



SGS U.S. Testing Company Inc.

1341 North 108th East Avenue
Tulsa, OK 74116
Tel: 918-437-8333
Fax: 918-437-8487

Report No.: 111646-1

Date: 9/10/98

Page 1 of 2

REPORT OF TEST

CLIENT: Shamrock Mining Associates
2870 South 20th East
Salt Lake City, UT 84106

Attn: Peggy Ivers

SUBJECT: ASTM C 97 Water Absorption, Density and Specific Gravity of Marble Dimension Stone.

REFERENCE: Letter.

SAMPLE ID: Samples identified as "Honeycomb Calcite" were received from the client on 7/2/98. The samples were received in good condition.

PROCEDURE: Stone samples were tested for water absorption, density and specific gravity in accordance with ASTM C 97. No revisions to this report will be allowed after 90 days of the report date.

RESULTS: See test data and results on the following page.

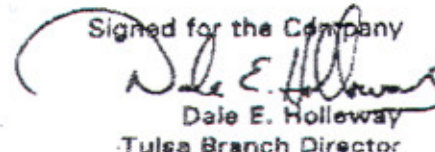
TEST DATE: 7/21/98 thru 7/23/98.

CONCLUSION: The material tested meets the minimum requirements of ASTM C503-96 for water absorption of marble dimension stone.

The material tested meets the minimum requirements of ASTM C503-96 for density and specific gravity of marble dimension stone.


Greg Ratliff, Engineer

bk

Signed for the Company

Dale E. Holleway
Tulsa Branch Director

Member of the SGS Group

ANALYTICAL SERVICES - PERFORMANCE TESTING - STANDARDS EVALUATION - CERTIFICATION SERVICES
SGS U.S. TESTING COMPANY INC. REPORTS ARE FOR THE EXCLUSIVE USE OF THE CLIENT TO WHOM THEY ARE ADDRESSED. ANYONE RELYING ON SUCH REPORTS SHOULD UNDERSTAND ALL OF THE DETAILS OF THE ENGAGEMENT. REPORTS REFLECT RESULTS ONLY OF THE STANDARD OR PROCEDURE IDENTIFIED TO THE TESTS CONDUCTED AND ARE LIMITED TO THE SAMPLES TESTED. TEST RESULTS MAY NOT BE INDICATIVE OF THE QUALITY OF THE LOT FROM WHICH THE SAMPLE WAS TAKEN. SGS U.S. TESTING COMPANY INC. HAS NOT CONDUCTED ANY QUALITY CONTROL PROGRAM FOR THE CLIENT. NEITHER THE NAME, SEALS, MARKS NOR INSIGNS OF SGS U.S. TESTING COMPANY INC. MAY BE USED IN ANY ADVERTISING OR PROMOTIONAL MATERIALS WITHOUT THE PRIOR WRITTEN APPROVAL OF SGS U.S. TESTING COMPANY INC. THIS REPORT SHALL NOT BE REPRODUCED EXCEPT IN FULL WITH THE WRITTEN PERMISSION OF THE SGS U.S. TESTING COMPANY INC. SAMPLES NOT DESTROYED IN TESTING ARE DISPOSED OF AFTER 90 DAYS.



CLIENT: Shamrock Mining Associates, UT

Report No.: 111848-1

Date: 9/10/98

Page 2 of 2

RESULTS:

Absorption and Specific Gravity (ASTM C 97):

<u>Specimen</u>	<u>Wet Weight (g)</u>	<u>Dry Weight (g)</u>	<u>Volume (cc)</u>	<u>Density (lb/ft³)</u>	<u>Specific Gravity</u>	<u>Absorption (%)</u>
1	363.53	363.48	133.38	170.04	2.725	0.014
2	363.68	363.53	133.84	169.74	2.720	0.041
3	378.21	376.08	137.87	170.22	2.728	0.035
Average	-	-	-	170.00	2.724	0.030

Requirements: ASTM C 503-98

Absorption: 0.20%, maximum

Density: Calcite: 162 lb/ft³, min.
 Dolomite: 175 lb/ft³, min.
 Serpentine: 168 lb/ft³, min.
 Travertine: 144 lb/ft³, min.

 End of Report

REPORT OF TEST



1341 North 108th East Avenue
Tulsa, OK 74118
Tel: 918-437-8333
Fax: 918-437-8487

Report No.: 111848-2
Date: 9/10/98
Page 1 of 2

CLIENT: Shamrock Mining Associates
2670 South 20th East
Salt Lake City, UT 84106
Attn: Peggy Ivers

SUBJECT: ASTM C 99 Modulus of Rupture of Marble Dimension Stone.

