI A137.3—2022, American National Standard Specifications for Gauged Porcelain Tiles and Gauged Porcelain Tile Panels/Slabs," July 2022.

[34] Petition, p. 10, exhibit I-20, exhibit I-21.

[35] Petition, exhibit I-15: "ANSI A137.1—2022, American National Standard Specifications for Ceramic Tile, July 2022," July 2022.

- Grade 3 ("cull grade")— Thinnest (¼-inch) tile available, but still suitable for walls.[36]

Ceramic tile for flooring applications are required to meet Dynamic Coefficient of Friction ("DCOF") test requirements for slip resistance.[37] On a scale of 0 – 1.00, the coefficient of friction ("COF") should exceed 0.50 foot-pounds for standard floor tiles and must exceed 0.60 foot-pounds for level floor tile applications and 0.8 foot-pounds for incline ramp applications to comply with Americans with Disabilities Act ("ADA") requirements.[38]

Surface abrasion-resistance (sometimes referred to as the "durability classification" or "Porcelain Enamel Institute ("PEI") rating") of glazed ceramic tile is rated in accordance with the Visible Abrasion Resistance standards of ANSI A137.1, in accordance with the testing requirements of ASTM standard C1027. There are six abrasion-resistance rating classes distinguish the suitability of ceramic tiles for various floor and wall applications:

- Class 0— Suitable only for light-duty wall applications;
- PEI Class I— Suitable only for residential and commercial wall applications;
- PEI Class II— Suitable for interior residential and commercial wall, and residential bathroom floor applications;
- PEI Class III— Suitable for all residential and light foot-traffic commercial floor applications;
- PEI Class VI— Suitable for all residential, medium foot-traffic commercial, and light foot-traffic institutional floor applications; and

[36] Petition, exhibit I-15: "ANSI A137.1—2022, American National Standard Specifications for Ceramic Tile," July 2022, Section 8.1 Grade Marking Distinguishes Various Qualities and Attributes of Ceramic Tiles, p. 22; Calcamuggio, Jeffrey, "Tile Flooring 101 – Considerations," Buildipedia, August 17, 2011, http://buildipedia.com/at-home/floors/tile-flooring-101-considerations?print=1&tmpl=component; Robinson, Kristy, "How to Determine the Quality of Ceramic Floor Tiles," SFGate Home Guides, Jan 30, 2021, https://homeguides.sfgate.com/determine-quality-ceramic-floor-tiles-24866.html.

[37] According to Section 6.2.2.1.10 of ANSI A137.1, ceramic tiles suitable for walking upon as level interior surfaces when wet shall have a wet DCOF of ***. Petition, exhibit I-15: "American National Standard Specifications for Ceramic Tile, ANSI A137.1—2022," July 2022, pp. 15 to 16.

[38] ADA Accessibility Guidelines ("ADAAG"), Section A4.5 Ground and Floor Surfaces, Appendix A4.5.1 General, September 2002, https://www.access-board.gov/guidelines-and-standards/buildings-and-sites/about-the-ada-standards/background/adaag#A4.5.1; Robinson, Kristy, "How to Determine the Quality of Ceramic Floor Tiles," SFGate Home Guides, January 30, 2021, https://homeguides.sfgate.com/determine-quality-ceramic-floor-tiles-24866.html, retrieved May 16, 2024.

- PEI Class V— Suitable for all residential, commercial, institutional, and industrial floors applications.[39]

Ceramic mosaic tiles

Ceramic tile can be sold as part of a combination of different ceramic tiles or other materials (e.g., stone, glass, etc.) usually set in a small format and usually set on a mesh sheet, known as mosaic tile.[40] ANSI defines mosaic tile as ***[41]

Porcelain and non-porcelain ceramic tiles

Porcelain ceramic tile is distinguished from other ("non-porcelain") types of ceramic tile by lower porosity (water absorption) and other physical characteristics, more expensive raw materials,[42] and higher firing temperatures and longer firing periods. Moreover, porcelain tile is common for end uses requiring superior breaking strength, freeze-thaw cycle resistance, and minimum water-exposure expansion. Porcelain tile is distinguished from non-porcelain tile by its low porosity of 0.5 percent or less of water absorption. Sometimes referred to as "impervious tile," porcelain tile is considered suitable for all interior and exterior applications.[43] Various types of non-porcelain tile have higher porosities and more limited suitable applications:

- Vitreous tile (over 0.5 percent to 3 percent), suitable for outdoor and wet interior rooms (e.g., bathrooms);

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[39] Petition, exhibit I-15: ANSI A137.1—2022, American National Standard Specifications for Ceramic Tile, August 2017, Section 6.2.3.5 Surface Wear Resistance, pp. 18 to 19; Wallender, Lee, "Understanding Ceramic Tile PEI Ratings," The Spruce, January 30, 2020, https://www.thespruce.com/pei-ratings-help-with-tile-installation-areas-1822598.

[40] Cosmo Surfaces, "What are Mosaic Tiles," December 7, 2020, https://cosmosurfaces.com/what-are-mosaic-tiles/ and Tile Bar, "What is Mosaic Tile," https://cosmosurfaces.com/what-are-mosaic-tiles/ retrieved May 22, 2024.

[41] Section 3.0 Definition of Terms of the American National Standard Specifications for Ceramic Tile, ANSI A137.1. Petition, exhibit I-15: "American National Standard Specifications for Ceramic Tile, ANSI A137.1—2022," July 2022, 1.

[42] The predominant raw material for producing porcelain tile is more highly refined (for higher purity), very fine-grained, white (kaolinite) clays, with significant amounts of quartz and feldspar as additional additives. Wallender, Lee, "Porcelain Tile vs. Ceramic Tile Comparison Guide," The Spruce, April 10, 2020, https://www.thespruce.com/porcelain-tile-vs-ceramic-tile-1822583.

[43] Home Depot, "Porcelain vs. Ceramic Tiles," https://www.homedepot.com/c/ab/porcelain-vs-ceramic-tiles/9ba683603be9fa5395fab9016ed2ca9d retrieved May 22, 2024 and Mission Stone & Tile, "8 Differences Between Ceramic and Porcelain Tile," https://missionstonetile.com/blogs/resources/what-is-the-difference-between-ceramic-and-porcelain-tile retrieved May 22, 2024.

- Semi-vitreous tile (over 3 percent to 7 percent), not suitable for outdoor or wet interior rooms; and
- Non-vitreous tile (over 7 percent) water absorption, not suitable for outdoor or wet interior rooms.[44]

Since November 2007, the Ceramic Tile Distributors Association ("CTDA") and the Tile Council of North America ("TCNA") have sponsored the Porcelain Tile Certification Agency ("PTCA") program to certify that a manufacturer's "porcelain tile" samples meet the water-porosity criteria of 0.5 percent or less.[45] Compared to non-porcelain tile, porcelain tile is generally harder to cut and harder to bond to the floor.[46]

Glazed and unglazed ceramic tile surfaces

Ceramic tile surfaces can be either glazed or unglazed. Non-porcelain tiles are usually glazed for enhanced surface durability. Glazed porcelain tile have filled micro-pores that would otherwise remain open if the tile is left unglazed. Glazing renders porcelain tile surfaces both more durable and easier to clean, but unglazed porcelain tile offer greater slip resistance. Unglazed porcelain tile can be "through body" with the surface color extending uniformly through the entire thickness of the tile. Glazed surfaces can have different colors and patterns than the body of the porcelain tile, but the glaze is usually sufficiently resistant enough to abrasion to not show surface wear.[47] There are four common forms of glazed tile surfaces:

- Gloss - with a shiny and reflective appearance;
- Matt or matte – with a non-shiny, unpolished appearance;

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[44] Water absorption of ceramic tile is tested in accordance with the requirements of ASTM C373 – 18: Standard Test Methods for Determination of Water Absorption and Associated Properties by Vacuum Method for Pressed Ceramic Tiles and Glass Tiles and Boil Method for Extruded Ceramic Tiles and Nontile Fired Ceramic Whiteware Products; Calcamuggio, Jeffrey, "Tile Flooring 101 – Considerations," Buildipedia, August 17, 2011, http://buildipedia.com/at-home/floors/tile-flooring-101-considerations?print=1&tmpl=component.

[45] International Product Assurance Laboratories, "The Porcelain Tile Certification Agency (PTCA)," https://ipalaboratories.com/lab-services/materials-testing/certified-porcelain/#:~:text=In%20November%202007%2C%20the%20Ceramic,ASTM%20C373%20test%20method%20measures, retrieved May 22, 2024 and The Porcelain Tile Certification Agency (PCTA), "About PCTA" http://www.ptcaonline.org/, retrieved May 22, 2024.

[46]Mission Stone & Tile, "8 Differences Between Ceramic and Porcelain Tile," https://missionstonetile.com/blogs/resources/what-is-the-difference-between-ceramic-and-porcelain-tile, retrieved May 22, 2024.

[47] Old English Tiles, "The Difference Between Glazed an Unglazed Porcelain Tiles," June 14, 2018, https://www.oldeenglishtiles.com.au/blogs/news/the-difference-between-glazed-and-unglazed-porcelain-tiles and Ceramic Research Company, Articles "How to Choose and Maintain Ceramic Tiles," no date, https://www.ceramic-research.com/articles_02.html, retrieved May 23, 2024.

- Lappato – thinly glazed and polished, but not completely which gives these types of tiles a natural look that is part glossy, part matt; and
- Textured – pressing materials into a mold that gives a textured effect (such as that of natural stone or wood) then it's glazed and fired.[48]

Polished tile

A polished ceramic tile is double fired.[49] First it is processed with the desired pattern or color and then with a clear coat. Afterwards, the tile undergoes a similar polishing process as stone which includes passing the tile under polishing wheels with water and polishing compound. Finally, it is sealed to retain its appearance.[50]

Manufacturing processes

The manufacturing process for all ceramic tile consists of eight successive basic stages including: (1) raw-materials crushing, (2) mixing and milling, (3) spray drying, (4) shaping, (5) drying, (6) glazing and/or digital printing, (7) firing, and (8) post-firing operations.[51] All ceramic tile is produced, regardless of where throughout the world, generally using the same basic raw materials despite technological variations, for each step described below.[52]

[48] Old English Tiles, "The Difference Between Glazed an Unglazed Porcelain Tiles," June 14, 2018, https://www.oldeenglishtiles.com.au/blogs/news/the-difference-between-glazed-and-unglazed-porcelain-tiles; Atlas Plan, "Lappato Porcelain Tiles," accessed May 21, 024, https://www.atlasplan.com/en-US/news/lappato-tiles/#:~:text=The%20lappato%20meaning%20refers%20to,is%20part%20glossy%2C%20part%20matt; Mineral Tiles, "Matte," accessed May 21, 2024, https://www.mineraltiles.com/collections/matte-finish; and Greenlee, B., "Tile 101:Guide to Tile Finishes," January 21, 2020, https://www.tileshop.com/blog/guide-to-tile-finishes/#:~:text=Polished%20tiles%20are%20double%20fired,sealed%20to%20retain%20their%20appearance.

[49] Double-fired ceramic tiles are made by first firing the raw tile, and then firing it again after glazing. Herberia Ceramich, "Porecelain Stoneware and Double Firing Tiles," https://www.herberiaceramiche.it/en/porcelain-stoneware/#:~:text=Double%2Dfired%20ceramic%20tiles%20are%20made%20by%20first%20firing%20the,effect%20of%20outstanding%20aesthetic%20value retrieved May 21, 2024.

[50] Greenlee, B., "Tile 101:Guide to Tile Finishes," January 21, 2020, https://www.tileshop.com/blog/guide-to-tile-finishes/#:~:text=Polished%20tiles%20are%20double%20fired,sealed%20to%20retain%20their%20appearance.

[51] Unless specified otherwise, information in this section is compiled from Petition, pp. 10-12.

[52] Petition, p. 10.

Raw-materials crushing

The raw materials for ceramic tile determine its properties. While ball clay and kaolin clay are common to all types of ceramic tile,[53] the amount and type of clay varies. The color of the ceramic tile body is determined in part by the amount of the iron-containing raw materials, with a higher iron content resulting in a red ceramic body in contrast to a low (or absence) of iron content resulting in a whitish ceramic body.[54] Other minerals are added to impart specific properties, depending on the type of tile, forming process, and firing process:

- Silica (quartz) sand— added-in as a cost-effective filler material;
- Alkali-containing feldspar— lowers the melting temperature, enhances low melt viscosity, and allows for controlled sintering at high temperatures;
- Nepheline syenite— a source of alkalis;
- Talc— an "auxiliary flux" that controls size and promotes low and consistent shrinkage; and
- Biotite— an accessory mineral contained in granite, which is a source of silica and feldspar, but otherwise does not provide a specific function.[55]

The clays and other raw materials are pulverized down to suitable grain sizes for the subsequent mixing and milling operations.

Mixing and milling

The raw materials are mixed together and milled, either dry or wet, depending on the fanning process. The wet-mixing method is more common, in large mills that further reduce the particle size in preparation for spray-drying. Wet mixing can also be done for extrusion forming, wet-pressing, and slip-casting. Dry milling can be done where the subsequent forming operation does rely on spray-dried particles.

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[53] Ball clay and kaolin clays also provide material strength in the unfired state, enhances pyroplasticity (stability) while firing, and maintains a steady sintering temperature in the kiln. Zillion Sawa Minerals, "What is Ball Clay and How is it Used and Applied in Different Industries Like Ceramic?," June 1, 2023, https://medium.com/@zillionsawaminerals/what-is-ball-clay-and-how-is-it-used-and-applied-in-different-industries-like-ceramic-c06bf6f89d10.

[54] Clay composition is determined by the ratio of silica to other minerals, such as quartz, carbonates, aluminum oxides, and iron oxides. Red clays form from continued weathering which leaches out minerals containing sodium, potassium, calcium, and carbonates, but the more chemically stable iron and aluminum oxides are less likely to leach out. Red clay-rich soils are found mostly in humid temperate and tropical regions of the world. Blue, Marie-Louise, "What Is Red Clay?" Sciencing.com, https://sciencing.com/red-clay-22940.html.

[55] Ceramic Research Company, Articles "Roles and Functions of Ceramic Raw Materials in the Ceramic Tile Body," no date, https://www.ceramic-research.com/articles_02.html, retrieved May 23, 2024.

Spray drying

To obtain consistent particles for a high degree of quality control, the wet-milled mixture (slurry) is sprayed into a vertical tower with rising warm air. The high degree of process control results in a generally homogenous powder containing just enough moisture for the subsequent pressing (shaping) process.

Shaping

Tiles can be formed by various processes, depending on whether the material being formed is either wet or dry. The most common method is dry-pressing[56] of the ground particles by compression between dies, rollers, belts, or other means. In some instances, various powders are combined to create surface effects when pressed together. Wet clay can be formed by continuous extruding and cutting to size (including larger sizes)[57], pressing into a die, or pouring into a mold.

Drying

After being formed, the newly formed ("green") tiles are dried, usually in large dryers or low-temperature kilns. Drying can be either continuous or batch operations, being commonly fueled by natural gas, fuel oil, or coal, although infrared, microwave, or even excess heat from other operations are sometimes used.

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[56] In dry-pressing, the particles are not actually fully dry, but rather contain just enough moisture to hold together after pressing.

[57] Although the manufacturing process for slabs (also referred to as panels) is similar to that of smaller sized tile, the equipment that produce the ceramic slabs may be different as it is produced on continuous production line. Some production lines can produce both tiles and slabs. For example, CONTINUA+: Compaction technology can produce slabs and tiles without any size or mold limits. Sacmi, "Continua+ Compaction Technology for Slabs and Tiles," accessed May 21, 2024, https://www.sacmi.com/en-US/ceramics/Tiles/Continua. Ceramic slabs are produced in larger dimensions and thickness than ceramic tiles. Common ceramic slabs sizes typically range from 1200 mm X 1200 mm to 1600 mm X 3200 mm while ceramic tile sizes are 600 mm X 600 mm, 800 mm X 800 mm, and 800 mm X 1600 mm. Slabs are used for kitchen tops, countertops, furniture & wall claddings. Comet's postconference brief, pp. 1-4; It is also suitable to be used in novel applications: building and construction (new floorings without dismantling the previous paving, ventilated façades, tunnel coverings, insulating paneling), indoor furniture (tabletops, doors), support for photovoltaic ceramic panels. Raimondo, M. et al, "Processing and properties of large-sized ceramic slabs," Institute of Science and Technology for Ceramics, Vol. 49, 4, 289-296 (2010), https://www.researchgate.net/publication/50284952_Processing_and_properties_of_large-sized_ceramic_slabs/fulltext/0e60c806f0c493afa4b70f1d/Processing-and-properties-of-large-sized-ceramic-slabs.pdf.

Glazing and/or digital printing

The surface of the green tile can be decorated before firing by applying materials that bond with the surface when fired. There are various techniques to apply glazing materials from a simple waterfall coating the surface to spray applications, and now digital printing with glaze-like compounds. Surface decoration can also be applied prior to forming by adding dry powders that impart the decorative effects to the surface upon firing. Surfaces of fired tile also can be decorated before a secondary firing operation.

Firing

Conversion from a clay-containing mixture to a ceramic material through firing creates the properties associated with ceramic tile.[58] The time and temperature for firing the green tile depends on the raw-material composition and determines the finished properties. Heating and cooling are controlled to allow the various physical changes to take place. In the case of porcelain tiles, firing is sufficiently hot (typically, but not exclusively, between 2,100°F to 2,200°F) to drive-down the finished porosity (water absorption) from 6 to 8 percent down to 0.5 percent or less. [59] Firing can be accomplished in a single operation with the green tile and surface decoration fired together (i.e., "single-fired" or "monocottura") in a roller-hearth kiln or in two or more subsequent firing operations depending on the pre-firing processes and desired decoration effects.[60] Depending on the firing process and raw materials used, the total time for firing and cooling can be under an hour or even requiring multiple days.[61]

[58] While the crystallinity of the clay-containing mixture changes through the firing process, crystallinity itself is not a determinant of whether a material is ceramic.

[59] Petition, p. 12.

[60] The shaping, glazing, and single-firing steps combined can require as little as an hour to complete. Because the single-firing process results in stronger and more-durable ceramic tile with a harder glazed surface that is less prone to peeling and cracking, monocottura tiles are suitable for interior floor tiles and outdoor applications. Build.com, "Moncottura vs. Bicottura Tiles, What's the Difference?" http://www.build.com.au/monocottura-vs-bicottura-tiles-whats-difference, retrieved May 15, 2024.

[61] The older, double-firing ("bicottura") process— consisting of shaping and initial firing of unglazed tile, glazing, and second firing of glazed tile— can require several days to complete. Generally being softer than single-fired tile, double-fired tile is suitable for walls and back-splashes. Moreover, the protrusions (or "lugs") often present on the back surface render bicottura tile less suitable for covering horizontal flooring surfaces. *Ibid*.

Post-firing operations

Cooled ceramic tile undergoes various post-firing operations prior to shipment.[62] Polished tiles are treated with abrasives in a polishing line to create a fine polish on the surface.[63] Rectified tiles are trimmed on a cutting line to produce precisely sized tiles. Cutting may occur at the factory or offsite at another facility to produce more modular products. Very large-size tiles (referred to as "slabs" or "panels") up to 5-feet by 15-feet or even larger can be cut at the factory but are also commonly shipped as-produced in such large sizes for subsequent cutting in a separate facility or even at a job site. Ceramic tile is shipped in cartons for retail sale, e.g., at "big-box" home-improvement stores. Carton labels include symbols and rating information about the ceramic tile contained within, including its grade, PEI rating, water absorption, DCOF, frost-resistance, and shade variations.[64]

Domestic like product issues

Petitioners propose that the domestic like product be defined as ceramic tile, coextensive with Commerce's scope.[65] A number of Indian respondents argue that slabs constitute a separate like product or are not comparable to the domestic like product.[66] The petitioners stated ceramic slabs are still a type of ceramic tile that fall within the continuum of ceramic tile as a single domestic like product.[67]

[62] Tiles that are unsuitable for shipment are recycled into the body which helps to reduce cost. Preliminary conference transcript, p. 64 (Durbin), and Domestic respondent joint postconference brief exhibit 1, p. 2.

[63] Polishing line can be part of a continuous line or a separate line. Conference transcript, p.138 (Bedrosian).

[64] See, e.g.: The Home Depot, "Ceramic Tiles – Label Information," no date, https://www.homedepot.com/hdus/en_US/DTCCOM/Home_Services/Tile_Flooring/Tile_Flooring_Buying_Guide/Docs/ceramic_tile_label_info.pdf (retrieved May 17, 2024).

[65] Petitioners' postconference brief pp. 4-5.

[66] Comet's postconference brief pp. 1-3; Skera's postconference brief pp. 2-7; Varmora's postconference brief pp. 9-12. Respondents MSI, Bedrosian, Nexion, and Simpolo did not dispute petitioners' proposed definition for purposes of the preliminary phase.

[67] Petitioners' postconference brief p. 5.

Part II: Conditions of competition in the U.S. market

U.S. market characteristics

Ceramic tile is used as a decorative covering on floor and walls, mostly in kitchens and bathrooms, as well as commercial spaces. U.S. demand for ceramic tile is driven primarily by demand in the construction sector, both for new homes and for remodeling/removing and replacement ("R&R"). Like in the construction industry, demand for ceramic tile is seasonal, with peaks in the spring and fall, and valleys in the winter.[1] There are several substitutes reported for ceramic tile, particularly in flooring applications, including luxury vinyl tile ("LVT"), carpet, wood (typically hardwood), and stone. Some importers cited LVT as having taken market share from ceramic tile in recent years, due to its comparatively lower price and ease of installation.[2]

A majority of U.S. producers (8 of 10) and importers (9 of 17) indicated that the market was subject to distinctive conditions of competition. Specifically, importer *** reported that ceramic tile is under significant threat from substitute products because installation costs for some of these substitute products is significantly less than for ceramic tile. Installation labor shortages also played a role in decreased demand for ceramic tile in the past three years. Three importer/producers *** and an importer *** specifically point to a surge of low-cost imports from India. Producer and importer *** reported that the introduction of low-priced subject imports, specifically for polished material, has resulted in the loss of significant quantities of sales in the home center market.

Apparent U.S. consumption of ceramic tile decreased during January 2021-December 2023. Overall, apparent U.S. consumption, by quantity, in 2023 was 9.0 percent lower than in 2021.

[1] Conference transcript, p. 120 (Shah).

[2] Petitioner stated that LVT has been taking market share from other flooring types such as laminate, wood, and carpeting, rather than ceramic tile. Petitioner's postconference brief, pp. 13-14.

Channels of distribution

Retailers were the largest distribution channel for U.S. producers and importers with big box/home center retailers accounting for a majority of shipments to retailers (table II-1). U.S. producers and importers also sold ceramic tile to distributors, other retailers, contractors, and other end users. Importers reported a larger share of sales to big box/home center retailers than did U.S. producers, and U.S. producers reported a larger share to distributors than did importers.

Table II-1
Ceramic tile: Share of U.S. shipments by source, channel of distribution, and period

Shares in percent

Source	Channel	2021	2022	2023
United States	Distributors	***	***	***
United States	Big box / home center	***	***	***
United States	Other retailers	***	***	***
United States	All retailers	***	***	***
United States	Contractors / builders	***	***	***
United States	Other end users	***	***	***
United States	All end users	***	***	***
India	Distributors	***	***	***
India	Big box / home center	***	***	***
India	Other retailers	***	***	***
India	All retailers	***	***	***
India	Contractors / builders	***	***	***
India	Other end users	***	***	***
India	All end users	***	***	***
Nonsubject	Distributors	***	***	***
Nonsubject	Big box / home center	***	***	***
Nonsubject	Other retailers	***	***	***
Nonsubject	All retailers	***	***	***
Nonsubject	Contractors / builders	***	***	***
Nonsubject	Other end users	***	***	***
Nonsubject	All end users	***	***	***
All imports	Distributors	***	***	***
All imports	Big box / home center	***	***	***
All imports	Other retailers	***	***	***
All imports	All retailers	***	***	***
All imports	Contractors / builders	***	***	***
All imports	Other end users	***	***	***
All imports	All end users	***	***	***

Source: Compiled from data submitted in response to Commission questionnaires.

Geographic distribution

U.S. producers and importers reported selling ceramic tile to all U.S. regions (table II-2). For U.S. producers, *** percent of sales were within 100 miles of their production facility, *** percent were between 101 and 1,000 miles, and *** percent were over 1,000 miles. Importers sold *** percent within 100 miles of their U.S. point of shipment, *** percent between 101 and 1,000 miles, and *** percent over 1,000 miles.

Table II-2
Ceramic tile: Count of U.S. producers' and U.S. importers' geographic markets

Region	U.S. producers	U.S. importers (India)
Northeast	10	7
Midwest	10	7
Southeast	10	8
Central Southwest	10	7
Mountains	10	6
Pacific Coast	10	6
Other	8	5
All regions (except Other)	10	6
Reporting firms	10	10

Source: Compiled from data submitted in response to Commission questionnaires.

Note: Other U.S. markets include AK, HI, PR, and VI.

Supply and demand considerations

U.S. supply

Table II-3 provides a summary of the supply factors regarding ceramic tile from U.S. producers and from India. In general, U.S. producers reported high inventories, and U.S. producers and Indian producers all reported being unable to produce alternative products.

Table II-3
Ceramic tile: Supply factors that affect the ability to increase shipments to the U.S. market, by country

Quantity in 1,000 of square feet; ratios and shares in percent; Count in number of firms reporting

Factor	Measure	United States	India
Capacity 2021	Quantity	1,007,486	4,724,224
Capacity 2023	Quantity	1,058,254	5,595,357
Capacity utilization 2021	Ratio	88.5	73.9
Capacity utilization 2023	Ratio	82.1	77.2
Inventories to total shipments 2021	Ratio	34.2	12.9
Inventories to total shipments 2023	Ratio	39.5	13.1
Home market shipments 2023	Ratio	98.2	81.3
Non-US export market shipments 2023	Ratio	1.8	15.6
Ability to shift production	Count	0 of 10	0 of 126

Source: Compiled from data submitted in response to Commission questionnaires.

Note: Home market shipments for India are likely overstated because of a number of resellers that purchase ceramic tile in India and subsequently export the product.

Note: Responding U.S. producers accounted for virtually all of U.S. production of ceramic tile in 2023. Responding foreign producer/exporter firms accounted for nearly all of U.S. imports of ceramic tile from India during 2023. For additional data on the number of responding firms and their share of U.S. production and of U.S. imports from each subject country, please refer to Part I, “Summary Data and Data Sources.”

Domestic production

Based on available information, U.S. producers of ceramic tile have the ability to respond to changes in demand with moderately large changes in the quantity of shipments of U.S.-produced ceramic tile to the U.S. market. The main contributing factors to this degree of responsiveness of supply are the availability of unused capacity and inventories. Factors mitigating responsiveness of supply include the limited ability to shift shipments from alternate markets and no reported ability to shift production to or from alternate products.

U.S. producers' capacity utilization decreased from 2021 to 2023, as production capacity rose, and production quantity decreased slightly. U.S. producers' total production increased between 2021 and 2023. U.S. producers' inventories as a share of total shipments increased from 34.2 percent in 2021 to 39.5 percent in 2023. U.S. producers' export shipments accounted for a small share of total shipments, 1.8 percent in 2023. None of the responding U.S. producers reported being able to shift production to or from other products.

Subject imports from India

Based on available information, producers of ceramic tile from India have the ability to respond to changes in demand with large changes in the quantity of shipments of ceramic tile to the U.S. market. The main contributing factors to this degree of responsiveness of supply are the availability unused capacity and some inventories, and some ability to shift shipments from alternate markets. Factors mitigating responsiveness of supply include no reported ability to shift production to or from alternate products.

Imports from nonsubject sources

Nonsubject imports accounted for 79.7 percent of total U.S. imports in 2023, down from 90.2 percent in 2021. The largest sources of nonsubject imports during January 2021-December 2023 were Spain, followed by Mexico, Italy, and Brazil. Combined, these countries accounted for 58.4 percent of nonsubject imports in 2023.