SAMPLE ID: Samples identified as "Honeycomb Calcite" were received from the client on 9/25/98. The samples were received in good condition.

PROCEDURE: Stone samples were tested for Modulus of Rupture in accordance with ASTM C 99. No revisions to this report will be allowed after 90 days of the report date.

RESULTS: See test data and results on the following page.

TEST DATE: 9/3/98

CONCLUSION: Material tested meet the minimum requirements of ASTM C 503-96 for modulus of rupture of marble dimension stone.

REPORT OF TEST

bk

[Signature]
Greg Knight, Engineer

Signed for the Company
[Signature]
Dale E. Holloway
Tulsa Branch Director

Member of the SGS Group

ANALYTICAL SERVICES - PERFORMANCE TESTING - STANDARDS EVALUATION - CERTIFICATION SERVICES
SGS U.S. TESTING COMPANY INC. REPORTS ARE FOR THE EXCLUSIVE USE OF THE CLIENT TO WHOM THEY ARE ADDRESSED. ANYONE RELYING ON SUCH REPORTS SHOULD UNDERSTAND ALL OF THE DETAILS OF THE ENGAGEMENT. REPORTS REFLECT RESULTS ONLY OF THE STANDARDS OR PROCEDURES IDENTIFIED TO THE TESTS CONDUCTED AND ARE LIMITED TO THE SAMPLES TESTED. TEST RESULTS MAY NOT BE INDICATIVE OF THE QUALITY OF THE LOT FROM WHICH THE SAMPLE WAS TAKEN. SGS U.S. TESTING COMPANY INC. HAS NOT CONDUCTED ANY QUALITY CONTROL PROGRAM FOR THE CLIENT. NEITHER THE NAME, SEALS, MARKS NOR SIGNS OF SGS U.S. TESTING COMPANY INC. MAY BE USED IN ANY MANNER, ISUES OR PROMOTIONAL MATERIALS WITHOUT THE PRIOR WRITTEN APPROVAL OF SGS U.S. TESTING COMPANY INC. THIS REPORT SHALL NOT BE REPRODUCED EXCEPT IN FULL WITH OUT THE WRITTEN PERMISSION OF THE SGS U.S. TESTING COMPANY INC. SAMPLES NOT DESTROYED IN TESTING ARE PRESERVED FOR AFTER 90 DAYS.



Client: Shamrock Mining Associates, UT

Report No.: 111648-2

Date: 9/10/98

Page 2 of 2

TEST RESULTS:

ASTM C 99 Modulus of Rupture

<u>Specimen</u>	<u>Width, in.</u>	<u>Thickness, in.</u>	<u>Ultimate Load, lbs.</u>	<u>Modulus of Rupture, psi</u>
1	4.042	2.212	1492	792
2	3.986	2.306	3109	1540
3	4.004	2.346	1923	916
4	4.003	2.340	1924	922
5	3.973	2.351	1851	885
Average				1011

Requirement: ASTM C 503-96 Marble Dimension Stone
1000 psi, min.*****
End of Report

REPORT OF TEST



SGS U.S. Testing Company Inc.

1341 North 108th East Avenue
Tulsa, OK 74116
Tel: 918-437-8333
Fax: 918-437-8487

Report No.: 111846-3
Date: 9/10/98
Page 1 of 2

CLIENT: Shamrock Mining Associates
2870 South 20th East
Salt Lake City, UT 84106
Attn: Peggy Ivers

SUBJECT: ASTM C 170 Compressive Strength of Marble Dimension Stone.

REFERENCE: Letter.

SAMPLE ID: Samples identified as "Honeycomb Calcite" were received from the client on 7/2/98. The samples were received in good condition.

PROCEDURE: Stone samples were tested for compressive strength in accordance with ASTM C 170. No revisions to this report will be allowed after 90 days of the report date.

RESULTS: See test data and results on the following page.

TEST DATE: 7/23/98.

CONCLUSION: Material tested meets the minimum requirements of ASTM C503-96 for compressive strength of marble dimension stone.