Supply constraints

Most firms (8 of 10 U.S. producers and 14 of 17 importers) indicated that they had not experienced any supply constraints since January 1, 2021. U.S. producer *** reported that it had refused preliminary business requests from new customers because of its temporary full production capacity that resulted from the COVID-19 pandemic, but it never declined significant orders. Importer *** reported freight supply chain constraints took effect in

2021 and importer *** reported constraints due to supply chain related challenges during the COVID-19 pandemic. Additionally, respondents stated that there were supply chain challenges for imports during the period of 2021-23.[3]

U.S. demand

Based on available information, the overall demand for ceramic tile is likely to experience moderate changes in response to changes in price. The main contributing factor to demand responsiveness is the availability of lower-cost substitute products (including LVT), tempered by the small-to-moderate share of the final cost of a tile project accounted for by the tile itself compared to cost of installation.

End uses and cost share

The primary end uses for ceramic tile are flooring and wall covering in kitchens and bathrooms. Responding firms reported that ceramic tile can accounts for a wide range of total installed cost of flooring or wall coverings (ranging from a quarter to virtually all). Cost shares for floor covering ranged from 25 to 100 percent for responding firms, while cost shares for wall covering ranged from 10 to 100 percent with a fairly even distribution of responses in that wide range.

Business cycles

Most responding firms (9 of 10 U.S. producers and 9 of 17 importers) reported that the ceramic tile market is subject to business cycles. Firms reported that the market follows the seasonal trends in the construction industry, with weaker demand in the winter months and stronger demand in spring and fall. Importer *** reported that there was a increase in demand during the COVID-19 pandemic and then a sharp decrease in demand during 2022 and 2023 due to economic slowdown, inflation, and destocking.

Demand trends

Most firms reported a decrease in U.S. demand for ceramic tile since January 1, 2021 (table II-4). U.S. demand for ceramic tile is driven by demand in the construction sector, both for new homes and in the R&R sector.[4] As shown in figure II-1, new home construction and the remodeling market index ("RMI") for R&R activity have shown stagnation and a decline in

[3] Conference transcript, p. 158 (Shah).
[4] Conference transcript, p. 50 (Caselli).

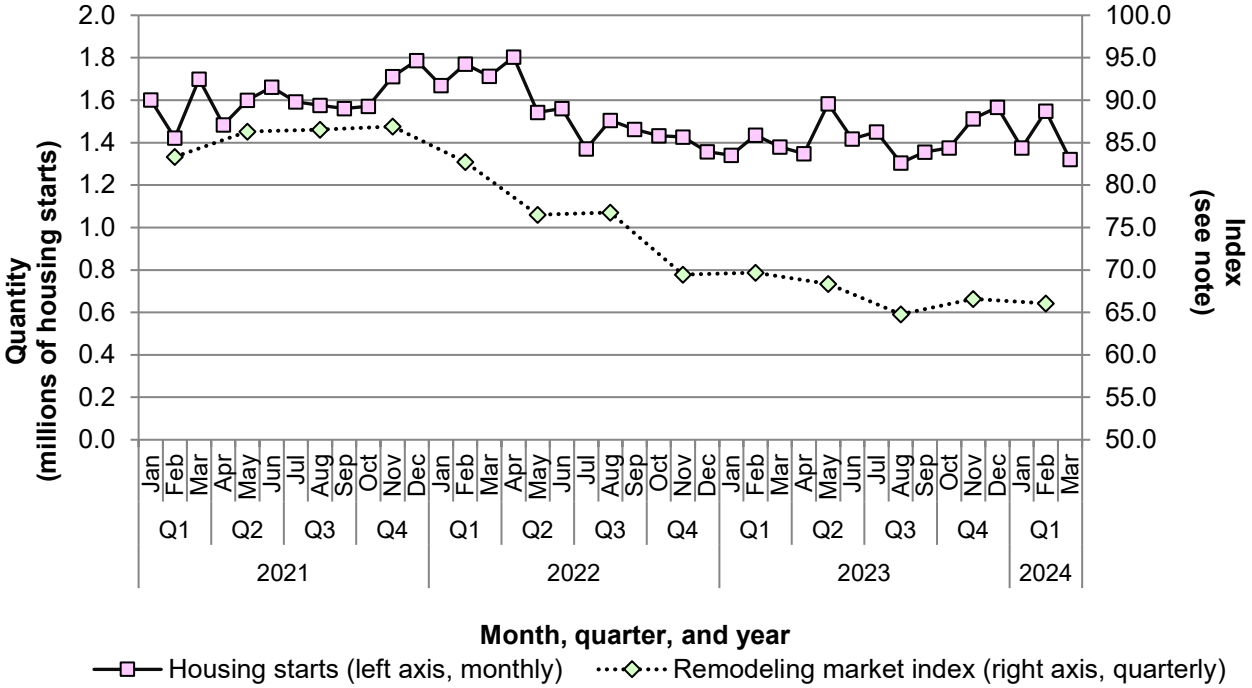
recent years (table II-5). New home construction gradually decreased from 2021 to 2023. The RMI for R&R activity decreased overall, peaking in the second quarter of 2021 before falling slowly through 2023. Overall, the number of new housing units decreased by 2.5 percent between January 2021 and December 2023, while the RMI decreased by 19.2 percent between the first quarter of 2021 and the last quarter of 2023. Producer *** reported that the ceramic tile market in the United States is driven by housing construction, sales and remodeling, and commercial developments. Several U.S. producers, ***, reported that high interest rates are contributing to a slowing construction sector.

Table II-4
Ceramic tile: Count of firms' responses regarding overall domestic and foreign demand, by firm type

Market	Firm type	Steadily Increase	Fluctuate Up	No change	Fluctuate Down	Steadily Decrease
Domestic demand	U.S. producers	2	0	0	7	0
Domestic demand	Importers	5	2	2	6	1
Foreign demand	U.S. producers	0	0	0	4	2
Foreign demand	Importers	4	1	0	2	2

Source: Compiled from data submitted in response to Commission questionnaires.

Figure II-1
Ceramic tile: Monthly privately owned housing units started, seasonally adjusted annual rate, January 2021 to March 2024



Source: https://fred.stlouisfed.org, accessed May 13, 2024 and https://www.nahb.org/news-and-economics/housing-economics/indices/remodeling-market-index, accessed May 14, 2024.

Note: Index of 50.0 indicates equal numbers of remodelers report activity is good and poor for the previous quarter

Table II-5
Ceramic tile: Monthly privately owned housing units started, seasonally adjusted annual rate, January 2021 to March 2024

Quantity in 1,000 housing starts; n.a. are not available

Month	2021	2022	2023	2024
January	1,602	1,669	1,340	1,375
February	1,422	1,771	1,436	1,549
March	1,700	1,713	1,380	1,321
April	1,484	1,803	1,348	n.a.
May	1,600	1,543	1,583	n.a.
June	1,661	1,561	1,418	n.a.
July	1,593	1,371	1,451	n.a.
August	1,576	1,505	1,305	n.a.
September	1,560	1,463	1,356	n.a.
October	1,572	1,432	1,376	n.a.
November	1,712	1,427	1,512	n.a.
December	1,787	1,357	1,566	n.a.

Source: https://fred.stlouisfed.org, accessed May 13, 2024.

Table II-6
Ceramic tile: Quarterly remodeling market index, seasonally adjusted, January 2021 to March 2024

Index in percent; 50.0 indicates equal numbers of remodelers report activity is good and poor for the previous quarter; n.a. are not available

Quarter	2021	2022	2023	2024
Q1	83	83	70	66
Q2	86	77	68	n.a.
Q3	87	77	65	n.a.
Q4	87	69	67	n.a.

Source: https://www.nahb.org/news-and-economics/housing-economics/indices/remodeling-market-index, accessed May 14, 2024.

A majority of U.S. producers reported a decrease in demand for ceramic tile outside the United States while a slight majority of importers reported an increase (table II-6). Producer *** reported that the decline was due to geopolitical and freight issues. Importers that reported an increase in foreign demand generally cited strong construction activity and improvements in digital technology. Importer *** stated that with "economic growth in high populous countries there has been an overall increase in ceramic tile usage." Importer *** reported that other countries such as Italy and Spain have begun producing tiles with new technologies, such as 3-D surface textures and more sophisticated looks.

Substitute products

Most responding U.S. producers (8 of 10) and half of responding importers (8 of 16) reported that there are no substitutes for ceramic tile. Firms that did indicate there are substitutes for ceramic tile, they cited LVT (or vinyl, laminate) and carpet for flooring applications. Wood and stone were also listed as possible substitutes in flooring and wall applications. Two of 10 U.S. producers and 8 of 16 importers reported that LVT is considered a substitute for ceramic tile in flooring applications. Importer *** stated that the reduced pricing and improvement in technology enabling a rigid core for LVT has made it more competitive. The reduction in pricing is related to having a click lock, which makes for a significantly lower cost of installation since the planks can easily attach together rather than needing aligning and grouting for tile, thereby reducing the price of the installed floor. Recently, water-resistant laminate has also been introduced which has a lower price and lower installation cost than ceramic tile.

One U.S. producer and five importers reported that changes in the price of LVT have affected ceramic tile prices. These firms generally noted that the material and installation costs of LVT, vinyl, and laminate flooring are significantly less than ceramic tile. Importer *** reported that the lower price of LVT has caused it to lower the price of low-end porcelain tiles in the last year or so.

Substitutability issues

This section assesses the degree to which U.S.-produced ceramic tile and imports of ceramic tile from subject countries can be substituted for one another by examining the importance of certain purchasing factors and the comparability of ceramic tile from domestic and imported sources based on those factors. Based on available data, staff believes that there is a high degree of substitutability between domestically produced ceramic tile and ceramic tile imported from subject sources.[5] Factors contributing to this level of substitutability include similar quality, availability, and lead times for ceramic tile from inventory, little preference for

[5] The degree of substitution between domestic and imported ceramic tile depends upon the extent of product differentiation between the domestic and imported products and reflects how easily purchasers can switch from domestically produced ceramic tile to the ceramic tile imported from subject countries (or vice versa) when prices change. The degree of substitution may include such factors as relative prices (discounts/rebates), quality differences (e.g., grade standards, defect rates, etc.), and differences in sales conditions (e.g., lead times between order and delivery dates, reliability of supply, product services, etc.).

particular country of origin or producers[6], interchangeability between domestic and subject sources, and limited significant factors other than price.

Factors affecting purchasing decisions

Most important purchase factors

Purchasers responding to lost sales and lost revenue allegations[7] were asked to identify the main purchasing factors their firm considered in their purchasing decisions for ceramic tile. The major purchasing factors identified by firms include trend, quality, availability, production capacity, market brand preference, distribution network, service, innovation, reliability of supply, and price.

The most often cited top three factors firms consider in their purchasing decisions for ceramic tile were quality (two firms), trend-forward product designs (one firm), and fulfillment speed (one firm) as shown in table II-7. Quality was again the most frequently reported second-most important factor (two firms); and price was the most frequently reported third-most important factor (two firms).

Table II-7
Ceramic tile: Count of ranking of factors used in purchasing decisions as reported by U.S. purchasers, by factor

Count in number of firms reporting

Factor	First	Second	Third	Total
Price / Cost	0	0	2	2
Quality	2	2	1	4
Design Trend	1	0	1	2
All other factors	1	2	0	NA

Source: Compiled from data submitted in response to Commission questionnaires.
Note: Other factors include fulfillment speed, production capacity, and reliability.

Lead times

Ceramic tile is primarily sold from inventory. U.S. producers reported that 90.9 percent of their commercial shipments were sold from inventory, with lead times averaging 7.7 days. The remaining 9.1 percent of U.S. producers' commercial shipments were produced-to-order, with lead times averaging 49.5 days. Importers reported that 96.8 percent of their commercial

[6] "Some customers may have a preference for Italian tile. Most customers rarely know the country of origin of the box of ceramic tile that are installed by installers." Petitioners' postconference brief, p. 8. Conference transcript, p. 24 (Haynes).

[7] This information is compiled from responses by purchasers identified by Petitioners to the lost sales lost revenue allegations. See Part V for additional information.

shipments were sold from U.S. inventories, with lead times averaging 5.5 days. Importers reported that 0.1 percent of their shipments came from foreign manufacturers' inventories, with lead times averaging 140 days, and 3.1 percent was produced-to-order, with an average lead time of 15.3 days.

Comparison of U.S.-produced and imported ceramic tile

In order to determine whether U.S.-produced ceramic tile can generally be used in the same applications as imports from India and nonsubject countries, U.S. producers and importers were asked whether the products can always, frequently, sometimes, or never be used interchangeably. As shown in table II-8, most U.S. producers and importers reported that ceramic tile from the United States, India, and other countries was always or frequently interchangeable. Several importers did report that Indian ceramic tiles were only sometimes interchangeable when compared to other countries. Importer *** reported that there are instances where a product is not as available in the United States which limits interchangeability, particularly for polished tile and the "production processes for the double loaded and soluble salt" ceramic tile.

Table II-8
Ceramic tile: Count of U.S. producers and importers reporting interchangeability between product produced in the United States and in other countries reported, by country pair

Count in number of firms reporting

Country pair	Firm Type	Always	Frequently	Sometimes	Never
United States vs. India	U.S. producer	5	4	1	0
United States vs. Other	U.S. producer	5	4	1	0
India vs. Other	U.S. producer	3	3	1	1
United States vs. India	U.S. importer	4	6	5	0
United States vs. Other	U.S. importer	4	7	5	0
India vs. Other	U.S. importer	4	4	6	0

Source: Compiled from data submitted in response to Commission questionnaires.

In addition, U.S. producers and importers were asked to assess how often differences other than price were significant in sales of ceramic tile from the United States, subject, or nonsubject countries. As seen in table II-9, most U.S. producers and importers reported that differences other than price were sometimes or never significant. Many firms cited quality, product availability, new styles, minimum order quantities, and service as significant factors other than price that differentiate domestic and imported ceramic tile. Several importers stated that imported ceramic tile offer newer styles and innovations, as well as certain sizes, varieties, styles, and matching components that domestic producers do not. Importer ***

reported that domestic producers require large minimum order quantities and that development time for various styles is significantly longer in the United States. This is important since many of their customers prioritize speed to market with trend and design at a reduced risk when making a tile purchasing decision.

Table II-9
Ceramic tile: Count of U.S. producers and importers reporting the significance of differences other than price between product produced in the United States and in other countries reported, by country pair

Count in number of firms reporting

Country pair	Firm Type	Always	Frequently	Sometimes	Never
United States vs. India	U.S. producer	1	1	4	3
United States vs. Other	U.S. producer	0	1	5	3
India vs. Other	U.S. producer	1	0	4	2
United States vs. India	U.S. importer	4	3	6	2
United States vs. Other	U.S. importer	2	2	10	2
India vs. Other	U.S. importer	2	2	7	2

Source: Compiled from data submitted in response to Commission questionnaires.

Part III: U.S. producers' production, shipments, and employment

The Commission analyzes a number of factors in making injury determinations (see 19 U.S.C. §§ 1677(7)(B) and 1677(7)(C)). Information on the subsidies and dumping margins was presented in Part I of this report and information on the volume and pricing of imports of the subject merchandise is presented in Part IV and Part V. Information on the other factors specified is presented in this section and/or Part VI and (except as noted) is based on the questionnaire responses of ten firms that accounted for approximately 95 percent of U.S. production of ceramic tile during 2023.

U.S. producers

The Commission issued a U.S. producer questionnaire to 30 firms based on information contained in the petition. Ten firms provided usable data on their operations. Table III-1 lists U.S. producers of ceramic tile, their production locations, positions on the petition, and shares of total production.

Table III-1
Ceramic tile: U.S. producers, their positions on the petition, production locations, and shares of reported production, 2023

Shares in percent

Firm	Position on petition	Production location(s)	Share of production
AHF (Crossville Brand)	Petitioner	Crossville, TN	***
American Wonder	Petitioner	Lebanon, TN	***
Dal-Tile	Petitioner	Sunnyvale, TX Muskogee, OK El Paso, TX Florence, AL Dickson, TN Gettysburg, PA	***
Del Conca	Petitioner	Loudon - TN	***
Florida Tile	Petitioner	Lawrenceburg, KY	***
Florim	Petitioner	Clarksville, TN	***
Ironrock	***	Canton, OH	***
Landmark	Petitioner	Mount Pleasant, TN	***
Portobello	Petitioner	Baxter, TN	***
Stonepeak	Petitioner	Crossville, TN	***
All firms	Various	Various	100.0

Source: Compiled from data submitted in response to Commission questionnaires.

Table III-2 presents information on U.S. producers' ownership, related and/or affiliated firms.

Table III-2
Ceramic tile: U.S. producers' ownership, related and/or affiliated firms

Reporting firm	Relationship type and related firm	Details of relationship
***	***	***
***	***	***
***	***	***
***	***	***
***	***	***
***	***	***
***	***	***
***	***	***
***	***	***
***	***	***
***	***	***
***	***	***
***	***	***
***	***	***
***	***	***
***	***	***

Reporting firm	Relationship type and related firm	Details of relationship
***	***	***
***	***	***
***	***	***
***	***	***
***	***	***
***	***	***
***	***	***
***	***	***
***	***	***
***	***	***
***	***	***
***	***	***
***	***	***
***	***	***
***	***	***
***	***	***

Source: Compiled from data submitted in response to Commission questionnaires.

As indicated in table III-2, no U.S. producers are related to foreign producers of the subject merchandise and *** U.S. producers are related to U.S. importers of the subject merchandise. In addition, as discussed in greater detail below, *** U.S. producers (***) directly import the subject merchandise and *** U.S. producer *** purchased the subject merchandise from U.S. importers. Eight U.S. producers are related to manufacturers of ceramic tile in nonsubject countries, and nine import ceramic tile from nonsubject countries.

Table III-3 presents events in the U.S. industry since January 1, 2021.

Table III-3
Ceramic Tile: Important industry events since 2021

Item	Firm	Event
Expansion	Florim	In September 2021, Florim announced that it will invest $35 million in its Clarksville-Montgomery County plant in Clarksville, TN. Florim will add a new warehouse and invest in technologically advanced manufacturing machinery to increase the production capabilities and expand the range of product offerings. The investment is anticipated to add 33 jobs and bring employment to approximately 345 workers. The new 460,000 square foot warehouse became operational in 2023 and contains over 3 million cubic feet of storage for porcelain tile production.
Closure	Interceramic	On February 22, 2023, Interceramic announced that it will close its United States operations located in Carrollton, TX by March 1, 2023, resulting in the loss of approximately 400 jobs. Interceramic is the largest glazed floor tile manufacturer in North America.
Acquisition	AHF (Crossville Brands)	On October 13, 2023, AHF (Crossville Brands) headquartered in Dallas, TX, acquired Crossville Inc., a porcelain tile manufacturer located in Crossville, TN.
Opening	Portobello	On October 18, 2023, Portobello America held a grand opening ceremony for its new plant located in Baxter, TN. The plant's annual production capacity is 50 million square feet. The plant became operational in the summer of 2023 and is anticipated to generate 230 local jobs. Portobello plans to have a small-format line and a second kiln for field tiles, by year-end 2024.
Expansion	Stonepeak	In 2023, Stonepeak Ceramics invested $10 million in its TN production facility in Crossville}. The company plans to upgrade and expand product output by investing in cutting-edge production technologies which include new polishing lines, new 12-bar digital printing machines with state-of-the-art capabilities and offering customers XL gauged porcelain stoneware slabs.
Expansion	Landmark	On March 22, 2024, Landmark Ceramics celebrated its $70 million tile production plant expansion in Mt. Pleasant, TN. The expansion will also make the plant location a North American logistics hub for Landmark, a subsidiary of Italy-based Gruppo Concorde S.p.A. Part of Landmark Ceramics plant expansion includes a new kiln that increases the plant's annual production capacity to 80 million square feet and add 78 new jobs.

Source: Business Facilities Magazine, "Two Manufacturing Projects Will Create Nearly 300 Jobs In Tennessee," April 12, 2024, https://businessfacilities.com/two-manufacturers-invest-29m-to-expand-in-tennessee/#:~:text=Manufacturing%20Expansions%20Create%20Nearly%20300,%2478.3M%20in%20Lebanon%2C%20TN; Businesswire, "Paceline Equity Portfolio Company AHF Products Acquires Crossville, a Leading U.S. Porcelain Tile Manufacturer," October 13, 2023, https://www.ahfproducts.com/en-us/press/ahf-products-enters-tile-category-with-purchase-of-assets-of-crossville-inc.html; ClarksvilleNow.com," Florim USA expands with 460,000-square-foot warehouse in Clarksville," November 1, 2023, https://clarksvillenow.com/local/florim-usa-expands-with-460000-square-

foot-warehouse-in-clarksville/; Floor Daily, “Portobello America Holds Grand Opening for Tennessee Factory,” October 18, 2023, https://www.floordaily.net/flooring-news/portobello-america-holds-grand-opening-for-tennessee-factory; Dallas News, “Mexican company cutting 400 Texas jobs, closing Carrollton, Garland sites,” March 6, 2023, https://www.dallasnews.com/business/2023/03/06/mexican-tile-company-closing-down-us-operations-lay-off-nearly-400-across-texas/; Floor Daily, “Interceramic Closing TX Manufacturing, Corporate Functions & Showrooms,” April 12, 2023, https://www.floordaily.net/flooring-news/interceramic-closing-tx-manufacturing-corporate-functions-showrooms#:~:text=%E2%80%9CThe%20Chihuahua%2C%20Mexico%20%2Dbased,400%20job%20cuts%20across%20Texas; Floor Daily, “Landmark Ceramics Cuts Ribbon on $70M Plant Expansion,“ March 25, 2024, https://www.floordaily.net/flooring-news/landmark-ceramics-cuts-ribbon-on-70m-plant-expansion; Floor Daily, “Portobello America's Tennessee Plant Slated to Open in April,” March 17, 2023, https://www.floordaily.net/flooring-news/portobello-americas-tennessee-plant-slated-to-open-in-april; Leaf Chronicle, “Florim to invest another $35 million in Montgomery County ceramic tile plant,” September 22, 2021, https://www.theleafchronicle.com/story/news/local/clarksville/2021/09/22/florim-invest-35-million-montgomery-county-ceramic-tile-plant/5813076001/#:~:text=Through%20a%20%2435%20million%20addition,Montgomery%20County%20Economic%20Development%20Council; Library Resources, “Interceramic USA – Closed,” (accessed May 16, 2023), https://libraryresources.net/manufacturer/interceramic-usa; Stonepeak Ceramics, “Stonepeak Ceramics expands investments to boost U.S. production,” September 18, 2023, https://www.stonepeakceramics.com/news-detail.php?id=184&t=stonepeak-ceramics-expands-investments-to-boost-u.s.-production-#:~:text=Throughout%202023%2C%20Stonepeak%20Ceramics%20has,of%20the%20Tennessee%20production%20facility;

Producers in the United States were asked to report any change in the character of their operations or organization relating to the production of ceramic tile since 2021. Eight of ten producers indicated in their questionnaires that they had experienced such changes. Table III-4 presents the changes identified by these producers.

Table III-4
Ceramic tile: U.S. producers' reported changes in operations, since January 1, 2021

Item	Firm name and narrative response on changes in operations
Plant openings	***
Prolonged shutdowns	***
Prolonged shutdowns	***
Prolonged shutdowns	***
Production curtailments	***
Production curtailments	***
Production curtailments	***
Production curtailments	***
Expansions	***
Expansions	***
Expansions	***
Consolidations	***
Other	***

Source: Compiled from data submitted in response to Commission questionnaires.

U.S. production, capacity, and capacity utilization

Table III-5 presents U.S. producers' installed overall and practical capacity and production on the same equipment. During 2021-23 installed overall capacity increased by 6.1 percent, and reported practical ceramic tile capacity increased by 5.0 percent. During 2021-23, production of ceramic tile production fluctuated but decreased slightly by 2.5 percent. During 2021-23, installed overall capacity utilization decreased from 77.5 percent to 71.1 percent, and reported practical ceramic tile capacity decreased from 88.5 percent to 82.1 percent.

Table III-5
Ceramic tile: U.S. producers' installed and practical capacity and production on the same equipment as in-scope production, by period

Capacity and production in 1,000 square feet; utilization in percent

Item	Measure	2021	2022	2023
Installed overall	Capacity	1,150,883	1,168,073	1,221,573
Installed overall	Production	891,535	896,036	868,932
Installed overall	Utilization	77.5	76.7	71.1
Practical overall	Capacity	1,007,486	1,034,159	1,058,254
Practical overall	Production	891,535	896,036	868,932
Practical overall	Utilization	88.5	86.6	82.1
Practical ceramic tile	Capacity	1,007,486	1,034,159	1,058,254
Practical ceramic tile	Production	891,535	896,036	868,932
Practical ceramic tile	Utilization	88.5	86.6	82.1

Source: Compiled from data submitted in response to Commission questionnaires.

Table III-6 presents U.S. producers' reported narratives regarding practical capacity constraints.

Table III-6
Ceramic tile: U.S. producers' reported capacity constraints since January 1, 2021

Item	Firm name and narrative response on constraints to practical overall capacity
Production bottlenecks	***
Production bottlenecks	***
Production bottlenecks	***
Production bottlenecks	***
Existing labor force	***
Existing labor force	***
Existing labor force	***
Storage capacity	***
Other constraints	***
Other constraints	***
Other constraints	***
Other constraints	***

Source: Compiled from data submitted in response to Commission questionnaires.

Table III-7 and figure III-1 present U.S. producers' production, capacity, and capacity utilization. U.S. producers' practical capacity increased by 5.0 percent during 2021-2023, largely due to two firms: ***. Ceramic tile production fluctuated but decreased by *** percent during 2021-23. Four of nine U.S. producers that operated continuously throughout the reporting period, had lower production in 2023 than in 2021. U.S. producers' average capacity utilization decreased year to year, ending 6.4 percentage points lower in 2023 than in 2021.

Table III-7
Ceramic tile: U.S. producers' output, by firm and period

Practical capacity

Capacity in 1,000 of square feet

Firm	2021	2022	2023
AHF (Crossville Brand)	***	***	***
American Wonder	***	***	***
Dal-Tile	***	***	***
Del Conca	***	***	***
Florida Tile	***	***	***
Florim	***	***	***
Ironrock	***	***	***
Landmark	***	***	***
Portobello	***	***	***
Stonepeak	***	***	***
All firms	1,007,486	1,034,159	1,058,254

Table continued.

Table III-7 Continued
Ceramic tile: U.S. producers' output, by firm and period

Production

Production in 1,000 of square feet

Firm	2021	2022	2023
AHF (Crossville Brand)	***	***	***
American Wonder	***	***	***
Dal-Tile	***	***	***
Del Conca	***	***	***
Florida Tile	***	***	***
Florim	***	***	***
Ironrock	***	***	***
Landmark	***	***	***
Portobello	***	***	***
Stonepeak	***	***	***
All firms	891,535	896,036	868,932

Table continued.

Table III-7 Continued
Ceramic tile: U.S. producers' output, by firm and period

Capacity utilization

Capacity utilization in percent

Firm	2021	2022	2023
AHF (Crossville Brand)	***	***	***
American Wonder	***	***	***
Dal-Tile	***	***	***
Del Conca	***	***	***
Florida Tile	***	***	***
Florim	***	***	***
Ironrock	***	***	***
Landmark	***	***	***
Portobello	***	***	***
Stonepeak	***	***	***
All firms	88.5	86.6	82.1

Note: Capacity utilization ratio represents the ratio of the U.S. producer's production to its production capacity.

Table continued.

Table III-7 Continued
Ceramic tile: U.S. producers' output, by firm and period

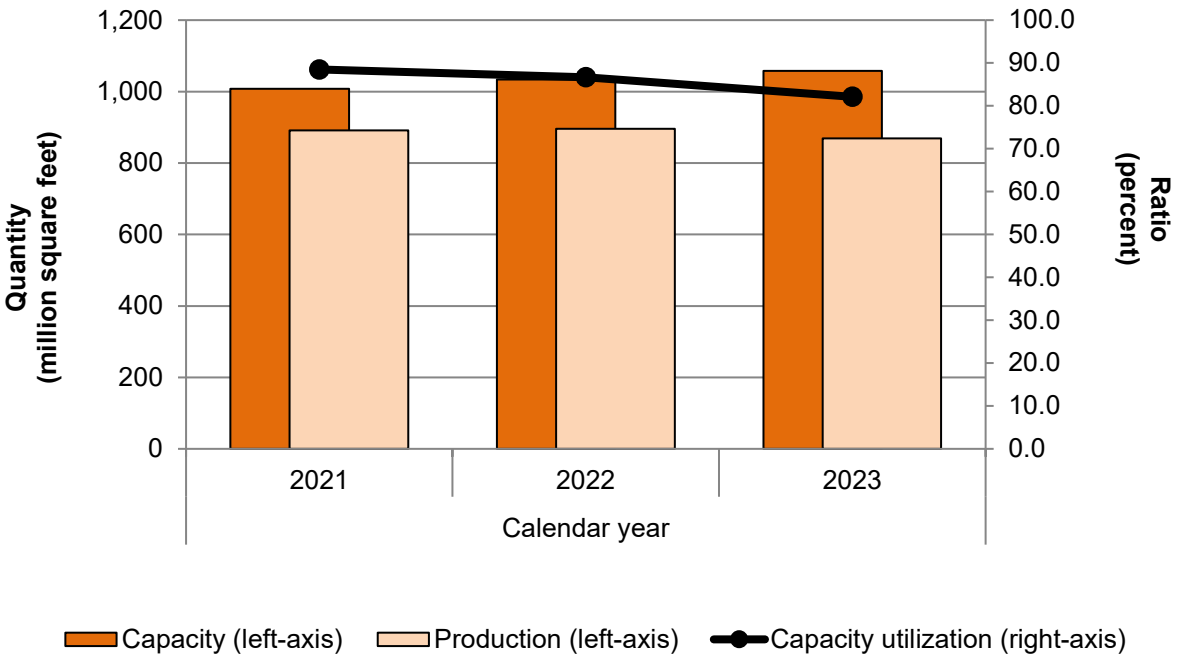
Share of production

Share in percent

Firm	2021	2022	2023
AHF (Crossville Brand)	***	***	***
American Wonder	***	***	***
Dal-Tile	***	***	***
Del Conca	***	***	***
Florida Tile	***	***	***
Florim	***	***	***
Ironrock	***	***	***
Landmark	***	***	***
Portobello	***	***	***
Stonepeak	***	***	***
All firms	100.0	100.0	100.0

Source: Compiled from data submitted in response to Commission questionnaires.

Figure III-1
Ceramic tile: U.S. producers' output, by period



Source: Compiled from data submitted in response to Commission questionnaires.

Alternative products

No responding U.S. producer reported production of other products using the same equipment to produce ceramic tile.

U.S. producers' U.S. shipments and exports

Table III-8 presents U.S. producers' U.S. shipments, export shipments, and total shipments. U.S. shipments accounted for the majority of U.S. producers' total shipments from 2021 to 2023.[1] The quantity of their U.S. shipments fluctuated but decreased by 6.2 percent during 2021-23. The decrease reflects ***. The value of U.S. producers' U.S. shipments fluctuated year to year, increasing overall by percent during 2021-2023.

[1] Four firms reported internal consumption, including firm's own retail sales, accounting for less than 1.0 percent of U.S. producers' U.S. shipments in any single year during 2021-23. While two firms reported transfers to related firms, accounting for less than 1.5 percent of U.S. producers' U.S. shipments in any single year during 2021-23.

The average unit value of U.S. producers' U.S. shipments increased year to year, ending 14.6 percent higher in 2023 than in 2021.[2]

Table III-8
Ceramic tile: U.S. producers' shipments, by destination and period

Quantity in 1,000 of square feet; value in 1,000 dollars; unit value in dollars per square feet; shares in percent

Item	Measure	2021	2022	2023
U.S. shipments	Quantity	854,822	861,750	801,735
Export shipments	Quantity	11,408	15,019	14,560
Total shipments	Quantity	866,230	876,769	816,295
U.S. shipments	Value	1,229,590	1,347,628	1,325,877
Export shipments	Value	19,404	26,704	27,995
Total shipments	Value	1,248,994	1,374,332	1,353,872
U.S. shipments	Unit value	1.44	1.56	1.65
Export shipments	Unit value	1.70	1.78	1.92
Total shipments	Unit value	1.44	1.57	1.66
U.S. shipments	Share of quantity	98.7	98.3	98.2
Export shipments	Share of quantity	1.3	1.7	1.8
Total shipments	Share of quantity	100.0	100.0	100.0
U.S. shipments	Share of value	98.4	98.1	97.9
Export shipments	Share of value	1.6	1.9	2.1
Total shipments	Share of value	100.0	100.0	100.0

Source: Compiled from data submitted in response to Commission questionnaires.

By quantity, export shipments accounted for a minority share of U.S. producers' total shipments in each year from 2021 to 2023.[3] The quantity of their export shipments fluctuated, but increased by 27.6 percent during 2021-23. The value of U.S. producers' export shipments increased yearly from 2021 to 2023, ending 44.2 percent higher. The unit value of their export shipments increased year to year, ending 12.9 percent higher in 2023 than in 2021.

[2] ***.

[3] Eight of the ten firms (except ***) reported exports during 2021-23, with ***.

Table III-9 presents U.S. producers' U.S. shipments by water permeability, which shows that the vast majority of U.S. producers' U.S. shipments were porcelain versus non-porcelain ceramic tiles.[4]

Table III-9
Ceramic tile: U.S. producers' U.S. shipments, by water permeability, 2023

Quantity in 1,000 of square feet; share in percent

Water permeability	Quantity	Share
Porcelain	***	***
Non-porcelain	***	***
All water permeabilities	***	100.0

Source: Compiled from data submitted in response to Commission questionnaires.

Table III-10 presents information on U.S. producers' U.S. shipments by use, and product type. In 2023, non-mosaic tile comprised *** percent of U.S. shipments, while mosaic tiles comprised the remaining *** percent of U.S. shipments.[5] In 2023, floor tile comprised *** percent of U.S. shipments, while wall tile comprised *** percent of U.S. shipments.

[4] In 2023, all ten U.S. producers reports U.S. shipments of porcelain ceramic tile. ***.
[5] ***.

Table III-10
Ceramic tile: U.S. producers' U.S. shipments, by use and type, 2023

Quantity in 1,000 of square feet; share in percent

Use	Measure	Non-mosaic large	Non-mosaic medium and small	Mosaic	All types
Floor	Quantity	***	***	***	***
Wall	Quantity	***	***	***	***
All other uses	Quantity	***	***	***	***
All uses	Quantity	87,946	700,631	13,158	801,735
Floor	Share across	***	***	***	100.0
Wall	Share across	***	***	***	100.0
All other uses	Share across	***	***	***	100.0
All uses	Share across	***	***	***	100.0
Floor	Share down	***	***	***	***
Wall	Share down	***	***	***	***
All other uses	Share down	***	***	***	***
All uses	Share down	100.0	100.0	100.0	100.0
Floor	Share across and down	***	***	***	***
Wall	Share across and down	***	***	***	***
All other uses	Share across and down	***	***	***	***
All uses	Share across and down	11.0	87.4	1.6	100.0

Source: Compiled from data submitted in response to Commission questionnaires.

U.S. producers' inventories

Table III-11 presents U.S. producers' end-of-period inventories and the ratio of these inventories to U.S. producers' production, U.S. shipments, and total shipments**.** U.S. producers' end-of-period inventories increased by 8.9 from 2021 to 2023.[6] The ratios of U.S. producers' end-of-period inventories to their U.S. production, U.S. shipments, and total shipments each increased in every year from 2021 to 2023, ending 3.9 percentage points, 5.6 percentage points, and 5.3 percentage points higher, respectively.

[6] All U.S. producers other than *** reported higher end-of-period inventories in 2023 than in 2021.

Table III-11
Ceramic tile: U.S. producers' inventories and their ratio to select items, by period

Quantity in 1,000 square feet; ratio in percent

Item	2021	2022	2023
End-of-period inventory quantity	295,902	307,900	322,242
Inventory ratio to U.S. production	33.2	34.4	37.1
Inventory ratio to U.S. shipments	34.6	35.7	40.2
Inventory ratio to total shipments	34.2	35.1	39.5

Source: Compiled from data submitted in response to Commission questionnaires.

Note: Shares and ratios shown as "0.0" represent values greater than zero, but less than "0.05" percent. Zeroes, null values, and undefined calculations are suppressed and shown as "---".

U.S. producers' imports and purchases from subject sources

U.S. producers' imports and purchases of ceramic tile are presented in table III-12 through III-15. *** directly imported ceramic tile from India. *** purchased imported ceramic tile from India.

Table III-12
Ceramic tile: *'s U.S. production, subject imports, and ratio of subject imports to production, by source and period**

Quantity in 1,000 of square feet; ratio in percent

Item	Measure	2021	2022	2023
U.S. production	Quantity	***	***	***
Imports from India	Quantity	***	***	***
Imports from India to U.S. production	Ratio	***	***	***

Source: Compiled from data submitted in response to Commission questionnaires.

Note: Shares and ratios shown as "0.0" represent values greater than zero, but less than "0.05" percent. Zeroes, null values, and undefined calculations are suppressed and shown as "---".

Table III-13
Ceramic tile: *'s U.S. production, subject imports, and ratio of subject imports to production, by source and period**

Quantity in 1,000 of square feet; ratio in percent

Item	Measure	2021	2022	2023
U.S. production	Quantity	***	***	***
Imports from India	Quantity	***	***	***
Imports from India to U.S. production	Quantity	***	***	***

Source: Compiled from data submitted in response to Commission questionnaires.

Note: Shares and ratios shown as "0.0" represent values greater than zero, but less than "0.05" percent. Zeroes, null values, and undefined calculations are suppressed and shown as "---".

Table III-14
Ceramic tile: *'s purchases of imports from subject sources, by source, importer of record, by period**

Quantity in 1,000 of square feet; ratio in percent

Item	Measure	2021	2022	2023
***'s U.S. production	Quantity	***	***	***
***'s purchases of imports from India imported by ***	Quantity	***	***	***
***'s U.S. imports from India	Quantity	***	***	***
Overall U.S. imports from India	Quantity	***	***	***
Ratio 1: ***'s purchases of imports from India relative to ***'s U.S. imports from India	Ratio	***	***	***
Ratio 2: ***'s U.S. imports from India relative to overall U.S. imports from India	Ratio	***	***	***
Ratio 3: ***'s U.S. imports from India relative to ***'s U.S. production.	Ratio	***	***	***

Source: Compiled from data submitted in response to Commission questionnaires and proprietary, Census-edited Customs import records using the HTS statistical reporting numbers as identified in table IV-2 of this report, accessed April 18, 2024.

Note: Shares and ratios shown as "0.0" represent values greater than zero, but less than "0.05" percent. Zeroes, null values, and undefined calculations are suppressed and shown as "---".

Table III-15
Ceramic tile: U.S. producers' reasons for importing

Item	Narrative response on reasons for importing or purchasing
***'s reason for importing	***
***'s reason for importing and purchasing	***

Source: Compiled from data submitted in response to Commission questionnaires.

U.S. employment, wages, and productivity

Table III-16 shows U.S. producers' employment-related data. The number of production-related workers ("PRWs") increased by 8.1 percent from 2021 to 2023.[7] Productivity decreased by 7.5 percent from 2021 to 2023. Unit labor costs and total hours worked, conversely, increased during 2021 to 2023, ending 16.7 percent and 5.4 percent higher, respectively. Hour worked per PRW decreased during 2021-23, while wages paid, and hourly wages both increased from 2021 to 2023.

Table III-16
Ceramic tile: U.S. producers' employment related information, by period

Item	2021	2022	2023
Production and related workers (PRWs) (number)	3,679	3,779	3,976
Total hours worked (1,000 hours)	7,538	7,518	7,943
Hours worked per PRW (hours)	2,049	1,989	1,998
Wages paid ($1,000)	211,541	224,720	244,192
Hourly wages (dollars per hour)	$28.06	$29.89	$30.74
Productivity (square feet per hour)	118.3	119.2	109.4
Unit labor costs (dollars per square foot)	$0.24	$0.25	$0.28

Source: Compiled from data submitted in response to Commission questionnaires.

[7] Seven of 10 U.S. producers increased the number of PRWs, with ***.

Part IV: U.S. imports, apparent U.S. consumption, and market shares

U.S. importers

The Commission issued importer questionnaires to 90 firms believed to be importers of subject ceramic tile, as well as to all U.S. producers of ceramic tile.[1] Usable questionnaire responses were received from 17 companies, representing *** percent of U.S. imports from India and nearly all of imports from nonsubject countries in 2023.[2] Table IV-1 lists all responding U.S. importers of ceramic tile from India and other sources, their locations, and their shares of U.S. imports, in 2023.

[1] The Commission issued questionnaires to those firms identified in the petitions; staff research; and proprietary, Census-edited Customs' import records.

[2] Import coverage was calculated as a share of imports, as reported in questionnaire responses, divided by official import statistics of the U.S. Department of Commerce Census Bureau using HTS statistical reporting numbers 6907.21.1005, 6907.21.1011, 6907.21.1051, 6907.21.2000, 6907.21.3000, 6907.21.4000, 6907.21.9011, 6907.21.9051, 6907.22.1005, 6907.22.1011, 6907.22.1051, 6907.22.2000, 6907.22.3000, 6907.22.4000, 6907.22.9011, 6907.22.9051, 6907.23.1005, 6907.23.1011, 6907.23.1051, 6907.23.2000, 6907.23.3000, 6907.23.4000, 6907.23.9011, 6907.23.9051, 6907.30.1005, 6907.30.1011, 6907.30.1051, 6907.30.2000, 6907.30.3000, 6907.30.4000, 6907.30.9011, 6907.30.9051, 6907.40.1005, 6907.40.1011, 6907.40.1051, 6907.40.2000, 6907.40.3000, 6907.40.4000, 6907.40.9011, and 6907.40.9051.

Table IV-1
Ceramic tile: U.S. importers, their headquarters, and share of imports within each source, 2023

Share in percent

Firm	Headquarters	India	Nonsubject sources	All import sources
AHF (Crossville Brand)	Mountville, PA	***	***	***
Anatolia	Vaughan - Canada, ON	***	***	***
Bedrosians	Fresno, CA	***	***	***
CRW	Westland, MI	***	***	***
Dal-Tile	Dallas, TX	***	***	***
Del Conca	Loudon, TN	***	***	***
Einstein Floors	Houston, TX	***	***	***
Florim	Clarksville, TN	***	***	***
FD Sales	Atlanta, GA	***	***	***
LG Sourcing	Mooresville, NC	***	***	***
Landmark	Mount Pleasant, TN	***	***	***
MS International	Orange, CA	***	***	***
Magna Rosetta	Stratford, CT	***	***	***
North America Tile	Miami, FL	***	***	***
Florida Tile	Lexington, KY	***	***	***
Portobello	Baxter, TN	***	***	***
Stonepeak	Chicago, IL	***	***	***
All firms	Various	100.0	100.0	100.0

Source: Compiled from data submitted in response to Commission questionnaires.

Note: Shares and ratios shown as "0.0" represent values greater than zero, but less than "0.05" percent. Zeroes, null values, and undefined calculations are suppressed and shown as "---".

U.S. imports

Table IV-2, IV-3 and figure IV-1 present data for U.S. imports of ceramic tile from India and all other sources.[3] U.S. imports from India by quantity and value increased in every year from 2021 to 2023, ending 85.9 percent, and 57.3 percent higher, respectively. The unit value of imports from India increased in 2022 and then decreased in 2023, for an overall decline of 15.4 percent between 2021 and 2023.

U.S. imports from nonsubject sources by quantity decreased in every year from 2021 to 2023, ending 20.6 percent lower. U.S. imports from nonsubject sources by value fluctuated year to year, increasing from 2021 to 22 then decreasing from 2022 to 2023, ending 1.2 percent lower. The unit value of imports from nonsubject sources increased in each year, ending 24.4 percent higher in 2023 than in 2021.

[3] Appendix E presents import data between 2016 and 2023.

Table IV-2

Ceramic tile: U.S. imports by source and period

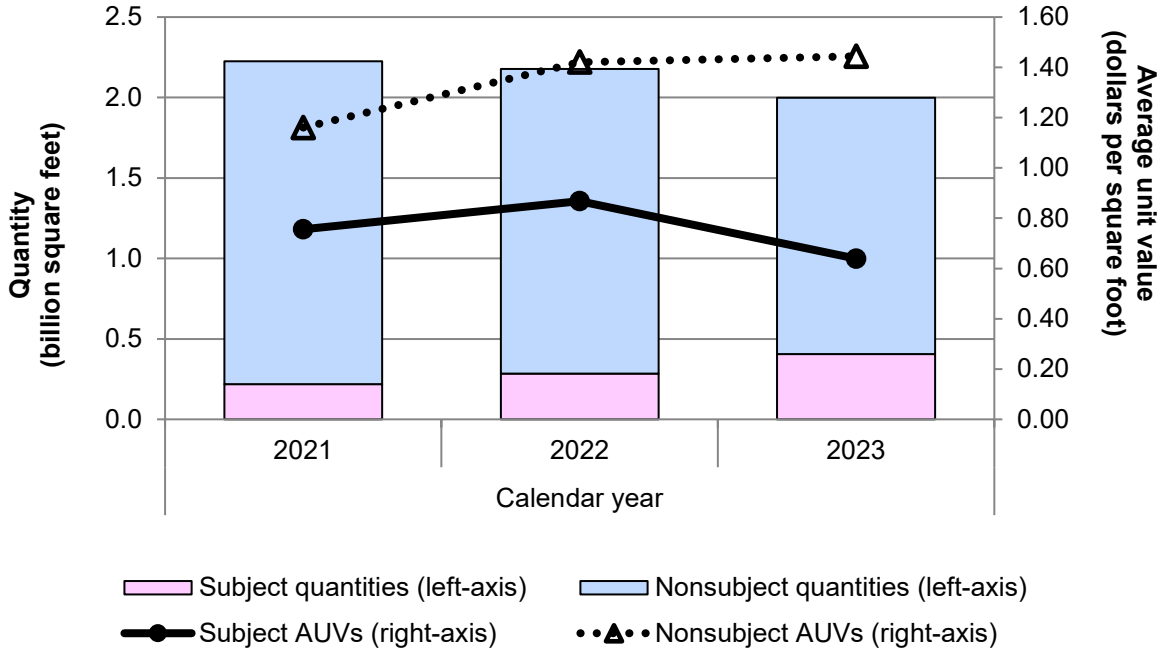
Quantity in 1,000 of square feet; value in 1,000 dollars; unit value in dollars per square foot; share and ratio in percent

Source	Measure	2021	2022	2023
India	Quantity	217,789	283,935	404,927
Nonsubject sources	Quantity	2,007,374	1,894,205	1,594,591
All import sources	Quantity	2,225,163	2,178,139	1,999,518
India	Value	164,529	246,382	258,805
Nonsubject sources	Value	2,329,927	2,690,617	2,302,423
All import sources	Value	2,494,457	2,936,999	2,561,228
India	Unit value	0.76	0.87	0.64
Nonsubject sources	Unit value	1.16	1.42	1.44
All import sources	Unit value	1.12	1.35	1.28
India	Share of quantity	9.8	13.0	20.3
Nonsubject sources	Share of quantity	90.2	87.0	79.7
All import sources	Share of quantity	100.0	100.0	100.0
India	Share of value	6.6	8.4	10.1
Nonsubject sources	Share of value	93.4	91.6	89.9
All import sources	Share of value	100.0	100.0	100.0
India	Ratio	24.4	31.7	46.6
Nonsubject sources	Ratio	225.2	211.4	183.5
All import sources	Ratio	249.6	243.1	230.1

Source: Compiled from official U.S. import statistics of the U.S. Department of Commerce Census Bureau using statistical reporting numbers 6907.21.1005, 6907.21.1011, 6907.21.1051, 6907.21.2000, 6907.21.3000, 6907.21.4000, 6907.21.9011, 6907.21.9051, 6907.22.1005, 6907.22.1011, 6907.22.1051, 6907.22.2000, 6907.22.3000, 6907.22.4000, 6907.22.9011, 6907.22.9051, 6907.23.1005, 6907.23.1011, 6907.23.1051, 6907.23.2000, 6907.23.3000, 6907.23.4000, 6907.23.9011, 6907.23.9051, 6907.30.1005, 6907.30.1011, 6907.30.1051, 6907.30.2000, 6907.30.3000, 6907.30.4000, 6907.30.9011, 6907.30.9051, 6907.40.1005, 6907.40.1011, 6907.40.1051, 6907.40.2000, 6907.40.3000, 6907.40.4000, 6907.40.9011, and 6907.40.9051, accessed May 7, 2024. Imports are based on the imports for consumption data series. Value data reflect landed duty-paid values.

Note: Shares and ratios shown as "0.0" represent values greater than zero, but less than "0.05" percent. Zeroes, null values, and undefined calculations are suppressed and shown as "---".

Figure IV-1
Ceramic tile: U.S. import quantities and average unit values, by source and period



Source: Compiled from official U.S. import statistics of the U.S. Department of Commerce Census Bureau using statistical reporting numbers 6907.21.1005, 6907.21.1011, 6907.21.1051, 6907.21.2000, 6907.21.3000, 6907.21.4000, 6907.21.9011, 6907.21.9051, 6907.22.1005, 6907.22.1011, 6907.22.1051, 6907.22.2000, 6907.22.3000, 6907.22.4000, 6907.22.9011, 6907.22.9051, 6907.23.1005, 6907.23.1011, 6907.23.1051, 6907.23.2000, 6907.23.3000, 6907.23.4000, 6907.23.9011, 6907.23.9051, 6907.30.1005, 6907.30.1011, 6907.30.1051, 6907.30.2000, 6907.30.3000, 6907.30.4000, 6907.30.9011, 6907.30.9051, 6907.40.1005, 6907.40.1011, 6907.40.1051, 6907.40.2000, 6907.40.3000, 6907.40.4000, 6907.40.9011, and 6907.40.9051, accessed May 7, 2024. Imports are based on the imports for consumption data series. Value data reflect landed duty-paid values.

Table IV-3 presents data for U.S. imports of ceramic tile from nonsubject sources including the largest nonsubject countries, Spain, Mexico, Italy, and Brazil. Spain was the largest nonsubject source of ceramic tile imports during the years 2021 and 2023.

Table IV-3
Ceramic tile: U.S. imports from nonsubject sources, by source and period

Quantity in 1,000 of square feet; share and in percent

Source	Measure	2021	2022	2023
Spain	Quantity	492,915	431,283	348,526
Mexico	Quantity	359,469	362,899	334,866
Italy	Quantity	387,700	376,708	299,670
Brazil	Quantity	236,634	226,071	184,777
Turkey	Quantity	299,041	266,530	173,054
Vietnam	Quantity	31,370	40,391	77,253
Peru	Quantity	37,046	28,800	35,761
Malaysia	Quantity	31,011	40,973	32,165
Colombia	Quantity	13,033	17,201	28,592
Thailand	Quantity	18,414	17,967	19,543
All other sources	Quantity	100,741	85,380	60,383
Nonsubject sources	Quantity	2,007,374	1,894,205	1,594,591
Spain	Share	22.2	19.8	17.4
Mexico	Share	16.2	16.7	16.7
Italy	Share	17.4	17.3	15.0
Brazil	Share	10.6	10.4	9.2
Turkey	Share	13.4	12.2	8.7
Vietnam	Share	1.4	1.9	3.9
Peru	Share	1.7	1.3	1.8
Malaysia	Share	1.4	1.9	1.6
Colombia	Share	0.6	0.8	1.4
Thailand	Share	0.8	0.8	1.0
All other sources	Share	4.5	3.9	3.0
Nonsubject sources	Share	90.2	87.0	79.7

Source: Compiled from official U.S. import statistics of the U.S. Department of Commerce Census Bureau using statistical reporting numbers 6907.21.1005, 6907.21.1011, 6907.21.1051, 6907.21.2000, 6907.21.3000, 6907.21.4000, 6907.21.9011, 6907.21.9051, 6907.22.1005, 6907.22.1011, 6907.22.1051, 6907.22.2000, 6907.22.3000, 6907.22.4000, 6907.22.9011, 6907.22.9051, 6907.23.1005, 6907.23.1011, 6907.23.1051, 6907.23.2000, 6907.23.3000, 6907.23.4000, 6907.23.9011, 6907.23.9051, 6907.30.1005, 6907.30.1011, 6907.30.1051, 6907.30.2000, 6907.30.3000, 6907.30.4000, 6907.30.9011, 6907.30.9051, 6907.40.1005, 6907.40.1011, 6907.40.1051, 6907.40.2000, 6907.40.3000, 6907.40.4000, 6907.40.9011, and 6907.40.9051, accessed May 7, 2024. Imports are based on the imports for consumption data series. Value data reflect landed duty-paid values.

Note: Shares and ratios shown as "0.0" represent values greater than zero, but less than "0.05" percent. Zeroes, null values, and undefined calculations are suppressed and shown as “---“.

Table IV-4 presents data for U.S. producers' and/or their affiliates, U.S. imports, by source and period.

Table IV-4
Ceramic tile: U.S. producers' and/or affiliates' U.S. imports, by source and period

Quantity in 1,000 of square feet; ratio in percent

Source	Measure	2021	2022	2023
India	Quantity	***	***	***
Nonsubject sources	Quantity	***	***	***
All import sources	Quantity	***	***	***
India	Ratio	***	***	***
Nonsubject sources	Ratio	***	***	***
All import sources	Ratio	***	***	***

Source: Compiled from data submitted in response to Commission questionnaires.

Note: Shares and ratios shown as "0.0" represent values greater than zero, but less than "0.05" percent. Zeroes, null values, and undefined calculations are suppressed and shown as "---". Ratio calculated as the quantity controlled by U.S. producers based on questionnaire data relative to U.S. imports statistics as shown in table IV-2.

Tables IV-5 and IV-6 presents U.S. importers' U.S. shipments by water permeability and source. In 2023, porcelain tile comprised *** percent, non-porcelain tile comprised *** percent of U.S. shipments from India, by quantity. During the same year, porcelain tile comprised *** percent, non-porcelain tile comprised *** percent of U.S. shipments from nonsubject sources, by quantity.

Table IV-5
Ceramic tile: U.S. importers' U.S. shipments from India, by water permeability, 2023

Quantity in 1,000 of square feet; share in percent

Water permeability	Quantity	Share
Porcelain	***	***
Non-porcelain	***	***
All water permeabilities	***	100.0

Source: Compiled from data submitted in response to Commission questionnaires.

Table IV-6
Ceramic tile: U.S. importers' U.S. shipments from nonsubject, by water permeability, 2023

Quantity in 1,000 of square feet; share in percent

Water permeability	Quantity	Share
Porcelain	***	***
Non-porcelain	***	***
All water permeabilities	***	100.0

Source: Compiled from data submitted in response to Commission questionnaires.

Tables IV-7 and IV-8 present information on U.S. importers' U.S. shipments by use, and product type. In 2023, non-mosaic tiles comprised *** percent of U.S. shipments from India and *** percent of U.S. shipments from nonsubject sources, by quantity. In 2023, mosaic tiles comprised the remaining *** percent of U.S. shipments of imports from India and *** percent of U.S. shipments of imports from nonsubject sources, by quantity. In 2023, floor tiles comprised *** percent of U.S. shipments of imports from India and *** percent of U.S. shipments of imports from nonsubject sources, by quantity. In 2023, wall tiles comprised the *** percent of U.S. shipments from India and *** percent of U.S. shipments from nonsubject sources, by quantity.