REPORT OF TEST

bk


Greg Ratliff, Engineer

Signed for the Company


Dale E. Holloway
Tulsa Branch Director

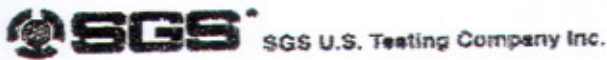
Member of the SGS Group

ANALYTICAL SERVICES - PERFORMANCE TESTING - STANDARD EVALUATION - CERTIFICATION SERVICES
SGS U.S. TESTING COMPANY INC. REPORTS ARE FOR THE EXCLUSIVE USE OF THE CLIENT TO WHOM THEY ARE ADDRESSED. ANYONE RELYING ON SUCH REPORTS SHOULD UNDERSTAND ALL OF THE DETAILS OF THE ENGAGEMENT. REPORTS REFLECT RESULTS ONLY OF THE STANDARD OR PROCEDURE IDENTIFIED TO THE TESTS CONDUCTED AND ARE LIMITED TO THE SAMPLES TESTED. TEST RESULTS MAY NOT BE INDICATIVE OF THE QUALITY OF THE LOT FROM WHICH THE SAMPLE WAS TAKEN. SGS U.S. TESTING COMPANY INC. HAS NOT CONDUCTED ANY QUALITY CONTROL PROGRAM FOR THE CLIENT. NEITHER THE NAME, SEALS, MARKS NOR INSIGNIA OF SGS U.S. TESTING COMPANY INC. MAY BE USED IN ANY ADVERTISING OR PROMOTIONAL MATERIALS WITHOUT THE PRIOR WRITTEN APPROVAL OF SGS U.S. TESTING COMPANY INC. THIS REPORT SHALL NOT BE REPRODUCED EXCEPT IN FULL WITH OUT THE WRITTEN PERMISSION OF THE SGS U.S. TESTING COMPANY INC. SAMPLES NOT DESTROYED IN TESTING ARE DISPOSED OF AFTER 90 DAYS.

FROM :

PHONE NO. :

P86



Client: Shamrock Mining Associates, UT

Report No.: 111648-3

Date: 9/10/98

Page 2 of 2

TEST RESULTS:

Compressive Strength (ASTM C 170):

Specimen	Width (in.)	Length (in.)	Thickness (in.)	Load (psi)	Compressive Strength (psi)
1	2.045	2.040	2.038	54883	13103
2	2.037	2.044	2.028	39058	9381
3	2.036	2.054	1.894	26741	6384
4	2.048	2.039	2.001	29556	7078
5	2.052	2.024	2.014	13496	3250
Average	-	-	-	-	7841

Requirements: ASTM C 503-96 7,500 psi, min.

End of Report

REPORT OF TEST



SGS U.S. Testing Company Inc.

1341 North 108th East Avenue
Tulsa, OK 74116
Tel: 918-437-8333
Fax: 918-437-8487

Report No.: 111646-4
Date: 9/10/98
Page 1 of 2

CLIENT: Shamrock Mining Associates
2670 South 20th East
Saft Lake City, UT 84109
Attn: Peggy Ivers

SUBJECT: ASTM C 241 Abrasion Resistance of Marble Dimension Stone.

SAMPLE ID: Samples identified as "Honeycomb Calcite" were received from the client on 7/2/98. The samples were received in good condition.

PROCEDURE: Stone samples were tested for Abrasion Resistance in accordance with ASTM C 241. No revisions to this report will be allowed after 90 days of the report date.

RESULTS: See test data and results on the following page.

TEST DATE: 7/20/98

CONCLUSION: Material tested does not meet the minimum requirements of ASTM C 503-96 for abrasion resistance of marble dimension stone.

REPORT OF TEST

bk

[Signature]
Greg Ruffin, Engineer

Signed for the Company
[Signature]
Dale E. Holloway
Tulsa Branch Director

Member of the SGS Group

ANALYTICAL SERVICES • PERFORMANCE TESTING • STANDARDS EVALUATION • CERTIFICATION SERVICES
SGS U.S. TESTING COMPANY INC. REPORTS ARE FOR THE EXCLUSIVE USE OF THE CLIENT TO WHOM THEY ARE ADDRESSED. ANYONE RELYING ON SUCH REPORTS SHOULD UNDERSTAND ALL OF THE DETAILS OF THE ENGAGEMENT. REPORTS REFLECT RESULTS ONLY OF THE STANDARDS OR PROCEDURES IDENTIFIED TO THE TESTS CONDUCTED AND ARE LIMITED TO THE SAMPLES TESTED. TEST RESULTS MAY NOT BE INDICATIVE OF THE QUALITIES OF THE LOT FROM WHICH THE SAMPLE WAS TAKEN. SGS U.S. TESTING COMPANY INC. HAS NOT CONDUCTED ANY QUALITY CONTROL PROGRAM FOR THE CLIENT. NEITHER THE NAME, SEALS, MARKS NOR INSIGNIA OF SGS U.S. TESTING COMPANY INC. MAY BE USED IN ANY ADVERTISING OR PROMOTIONAL MATERIALS WITHOUT THE PRIOR WRITTEN APPROVAL OF SGS U.S. TESTING COMPANY INC. THIS REPORT SHALL NOT BE REPRODUCED EXCEPT IN PART WITHOUT THE WRITTEN PERMISSION OF THE SGS U.S. TESTING COMPANY INC. SAMPLES NOT DESTROYED BY TESTING ARE DISPOSED OF AFTER 30 DAYS.