Table IV-7
Ceramic tile: U.S. importers' U.S. shipments from India, by use and type, 2023

Quantity in 1,000 of square feet; share in percent

Use	Measure	Non-mosaic large	Non-mosaic medium and small	Mosaic	All types
Floor	Quantity	***	***	***	***
Wall	Quantity	***	***	***	***
All other uses	Quantity	***	***	***	***
All uses	Quantity	***	***	***	***
Floor	Share across	***	***	***	100.0
Wall	Share across	***	***	***	100.0
All other uses	Share across	***	***	***	---
All uses	Share across	***	***	***	100.0
Floor	Share down	***	***	***	***
Wall	Share down	***	***	***	***
All other uses	Share down	***	***	***	***
All uses	Share down	100.0	100.0	100.0	100.0
Floor	Share across and down	***	***	***	***
Wall	Share across and down	***	***	***	***
All other uses	Share across and down	***	***	***	***
All uses	Share across and down	***	***	***	100.0

Source: Compiled from data submitted in response to Commission questionnaires.

Note: Shares and ratios shown as "0.0" represent values greater than zero, but less than "0.05" percent. Zeroes, null values, and undefined calculations are suppressed and shown as "---".

Table IV-8
Ceramic tile: U.S. importers' U.S. shipments from nonsubject, by use and type, 2023

Quantity in 1,000 of square feet; share in percent

Use	Measure	Non-mosaic large	Non-mosaic medium and small	Mosaic	All types
Floor	Quantity	***	***	***	***
Wall	Quantity	***	***	***	***
All other uses	Quantity	***	***	***	***
All uses	Quantity	***	***	***	***
Floor	Share across	***	***	***	100.0
Wall	Share across	***	***	***	100.0
All other uses	Share across	***	***	***	100.0
All uses	Share across	***	***	***	100.0
Floor	Share down	***	***	***	***
Wall	Share down	***	***	***	***
All other uses	Share down	***	***	***	***
All uses	Share down	100.0	100.0	100.0	100.0
Floor	Share across and down	***	***	***	***
Wall	Share across and down	***	***	***	***
All other uses	Share across and down	***	***	***	***
All uses	Share across and down	***	***	***	100.0

Source: Compiled from data submitted in response to Commission questionnaires.

Note: Shares and ratios shown as "0.0" represent values greater than zero, but less than "0.05" percent. Zeroes, null values, and undefined calculations are suppressed and shown as "---".

Negligibility

The statute requires that an investigation be terminated without an injury determination if imports of the subject merchandise are found to be negligible.[4] Negligible imports are generally defined in the Act, as amended, as imports from a country of merchandise corresponding to a domestic like product where such imports account for less than 3 percent of the volume of all such merchandise imported into the United States in the most recent 12-month period for which data are available that precedes the filing of the petition or the initiation of the investigation. However, if there are imports of such merchandise from a number of countries subject to investigations initiated on the same day that individually account for less than 3 percent of the total volume of the subject merchandise, and if the

[4] Sections 703(a)(1), 705(b)(1), 733(a)(1), and 735(b)(1) of the Act (19 U.S.C. §§ 1671b(a)(1), 1671d(b)(1), 1673b(a)(1), and 1673d(b)(1)).

imports from those countries collectively account for more than 7 percent of the volume of all such merchandise imported into the United States during the applicable 12-month period, then imports from such countries are deemed not to be negligible.[5] Imports from India accounted for 21.0 percent of total imports of ceramic tile by quantity during April 2023 through March 2024.

Table IV-9
Ceramic tile: U.S. imports in the twelve-month period preceding the filing of the petition, April 2023 through March 2024

Quantity in 1,000 of square feet; share in percent

Source of imports	Quantity	Share of quantity
India	407,976	21.0
Nonsubject sources	1,536,268	79.0
All import sources	1,944,245	100.0

Source: Compiled from official U.S. import statistics of the U.S. Department of Commerce Census Bureau using statistical reporting numbers 6907.21.1005, 6907.21.1011, 6907.21.1051, 6907.21.2000, 6907.21.3000, 6907.21.4000, 6907.21.9011, 6907.21.9051, 6907.22.1005, 6907.22.1011, 6907.22.1051, 6907.22.2000, 6907.22.3000, 6907.22.4000, 6907.22.9011, 6907.22.9051, 6907.23.1005, 6907.23.1011, 6907.23.1051, 6907.23.2000, 6907.23.3000, 6907.23.4000, 6907.23.9011, 6907.23.9051, 6907.30.1005, 6907.30.1011, 6907.30.1051, 6907.30.2000, 6907.30.3000, 6907.30.4000, 6907.30.9011, 6907.30.9051, 6907.40.1005, 6907.40.1011, 6907.40.1051, 6907.40.2000, 6907.40.3000, 6907.40.4000, 6907.40.9011, and 6907.40.9051, accessed May 7, 2024. Imports are based on the imports for consumption data series.

Note: Shares and ratios shown as "0.0" represent values greater than zero, but less than "0.05" percent. Zeroes, null values, and undefined calculations are suppressed and shown as "---".

Apparent U.S. consumption and market shares

Quantity

Table IV-10 and figure IV-2 present data on apparent U.S. consumption and U.S. market shares by quantity for ceramic tile. Apparent U.S. consumption decreased year to year between 2021 and 2023, ending 9.0 percent lower. The decrease in apparent U.S. consumption between 2021 and 2023 reflects the decreases in U.S. producers' U.S. shipments and U.S. shipments of imports from nonsubject sources.[6]

During 2021-23, U.S. producers' market share increased by 0.9 percentage points. While the market share of U.S. shipments of imports from India was the smallest of the three sources,

[5] Section 771 (24) of the Act (19 U.S.C § 1677(24)).

[6] U.S. producers' U.S. shipments, which increased slightly in 2022, ended *** percent lower in 2023 than in 2021, while imports from nonsubject sources decreased each year, ending *** percent lower in 2023 than in 2021. During the same period U.S. imports from India increased each year, ending *** percent higher in 2023 than in 2021.

it increased by 7.4 percentage points from 2021 to 2023. The market share of U.S. shipments of imports from nonsubject sources decreased by 8.3 percentage points from 2021 to 2023.

Table IV-10
Ceramic tile: Apparent U.S. consumption and market shares based on quantity, by source and period

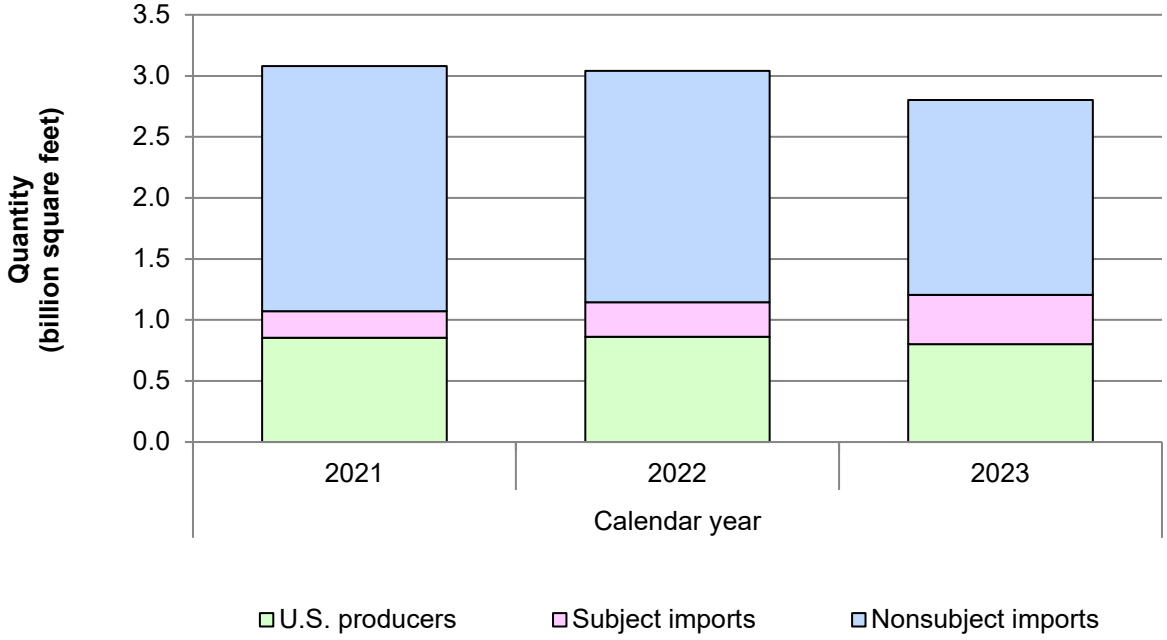
Quantity in 1,000 of square feet; shares in percent

Source	Measure	2021	2022	2023
U.S. producers	Quantity	854,822	861,750	801,735
India	Quantity	217,789	283,935	404,927
Nonsubject sources	Quantity	2,007,374	1,894,205	1,594,591
All import sources	Quantity	2,225,163	2,178,139	1,999,518
All sources	Quantity	3,079,985	3,039,889	2,801,253
U.S. producers	Share	27.8	28.3	28.6
India	Share	7.1	9.3	14.5
Nonsubject sources	Share	65.2	62.3	56.9
All import sources	Share	72.2	71.7	71.4
All sources	Share	100.0	100.0	100.0

Source: Compiled from official U.S. import statistics of the U.S. Department of Commerce Census Bureau using statistical reporting numbers 6907.21.1005, 6907.21.1011, 6907.21.1051, 6907.21.2000, 6907.21.3000, 6907.21.4000, 6907.21.9011, 6907.21.9051, 6907.22.1005, 6907.22.1011, 6907.22.1051, 6907.22.2000, 6907.22.3000, 6907.22.4000, 6907.22.9011, 6907.22.9051, 6907.23.1005, 6907.23.1011, 6907.23.1051, 6907.23.2000, 6907.23.3000, 6907.23.4000, 6907.23.9011, 6907.23.9051, 6907.30.1005, 6907.30.1011, 6907.30.1051, 6907.30.2000, 6907.30.3000, 6907.30.4000, 6907.30.9011, 6907.30.9051, 6907.40.1005, 6907.40.1011, 6907.40.1051, 6907.40.2000, 6907.40.3000, 6907.40.4000, 6907.40.9011, and 6907.40.9051, accessed May 7, 2024. Imports are based on the imports for consumption data series.

Note: Shares and ratios shown as "0.0" represent values greater than zero, but less than "0.05" percent. Zeroes, null values, and undefined calculations are suppressed and shown as “---“.

Figure IV-2
Ceramic tile: Apparent U.S. consumption based on quantity, by source and period



Source: Compiled from official U.S. import statistics of the U.S. Department of Commerce Census Bureau using statistical reporting numbers 6907.21.1005, 6907.21.1011, 6907.21.1051, 6907.21.2000, 6907.21.3000, 6907.21.4000, 6907.21.9011, 6907.21.9051, 6907.22.1005, 6907.22.1011, 6907.22.1051, 6907.22.2000, 6907.22.3000, 6907.22.4000, 6907.22.9011, 6907.22.9051, 6907.23.1005, 6907.23.1011, 6907.23.1051, 6907.23.2000, 6907.23.3000, 6907.23.4000, 6907.23.9011, 6907.23.9051, 6907.30.1005, 6907.30.1011, 6907.30.1051, 6907.30.2000, 6907.30.3000, 6907.30.4000, 6907.30.9011, 6907.30.9051, 6907.40.1005, 6907.40.1011, 6907.40.1051, 6907.40.2000, 6907.40.3000, 6907.40.4000, 6907.40.9011, and 6907.40.9051, accessed May 7, 2024. Imports are based on the imports for consumption data series.

Value

Table IV-11 and figure IV-3 present data on apparent U.S. consumption and U.S. market shares by value for ceramic tile. Apparent U.S. consumption, by value, fluctuated year to year between 2021 and 2023, increasing from 2021 to 2022 then decreasing more noticeably from 2022 to 2023, ending 4.4 percent lower. The year-to-year fluctuation in the value of apparent consumption largely reflects the changes in U.S. producers' U.S. shipments and U.S. shipments of imports from nonsubject sources.

During 2021-23, U.S. producers' market share increased by 1.1 percentage points. The market share of U.S. shipments of imports from India increased by 2.2 percentage points from 2021 to 2023. The market share of U.S. shipments of imports from nonsubject sources decreased by 3.3 percentage points from 2021 to 2023.

Table IV-11
Ceramic tile: Apparent U.S. consumption and market shares based on value, by source and period

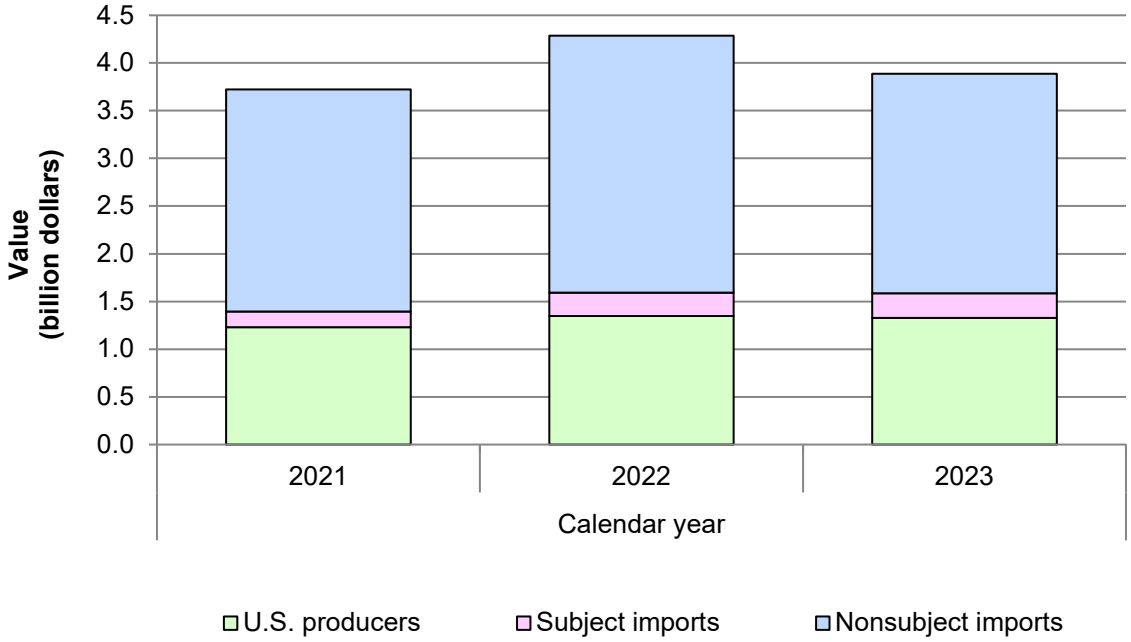
Value in 1,000 dollars; shares in percent

Source	Measure	2021	2022	2023
U.S. producers	Value	1,229,590	1,347,628	1,325,877
India	Value	164,529	246,382	258,805
Nonsubject sources	Value	2,329,927	2,690,617	2,302,423
All import sources	Value	2,494,457	2,936,999	2,561,228
All sources	Value	3,724,047	4,284,627	3,887,105
U.S. producers	Share	33.0	31.5	34.1
India	Share	4.4	5.8	6.7
Nonsubject sources	Share	62.6	62.8	59.2
All import sources	Share	67.0	68.5	65.9
All sources	Share	100.0	100.0	100.0

Source: Compiled from official U.S. import statistics of the U.S. Department of Commerce Census Bureau using statistical reporting numbers 6907.21.1005, 6907.21.1011, 6907.21.1051, 6907.21.2000, 6907.21.3000, 6907.21.4000, 6907.21.9011, 6907.21.9051, 6907.22.1005, 6907.22.1011, 6907.22.1051, 6907.22.2000, 6907.22.3000, 6907.22.4000, 6907.22.9011, 6907.22.9051, 6907.23.1005, 6907.23.1011, 6907.23.1051, 6907.23.2000, 6907.23.3000, 6907.23.4000, 6907.23.9011, 6907.23.9051, 6907.30.1005, 6907.30.1011, 6907.30.1051, 6907.30.2000, 6907.30.3000, 6907.30.4000, 6907.30.9011, 6907.30.9051, 6907.40.1005, 6907.40.1011, 6907.40.1051, 6907.40.2000, 6907.40.3000, 6907.40.4000, 6907.40.9011, and 6907.40.9051, accessed May 7, 2024. Imports are based on the imports for consumption data series. Value data reflect landed duty-paid values.

Note: Shares and ratios shown as "0.0" represent values greater than zero, but less than "0.05" percent. Zeroes, null values, and undefined calculations are suppressed and shown as “---“.

Figure IV-3
Ceramic tile: Apparent U.S. consumption based on value, by source and period



Source: Compiled from official U.S. import statistics of the U.S. Department of Commerce Census Bureau using statistical reporting numbers 6907.21.1005, 6907.21.1011, 6907.21.1051, 6907.21.2000, 6907.21.3000, 6907.21.4000, 6907.21.9011, 6907.21.9051, 6907.22.1005, 6907.22.1011, 6907.22.1051, 6907.22.2000, 6907.22.3000, 6907.22.4000, 6907.22.9011, 6907.22.9051, 6907.23.1005, 6907.23.1011, 6907.23.1051, 6907.23.2000, 6907.23.3000, 6907.23.4000, 6907.23.9011, 6907.23.9051, 6907.30.1005, 6907.30.1011, 6907.30.1051, 6907.30.2000, 6907.30.3000, 6907.30.4000, 6907.30.9011, 6907.30.9051, 6907.40.1005, 6907.40.1011, 6907.40.1051, 6907.40.2000, 6907.40.3000, 6907.40.4000, 6907.40.9011, and 6907.40.9051, accessed May 7, 2024. Imports are based on the imports for consumption data series.

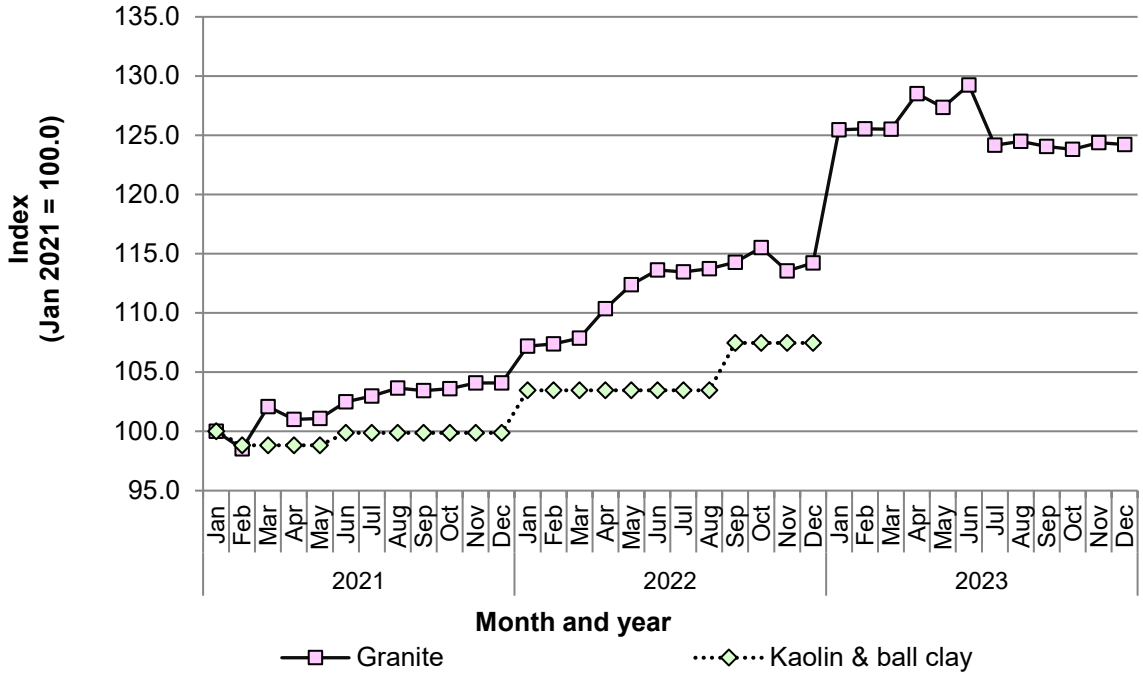
Part V: Pricing data

Factors affecting prices

Raw material costs

All ceramic tile is made from a mixture of the same inputs: primarily clay, minerals, sand, feldspar, and other raw materials.[1] Among the various types of clays, kaolin and ball clay are the predominant types used in ceramic tile production; the production of tile also uses silicate mineral additives such as feldspar, nepheline, granite, pyrophyllite, wollastonite, and talc.[2] The producer price index for kaolin and ball clay increased by 7.5 percent between January 2021 and December 2022 (the last available data), and the index for crushed granite (a quartz-rich igneous rock) rose between January 2021 and December 2023 by 24.2 percent (figure V-1 and tables V-1 and V-2).

Figure V-1
Raw materials: Crushed & broken granite and kaolin & ball clay price indices, January 2021-December 2023



Source: U.S. Bureau of Labor Statistics, Producer Price Index by Industry: Crushed and Broken Granite Mining (PCU212313212313) and Kaolin and Ball Clay Mining: Primary Products (PCU212324212324P), retrieved from FRED, Federal Reserve Bank of St. Louis; https://fred.stlouisfed.org/series/, May 16, 2024.

[1] Petitioner postconference brief, p. 7.
[2] China publication, p. V-1.

Table V-1
Raw materials: Monthly crushed and broken granite mining price index, not seasonally adjusted, January 2021 to December 2023

Index in percent; January 2021=100.0

Month	2021	2022	2023
January	100.0	107.2	125.5
February	98.5	107.4	125.5
March	102.1	107.9	125.5
April	101.0	110.4	128.5
May	101.1	112.4	127.4
June	102.5	113.6	129.2
July	103.0	113.5	124.2
August	103.7	113.7	124.5
September	103.4	114.3	124.0
October	103.6	115.5	123.8
November	104.1	113.6	124.4
December	104.1	114.2	124.2

Source: U.S. Bureau of Labor Statistics, Producer Price Index by Industry: Crushed and Broken Granite Mining (PCU212313212313), retrieved from FRED, Federal Reserve Bank of St. Louis; https://fred.stlouisfed.org/series/, May 16, 2024.

Table V-2
Raw materials: Monthly kaolin and ball clay mining price index, not seasonally adjusted, January 2021 to December 2022

Index in percent; January 2021=100.0

Month	2021	2022
January	100.0	103.5
February	98.8	103.5
March	98.8	103.5
April	98.8	103.5
May	98.8	103.5
June	99.9	103.5
July	99.9	103.5
August	99.9	103.5
September	99.9	107.5
October	99.9	107.5
November	99.9	107.5
December	99.9	107.5

Source: U.S. Bureau of Labor Statistics, Producer Price Index by Industry: Kaolin and Ball Clay Mining: Primary Products (PCU212324212324P), retrieved from FRED, Federal Reserve Bank of St. Louis; https://fred.stlouisfed.org/series/, May 16, 2024.

According to Petitioner, domestic manufacturers have some of the best quality raw materials available locally, because of the positioning of the production facilities, and that U.S. producers are able to minimize the transportation costs of these raw materials, although rising

inflation and transportation costs have impacted the overall costs of these raw materials.[3] Also, while most raw material for ceramic tile is sourced domestically, glazes for the ceramic tiles are mostly imported.[4]

Transportation costs to the U.S. market

Transportation costs for ceramic tile shipped from India to the United States averaged 19.8 percent of landed duty-paid values during 2023. This estimate was derived from official import data and represent the transportation and other charges on imports.[5]

U.S. inland transportation costs

Over half of responding U.S. producers (6 of 10) reported that their customers typically arrange for transportation and over half of responding importers (9 of 16) reported that their firm typically arranges for transportation.[6] Most U.S. producers reported that their U.S. inland transportation costs ranged from 9.0 to 30.0 percent while most importers reported costs of 3.0 to 7.0 percent.

Pricing practices

Pricing methods

U.S. producers and importers reported setting prices using transaction-by-transaction negotiations, contracts, and price lists (table V-3). U.S. producer *** reported that it has different price lists for different customer categories.

[3] Conference transcript, pp. 54, 60 (Caselli).

[4] Conference transcript, p. 60 (Caselli).

[5] The estimated transportation costs were obtained by subtracting the customs value from the c.i.f. value of the imports for 2023 and then dividing by the customs value based on the HTS statistical reporting number 6907.10.0000, 6907.21.1005, 6907.21.1011, 6907.21.1051, 6907.21.2000, 6907.21.3000, 6907.21.4000, 6907.21.9011, 6907.21.9051, 6907.22.1005, 6907.22.1011, 6907.22.1051, 6907.22.2000, 6907.22.3000, 6907.22.4000, 6907.22.9011, 6907.22.9051, 6907.23.1005, 6907.23.1011, 6907.23.1051, 6907.23.2000, 6907.23.3000, 6907.23.4000, 6907.23.9011, 6907.23.9051, 6907.30.1005, 6907.30.1011, 6907.30.1051, 6907.30.2000, 6907.30.3000, 6907.30.4000, 6907.30.9011, 6907.30.9051, 6907.40.1005, 6907.40.1011, 6907.40.1051, 6907.40.2000, 6907.40.3000, 6907.40.4000, 6907.40.9011, 6907.40.9051, 6907.90.0011, 6907.90.0051, 6908.10.1000, 6908.10.2000, 6908.10.5000, 6908.90.0011, and 6908.90.0051.

[6] Ceramic tiles are normally transported by truck but occasionally may be transmitted intermodally including trains. Conference transcript, p. 41 (Caselli).

Table V-3
Ceramic tile: Count of U.S. producers' and importers' reported price setting methods

Method	U.S. producers	U.S. importers
Transaction-by-transaction	6	9
Contract	4	5
Set price list	9	11
Other	0	1
Responding firms	10	17

Source: Compiled from data submitted in response to Commission questionnaires.

Note: The sum of responses down may not add up to the total number of responding firms as each firm was instructed to check all applicable price setting methods employed.

U.S. producers reported that approximately two-thirds of their ceramic tile is sold on the spot market, with most of the remaining sales being through long-term and annual contracts, in 2023. Subject importers reported selling three-quarters of their ceramic tile in the spot market, with most of the remaining being sold through long-term contracts (table V-4).

Table V-4
Ceramic tile: U.S. producers' and importers' shares of commercial U.S. shipments by type of sale, 2023

Share in percent

Sale type	U.S. producers	Subject U.S. importers
Long-term contracts	13.6	21.3
Annual contract	14.6	---
Short-term contracts	7.3	2.7
Spot sales	64.5	76.0
All sales types	100.0	100.0

Source: Compiled from data submitted in response to Commission questionnaires.

Note: Because of rounding, figures may not add to the totals shown.

U.S. producers reported that short-term contracts generally last between 45 and 180 days, and long-term contracts would range from two to three years. Most responding U.S. producers reported that price and quantity are both fixed in short-term contracts, and price is fixed for annual and long-term contracts. All responding U.S. producers reported that prices are not indexed to raw materials. *** reported that *** long-term contracts fix price but allow for price renegotiation and contract prices are not fixed to raw materials.

Sales terms and discounts

U.S. producers and importers typically quote prices on an f.o.b. basis. U.S. producers reported offering quantity, total volume, and other discounts, including discretionary, and

customer-specific discounts. Importers also reported offering quantity, total volume, and other discounts, including price matching and customer-specific discounts. One U.S. producer and five importers reported that they have no discount policy.

Price data

The Commission requested U.S. producers and importers to provide quarterly data for the total quantity and f.o.b. value of the following ceramic tile products shipped to unrelated U.S. customers during January 2021-December 2023.

Product 1.--Porcelain tile, rectangular, 6”–8” in width by 24”–36” in length (excluding mosaic ceramic tile and finishing ceramic tile), sold to home centers

Product 2.--Porcelain tile, rectangular, 12” in width by 24” in length (excluding mosaic ceramic tile and finishing ceramic tile), sold to regional distributors/floor covering wholesalers

Product 3.--Non-porcelain ceramic tile, square or rectangular, 3”–6” in width by 6”–12” in length (excluding mosaic ceramic tile and finishing ceramic tile), sold to other retailer (e.g. manufacturer-owned stores, importer-owned stores, kitchen/bath/flooring stores)

Product 4.—Porcelain tile, square or rectangular, 24”-48” in width by 24”-48” in length (excluding mosaic ceramic tile and finishing ceramic tile), sold to distributors

All 10 responding U.S. producers and 7 importers provided usable pricing data for sales of the requested products, although not all firms reported pricing for all products for all quarters.[7] [8] Pricing data reported by these firms accounted for approximately 32.8 percent of U.S. producers’ U.S. shipments of ceramic tile and 5.9 percent of U.S. shipments of subject imports from India in 2023.[9]

Price data for products 1-4 are presented in tables V-5 to V-8 and figures V-2 to V-5.

[7] Per-unit pricing data are calculated from total quantity and total value data provided by U.S. producers and importers. The precision and variation of these figures may be affected by rounding, limited quantities, and producer or importer estimates.

[8] Staff excluded price data reported by importer *** that was erroneously reported for the firm’s internal consumption.

[9] Pricing coverage is based on U.S. shipments reported in questionnaires.

Table V-5
Ceramic tile: Weighted-average f.o.b. prices and quantities of domestic and imported product 1 and margins of underselling/(overselling), by source and quarter

Price in dollars per square foot, quantity in 1,000 square feet, margin in percent.

Period	U.S. price	U.S. quantity	India price	India quantity	India margin
2021 Q1	***	***	***	***	***
2021 Q2	***	***	***	***	***
2021 Q3	***	***	***	***	***
2021 Q4	***	***	***	***	***
2022 Q1	***	***	***	***	***
2022 Q2	***	***	***	***	***
2022 Q3	***	***	***	***	***
2022 Q4	***	***	***	***	***
2023 Q1	***	***	***	***	***
2023 Q2	***	***	***	***	***
2023 Q3	***	***	***	***	***
2023 Q4	***	***	***	***	***

Source: Compiled from data submitted in response to Commission questionnaires.

Note: Product 1: Porcelain tile, rectangular, 6”–8” in width by 24”–36” in length (*excluding mosaic ceramic tile and finishing ceramic tile*), sold to home centers.

Table V-6
Ceramic tile: Weighted-average f.o.b. prices and quantities of domestic and imported product 2 and margins of underselling/(overselling), by source and quarter

Price in dollars per square foot, quantity in 1,000 square feet, margin in percent.

Period	U.S. price	U.S. quantity	India price	India quantity	India margin
2021 Q1	***	***	***	***	***
2021 Q2	***	***	***	***	***
2021 Q3	***	***	***	***	***
2021 Q4	***	***	***	***	***
2022 Q1	***	***	***	***	***
2022 Q2	***	***	***	***	***
2022 Q3	***	***	***	***	***
2022 Q4	***	***	***	***	***
2023 Q1	***	***	***	***	***
2023 Q2	***	***	***	***	***
2023 Q3	***	***	***	***	***
2023 Q4	***	***	***	***	***

Source: Compiled from data submitted in response to Commission questionnaires.

Note: Product 2: Porcelain tile, rectangular, 12” in width by 24” in length (excluding mosaic ceramic tile and finishing ceramic tile), sold to regional distributors/floor covering wholesalers

Table V-7
Ceramic tile: Weighted-average f.o.b. prices and quantities of domestic and imported product 3 and margins of underselling/(overselling), by source and quarter

Price in dollars per square foot, quantity in 1,000 square feet, margin in percent.

Period	U.S. price	U.S. quantity	India price	India quantity	India margin
2021 Q1	***	***	***	***	***
2021 Q2	***	***	***	***	***
2021 Q3	***	***	***	***	***
2021 Q4	***	***	***	***	***
2022 Q1	***	***	***	***	***
2022 Q2	***	***	***	***	***
2022 Q3	***	***	***	***	***
2022 Q4	***	***	***	***	***
2023 Q1	***	***	***	***	***
2023 Q2	***	***	***	***	***
2023 Q3	***	***	***	***	***
2023 Q4	***	***	***	***	***

Source: Compiled from data submitted in response to Commission questionnaires.

Note: Product 3: Non-porcelain ceramic tile, square or rectangular, 3”–6” in width by 6”–12” in length (*excluding mosaic ceramic tile and finishing ceramic tile*), sold to other retailer (e.g. manufacturer-owned stores, importer-owned stores, kitchen/bath/flooring stores)

Table V-8
Ceramic tile: Weighted-average f.o.b. prices and quantities of domestic and imported product 4 and margins of underselling/(overselling), by source and quarter

Price in dollars per square foot, quantity in 1,000 square feet, margin in percent.

Period	U.S. price	U.S. quantity	India price	India quantity	India margin
2021 Q1	***	***	***	***	***
2021 Q2	***	***	***	***	***
2021 Q3	***	***	***	***	***
2021 Q4	***	***	***	***	***
2022 Q1	***	***	***	***	***
2022 Q2	***	***	***	***	***
2022 Q3	***	***	***	***	***
2022 Q4	***	***	***	***	***
2023 Q1	***	***	***	***	***
2023 Q2	***	***	***	***	***
2023 Q3	***	***	***	***	***
2023 Q4	***	***	***	***	***

Source: Compiled from data submitted in response to Commission questionnaires.

Note: Product 4: Porcelain tile, square or rectangular, 24”-48” in width by 24”-48” in length (excluding mosaic ceramic tile and finishing ceramic tile), sold to distributors

Figure V-2
Ceramic tile: Weighted-average f.o.b. prices and quantities of domestic and imported product 1, by source and quarter

* * * * * * *

Source: Compiled from data submitted in response to Commission questionnaires.

Note: Product 1: Porcelain tile, rectangular, 6”–8” in width by 24”–36” in length (*excluding mosaic ceramic tile and finishing ceramic tile*), sold to home centers

Figure V-3
Ceramic tile: Weighted-average f.o.b. prices and quantities of domestic and imported product 2, by source and quarter

* * * * * * *

Source: Compiled from data submitted in response to Commission questionnaires.

Note: Product 2: Porcelain tile, rectangular, 12” in width by 24” in length (excluding mosaic ceramic tile and finishing ceramic tile), sold to regional distributors/floor covering wholesalers

Figure V-4
Ceramic tile: Weighted-average f.o.b. prices and quantities of domestic and imported product 3, by source and quarter

* * * * * * *

Source: Compiled from data submitted in response to Commission questionnaires.

Note: Product 3: Non-porcelain ceramic tile, square or rectangular, 3”–6” in width by 6”–12” in length (*excluding mosaic ceramic tile and finishing ceramic tile*), sold to other retailer (e.g. manufacturer-owned stores, importer-owned stores, kitchen/bath/flooring stores)

Figure V-5
Ceramic tile: Weighted-average f.o.b. prices and quantities of domestic and imported product 4, by source and quarter

* * * * * * *

Source: Compiled from data submitted in response to Commission questionnaires.

Note: Product 4: Porcelain tile, square or rectangular, 24”-48” in width by 24”-48” in length (excluding mosaic ceramic tile and finishing ceramic tile), sold to distributors

Price trends

In general, prices increased during January 2021-December 2023. Tables V-9 through V-11 and figures V-6 and V-7 summarize the price trends, by country and by product. As shown in the table, domestic price increases ranged from 0.9 to 23.5 percent during January 2021-December 2023 while import price increases ranged from 9.3 to 12.0 percent. Import prices for pricing product 1 from India decreased by 3.8 percent.

Table V-9
Ceramic tile: Summary of price data, by product and source, January 2021-December 2023

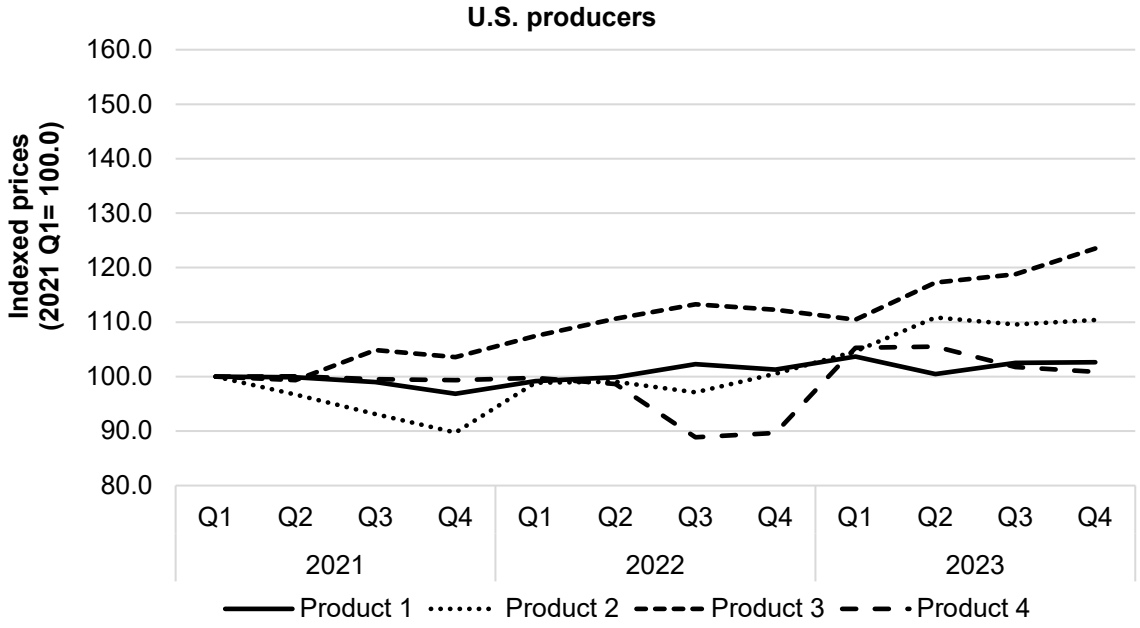
Quantity in 1,000 square feet, price in dollars per square foot

Product	Source	Number of quarters	Quantity	Low price	High price	First quarter price	Last quarter price	Change over period
Product 1	United States	***	***	***	***	***	***	***
Product 1	India	***	***	***	***	***	***	***
Product 2	United States	***	***	***	***	***	***	***
Product 2	India	***	***	***	***	***	***	***
Product 3	United States	***	***	***	***	***	***	***
Product 3	India	***	***	***	***	***	***	***
Product 4	United States	***	***	***	***	***	***	***
Product 4	India	***	***	***	***	***	***	***

Source: Compiled from data submitted in response to Commission questionnaires.

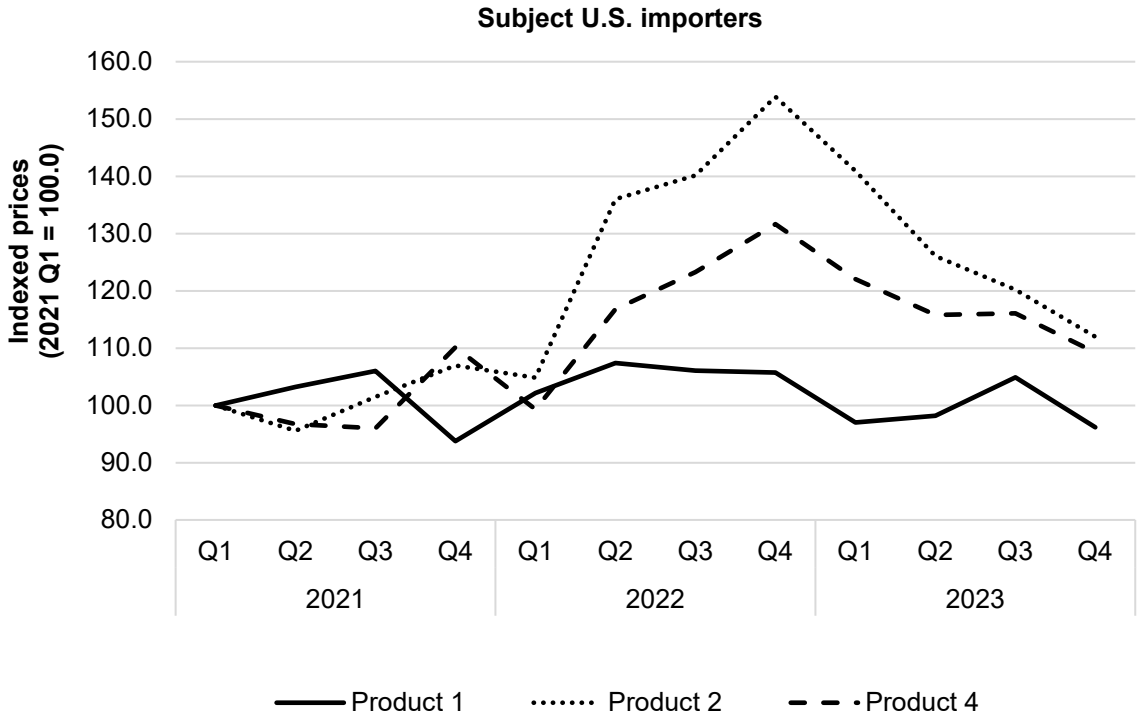
Note: Percent change column is percentage change from the first quarter 2021 to the last quarter of the data collection period.

Figure V-6
Ceramic tile: Indexed U.S. producer prices, by quarter



Source: Compiled from data submitted in response to Commission questionnaires.

Figure V-7
Ceramic tile: Indexed U.S. importer prices, by quarter



Source: Compiled from data submitted in response to Commission questionnaires.

Table V-10
Ceramic tile: Indexed U.S. producer prices, by quarter

Index in percent; 2021 Q1 = 100.0

Period	Product 1	Product 2	Product 3	Product 4
2021 Q1	100.0	100.0	100.0	100.0
2021 Q2	99.9	96.7	99.3	100.0
2021 Q3	99.0	93.1	104.9	99.5
2021 Q4	96.8	89.7	103.6	99.3
2022 Q1	99.2	98.9	107.4	99.7
2022 Q2	99.9	99.0	110.6	98.6
2022 Q3	102.3	97.1	113.3	88.9
2022 Q4	101.3	100.5	112.3	89.7
2023 Q1	103.7	104.7	110.5	105.3
2023 Q2	100.5	110.9	117.3	105.5
2023 Q3	102.5	109.6	118.8	101.7
2023 Q4	102.7	110.4	123.5	100.9

Source: Compiled from data submitted in response to Commission questionnaires.

Figure V-11
Ceramic tile: Indexed U.S. importer prices, by quarter

Index in percent; 2021 Q1 = 100.0

Period	Product 1	Product 2	Product 3	Product 4
2021 Q1	100.0	100.0	---	100.0
2021 Q2	103.2	95.6	---	96.7
2021 Q3	106.0	101.5	---	96.0
2021 Q4	93.8	106.9	---	110.1
2022 Q1	102.1	104.9	---	99.3
2022 Q2	107.4	136.0	---	116.8
2022 Q3	106.1	140.2	---	123.3
2022 Q4	105.7	153.9	---	131.6
2023 Q1	97.0	140.9	---	122.1
2023 Q2	98.2	126.0	---	115.8
2023 Q3	104.9	120.2	---	116.1
2023 Q4	96.2	112.0	---	109.3

Source: Compiled from data submitted in response to Commission questionnaires.

Price comparisons

As shown in table V-12, prices for product imported from India were below those for U.S.-produced product in 31 of 36 instances (30.7 million square feet); margins of underselling ranged from 2.2 to 38.8 percent. In the remaining 5 instances (4.9 million square feet), prices for product from India were between 1.1 and 14.9 percent above prices for the domestic product.

Table V-12
Ceramic tile: Instances of underselling and overselling and the range and average of margins, by product

Quantity in 1,000 square feet; margin in percent

Products	Type	Number of quarters	Quantity	Average margin	Min margin	Max margin
Product 1	Underselling	12	***	***	***	***
Product 2	Underselling	8	***	***	***	***
Product 3	Underselling	---	***	***	***	***
Product 4	Underselling	11	***	***	***	***
All products	Underselling	31	***	***	***	***
Product 1	Overselling	---	***	***	***	***
Product 2	Overselling	4	***	***	***	***
Product 3	Overselling	---	***	***	***	***
Product 4	Overselling	1	***	***	***	***
All products	Overselling	5	***	***	***	***

Source: Compiled from data submitted in response to Commission questionnaires.

Note: These data include only quarters in which there is a comparison between the U.S. and subject product.

Lost sales and lost revenue

The Commission requested that U.S. producers of ceramic tile report purchasers with which they experienced instances of lost sales or revenue due to competition from imports of ceramic tile from India during January 2021-December 2023. Of the 10 responding U.S. producers, 7 reported that they had to reduce prices and 4 had to roll back announced price increases. Nine of 10 firms reported that they had lost sales. Four U.S. producers (***) submitted lost sales and lost revenue allegations. The four U.S. producers identified 29 firms with which they lost sales or revenue (21 consisting lost sales allegations and 8 consisting of both lost sales and lost revenue allegations). All allegations of lost sales and lost revenue were made in 2022-23. Some allegations also included 2024.

Staff contacted 29 purchasers and received responses from 4 purchasers. Responding purchasers reported purchasing or importing *** square feet of ceramic tile during January 2021-December 2023 (table V-13).

During 2023, responding purchasers purchased *** percent from U.S. producers, purchased or imported *** percent from India, and *** percent from nonsubject countries. Purchasers were asked about changes in their purchasing patterns from different sources since 2021. Of the responding purchasers, three reported increased purchases from domestic producers and one reported decreased purchases from domestic producers. Explanations for increasing purchases of domestic product included additional tile capacity that

has become available due to U.S. producers' investment in new lines and equipment. Decreasing purchases of domestic product was attributed to domestic suppliers' manufacturing constraints. All four purchasers reported that they had increased purchases of ceramic tile imported from India, citing increased demand due to the COVID-19 pandemic, and an ability for India to supply unmet demand for tiles with specific finishes, such as polished tiles.

Table V-13
Ceramic tile: Purchasers' reported purchases and imports, by firm and source

Quantity in 1,000 square feet, share in percent

Firm	Domestic quantity	Subject quantity	All other quantity	Change in domestic share	Change in subject share
***	***	***	***	***	***
***	***	***	***	***	***
***	***	***	***	***	***
***	***	***	***	***	***
All firms	***	***	***	***	***

Source: Compiled from data submitted in response to Commission questionnaires.

Note: All other includes all other sources and unknown sources. Change is the percentage point change in the share of the firm's total purchases of domestic and/or subject country imports between first and last years.

Of the four responding purchasers, two reported that, since 2021, they had purchased imported ceramic tile from India instead of U.S.-produced product, and both purchasers reported that subject import prices were lower than U.S.-produced product. One purchaser, ***, reported that price was a primary reason for the decision to purchase imported product rather than U.S.-produced product, and estimated that it purchased *** square feet of subject imports instead of domestically produced ceramic tile (table V-14). The other purchaser, ***, reported purchasing subject ceramic tile for non-price reasons, including trend, quality, availability, production capacity, market brand preference, distribution network, service, innovation, compliance, reliability of supply, price/value, and limitations on domestic suppliers' manufacturing capacity.

Of the four responding purchasers, three reported that U.S. producers had not reduced prices in order to compete with lower-priced imports from India; one reported that it did not know.

Table V-14
Ceramic tile: Purchasers' responses to purchasing subject imports instead of domestic product, by firm

Quantity in 1,000 square feet

Firm	Purchased subject imports instead of domestic	Imports priced lower	Choice based on price	Quantity	Narrative on reasons for purchasing imports
***	***	***	***	***	***
***	***	***	***	***	***
***	***	***	***	***	***
***	***	***	***	***	***
All firms	Yes--2; No--2	Yes--2; No--0	Yes--1; No--1	***	

Source: Compiled from data submitted in response to Commission questionnaires.

Part VI: Financial experience of U.S. producers

Background[1]

Ten U.S. producers (AHF (Crossville Brand), American Wonder, Dal-Tile, Del Conca, Florida Tile, Florim, Ironrock, Landmark, Portobello and Stonepeak) provided usable financial results on their ceramic tile operations.[2] [3] *** U.S. producers reported financial data on a calendar year basis, and *** provided data on the basis of GAAP.[4] ***.[5]

Figure VI-1 presents each responding firm's share of the total reported net sales quantity in 2023.

[1] The following abbreviations are used in the tables and/or text of this section: generally accepted accounting principles ("GAAP"), fiscal year ("FY"), net sales ("NS"), cost of goods sold ("COGS"), selling, general, and administrative expenses ("SG&A expenses"), average unit values ("AUVs"), research and development expenses ("R&D expenses"), and return on assets ("ROA").

[2] ***. *** U.S. producer questionnaire response, section II-2a.

[3] ***. *** U.S. producer questionnaire response, section II-2a.

[4] ***. *** U.S. producers questionnaire, response section III-2.

[5] Dal-Tile is owned by Mohawk Industries Group and operates within the Global Ceramic business segment. The Global Ceramic business segment accounted for 39.0 percent of Mohawk's total revenue in 2023. Mohawk's 2023 Form 10-K report, p.3 (as filed).

Figure VI-1
Ceramic tile: U.S. producers' share of net sales quantity in 2023, by firm

* * * * * * *

Source: Compiled from data submitted in response to Commission questionnaires.

Operations on ceramic tile

Table VI-1 presents aggregated data on U.S. producers' operations in relation to ceramic tile, while table VI-2 presents corresponding changes in AUVs. Table VI-3 presents selected company-specific financial data.

Table VI-1
Ceramic tile: U.S. producers' results of operations, by item and period

Quantity in 1,000 of square feet; value in 1,000 dollars; ratios in percent

Item	Measure	2021	2022	2023
Total net sales	Quantity	866,230	876,772	816,288
Total net sales	Value	1,248,994	1,374,332	1,353,871
COGS: Raw materials	Value	255,560	304,938	305,052
COGS: Energy	Value	3,980	5,541	3,555
COGS: Direct labor	Value	111,203	122,123	131,525
COGS: Other factory	Value	390,455	404,542	427,892
COGS: Total	Value	829,222	926,385	929,458
Gross profit or (loss)	Value	419,772	447,947	424,413
SG&A expenses	Value	354,325	390,871	409,647
Operating income or (loss)	Value	65,447	57,076	14,766
Other expenses/(income), net	Value	14,408	13,611	32,422
Net income or (loss)	Value	51,039	43,465	(17,656)
Depreciation/amortization	Value	113,505	108,069	105,096
Cash flow	Value	164,544	151,534	87,440
COGS: Raw materials	Ratio to NS	20.5	22.2	22.5
COGS: Energy	Ratio to NS	5.8	6.9	4.8
COGS: Direct labor	Ratio to NS	8.9	8.9	9.7
COGS: Other factory	Ratio to NS	31.3	29.4	31.6
COGS: Total	Ratio to NS	66.4	67.4	68.7
Gross profit	Ratio to NS	33.6	32.6	31.3
SG&A expense	Ratio to NS	28.4	28.4	30.3
Operating income or (loss)	Ratio to NS	5.2	4.2	1.1
Net income or (loss)	Ratio to NS	4.1	3.2	(1.3)

Table continued.

Table VI-1 Continued
Ceramic tile: U.S. producers' results of operations, by item and period

Shares in percent; unit values in dollars per square foot; count in number of firms reporting

Item	Measure	2021	2022	2023
COGS: Raw materials	Share	30.8	32.9	32.8
COGS: Energy	Share	8.7	10.2	7.0
COGS: Direct labor	Share	13.4	13.2	14.2
COGS: Other factory	Share	47.1	43.7	46.0
COGS: Total	Share	100.0	100.0	100.0
Total net sales	Unit value	1.44	1.57	1.66
COGS: Raw materials	Unit value	0.30	0.35	0.37
COGS: Energy	Unit value	0.08	0.11	0.08
COGS: Direct labor	Unit value	0.13	0.14	0.16
COGS: Other factory	Unit value	0.45	0.46	0.52
COGS: Total	Unit value	0.96	1.06	1.14
Gross profit or (loss)	Unit value	0.48	0.51	0.52
SG&A expenses	Unit value	0.41	0.45	0.50
Operating income or (loss)	Unit value	0.08	0.07	0.02
Net income or (loss)	Unit value	0.06	0.05	(0.02)
Operating losses	Count	4	5	6
Net losses	Count	4	5	7
Data	Count	9	9	10

Source: Compiled from data submitted in response to Commission questionnaires.

Note: Shares represent the share of COGS. Shares and ratios shown as "0.0" represent values greater than zero, but less than "0.05" percent. Zeroes, null values, and undefined calculations are suppressed and shown as "---".

Table VI-2
Ceramic tile: Changes in AUVs between comparison periods

Changes in percent

Item	2021-23	2021-22	2022-23
Total net sales	▲15.0	▲8.7	▲5.8
COGS: Raw materials	▲26.7	▲17.9	▲7.4
COGS: Energy	▼(4.2)	▲30.1	▼(26.4)
COGS: Direct labor	▲25.5	▲8.5	▲15.7
COGS: Other factory	▲16.3	▲2.4	▲13.6
COGS: Total	▲18.9	▲10.4	▲7.8

Table continued.

Table VI-2 Continued
Ceramic tile: Changes in AUVs between comparison periods

Changes in dollars per square foot

Item	2021-23	2021-22	2022-23
Total net sales	▲0.22	▲0.13	▲0.09
COGS: Raw materials	▲0.08	▲0.05	▲0.03
COGS: Energy	▼(0.00)	▲0.02	▼(0.03)
COGS: Direct labor	▲0.03	▲0.01	▲0.02
COGS: Other factory	▲0.07	▲0.01	▲0.06
COGS: Total	▲0.18	▲0.10	▲0.08
Gross profit or (loss)	▲0.04	▲0.03	▲0.01
SG&A expense	▲0.09	▲0.04	▲0.06
Operating income or (loss)	▼(0.06)	▼(0.01)	▼(0.05)
Net income or (loss)	▼(0.08)	▼(0.01)	▼(0.07)

Source: Compiled from data submitted in response to Commission questionnaires.

Note: Percentages and unit values shown as “0.0” or “0.00” represent values greater than zero, but less than “0.05” or “0.005,” respectively. Zeroes, null values, and undefined calculations are suppressed and shown as “---”. Period changes preceded by a “▲” represent an increase, while period changes preceded by a “▼” represent a decrease.

Table VI-3
Ceramic tile: U.S. producers' sales, costs/expenses, and profitability, by firm and period

Net sales quantity

Quantity in 1,000 of square feet

Firm	2021	2022	2023
AHF (Crossville Brand)	***	***	***
American Wonder	***	***	***
Dal-Tile	***	***	***
Del Conca	***	***	***
Florida Tile	***	***	***
Florim	***	***	***
Ironrock	***	***	***
Landmark	***	***	***
Portobello	***	***	***
Stonepeak	***	***	***
All firms	866,230	876,772	816,288

Table continued.

Table VI-3 Continued
Ceramic tile: U.S. producers' sales, costs/expenses, and profitability, by firm and period

Net sales value

Value in 1,000 dollars

Firm	2021	2022	2023
AHF (Crossville Brand)	***	***	***
American Wonder	***	***	***
Dal-Tile	***	***	***
Del Conca	***	***	***
Florida Tile	***	***	***
Florim	***	***	***
Ironrock	***	***	***
Landmark	***	***	***
Portobello	***	***	***
Stonepeak	***	***	***
All firms	1,248,994	1,374,332	1,353,871

Table continued.

Table VI-3 Continued
Ceramic tile: U.S. producers' sales, costs/expenses, and profitability, by firm and period

COGS

Value in 1,000 dollars

Firm	2021	2022	2023
AHF (Crossville Brand)	***	***	***
American Wonder	***	***	***
Dal-Tile	***	***	***
Del Conca	***	***	***
Florida Tile	***	***	***
Florim	***	***	***
Ironrock	***	***	***
Landmark	***	***	***
Portobello	***	***	***
Stonepeak	***	***	***
All firms	829,222	926,385	929,458

Table continued.

Table VI-3 Continued
Ceramic tile: U.S. producers' sales, costs/expenses, and profitability, by firm and period

Gross profit or (loss)

Value in 1,000 dollars

Firm	2021	2022	2023
AHF (Crossville Brand)	***	***	***
American Wonder	***	***	***
Dal-Tile	***	***	***
Del Conca	***	***	***
Florida Tile	***	***	***
Florim	***	***	***
Ironrock	***	***	***
Landmark	***	***	***
Portobello	***	***	***
Stonepeak	***	***	***
All firms	419,772	447,947	424,413

Table continued.

Table VI-3 Continued
Ceramic tile: U.S. producers' sales, costs/expenses, and profitability, by firm and period

SG&A expenses

Value in 1,000 dollars

Firm	2021	2022	2023
AHF (Crossville Brand)	***	***	***
American Wonder	***	***	***
Dal-Tile	***	***	***
Del Conca	***	***	***
Florida Tile	***	***	***
Florim	***	***	***
Ironrock	***	***	***
Landmark	***	***	***
Portobello	***	***	***
Stonepeak	***	***	***
All firms	354,325	390,871	409,647

Table continued.

Table VI-3 Continued
Ceramic tile: U.S. producers' sales, costs/expenses, and profitability, by firm and period

Operating income or (loss)

Value in 1,000 dollars

Firm	2021	2022	2023
AHF (Crossville Brand)	***	***	***
American Wonder	***	***	***
Dal-Tile	***	***	***
Del Conca	***	***	***
Florida Tile	***	***	***
Florim	***	***	***
Ironrock	***	***	***
Landmark	***	***	***
Portobello	***	***	***
Stonepeak	***	***	***
All firms	65,447	57,076	14,766

Table continued.

Table VI-3 Continued
Ceramic tile: U.S. producers' sales, costs/expenses, and profitability, by firm and period

Net income or (loss)

Value in 1,000 dollars

Firm	2021	2022	2023
AHF (Crossville Brand)	***	***	***
American Wonder	***	***	***
Dal-Tile	***	***	***
Del Conca	***	***	***
Florida Tile	***	***	***
Florim	***	***	***
Ironrock	***	***	***
Landmark	***	***	***
Portobello	***	***	***
Stonepeak	***	***	***
All firms	51,039	43,465	(17,656)

Table continued.

Table VI-3 Continued
Ceramic tile: U.S. producers' sales, costs/expenses, and profitability, by firm and period

COGS to net sales ratio

Ratios in percent

Firm	2021	2022	2023
AHF (Crossville Brand)	***	***	***
American Wonder	***	***	***
Dal-Tile	***	***	***
Del Conca	***	***	***
Florida Tile	***	***	***
Florim	***	***	***
Ironrock	***	***	***
Landmark	***	***	***
Portobello	***	***	***
Stonepeak	***	***	***
All firms	66.4	67.4	68.7

Table continued.

Table VI-3 Continued
Ceramic tile: U.S. producers' sales, costs/expenses, and profitability, by firm and period

Gross profit or (loss) to net sales ratio

Ratios in percent

Firm	2021	2022	2023
AHF (Crossville Brand)	***	***	***
American Wonder	***	***	***
Dal-Tile	***	***	***
Del Conca	***	***	***
Florida Tile	***	***	***
Florim	***	***	***
Ironrock	***	***	***
Landmark	***	***	***
Portobello	***	***	***
Stonepeak	***	***	***
All firms	33.6	32.6	31.3

Table continued.

Table VI-3 Continued
Ceramic tile: U.S. producers' sales, costs/expenses, and profitability, by firm and period

SG&A expenses to net sales ratio

Ratios in percent

Firm	2021	2022	2023
AHF (Crossville Brand)	***	***	***
American Wonder	***	***	***
Dal-Tile	***	***	***
Del Conca	***	***	***
Florida Tile	***	***	***
Florim	***	***	***
Ironrock	***	***	***
Landmark	***	***	***
Portobello	***	***	***
Stonepeak	***	***	***
All firms	28.4	28.4	30.3

Table continued.

Table VI-3 Continued
Ceramic tile: U.S. producers' sales, costs/expenses, and profitability, by firm and period

Operating income or (loss) to net sales ratio

Ratios in percent

Firm	2021	2022	2023
AHF (Crossville Brand)	***	***	***
American Wonder	***	***	***
Dal-Tile	***	***	***
Del Conca	***	***	***
Florida Tile	***	***	***
Florim	***	***	***
Ironrock	***	***	***
Landmark	***	***	***
Portobello	***	***	***
Stonepeak	***	***	***
All firms	5.2	4.2	1.1

Table continued.

Table VI-3 Continued
Ceramic tile: U.S. producers' sales, costs/expenses, and profitability, by firm and period

Net income or (loss) to net sales ratio

Ratios in percent

Firm	2021	2022	2023
AHF (Crossville Brand)	***	***	***
American Wonder	***	***	***
Dal-Tile	***	***	***
Del Conca	***	***	***
Florida Tile	***	***	***
Florim	***	***	***
Ironrock	***	***	***
Landmark	***	***	***
Portobello	***	***	***
Stonepeak	***	***	***
All firms	4.1	3.2	(1.3)

Table continued.

Table VI-3 Continued
Ceramic tile: U.S. producers' sales, costs/expenses, and profitability, by firm and period

Unit net sales value

Unit values in dollars per square foot

Firm	2021	2022	2023
AHF (Crossville Brand)	***	***	***
American Wonder	***	***	***
Dal-Tile	***	***	***
Del Conca	***	***	***
Florida Tile	***	***	***
Florim	***	***	***
Ironrock	***	***	***
Landmark	***	***	***
Portobello	***	***	***
Stonepeak	***	***	***
All firms	1.44	1.57	1.66

Table continued.

Table VI-3 Continued
Ceramic tile: U.S. producers' sales, costs/expenses, and profitability, by firm and period

Unit raw material costs

Unit values in dollars per square foot

Firm	2021	2022	2023
AHF (Crossville Brand)	***	***	***
American Wonder	***	***	***
Dal-Tile	***	***	***
Del Conca	***	***	***
Florida Tile	***	***	***
Florim	***	***	***
Ironrock	***	***	***
Landmark	***	***	***
Portobello	***	***	***
Stonepeak	***	***	***
All firms	0.30	0.35	0.37

Table continued.

Table VI-3 Continued
Ceramic tile: U.S. producers' sales, costs/expenses, and profitability, by firm and period

Energy costs

Unit values in dollars per square foot

Firm	2021	2022	2023
AHF (Crossville Brand)	***	***	***
American Wonder	***	***	***
Dal-Tile	***	***	***
Del Conca	***	***	***
Florida Tile	***	***	***
Florim	***	***	***
Ironrock	***	***	***
Landmark	***	***	***
Portobello	***	***	***
Stonepeak	***	***	***
All firms	0.08	0.11	0.08

Table continued.

Table VI-3 Continued
Ceramic tile: U.S. producers' sales, costs/expenses, and profitability, by firm and period

Unit direct labor costs

Unit values in dollars per square foot

Firm	2021	2022	2023
AHF (Crossville Brand)	***	***	***
American Wonder	***	***	***
Dal-Tile	***	***	***
Del Conca	***	***	***
Florida Tile	***	***	***
Florim	***	***	***
Ironrock	***	***	***
Landmark	***	***	***
Portobello	***	***	***
Stonepeak	***	***	***
All firms	0.13	0.14	0.16

Table continued.

Table VI-3 Continued
Ceramic tile: U.S. producers' sales, costs/expenses, and profitability, by firm and period

Unit other factory costs

Unit values in dollars per square foot

Firm	2021	2022	2023
AHF (Crossville Brand)	***	***	***
American Wonder	***	***	***
Dal-Tile	***	***	***
Del Conca	***	***	***
Florida Tile	***	***	***
Florim	***	***	***
Ironrock	***	***	***
Landmark	***	***	***
Portobello	***	***	***
Stonepeak	***	***	***
All firms	0.45	0.46	0.52

Table continued.

Table VI-3 Continued
Ceramic tile: U.S. producers' sales, costs/expenses, and profitability, by firm and period

Unit COGS

Unit values in dollars per square foot

Firm	2021	2022	2023
AHF (Crossville Brand)	***	***	***
American Wonder	***	***	***
Dal-Tile	***	***	***
Del Conca	***	***	***
Florida Tile	***	***	***
Florim	***	***	***
Ironrock	***	***	***
Landmark	***	***	***
Portobello	***	***	***
Stonepeak	***	***	***
All firms	0.96	1.06	1.14

Table continued.

Table VI-3 Continued
Ceramic tile: U.S. producers' sales, costs/expenses, and profitability, by firm and period

Unit gross profit or (loss)

Unit values in dollars per square foot

Firm	2021	2022	2023
AHF (Crossville Brand)	***	***	***
American Wonder	***	***	***
Dal-Tile	***	***	***
Del Conca	***	***	***
Florida Tile	***	***	***
Florim	***	***	***
Ironrock	***	***	***
Landmark	***	***	***
Portobello	***	***	***
Stonepeak	***	***	***
All firms	0.48	0.51	0.52

Table continued.

Table VI-3 Continued
Ceramic tile: U.S. producers' sales, costs/expenses, and profitability, by firm and period

Unit SG&A expenses

Unit values in dollars per square foot

Firm	2021	2022	2023
AHF (Crossville Brand)	***	***	***
American Wonder	***	***	***
Dal-Tile	***	***	***
Del Conca	***	***	***
Florida Tile	***	***	***
Florim	***	***	***
Ironrock	***	***	***
Landmark	***	***	***
Portobello	***	***	***
Stonepeak	***	***	***
All firms	0.41	0.45	0.50

Table continued.

Table VI-3 Continued
Ceramic tile: U.S. producers' sales, costs/expenses, and profitability, by firm and period

Unit operating income or (loss)

Unit values in dollars per square foot

Firm	2021	2022	2023
AHF (Crossville Brand)	***	***	***
American Wonder	***	***	***
Dal-Tile	***	***	***
Del Conca	***	***	***
Florida Tile	***	***	***
Florim	***	***	***
Ironrock	***	***	***
Landmark	***	***	***
Portobello	***	***	***
Stonepeak	***	***	***
All firms	0.08	0.07	0.02

Table continued.

Table VI-3 Continued
Ceramic tile: U.S. producers' sales, costs/expenses, and profitability, by firm and period

Unit net income or (loss)

Unit values in dollars per square foot

Firm	2021	2022	2023
AHF (Crossville Brand)	***	***	***
American Wonder	***	***	***
Dal-Tile	***	***	***
Del Conca	***	***	***
Florida Tile	***	***	***
Florim	***	***	***
Ironrock	***	***	***
Landmark	***	***	***
Portobello	***	***	***
Stonepeak	***	***	***
All firms	0.06	0.05	(0.02)

Source: Compiled from data submitted in response to Commission questionnaires.

Note: Shares and ratios shown as "0.0" represent values greater than zero, but less than "0.05" percent. Zeroes, null values, and undefined calculations are suppressed and shown as "---".

Net sales

Total revenue consists primarily of commercial sales, four U.S. producers reported internal consumption and two reported transfers to related firms. Noncommercial sales accounted for less than 1.0 percent of total revenue from 2021 to 2023, and are included in the financial data, but not shown separately in this section of the report.[6] [7] As shown in table VI-1, both total net sales quantity and value increased from 2021 to 2022, then decreased from 2022 to 2023. Total net sales value increased at a higher rate than quantity from 2021 to 2022 affecting the overall trend. Overall, total net sales quantity decreased by 5.8 percent from 2021 to 2023, while total net sales value increased by 8.4 percent during that same period. As shown in table VI-3, *** U.S. producers that operated continuously throughout the reporting period showed an overall decrease in sales quantity from 2021 to 2023, while *** U.S. producers that operated continuously throughout the reporting period *** showed an overall increase in sales value from 2021 to 2023 (with the majority of the increase occurring from 2021 to 2022).[8] On an average per square foot basis, sales values increased from $1.44 in 2021 to $1.57 in 2022 and $1.66 in 2023. *** U.S. producers that operated

[6] ***. While some items reported are not internal consumption as defined by the Commission, the items are immaterial to reported profitability. All internal consumption was reported at fair market value. ***. Transfers to related firms were reported at fair market value. ***'s U.S. producers questionnaire response, section II-13. Email from ***, May 14, 2024, and email from ***, May 13, 2024.

[7] ***. U.S. producers questionnaire responses, section II-6, and emails from ***, ***, ***, May 9, 2024, May 10, 2024 and May 14, 2024, respectively.

[8] *** Email from ***, May 9, 2024.

continuously throughout the reporting period had an overall increase in their per-square foot values from 2021 to 2023. In 2023, the average per-square foot value ranged from a low of $*** reported by *** to a high of $*** reported by ***. Variations in per-square foot values may be explained by the differences in product mix and the size of the producer.[9] [10]

Cost of goods sold and gross profit or loss

Raw material costs, energy costs, direct labor and other factory costs accounted for 32.8, 7.0, 14.2, and 46.0 percent of total COGS, respectively, in 2023.

Raw material costs, the second largest component of COGS in all years, irregularly increased by 19.4 percent from 2021 to 2023, with all the increase occurring from 2021 to 2022. On an average per square foot basis, raw material costs increased from $0.30 in 2021 to $0.35 in 2022 and $0.37 in 2023.[11] As shown in table VI-3, the average per square foot values varied between U.S. producers but were uniform in trends with *** U.S. producers that operated continuously throughout the reporting period showing an overall increase in their per-square foot values from 2021 to 2023.[12] As a ratio to net sales, raw material costs increased from 20.5 percent in 2021 to 22.5 percent in 2023.

Table VI-4 presents details on specific raw material inputs as a share of raw material costs in 2023. The table shows that clay is the primary raw material input for ceramic tile accounting for 38.4 percent, followed by glazing, decorating, and other surfacing material accounting for 23.8 percent, then silica, feldspar, and other minerals accounting for 22.2

[9] *** Email from ***, May 14, 2024.

[10] *** Email from ***, May 15, 2024.

[11] Petitioners indicated that in addition to inflation impacting the cost of raw materials, a large part of the increase is attributable to the transportation costs of those raw materials. Conference transcript, p.54 (Caselli)

[12] ***. Email from ***, May 13, 2024.

percent. The remaining 15.7 percent is accounted for by all other material inputs such as packaging, ink, pigments and additives.[13]

Table VI-4
Ceramic tile: U.S. producers' raw material costs in 2023

Value in 1,000 dollars; share of value in percent

Item	Value	Share of value
Clay	117,104	38.4
Glazing, decorating, and other surfacing materials	72,450	23.8
Silica, feldspar, and other mineral	67,686	22.2
Other material inputs	47,793	15.7
All raw materials	305,032	100.0

Source: Compiled from data submitted in response to Commission questionnaires.

Note: ***.

Energy costs the smallest component of COGS in all years, increased by 31.6 percent from 2021 to 2022, then decreased by 31.4 percent from 2022 to 2023, and decreased overall by 9.7 percent from 2021 to 2023. On an average per square foot basis, energy costs increased from $0.08 in 2021 to $0.11 in 2022, then decreased to $0.08 in 2023.[14] As shown in table VI-3, *** U.S. producers operating continuously throughout the reporting period showed an increase in their per-square foot value from 2021 to 2022, and *** U.S. producers that operated continuously throughout the reporting period showed a decrease from 2022 to 2023. As a ratio to net sales, energy costs irregularly decreased from 5.8 percent in 2021 to 4.8 percent in 2023.

Direct labor costs, the third largest component of COGS in all years, increased overall by 18.3 percent from 2021 to 2023.[15] [16] On an average per square foot basis, direct labor costs increased from $0.13 in 2021 to $0.14 in 2022 and $0.16 in 2023. As shown in table VI-3, ***

[13] ***. Inputs were reported in manner consistent with the companies' accounting books and records. U.S. producers questionnaire responses sections, III-6, III-7a, and III-7b.

[14] ***. Email from ***, May 9, 2024.

[15] Petitioners' explained that the use of labor in the manufacturing process of ceramic tile is minimal because the process is highly automated. Conference transcript. p. 61 (Rodriguez)

[16] ***. Inputs were reported in a manner consistent with the companies' accounting books and records. U.S. producers' questionnaire responses sections, III-6, III-7a, and III-7b.

U.S. producers that operated continuously throughout the reporting period *** reported an overall increase in their per-square foot values from 2021 to 2023.[17] [18] As a ratio to net sales, direct labor costs increased from 8.9 percent in 2021 to 9.7 percent in 2023.

Other factory costs, the largest component of COGS in all years, increased overall by 9.6 percent from 2021 to 2023. On an average per square foot basis, other factory costs increased from $0.45 in 2021 to $0.46 in 2022 and $0.52 in 2023. As shown in table VI-3, the per-square foot value of other factory costs varied between U.S. producers, but was uniform in trends with *** U.S. producers that operated continuously throughout the reporting period showing an overall increase from 2021 to 2023.[19] [20] As a ratio to net sales, other factory costs irregularly increased from 31.3 percent in 2021 to 31.6 percent in 2023.

Total COGS increased overall by 12.1 percent from 2021 to 2023, with the majority of the increase occurring from 2021 to 2022. On an average per square foot basis, total COGS increased from $0.96 in 2021 to $1.06 in 2021 and $1.14 in 2023. As a ratio to net sales, total COGS increased from 66.4 percent in 2021 to 68.7 percent in 2023.[21]

As shown in table VI-1, gross profit increased from $419.8 million in 2021 to $447.9 million in 2022, then decreased to $424.4 million in 2023. As a ratio to net sales, gross profit decreased from 33.6 percent in 2021 to 31.3 percent in 2023. As shown in table VI-3, *** reported an increase in gross profit from 2021 to 2022 that offset the decline in gross profit reported by *** during that same period. From 2022 to 2023, ***

[17] ***. U.S. producers' questionnaire responses, section II-12.
[18] ***. Email from ***, May 14, 2024.
[19] ***. Email from ***, May 14, 2024.
[20] ***. Email from ***, May 8, 2024.
[21] ***.

***'s gross profits increased, while the remaining U.S. producers that operated continuously throughout the reporting period showed a decline. ***.[22]

SG&A expenses and operating income or loss

U.S. producers' SG&A expenses increased overall by 15.6 percent from 2021 to 2023. As shown in table VI-3, *** U.S. producers that operated continuously throughout the reporting period had an overall increase in their SG&A expenses from 2021 to 2023.[23] The SG&A expense ratio (SG&A expenses divided by total net sales) increased from 28.4 percent in 2021 to 30.3 percent in 2023.[24]

U.S. producers' operating income decreased from $65.4 million in 2021 to $57.1 million in 2022, and further decreased to $14.8 million in 2023. As a ratio to net sales, operating income decreased from 5.2 percent in 2021 to 1.1 percent in 2023. As shown in table VI-3, from 2021 to 2022, *** reported an increase in operating income, ***, and the remaining U.S. producers that operated continuously throughout the reporting period showed a decrease or worsening losses. From 2022 to 2023, *** reported an increase in operating income, *** reported an operating loss that improved into a positive operating income, ***, and the remaining *** U.S. producers that operated continuously throughout the reporting period showed a decrease in operating income or worsening losses. ***.

[22] ***. Email from ***, May 20, 2024.

[23] ***. Inputs were reported in a manner consistent with the companies' accounting books and records. U.S. producers questionnaire responses sections, III-6, III-7a, and III-7b.

[24] ***. *** U.S. producers questionnaire response, sections III-10a and III-10b.

All other expenses and net income or loss

Classified below the operating income level are interest expenses, other expenses and other income. Interest expense, other expense, and other income were combined and only the net amount is shown. Total net other expenses/income irregularly increased by 125.0 percent from 2021 to 2023, with all the increase occurring from 2022 to 2023 (138.2 percent). The majority of the increase was driven by interest expense and other expense items. *** reported interest expenses, which irregularly increased from 2021 to 2023 (***). All other expense items were reported by *** U.S. producers and irregularly increased from 2021 to 2023.[25] [26] All other income items were reported by *** U.S. producers and irregularly increased from 2021 to 2023.[27]

Net income decreased from $51.0 million in 2021 to $43.5 million in 2022, and further decreased into a loss of $17.7 million in 2023. As a ratio to net sales, net income decreased from a positive 4.1 percent in 2021 to a negative 1.3 percent in 2023. As shown in table VI-3, from 2021 to 2022, *** reported a decrease in net income or a worsening loss, while *** reported an increase, and *** reported an improved loss. From 2022 to 2023, *** reported a decrease in net income or worsening losses, while *** reported an increase, and

[25] ***. Email from ***, May 14, 2024.

[26] ***. *** U.S. producers questionnaire response, sections III-10a and III-10b, and email from ***, May 9, 2024.

[27] ***. ***'s U.S. producers questionnaire response, sections III-10a and III-10b, and email from ***, May 15, 2024.

*** reported an improved loss. ***.[28]

Capital expenditures and research and development expenses

Table VI-5 presents capital expenditures, by firm, and table VI-7 presents R&D expenses, by firm. Tables VI-6 and VI-8 present the firms' narrative explanations of the nature, focus, and significance of their capital expenditures and R&D expenses, respectively. Capital expenditures increased from $41.7 million in 2021 to $220.6 million in 2023. *** reported the largest increases in capital expenditures from 2021 to 2023. [29] [30] [31] [32] ***.

R&D expenses (***) increased from $10.0 million in 2021 to $11.7 million in 2023.

[28] A variance analysis is not presented due to the large differences in product mix and the effects on unit cost trends related to start-up operations.

[29] ***. Email from ***, May 13, 2024.

[30] ***. *** U.S. producers response, section III-13b, and email from ***, May, 13, 2024.

[31] ***. Email from ***, May 16, 2024.

[32] ***. Email from ***, May 8, 2024.

Table VI-5
Ceramic tile: U.S. producers' capital expenditures, by firm and period

Value in 1,000 dollars

Firm	2021	2022	2023
AHF (Crossville Brand)	***	***	***
American Wonder	***	***	***
Dal-Tile	***	***	***
Del Conca	***	***	***
Florida Tile	***	***	***
Florim	***	***	***
Ironrock	***	***	***
Landmark	***	***	***
Portobello	***	***	***
Stonepeak	***	***	***
All firms	41,743	147,247	220,556

Source: Compiled from data submitted in response to Commission questionnaires.

Table VI-6
Ceramic tile: U.S. producers' narrative descriptions of their capital expenditures, by firm

Firm	Narrative on capital expenditures
AHF (Crossville Brand)	***
American Wonder	***
Dal-Tile	***
Del Conca	***
Florida Tile	***
Florim	***
Ironrock	***
Landmark	***
Portobello	***
Stonepeak	***

Source: Compiled from data submitted in response to Commission questionnaires.

Table VI-7
Ceramic tile: U.S. producers' R&D expenses, by firm and period

Value in 1,000 dollars

Firm	2021	2022	2023
AHF (Crossville Brand)	***	***	***
American Wonder	***	***	***
Dal-Tile	***	***	***
Del Conca	***	***	***
Florida Tile	***	***	***
Florim	***	***	***
Ironrock	***	***	***
Landmark	***	***	***
Portobello	***	***	***
Stonepeak	***	***	***
All firms	10,046	10,502	11,693

Source: Compiled from data submitted in response to Commission questionnaires.

Table VI-8
Ceramic tile: U.S. producers' narrative descriptions of their R&D expenses, by firm

Firm	Narrative on R&D expenses
AHF (Crossville Brand)	***
American Wonder	***
Dal-Tile	***
Del Conca	***
Florida Tile	***
Florim	***
Ironrock	***
Landmark	***
Portobello	***
Stonepeak	***

Source: Compiled from data submitted in response to Commission questionnaires.

Assets and return on assets

Table VI-9 presents data on the U.S. producers' total assets while table VI-10 presents their operating ROA.[33] Table VI-11 presents U.S. producers' narrative responses explaining their major asset categories and any significant changes in asset levels over time. Total net assets decreased from $2.2 billion in 2021 to $2.0 billion in 2023. ROA decreased from 3.0 percent in 2021 to 0.7 percent in 2023.

Table VI-9
Ceramic tile: U.S. producers' total net assets, by firm and period

Value in 1,000 dollars

Firm	2021	2022	2023
AHF (Crossville Brand)	***	***	***
American Wonder	***	***	***
Dal-Tile	***	***	***
Del Conca	***	***	***
Florida Tile	***	***	***
Florim	***	***	***
Ironrock	***	***	***
Landmark	***	***	***
Portobello	***	***	***
Stonepeak	***	***	***
All firms	2,173,363	1,984,705	2,015,393

Source: Compiled from data submitted in response to Commission questionnaires.

[33] The operating ROA is calculated as operating income divided by total assets. With respect to a firm's overall operations, the total asset value reflects an aggregation of a number of assets which are generally not product specific. Thus, high-level allocations are generally required in order to report a total asset value on a product-specific basis.

Table VI-10
Ceramic tile: U.S. producers' ROA, by firm and period

Ratio in percent

Firm	2021	2022	2023
AHF (Crossville Brand)	***	***	***
American Wonder	***	***	***
Dal-Tile	***	***	***
Del Conca	***	***	***
Florida Tile	***	***	***
Florim	***	***	***
Ironrock	***	***	***
Landmark	***	***	***
Portobello	***	***	***
Stonepeak	***	***	***
All firms	3.0	2.9	0.7

Source: Compiled from data submitted in response to Commission questionnaires.

Table VI-11
Ceramic tile: U.S. producers' narrative descriptions of their total net assets, by firm

Firm	Narrative on assets
***	***
***	***
***	***
***	***
***	***
***	***
***	***

Source: Compiled from data submitted in response to Commission questionnaires.

Capital and investment

The Commission requested U.S. producers of ceramic tile to describe any actual or potential negative effects of imports of ceramic tile from India on their firms' growth, investment, ability to raise capital, development and production efforts, or the scale of capital investments. Table VI-12 presents the number of firms reporting an impact in each category and table VI-13 provides the U.S. producers' narrative responses.

Table VI-12
Ceramic tile: Count of firms indicating actual and anticipated negative effects of imports from subject sources on investment, growth, and development since January 1, 2021, by effect

Number of firms reporting

Effect	Category	Count
Cancellation, postponement, or rejection of expansion projects	Investment	5
Denial or rejection of investment proposal	Investment	3
Reduction in the size of capital investments	Investment	3
Return on specific investments negatively impacted	Investment	7
Other investment effects	Investment	2
Any negative effects on investment	Investment	8
Rejection of bank loans	Growth	2
Lowering of credit rating	Growth	2
Problem related to the issue of stocks or bonds	Growth	0
Ability to service debt	Growth	3
Other growth and development effects	Growth	3
Any negative effects on growth and development	Growth	5
Anticipated negative effects of imports	Future	9

Source: Compiled from data submitted in response to Commission questionnaires.

Note: ***.

Table VI-13
Ceramic tile: U.S. producers' narratives relating to actual and anticipated negative effects of imports on investment, growth, and development, since January 1, 2021, by firm and effect

Item	Firm name and narrative on impact of imports
Cancellation, postponement, or rejection of expansion projects	***
Cancellation, postponement, or rejection of expansion projects	***
Cancellation, postponement, or rejection of expansion projects	***
Cancellation, postponement, or rejection of expansion projects	***
Cancellation, postponement, or rejection of expansion projects	***
Denial or rejection of investment proposal	***
Denial or rejection of investment proposal	***
Denial or rejection of investment proposal	***
Reduction in the size of capital investments	***
Reduction in the size of capital investments	***
Reduction in the size of capital investments	***
Return on specific investments negatively impacted	***
Return on specific investments negatively impacted	***
Return on specific investments negatively impacted	***
Return on specific investments negatively impacted	***
Return on specific investments negatively impacted	***
Return on specific investments negatively impacted	***

Item	Firm name and narrative on impact of imports
Return on specific investments negatively impacted	***
Other negative effects on investments	***
Other negative effects on investments	***
Rejection of bank loans	***
Rejection of bank loans	***
Lowering of credit rating	***
Lowering of credit rating	***
Ability to service debt	***
Ability to service debt	***
Ability to service debt	***
Other effects on growth and development	***
Other effects on growth and development	***
Other effects on growth and development	***
Anticipated effects of imports	***
Anticipated effects of imports	***
Anticipated effects of imports	***
Anticipated effects of imports	***
Anticipated effects of imports	***
Anticipated effects of imports	***

Item	Firm name and narrative on impact of imports
Anticipated effects of imports	***
Anticipated effects of imports	***
Anticipated effects of imports	***

Source: Compiled from data submitted in response to Commission questionnaires

Part VII: Threat considerations and information on nonsubject countries

Section 771(7)(F)(i) of the Act (19 U.S.C. § 1677(7)(F)(i)) provides that—

> *In determining whether an industry in the United States is threatened with material injury by reason of imports (or sales for importation) of the subject merchandise, the Commission shall consider, among other relevant economic factors*[1]*--*
>
> *(I) if a countervailable subsidy is involved, such information as may be presented to it by the administering authority as to the nature of the subsidy (particularly as to whether the countervailable subsidy is a subsidy described in Article 3 or 6.1 of the Subsidies Agreement), and whether imports of the subject merchandise are likely to increase,*
>
> *(II) any existing unused production capacity or imminent, substantial increase in production capacity in the exporting country indicating the likelihood of substantially increased imports of the subject merchandise into the United States, taking into account the availability of other export markets to absorb any additional exports,*
>
> *(III) a significant rate of increase of the volume or market penetration of imports of the subject merchandise indicating the likelihood of substantially increased imports,*
>
> *(IV) whether imports of the subject merchandise are entering at prices that are likely to have a significant depressing or suppressing effect on domestic prices, and are likely to increase demand for further imports,*
>
> *(V) inventories of the subject merchandise,*

[1] Section 771(7)(F)(ii) of the Act (19 U.S.C. § 1677(7)(F)(ii)) provides that "The Commission shall consider {these factors} . . . as a whole in making a determination of whether further dumped or subsidized imports are imminent and whether material injury by reason of imports would occur unless an order is issued or a suspension agreement is accepted under this title. The presence or absence of any factor which the Commission is required to consider . . . shall not necessarily give decisive guidance with respect to the determination. Such a determination may not be made on the basis of mere conjecture or supposition."

(VI) the potential for product-shifting if production facilities in the foreign country, which can be used to produce the subject merchandise, are currently being used to produce other products,

(VII) in any investigation under this title which involves imports of both a raw agricultural product (within the meaning of paragraph (4)(E)(iv)) and any product processed from such raw agricultural product, the likelihood that there will be increased imports, by reason of product shifting, if there is an affirmative determination by the Commission under section 705(b)(1) or 735(b)(1) with respect to either the raw agricultural product or the processed agricultural product (but not both),

(VIII) the actual and potential negative effects on the existing development and production efforts of the domestic industry, including efforts to develop a derivative or more advanced version of the domestic like product, and

(IX) any other demonstrable adverse trends that indicate the probability that there is likely to be material injury by reason of imports (or sale for importation) of the subject merchandise (whether or not it is actually being imported at the time).[2]

Information on the nature of the subsidies was presented earlier in this report; information on the volume and pricing of imports of the subject merchandise is presented in Parts IV and V; and information on the effects of imports of the subject merchandise on U.S. producers' existing development and production efforts is presented in Part VI. Information on inventories of the subject merchandise; foreign producers' operations, including the potential for "product-shifting;" any other threat indicators, if applicable; and any dumping in third-country markets, follows. Also presented in this section of the report is information obtained for consideration by the Commission on nonsubject countries.

[2] Section 771(7)(F)(iii) of the Act (19 U.S.C. § 1677(7)(F)(iii)) further provides that, in antidumping investigations, ". . . the Commission shall consider whether dumping in the markets of foreign countries (as evidenced by dumping findings or antidumping remedies in other WTO member markets against the same class or kind of merchandise manufactured or exported by the same party as under investigation) suggests a threat of material injury to the domestic industry."

The industry in India

The Commission issued foreign producers' or exporters' questionnaires to 100 firms believed to produce and/or export ceramic tile from India.[3] Usable responses to the Commission's questionnaire were received from 138 firms: These firms' exports to the United States accounted for nearly all of U.S. imports of ceramic tile from India in 2023. According to estimates requested of the responding producers in India, the production of ceramic tile in India reported in questionnaires accounts for nearly all of overall production of ceramic tile in 2023. Table VII-1 presents information on the ceramic tile operations of the responding top 10 producers and exporters and all others in India and VII-2 presents summary data for top 10 resellers and other resellers of ceramic tile from India.

Table VII-1
Ceramic tile: Summary data for producers in India, 2023

Quantity in 1,000 of square feet; share in percent

Producer	Production quantity	Share of reported production	Exports to the United States quantity	Share of reported exports to the United States	Total shipments quantity	Share of firm's total shipments exported to the United States
Varmora Granito	***	***	***	***	***	***
Simpolo Vitrified	***	***	***	***	***	***
Sunshine Tiles	***	***	***	***	***	***
Italica Granito	***	***	***	***	***	***
Exxaro Tiles	***	***	***	***	***	***
Qutone Ceramic	***	***	***	***	***	***
Lavish Granito	***	***	***	***	***	***
Commander Vitrified	***	***	***	***	***	***
Asian Granito India	***	***	***	***	***	***
Color Granito	***	***	***	***	***	***
All other producers	***	***	***	***	***	***
All individual producers	***	100.0	***	100.0	***	***

Source: Compiled from data submitted in response to Commission questionnaires.

Note: Shares and ratios shown as "0.0" represent values greater than zero, but less than "0.05" percent. Zeroes, null values, and undefined calculations are suppressed and shown as "---".

[3] These firms were identified through a review of information submitted in the petition and presented in third-party sources.

Table VII-2
Ceramic tile: Summary data for subject resellers, 2023

Quantity in 1,000 of square feet; share in percent

Reseller	Resales exported to the United States quantity	Share of resales exported to the United States
Sellwin International	***	***
Win-Tel Ceramics	***	***
Niro Ceramic	***	***
Neelson Ceramic	***	***
Emcer Tiles	***	***
Spolo Ceramic	***	***
Aqval Ceramic	***	***
Velsaa Vitrified	***	***
Lorence Vitrified	***	***
Sparten Granito	***	***
All other resellers	***	***
All individual resellers	***	***

Source: Compiled from data submitted in response to Commission questionnaires.

Note: Shares and ratios shown as "0.0" represent values greater than zero, but less than "0.05" percent. Zeroes, null values, and undefined calculations are suppressed and shown as “---“. Foreign resellers, included in all other resellers, *** did not report resales in 2023 but did report resales in 2021 and/or 2022.

Table VII-3 presents events in India's industry since January 1, 2021.

Table VII-3
Ceramic tile: Important industry events in India since January 1, 2021

Item	Firm	Event
Expansion	Lorison Tiles	In 2021, Lorison Tiles located in Jivapar, Morbi, added Luften Tiles, a new manufacturing unit for ceramic wall tiles located in Morbi, Gujarat. Its production capacity is 129.2 million square feet (12 million square meters) per annum.
Expansion	Kajaria Ceramics	From January 2021 to March 2024, Kajaria Ceramics increased its production capacity by 16.07 million square meters (173 million square feet) per annum by bringing new units into operation at existing facilities and by acquiring subsidiaries. The firm's overall production capacity rose from 70.40 square meters (757.8 million square feet) per annum to 86.47 square meters (930.8 million square feet) per annum. Kajaria Ceramics currently own four facilities: Gailpur, Rajasthan; Malootana, Rajasthan; Sikandrabad,Uttar Pradesh; and Srikalahasti, Andhra Pradesh. It also has three subsidiaries: Kajaria Vitrified (formerly known as Jaxx Vitrified), Morbi, Gujarat; Kajaria Infinity (formerly known as Cosa Ceramics), Morbi, Gujarat and South Asian Ceramics, Balanagar, Telangana.
Expansion	Asian Granito India Limited	In 2021, Asian Granito India Ltd. headquartered in Ahmedabad, Gujarat, is the seventh largest tile producer in India, completed an expansion project to increase tile production capacity by around 129,167 square feet per day, raising its total production capacity to *** each year.
Expansion	Murudeshwar Ceramics Ltd.	In 2022, Murudeshwar Ceramics Ltd. approved a project that will increase production capacity at its Sira Plant, in Hubli, Karnataka, by approximately 86,111 square feet per day, and at its Karaikal Plant, in Karaikal, Pondicherry, by approximately 32,292 square feet per day.
Expansion	Prism Johnson	In 2022, Prism Johnson headquartered in Kalina, Santacruz (East), Mumbai, completed the expansion of its annual tile production capacity by 43.1 million square feet through joint venture entities.
Expansion	Somany Ceramics	In 2022, Somany Ceramics whose headquarters is in Uttar Pradesh expanded its annual tile production capacity from 678 million square feet to 796 million square feet.
Expansion	Prism Johnson	In 2023, Prism Johnson opened a new tile manufacturing plant at Panagarh, West Bengal, with an annual production capacity

Item	Firm	Event
		of 6.3 million square meters (7.8 million square feet). This company also completed a joint venture which expanded its tile annual production capacity by 1.2 million square meters (12.9 million square feet). Prism Johnson's current production capacity is 656.6 million square feet across 10 manufacturing plants in India.
Expansion	Lavish Ceramics	In 2021, Lavish Ceramics installed India's largest kiln (2,798 square feet), at its Luxgres Ceramica LLP factory located in Morbi, Gujarat. Lavish Ceramics annual production capacity is 172.2 million square feet.
Expansion	Lavish Ceramics	In 2022, Lavish Ceramics located in Morbi, Gujarat, transformed its wall tile unit (silk ceramics) into a glazed porcelain tile production factory by reinvesting in the existing infrastructure.

Source: Source: Kajaria Ceramics, Corporate Presentation, January 2021 – March 2024, retrieved May 9, 2024, https://www.kajariaceramics.com/analyst-presentation.php; Lavish Ceramics, Company Profile, "The Million Mile Story," accessed May 9, 2024, https://www.lavishceramics.com/company-profile/; Lorison Tiles, "Our Milestone," retrieved May 9, 2024, https://lorisontiles.com/milestone/; Luften Tiles, "Export," retrieved May 9, 2024, https://www.luftentilesllp.com/export; Petition, pp. 37 - 38; Prism Johnson, Company Presentation, "Corporate Presentation February 2024," February 2024, retrieved May 9, 2024, https://www.prismjohnson.in/wp-content/uploads/2024/02/Prism-Johnson-Corporate-Presentation-Feb-2024.pdf;

Changes in operations

Producers in India were asked to report any change in the character of their operations or organization relating to the production of ceramic tile since 2021. 47 of 138 responding subject producers indicated in their questionnaires that they had experienced such changes. The most commonly reported changes were expansions (reported by 23 firms), plant openings (reported by 17 firms), and production curtailments (reported by 7 firms), and. Tables VII-4 and VII-5 present the changes identified by these subject producers.

Table VII-4
Ceramic tile: Count of reported changes in operations in India since January 1, 2021, by type of change in operation

Count in number of firms reporting

Item	India
Plant openings	17
Plant closings	2
Prolonged shutdowns	1
Production curtailments	7
Relocations	0
Expansions	23
Acquisitions	2
Consolidations	1
Weather-related or force majeure events	5
Other	3
Any change	47

Source: Compiled from data submitted in response to Commission questionnaires.

Table VII-5
Ceramic tile: Reported changes in operations in India since January 1, 2021, by firm

Item	Firm name and accompanying narrative response regarding changes in operations
Plant openings	***
Plant openings	***
Plant openings	***
Plant openings	***
Plant openings	***
Plant openings	***
Plant openings	***
Plant openings	***
Plant openings	***
Plant openings	***
Plant openings	***
Plant openings	***
Plant openings	***
Plant openings	***
Plant openings	***

Item	Firm name and accompanying narrative response regarding changes in operations
Plant openings	***
Plant openings	***
Plant openings	***
Plant openings	***
Plant closings	***
Plant closings	***
Prolonged shutdowns	***
Production curtailments	***
Production curtailments	***
Production curtailments	***
Production curtailments	***
Production curtailments	***
Production curtailments	***
Expansions	***
Expansions	***
Expansions	***
Expansions	***
Expansions	***
Expansions	***
Expansions	***
Expansions	***
Expansions	***
Expansions	***
Expansions	***
Expansions	***
Expansions	***
Expansions	***
Expansions	***
Expansions	***

Item	Firm name and accompanying narrative response regarding changes in operations
Expansions	***
Expansions	***
Expansions	***
Expansions	***
Expansions	***
Expansions	***
Expansions	***
Expansions	***

Item	Firm name and accompanying narrative response regarding changes in operations
Acquisitions	***
Acquisitions	***
Consolidations	***
Weather-related or force majeure events	***
Weather-related or force majeure events	***
Weather-related or force majeure events	***
Weather-related or force majeure events	***
Weather-related or force majeure events	***
Other	***
Other	***
Other	***

Source: Compiled from data submitted in response to Commission questionnaires.

Operations on ceramic tile

Table VII-6 presents data on India producers' installed capacity, practical overall capacity, and practical ceramic tile capacity and production on the same equipment. Between 2021 and 2023, *** firms reported no change in installed overall capacity, while *** firms reported an increase. *** firm reported a decrease. During 2021-23, *** firms reported an increase in practical overall capacity, *** firms reported no change, and *** firms reported a decrease. Installed overall capacity increased by 19.0 percent during 2021-23. Installed overall capacity utilization increased by 2.7 percentage points from 2021 to 2023. Following a similar trend, practical overall capacity increased by 18.4 percent during 2021-23 and practical overall production increased by 23.7 percent. Practical overall capacity utilization increased by 3.3 percentage points from 2021 to 2023.

Table VII-6
Ceramic tile: Indian producers' installed and practical capacity and production on the same equipment as in-scope production, by period

Quantity in 1,000 of square feet; utilization in percent

Item	Measure	2021	2022	2023
Installed overall	Capacity	5,045,349	5,711,622	6,003,498
Installed overall	Production	3,492,888	3,763,344	4,319,537
Installed overall	Utilization	69.2	65.9	72.0
Practical overall	Capacity	4,724,224	5,299,085	5,595,377
Practical overall	Production	3,492,888	3,763,344	4,319,537
Practical overall	Utilization	73.9	71.0	77.2
Practical ceramic tile	Capacity	4,724,224	5,299,085	5,595,357
Practical ceramic tile	Production	3,492,888	3,763,344	4,319,537
Practical ceramic tile	Utilization	73.9	71.0	77.2

Source: Compiled from data submitted in response to Commission questionnaires.

Note: Shares and ratios shown as "0.0" represent values greater than zero, but less than "0.05" percent. Zeroes, null values, and undefined calculations are suppressed and shown as "---".

Table VII-7 presents Indian producers' reported capacity constraints since January 1, 2021.

Table VII-7
Ceramic tile: Indian producers' reported capacity constraints since January 1, 2021

Item	Firm name and narrative response on constraints to practical overall capacity
Production bottlenecks	***
Production bottlenecks	***
Production bottlenecks	***
Production bottlenecks	***
Production bottlenecks	***
Production bottlenecks	***
Production bottlenecks	***
Production bottlenecks	***

Item	Firm name and narrative response on constraints to practical overall capacity
Production bottlenecks	***
Production bottlenecks	***
Production bottlenecks	***
Production bottlenecks	***
Production bottlenecks	***
Production bottlenecks	***
Production bottlenecks	***
Production bottlenecks	***
Production bottlenecks	***
Production bottlenecks	***
Production bottlenecks	***
Production bottlenecks	***
Production bottlenecks	***
Production bottlenecks	***
Production bottlenecks	***
Production bottlenecks	***
Production bottlenecks	***
Production bottlenecks	***
Production bottlenecks	***
Existing labor force	***
Existing labor force	***

Item	Firm name and narrative response on constraints to practical overall capacity
Existing labor force	***
Existing labor force	***
Existing labor force	***
Existing labor force	***
Existing labor force	***
Existing labor force	***
Existing labor force	***
Existing labor force	***
Existing labor force	***
Existing labor force	***
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Existing labor force	***
Existing labor force	***
Existing labor force	***
Existing labor force	***
Existing labor force	***
Existing labor force	***

Item	Firm name and narrative response on constraints to practical overall capacity
Existing labor force	***
Existing labor force	***
Supply of material inputs	***
Supply of material inputs	***
Supply of material inputs	***
Supply of material inputs	***
Supply of material inputs	***
Supply of material inputs	***
Supply of material inputs	***
Supply of material inputs	***
Supply of material inputs	***
Supply of material inputs	***
Supply of material inputs	***
Supply of material inputs	***
Supply of material inputs	***
Fuel or energy	***
Fuel or energy	***
Fuel or energy	***
Fuel or energy	***

Item	Firm name and narrative response on constraints to practical overall capacity
Fuel or energy	***
Storage capacity	***
Storage capacity	***
Storage capacity	***
Logistics/transportation	***
Logistics/transportation	***
Other constraints	***
Other constraints	***
Other constraints	***
Other constraints	***
Other constraints	***
Other constraints	***
Other constraints	***
Other constraints	***
Other constraints	***
Other constraints	***
Other constraints	***
Other constraints	***
Other constraints	***
Other constraints	***
Other constraints	***
Other constraints	***
Other constraints	***
Other constraints	***

Item	Firm name and narrative response on constraints to practical overall capacity
Other constraints	***
Other constraints	***
Other constraints	***
Other constraints	***
Other constraints	***
Other constraints	***
Other constraints	***
Other constraints	***
Other constraints	***
Other constraints	***
Other constraints	***
Other constraints	***
Other constraints	***
Other constraints	***
Other constraints	***
Other constraints	***
Other constraints	***

Source: Compiled from data submitted in response to Commission questionnaires.

Table VII-8 presents information on the ceramic tile operations of the responding producers and exporters in India. Between 2021 and 2023, *** firms reported no change in practical ceramic tile capacity, *** firms reported an increase, and *** firms reported a decrease. Indian producers' capacity increased overall by 18.4 percent during 2021-23. Indian producers' production increased overall by 23.7 percent during 2021-23. Indian producers' capacity utilization decreased by 2.9 percentage points during 2021-22, then increased by 6.2 percentage points during 2022-23, increasing overall by 3.3 percentage points during 2021-23. Relative to 2023 levels, Indian producers' capacity and production are projected to be higher in 2024 and 2025.

Indian producers' exports to the United States increased overall by 56.2 percent during 2021-23. The leading exporters of ceramic tile to the United States were ***. Indian producers' internal consumption increased overall by *** percent during 2021-23.[4] Commercial home market shipments increased overall by *** percent between 2021 and 2023. Exports to all other market increased overall by 21.9 percent between 2021 and 2023, decreasing by 1.5 percent during 2021-22 then increasing by 23.7 percent during 2022-23. Relative to 2023 levels, commercial home market shipments, and exports to all other markets and exports to the United States are projected to be higher in 2024 and 2025, while internal consumption is projected to be lower in 2024 and higher in 2025.

Commercial home market shipments as a share of subject producers' total shipments increased from *** percent in 2021 to *** percent in 2022 and then decreased to *** percent in 2023. Internal consumption as a share of total shipments increased from *** percent in 2021 to *** percent in 2022 and remained the same in 2023. Exports to the United States as a share of Indian producers' total shipments increased from 2.4 percent in 2021 to 3.0 percent in 2022, and increased to 3.1 percent in 2023. Exports to all other markets as a share of total shipments decreased from 16.0 percent in 2021 to 14.3 percent in 2021, and then increased to 15.6 percent in 2023.

[4] *** accounted for over *** of percent subject producers' reported internal consumption each year.

Table VII-8
Ceramic tile: Data on industry in India, by period

Quantity in 1,000 of square feet

Item	2021	2022	2023	Projection 2024	Projection 2025
Capacity	4,724,224	5,299,085	5,595,357	6,019,200	6,062,349
Production	3,492,888	3,763,344	4,319,537	4,813,771	4,881,664
End-of-period inventories	438,906	470,550	557,445	595,601	628,037
Internal consumption	***	***	***	***	***
Commercial home market shipments	***	***	***	***	***
Home market shipments	2,768,813	3,090,627	3,453,673	3,886,686	3,908,305
Exports to the United States	83,036	114,073	129,668	138,766	144,216
Exports to all other markets	544,605	536,481	663,875	771,632	812,917
Export shipments	627,641	650,554	793,543	910,398	957,133
Total shipments	3,396,454	3,741,181	4,247,216	4,797,084	4,865,438
Resales exported to the United States	69,856	83,591	178,985	181,099	174,909
Total exports to the United States	152,892	197,664	308,653	319,865	319,125

Table continued.

Table VII-8—Continued
Ceramic tile: Data on industry in India, by period

Shares and ratios in percent

Item	2021	2022	2023	Projection 2024	Projection 2025
Capacity utilization ratio	73.9	71.0	77.2	80.0	80.5
Inventory ratio to production	12.6	12.5	12.9	12.4	12.9
Inventory ratio to total shipments	12.9	12.6	13.1	12.4	12.9
Internal consumption share	***	***	***	***	***
Commercial home market shipments share	***	***	***	***	***
Home market shipments share	81.5	82.6	81.3	81.0	80.3
Exports to the United States share	2.4	3.0	3.1	2.9	3.0
Exports to all other markets share	16.0	14.3	15.6	16.1	16.7
Export shipments share	18.5	17.4	18.7	19.0	19.7
Total shipments share	100.0	100.0	100.0	100.0	100.0
Share of total exports to the U.S. exported by producers	54.3	57.7	42.0	43.4	45.2
Share of total exports to the U.S. exported by resellers	45.7	42.3	58.0	56.6	54.8
Adjusted share of total shipments exported to the United States	4.5	5.3	7.3	6.7	6.6

Source: Compiled from data submitted in response to Commission questionnaires.

Alternative products

No responding firms in India produced other products on the same equipment and machinery used to produce ceramic tile.

Exports

According to GTA, the leading export markets for ceramic tile from India in 2023 were Iraq, Mexico, Russia, United Arab Emirates, and the United States (table VII-9). In 2023, the United States was the top export market for ceramic tile from India, accounting for 7.5 percent, followed by the United Arab Emirates (5.5 percent), Iraq (5.3 percent), Mexico (4.9 percent) and Russia (4.6 percent).

Table VII-9
Ceramic tile: Exports from India by period

Value in 1,000 dollars; share in percent

Exporting country	Measure	2021	2022	2023
United States	Value	105,161	142,587	182,192
United Arab Emirates	Value	89,078	105,396	134,094
Iraq	Value	87,614	106,076	129,604
Mexico	Value	70,674	56,033	118,452
Russia	Value	55,075	52,977	113,048
United Kingdom	Value	57,451	48,951	108,776
Israel	Value	42,468	45,739	96,993
Kuwait	Value	74,633	77,583	92,328
Saudi Arabia	Value	156,719	105,423	74,627
Oman	Value	55,572	65,044	73,379
All other destination markets	Value	971,573	1,040,406	1,315,660
Total exports	Value	1,766,018	1,846,216	2,439,154
United States	Share of value	6.0	7.7	7.5
United Arab Emirates	Share of value	5.0	5.7	5.5
Iraq	Share of value	5.0	5.7	5.3
Mexico	Share of value	4.0	3.0	4.9
Russia	Share of value	3.1	2.9	4.6
United Kingdom	Share of value	3.3	2.7	4.5
Israel	Share of value	2.4	2.5	4.0
Kuwait	Share of value	4.2	4.2	3.8
Saudi Arabia	Share of value	8.9	5.7	3.1
Oman	Share of value	3.1	3.5	3.0
All other destination markets	Share of value	55.0	56.4	53.9
Total exports	Share of value	100.0	100.0	100.0

Source: Official export statistics under HS subheadings 6907.10, 6907.21, 6907.22, 6907.23, 6907.30, 6907.40, 6907.90, 6908.10 and 6908.90 reported by various national statistical authorities, in the IHS Markit, Global Trade Atlas database, accessed April 30, 2024.

Note: United States is shown at the top. All remaining top export destinations are shown in descending order for 2023.

U.S. inventories of imported merchandise

Table VII-10 presents data on U.S. importers' reported inventories of ceramic tile. U.S. importers' inventories of imports from India increased each year, increasing overall by *** percent from 2021 to 2023.[5] U.S. importers' inventories of imports from nonsubject increased by *** percent during 2021-22, then decreased by *** percent during 2022-23, increasing overall by *** percent from 2021 to 2023.[6] Between 2021 and 2023, inventories of subject imports from India decreased by *** percentage points relative to U.S. imports, but increased relative to U.S. shipments of imports by *** percentage points.

Table VII-10
Ceramic tile: U.S. importers' inventories and their ratio to select items, by source and period

Quantity in 1,000 of square feet; ratio in percent

Measure	Source	2021	2022	2023
Inventories quantity	India	***	***	***
Ratio to imports	India	***	***	***
Ratio to U.S. shipments of imports	India	***	***	***
Ratio to total shipments of imports	India	***	***	***
Inventories quantity	Nonsubject	***	***	***
Ratio to imports	Nonsubject	***	***	***
Ratio to U.S. shipments of imports	Nonsubject	***	***	***
Ratio to total shipments of imports	Nonsubject	***	***	***
Inventories quantity	All	***	***	***
Ratio to imports	All	***	***	***
Ratio to U.S. shipments of imports	All	***	***	***
Ratio to total shipments of imports	All	***	***	***

Source: Compiled from data submitted in response to Commission questionnaires.

Note: Shares and ratios shown as "0.0" represent values greater than zero, but less than "0.05" percent. Zeroes, null values, and undefined calculations are suppressed and shown as "---".

[5] ***.
[6] ***.

U.S. importers' outstanding orders

The Commission requested importers to indicate whether they imported or arranged for the importation of ceramic tile from India after December 31, 2023. The fifteen responding importers' reported data is presented in table VII-11. India accounted for *** percent and nonsubject sources accounted for *** percent of U.S. importers' arranged imports of ceramic tile.

Table VII-11
Ceramic tile: U.S. importers' arranged imports, by source and period

Quantity in 1,000 of square feet

Source	Jan-Mar 2024	Apr-Jun 2024	Jul-Sep 2024	Oct-Dec 2024	Total
India	***	***	***	***	***
Nonsubect sources	***	***	***	***	***
All import sources	***	***	***	***	***

Source: Compiled from data submitted in response to Commission questionnaires.

Third-country trade actions

On November 5, 2018, Bahrain, Kuwait, Oman, Qatar, Saudi Arabia and the United Emirates (Gulf Cooperation Council "GCC") initiated an antidumping investigation on imports of ceramic flags and paving, hearth, floor, or wall tiles; whether or not on a backing; finishing ceramics (ceramic tiles) originating in India. The antidumping orders were enforced June 6, 2020, with duties that ranged from 17.6 percent to 70.2 percent for 5 years.[7] Taiwan initiated an antidumping investigation on imports of ceramic tiles originating in India on October 28, 2020. The antidumping orders were enforced September 27, 2021, with duties ranging from 0 percent to 20.07 percent.[8] Also on May 5, 2021, Indonesia initiated a safeguard investigation to no longer exclude India from safeguard duties on ceramic tile. Imported tile from India entering Indonesia were subjected to higher duty rates ranging from 13 to 17 percent for a period of three years.[9] On December 13, 2021, the European Union initiated an antidumping

[7] WTO, Trade Remedies Data Portal, Antidumping, "Original Investigation AD-4-9/IND," June 6, 2020, retrieved May 7, 2024, AD-4-9/IND - Investigation details - Trade Remedies Data Portal (wto.org).

[8] WTO, Trade Remedies Data Portal, Antidumping, "Original Investigation 20-0002-IND," October 28, 2020, retrieved May 7, 2024, 20-0002-IND - Investigation details - Trade Remedies Data Portal (wto.org).

[9] WTO, Committee on Safeguards, Notification Under Article 12.1(B) of the Agreement on Safeguards on Finding a Serious Injury or Threat Thereof Caused by Increased Imports, "Notification to Impose a Measure," G/SG/N/10/IDN/20/Suppl.2,

(*continued*...)

investigation on imports in HS category 6907.21, 6907.22, 6907.23, 6907.30, and 6907.40 originating in India. The antidumping orders were enforced February 10, 2023, with duties on imports that range from 6.7 percent to 8.7 percent.[10]

Information on nonsubject countries

Table VII-12 presents global export data for ceramic tile, a category that includes HS, 6907.10, 6907.21, 6907.22, 6907.23, 6907.30, 6907.40, 6907.90, 6908.10 and 6908.90 (by source in descending order of value for 2023). In 2023, China (24.1 percent), Italy (23.8 percent), Spain (19.2 percent) and India (12.1 percent) accounted for nearly 80 percent of the global export value.

https://docs.wto.org/dol2fe/Pages/SS/directdoc.aspx?filename=q:/G/SG/N10IDN20S2.pdf&Open=True , (accessed various dates).

[10] WTO, Trade Remedies Data Portal, Antidumping, "Original Investigation AD684 IND," February 10, 2023, retrieved May 7, 2024, AD684 IND - Investigation details - Trade Remedies Data Portal (wto.org).

Table VII-12
Ceramic tile: Value of global exports by country and period

Value in 1,000 dollars; share in percent

Exporting country	Measure	2021	2022	2023
China	Value	3,915,203	4,962,393	4,856,006
Italy	Value	5,403,530	5,522,613	4,784,084
Spain	Value	4,360,007	4,504,877	3,859,036
India	Value	1,766,018	1,846,216	2,439,154
Turkey	Value	980,594	1,061,029	665,093
Poland	Value	467,759	477,988	465,380
Brazil	Value	488,143	512,538	391,718
Germany	Value	410,415	406,852	350,532
Portugal	Value	293,874	325,305	307,930
Mexico	Value	251,224	279,186	278,747
All other exporters	Value	2,893,306	2,543,961	1,737,052
Total exports	Value	21,230,073	22,442,958	20,134,731
China	Share of value	18.4	22.1	24.1
Italy	Share of value	25.5	24.6	23.8
Spain	Share of value	20.5	20.1	19.2
India	Share of value	8.3	8.2	12.1
Turkey	Share of value	4.6	4.7	3.3
Poland	Share of value	2.2	2.1	2.3
Brazil	Share of value	2.3	2.3	1.9
Germany	Share of value	1.9	1.8	1.7
Portugal	Share of value	1.4	1.4	1.5
Mexico	Share of value	1.2	1.2	1.4
All other exporters	Share of value	13.6	11.3	8.6
Total exports	Share of value	100.0	100.0	100.0

Source: Official export statistics under HS subheadings 6907.10, 6907.21, 6907.22, 6907.23, 6907.30, 6907.40, 6907.90, 6908.10 and 6908.90 reported by various national statistical authorities, in the IHS Markit, Global Trade Atlas database, accessed April 30, 2024.

Note: Because of rounding, figures may not add to total shown.

APPENDIX A

FEDERAL REGISTER NOTICES

The Commission makes available notices relevant to its investigations and reviews on its website, www.usitc.gov. In addition, the following tabulation presents, in chronological order, Federal Register notices issued by the Commission and Commerce during the current proceeding.

Citation	Title	Link
89 FR 31770, April 25, 2024	*Ceramic Tile From India; Institution of Antidumping and Countervailing Duty Investigations and Scheduling of Preliminary Phase Investigations*	https://www.govinfo.gov/content/pkg/FR-2024-04-25/pdf/2024-08882.pdf
89 FR 42841, May 9, 2024	*Ceramic Tile From India: Initiation of Countervailing Duty Investigation*	https://www.govinfo.gov/content/pkg/FR-2024-05-16/pdf/2024-10753.pdf
89 FR 42836, May 9, 2024	*Ceramic Tile From India: Initiation of Less-Than-Fair-Value Investigation*	https://www.govinfo.gov/content/pkg/FR-2024-05-16/pdf/2024-10749.pdf

APPENDIX B

LIST OF STAFF CONFERENCE WITNESSES

CALENDAR OF PUBLIC PRELIMINARY CONFERENCE

Those listed below appeared in the United States International Trade Commission's Preliminary Conference:

Subject: Ceramic Tile from India

Inv. Nos.: 701-TA-720 and 731-TA-1688 (Preliminary)

Date and Time: May 10, 2024 - 9:45 a.m.

Sessions were held in connection with these preliminary phase investigations in the Main Hearing Room (Room 101), 500 E Street, SW., Washington, DC.

OPENING REMARKS:

In Support of Imposition (**David Spooner**, Barnes & Thornburg LLP)
In Opposition to Imposition (**Jared R. Wessel**, Hogan Lovells US LLP)

In Support of the Imposition of the Antidumping and Countervailing Duty Orders:

Barnes & Thornburg LLP
Washington, DC
on behalf of

Coalition for Fair Trade in Ceramic Tile

Clark Cornelius, President and Chief Operating Officer, Florida Tile

James "Jed" Durbin, Vice President, Manufacturing & Outsourcing, Portobello America Manufacturing LLC

Don Haynes, EHS & Sustainability Manager, Florim USA

Claudio Caselli, Senior Vice President, Research & Development Product, Dal-Tile Corporation

Marcelo Rodriguez, Director, Technical Services, Dal-Tile Corporation

In Support of the Imposition of the
Antidumping and Countervailing Duty Orders (continued):

Eric Astrachan, Executive Director, The Tile Council of North America

Jennifer Lutz, Partner, ION Economics, LLC

Rebecca Tuzel, Economic Consultant, ION Economics, LLC

David Spooner)
Luis Arandia)
Michelle Rosario) – OF COUNSEL
Yusra Siddique)

In Opposition to the Imposition of the
Antidumping and Countervailing Duty Orders:

Hogan Lovells US LLP
Washington, DC
on behalf of

Bedrosians Tile & Stone ("Bedrosians")
M S International, Inc. ("MSI")

Larry Bedrosian, Chief Executive Officer, Bedrosians

Rajesh Shah, Chief Executive Officer, MSI

Jonathan T. Stoel)
Jared R. Wessel) – OF COUNSEL
Lindsay K. Brown)

TPM Solicitors & Consultants
New Delhi
on behalf of

Comet Granito Pvt. Ltd. ("Comet")

Pintu S Patel (remote witness), Managing Partner, Comet

Bharat Hadiyal (remote witness), Export Manager, Comet

A K Gupta (remote witness))
Namrita Raghuwanshi (remote witness)) – OF COUNSEL
Suhani Chanchlani (remote witness))

REBUTTAL/CLOSING REMARKS:

In Support of Imposition (**David Spooner**, Barnes & Thornburg LLP)
In Opposition to Imposition (**Jonathan T. Stoel,** Hogan Lovells US LLP)

APPENDIX C

SUMMARY DATA

Table C-1
Ceramic tile: Summary data concerning the U.S. market, by item and period
Quantity=1,000 of square feet; Value=1,000 dollars; Unit values, unit labor costs, and unit expenses=dollars per square foot; Period changes=percent--exceptions noted

Item	Reported data			Period changes		
	Calendar year			Comparison years		
	2021	2022	2023	2021-23	2021-22	2022-23
U.S. consumption quantity:						
Amount	3,079,985	3,039,889	2,801,253	▼(9.0)	▼(1.3)	▼(7.9)
Producers' share (fn1)	27.8	28.3	28.6	▲0.9	▲0.6	▲0.3
Importers' share (fn1):						
India	7.1	9.3	14.5	▲7.4	▲2.3	▲5.1
Nonsubject sources	65.2	62.3	56.9	▼(8.3)	▼(2.9)	▼(5.4)
All import sources	72.2	71.7	71.4	▼(0.9)	▼(0.6)	▼(0.3)
U.S. consumption value:						
Amount	3,724,047	4,284,627	3,887,105	▲4.4	▲15.1	▼(9.3)
Producers' share (fn1)	33.0	31.5	34.1	▲1.1	▼(1.6)	▲2.7
Importers' share (fn1):						
India	4.4	5.8	6.7	▲2.2	▲1.3	▲0.9
Nonsubject sources	62.6	62.8	59.2	▼(3.3)	▲0.2	▼(3.6)
All import sources	67.0	68.5	65.9	▼(1.1)	▲1.6	▼(2.7)
U.S. imports from:						
India:						
Quantity	217,789	283,935	404,927	▲85.9	▲30.4	▲42.6
Value	164,529	246,382	258,805	▲57.3	▲49.7	▲5.0
Unit value	$0.76	$0.87	$0.64	▼(15.4)	▲14.9	▼(26.3)
Ending inventory quantity	***	***	***	▲***	▲***	▲***
Nonsubject sources:						
Quantity	2,007,374	1,894,205	1,594,591	▼(20.6)	▼(5.6)	▼(15.8)
Value	2,329,927	2,690,617	2,302,423	▼(1.2)	▲15.5	▼(14.4)
Unit value	$1.16	$1.42	$1.44	▲24.4	▲22.4	▲1.7
Ending inventory quantity	***	***	***	▲***	▲***	▼***
All import sources:						
Quantity	2,225,163	2,178,139	1,999,518	▼(10.1)	▼(2.1)	▼(8.2)
Value	2,494,457	2,936,999	2,561,228	▲2.7	▲17.7	▼(12.8)
Unit value	$1.12	$1.35	$1.28	▲14.3	▲20.3	▼(5.0)
Ending inventory quantity	***	***	***	▲***	▲***	▲***
U.S. producers':						
Practical capacity quantity	1,007,486	1,034,159	1,058,254	▲5.0	▲2.6	▲2.3
Production quantity	891,535	896,036	868,932	▼(2.5)	▲0.5	▼(3.0)
Capacity utilization (fn1)	88.5	86.6	82.1	▼(6.4)	▼(1.8)	▼(4.5)
U.S. shipments:						
Quantity	854,822	861,750	801,735	▼(6.2)	▲0.8	▼(7.0)
Value	1,229,590	1,347,628	1,325,877	▲7.8	▲9.6	▼(1.6)
Unit value	$1.44	$1.56	$1.65	▲15.0	▲8.7	▲5.8
Export shipments:						
Quantity	11,408	15,019	14,560	▲27.6	▲31.7	▼(3.1)
Value	19,404	26,704	27,995	▲44.3	▲37.6	▲4.8
Unit value	$1.70	$1.78	$1.92	▲13.0	▲4.5	▲8.1
Ending inventory quantity	295,902	307,900	322,242	▲8.9	▲4.1	▲4.7
Inventories/total shipments (fn1)	34.2	35.1	39.5	▲5.3	▲1.0	▲4.4

Table continued.

Table C-1 Continued
Ceramic tile: Summary data concerning the U.S. market, by item and period
Quantity=1,000 of square feet; Value=1,000 dollars; Unit values, unit labor costs, and unit expenses=dollars per square foot; Period changes=percent--exceptions noted

Item	Reported data			Period changes		
	Calendar year			Comparison years		
	2021	2022	2023	2021-23	2021-22	2022-23
U.S. producers': Continued						
Production workers	3,679	3,779	3,976	▲8.1	▲2.7	▲5.2
Hours worked (1,000s)	7,538	7,518	7,943	▲5.4	▼(0.3)	▲5.7
Wages paid ($1,000)	211,541	224,720	244,192	▲15.4	▲6.2	▲8.7
Hourly wages (dollars per hour)	$28.06	$29.89	$30.74	▲9.5	▲6.5	▲2.9
Productivity (square feet per hour)	118.3	119.2	109.4	▼(7.5)	▲0.8	▼(8.2)
Unit labor costs	$0.24	$0.25	$0.28	▲18.4	▲5.7	▲12.1
Net sales:						
Quantity	866,230	876,772	816,288	▼(5.8)	▲1.2	▼(6.9)
Value	1,248,994	1,374,332	1,353,871	▲8.4	▲10.0	▼(1.5)
Unit value	$1.44	$1.57	$1.66	▲15.0	▲8.7	▲5.8
Cost of goods sold (COGS)	829,222	926,385	929,458	▲12.1	▲11.7	▲0.3
Gross profit or (loss) (fn2)	419,772	447,947	424,413	▲1.1	▲6.7	▼(5.3)
SG&A expenses	354,325	390,871	409,647	▲15.6	▲10.3	▲4.8
Operating income or (loss) (fn2)	65,447	57,076	14,766	▼(77.4)	▼(12.8)	▼(74.1)
Net income or (loss) (fn2)	51,039	43,465	(17,656)	▼---	▼(14.8)	▼---
Unit COGS	$0.96	$1.06	$1.14	▲18.9	▲10.4	▲7.8
Unit SG&A expenses	$0.41	$0.45	$0.50	▲22.7	▲9.0	▲12.6
Unit operating income or (loss) (fn2)	$0.08	$0.07	$0.02	▼(76.1)	▼(13.8)	▼(72.2)
Unit net income or (loss) (fn2)	$0.06	$0.05	$(0.02)	▼---	▼(15.9)	▼---
COGS/sales (fn1)	66.4	67.4	68.7	▲2.3	▲1.0	▲1.2
Operating income or (loss)/sales (fn1)	5.2	4.2	1.1	▼(4.1)	▼(1.1)	▼(3.1)
Net income or (loss)/sales (fn1)	4.1	3.2	(1.3)	▼(5.4)	▼(0.9)	▼(4.5)
Capital expenditures	41,743	147,247	220,556	▲428.4	▲252.7	▲49.8
Research and development expenses	10,046	10,502	11,693	▲16.4	▲4.5	▲11.3
Total assets	2,173,363	1,984,705	2,015,393	▼(7.3)	▼(8.7)	▲1.5

Source: Compiled from data submitted in response to Commission questionnaires and official U.S. import statistics of the U.S. Department of Commerce Census Bureau using statistical reporting numbers 6907.21.1005, 6907.21.1011, 6907.21.1051, 6907.21.2000, 6907.21.3000, 6907.21.4000, 6907.21.9011, 6907.21.9051, 6907.22.1005, 6907.22.1011, 6907.22.1051, 6907.22.2000, 6907.22.3000, 6907.22.4000, 6907.22.9011, 6907.22.9051, 6907.23.1005, 6907.23.1011, 6907.23.1051, 6907.23.2000, 6907.23.3000, 6907.23.4000, 6907.23.9011, 6907.23.9051, 6907.30.1005, 6907.30.1011, 6907.30.1051, 6907.30.2000, 6907.30.3000, 6907.30.4000, 6907.30.9011, 6907.30.9051, 6907.40.1005, 6907.40.1011, 6907.40.1051, 6907.40.2000, 6907.40.3000, 6907.40.4000, 6907.40.9011, and 6907.40.9051, accessed May 7, 2024. Imports are based on the imports for consumption data series. Value data reflect landed duty-paid values. 508-compliant tables containing these data are contained in parts III, IV, VI, and VII of this report.

Note.--Shares and ratios shown as "0.0" percent represent non-zero values less than "0.05" percent (if positive) and greater than "(0.05)" percent (if negative). Zeroes, null values, and undefined calculations are suppressed and shown as "---". Period changes preceded by a "▲" represent an increase, while period changes preceded by a "▼" represent a decrease.

fn1.--Reported data are in percent and period changes are in percentage points.
fn2.--Percent changes only calculated when both comparison values represent profits; The directional change in profitability provided when one or both comparison values represent a loss.

APPENDIX D

U.S. SHIPMENTS BY CHANNELS OF DISTRIBUTION AND PRODUCT TYPE

Table D-1
Ceramic tile: U.S. producers' and U.S. importers' U.S. shipments to distributors, by source and year

Quantity in 1,000 of square feet; share in percent

Source	Measure	2021	2022	2023
U.S. producers	Quantity	***	***	***
India	Quantity	***	***	***
Nonsubject sources	Quantity	***	***	***
All import sources	Quantity	***	***	***
All sources	Quantity	***	***	***
U.S. producers	Share	***	***	***
India	Share	***	***	***
Nonsubject sources	Share	***	***	***
All import sources	Share	***	***	***
All sources	Share	100.0	100.0	100.0
U.S. producers	Ratio	***	***	***
India	Ratio	***	***	***
Nonsubject sources	Ratio	***	***	***
All import sources	Ratio	***	***	***
All sources	Ratio	***	***	***

Source: Compiled from data submitted in response to Commission questionnaires.

Note: Shares and ratios shown as "0.0" represent values greater than zero, but less than "0.05" percent. Zeroes, null values, and undefined calculations are suppressed and shown as "---".

Table D-2
Ceramic tile: U.S. producers' and U.S. importers' U.S. shipments to retailers, by source and year

Quantity in 1,000 of square feet; share in percent

Source	Measure	2021	2022	2023
U.S. producers	Quantity	***	***	***
India	Quantity	***	***	***
Nonsubject sources	Quantity	***	***	***
All import sources	Quantity	***	***	***
All sources	Quantity	***	***	***
U.S. producers	Share	***	***	***
India	Share	***	***	***
Nonsubject sources	Share	***	***	***
All import sources	Share	***	***	***
All sources	Share	100.0	100.0	100.0
U.S. producers	Ratio	***	***	***
India	Ratio	***	***	***
Nonsubject sources	Ratio	***	***	***
All import sources	Ratio	***	***	***
All sources	Ratio	***	***	***

Source: Compiled from data submitted in response to Commission questionnaires.

Note: Shares and ratios shown as "0.0" represent values greater than zero, but less than "0.05" percent. Zeroes, null values, and undefined calculations are suppressed and shown as "---".

Table D-3
Ceramic tile: U.S. producers' and U.S. importers' U.S. shipments to end users, by source and year

Quantity in 1,000 of square feet; share in percent

Source	Measure	2021	2022	2023
U.S. producers	Quantity	***	***	***
India	Quantity	***	***	***
Nonsubject sources	Quantity	***	***	***
All import sources	Quantity	***	***	***
All sources	Quantity	***	***	***
U.S. producers	Share	***	***	***
India	Share	***	***	***
Nonsubject sources	Share	***	***	***
All import sources	Share	***	***	***
All sources	Share	100.0	100.0	100.0
U.S. producers	Ratio	***	***	***
India	Ratio	***	***	***
Nonsubject sources	Ratio	***	***	***
All import sources	Ratio	***	***	***
All sources	Ratio	***	***	***

Source: Compiled from data submitted in response to Commission questionnaires.

Note: Shares and ratios shown as "0.0" represent values greater than zero, but less than "0.05" percent. Zeroes, null values, and undefined calculations are suppressed and shown as "---".

Table D-4
Ceramic tile: U.S. producers' and U.S. importers' U.S. shipments of floor tiles, by source and type, 2023

Quantity in 1,000 of square feet; share in percent

Source	Measure	Non-mosaic large: Floor	Non-mosaic small and medium: Floor	Non-mosaic: Floor	Mosaic: Floor	All sizes: Floor
U.S. producers	Quantity	***	***	***	***	***
India	Quantity	***	***	***	***	***
Nonsubject sources	Quantity	***	***	***	***	***
All import sources	Quantity	***	***	***	***	***
All sources	Quantity	***	***	***	***	***
U.S. producers	Share	***	***	***	***	***
India	Share	***	***	***	***	***
Nonsubject sources	Share	***	***	***	***	***
All import sources	Share	***	***	***	***	***
All sources	Share	100.0	100.0	100.0	100.0	100.0

Source: Compiled from data submitted in response to Commission questionnaires.

Note: Shares and ratios shown as "0.0" represent values greater than zero, but less than "0.05" percent. Zeroes, null values, and undefined calculations are suppressed and shown as "---".

Figure D-1
Ceramic tile: U.S. producers' and U.S. importers' U.S. shipments of floor tiles, by source and type, 2023

* * * * * * *

Source: Compiled from data submitted in response to Commission questionnaires.

Table D-5
Ceramic tile: U.S. producers' and U.S. importers' U.S. shipments of wall tiles, by source and type, 2023

Quantity in 1,000 of square feet; share in percent

Source	Measure	Non-mosaic large: Wall	Non-mosaic small and medium: Wall	Non-mosaic: Wall	Mosaic: Wall	All sizes: Wall
U.S. producers	Quantity	***	***	***	***	***
India	Quantity	***	***	***	***	***
Nonsubject sources	Quantity	***	***	***	***	***
All import sources	Quantity	***	***	***	***	***
All sources	Quantity	***	***	***	***	***
U.S. producers	Share	***	***	***	***	***
India	Share	***	***	***	***	***
Nonsubject sources	Share	***	***	***	***	***
All import sources	Share	***	***	***	***	***
All sources	Share	100.0	100.0	100.0	100.0	100.0

Source: Compiled from data submitted in response to Commission questionnaires.
Note: Shares and ratios shown as "0.0" represent values greater than zero, but less than "0.05" percent. Zeroes, null values, and undefined calculations are suppressed and shown as "---".

Figure D-2
Ceramic tile: U.S. producers' and U.S. importers' U.S. shipments of wall tiles, by source and type, 2023

* * * * * * *

Source: Compiled from data submitted in response to Commission questionnaires.

Table D-6
Ceramic tile: U.S. producers' and U.S. importers' U.S. shipments of other tiles, by source and type, 2023

Quantity in 1,000 of square feet; share in percent

Source	Measure	Non-mosaic large: Other	Non-mosaic small and medium: Other	Non-mosaic: Other	Mosaic: Other	All sizes: Other
U.S. producers	Quantity	***	***	***	***	***
India	Quantity	***	***	***	***	***
Nonsubject sources	Quantity	***	***	***	***	***
All import sources	Quantity	***	***	***	***	***
All sources	Quantity	***	***	***	***	***
U.S. producers	Share	***	***	***	***	***
India	Share	***	***	***	***	***
Nonsubject sources	Share	***	***	***	***	***
All import sources	Share	***	***	***	***	***
All sources	Share	---	100.0	100.0	100.0	100.0

Source: Compiled from data submitted in response to Commission questionnaires.

Note: Shares and ratios shown as "0.0" represent values greater than zero, but less than "0.05" percent. Zeroes, null values, and undefined calculations are suppressed and shown as "---".

Figure D-3
Ceramic tile: U.S. producers' and U.S. importers' U.S. shipments of other tiles, by source and type, 2023

* * * * * * *

Source: Compiled from data submitted in response to Commission questionnaires.

APPENDIX E

HISTORICAL IMPORT DATA

Table E-1
Ceramic tile: Historical U.S. imports, by source and period

Quantity in 1,000 of square feet; share in percent

Source	Measure	2016	2017	2018	2019
Currently investigated sources: India	Quantity	3,880	7,716	17,169	68,122
Previously investigated sources: China	Quantity	579,525	657,091	690,580	435,856
All other sources	Quantity	1,396,783	1,434,376	1,482,597	1,553,266
All import sources	Quantity	1,980,188	2,099,183	2,190,345	2,057,244
Currently investigated sources: India	Share	0.2	0.4	0.8	3.3
Previously investigated sources: China	Share	29.3	31.3	31.5	21.2
All other sources	Share	70.5	68.3	67.7	75.5
All import sources	Share	100.0	100.0	100.0	100.0

Table continued.

Table E-1—Continued
Ceramic tile: Historical U.S. imports, by source and period

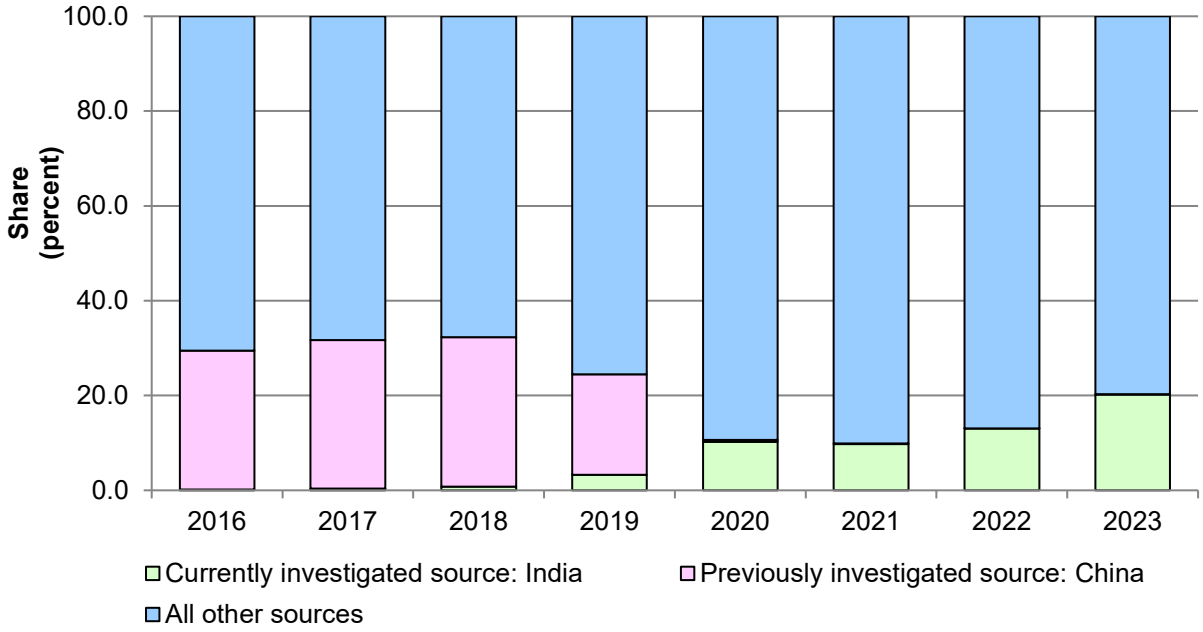
Quantity in 1,000 of square feet; share in percent

Source	Measure	2020	2021	2022	2023
Currently investigated sources: India	Quantity	200,598	217,789	283,935	404,927
Previously investigated sources: China	Quantity	7,724	2,221	1,259	834
All other sources	Quantity	1,748,917	2,005,153	1,892,946	1,593,757
All import sources	Quantity	1,957,239	2,225,163	2,178,139	1,999,518
Currently investigated sources: India	Share	10.2	9.8	13.0	20.3
Previously investigated sources: China	Share	0.4	0.1	0.1	0.0
All other sources	Share	89.4	90.1	86.9	79.7
All import sources	Share	100.0	100.0	100.0	100.0

Source: Compiled from official U.S. import statistics of the U.S. Department of Commerce Census Bureau using statistical reporting numbers 6907.10.0000, 6907.21.1005, 6907.21.1011, 6907.21.1051, 6907.21.2000, 6907.21.3000, 6907.21.4000, 6907.21.9011, 6907.21.9051, 6907.22.1005, 6907.22.1011, 6907.22.1051, 6907.22.2000, 6907.22.3000, 6907.22.4000, 6907.22.9011, 6907.22.9051, 6907.23.1005, 6907.23.1011, 6907.23.1051, 6907.23.2000, 6907.23.3000, 6907.23.4000, 6907.23.9011, 6907.23.9051, 6907.30.1005, 6907.30.1011, 6907.30.1051, 6907.30.2000, 6907.30.3000, 6907.30.4000, 6907.30.9011, 6907.30.9051, 6907.40.1005, 6907.40.1011, 6907.40.1051, 6907.40.2000, 6907.40.3000, 6907.40.4000, 6907.40.9011, 6907.40.9051, 6907.90.0011, 6907.90.0051, 6908.10.1000, 6908.10.2000, 6908.10.5000, 6908.90.0011, and 6908.90.0051, accessed May 20, 2024. Imports are based on the imports for consumption data series.

Note: Shares and ratios shown as "0.0" represent values greater than zero, but less than "0.05" percent. Zeroes, null values, and undefined calculations are suppressed and shown as "---".

Figure E-1
Ceramic tile: Share of historical U.S. imports, by source and period, 2023



Source: Compiled from official U.S. import statistics of the U.S. Department of Commerce Census Bureau using statistical reporting numbers 6907.10.0000, 6907.21.1005, 6907.21.1011, 6907.21.1051, 6907.21.2000, 6907.21.3000, 6907.21.4000, 6907.21.9011, 6907.21.9051, 6907.22.1005, 6907.22.1011, 6907.22.1051, 6907.22.2000, 6907.22.3000, 6907.22.4000, 6907.22.9011, 6907.22.9051, 6907.23.1005, 6907.23.1011, 6907.23.1051, 6907.23.2000, 6907.23.3000, 6907.23.4000, 6907.23.9011, 6907.23.9051, 6907.30.1005, 6907.30.1011, 6907.30.1051, 6907.30.2000, 6907.30.3000, 6907.30.4000, 6907.30.9011, 6907.30.9051, 6907.40.1005, 6907.40.1011, 6907.40.1051, 6907.40.2000, 6907.40.3000, 6907.40.4000, 6907.40.9011, 6907.40.9051, 6907.90.0011, 6907.90.0051, 6908.10.1000, 6908.10.2000, 6908.10.5000, 6908.90.0011, and 6908.90.0051, accessed May 20, 2024. Imports are based on the imports for consumption data series.