FROM :

PHONE NO. :

P08



Client: Shamrock Mining Associates, UT

Report No.: 111646-4

Date: 9/10/98

Page 2 of 2

TEST RESULTS:

ASTM C 241 Abrasion Resistance

<u>Specimen</u>	<u>Bulk Specific Gravity</u>	<u>Average Weight (g)</u>	<u>Weight Loss (g)</u>	<u>Abrasion Resistance</u>
1	2.727	182.65	3.881	7.66
2	2.731	165.53	3.991	7.46
3	2.730	164.69	3.123	9.50
Average	2.729			8.21

Requirement: ASTM C 503-96
10.0 psi, min.

End of Report

REPORT OF TEST



SGS U.S. Testing Company Inc.

1341 North 106th East Avenue
Tulsa, OK 74116
Tel: 918-437-8333
Fax: 918-437-8487

Report No.: 111648-5

Date: 9/10/98

Page 1 of 2

CLIENT: Shamrock Mining Associates
2670 South 20th East
Salt Lake City, UT 84109

Attn: Peggy Ivers

SUBJECT: ASTM C 880 Flexural Strength of Marble Dimension Stone.

SAMPLE ID: Samples identified as "Honeycomb Calcite" were received from the client on 8/25/98. The samples were received in good condition.

PROCEDURE: Stone samples were tested for flexural strength in the wet/dry condition in accordance with ASTM C 880. No revisions to this report will be allowed after 90 days of the report date.

RESULTS: See test data and results on the following page.

TEST DATE: 9/3/98

CONCLUSION: Material tested does not meet the minimum requirements of ASTM C 503-96 for flexural strength of marble dimension stone.

REPORT OF TEST


Greg Ratliff, Engineer

bk

Signed for the Company


Dale E. Holloway

Tulsa Branch Director

Member of the SGS Group

ANALYTICAL SERVICES • PERFORMANCE TESTING • STANDARDS EVALUATION • CERTIFICATION SERVICES
SGS U.S. TESTING COMPANY INC. REPORTS ARE FOR THE EXCLUSIVE USE OF THE CLIENT TO WHOM THEY ARE ADDRESSED. ANYONE RELYING ON SUCH REPORTS SHOULD UNDERSTAND ALL OF THE DETAILS OF THE ENGAGEMENT. REPORTS REFLECT RESULTS ONLY OF THE STANDARDS OR PROCEDURES IDENTIFIED TO THE TESTS CONDUCTED AND ARE LIMITED TO THE SAMPLES TESTED. TEST RESULTS MAY NOT BE INDICATIVE OF THE QUALITIES OF THE LOT FROM WHICH THE SAMPLE WAS TAKEN. SGS U.S. TESTING COMPANY INC. HAS NOT CONDUCTED ANY QUALITY CONTROL PROGRAM FOR THE CLIENT. NEITHER THE NAME, SEALS, MARKS NOR INSIGNIA OF SGS U.S. TESTING COMPANY INC. MAY BE USED IN ANY ADVERTISING OR PROMOTIONAL MATERIALS WITHOUT THE PRIOR WRITTEN APPROVAL OF SGS U.S. TESTING COMPANY INC. THIS REPORT SHALL NOT BE REPRODUCED EXCEPT IN FULL WITH OUT THE WRITTEN PERMISSION OF THE SGS U.S. TESTING COMPANY INC. SAMPLES NOT DESTROYED IN TESTING ARE DISPOSED OF AFTER 90 DAYS.



Client: Shamrock Mining Associates, UT

Report No.: 111646-5

Date: 9/10/98

Page 2 of 2

TEST RESULTS:

ASTM C 880 Flexural Strength

<u>Specimen</u>	<u>Thickness (in.)</u>	<u>Width (in.)</u>	<u>Ultimate Load (lb)</u>	<u>Flexural Strength (psi)</u>
1	1.376	4.028	725	856
2	1.220	4.025	334	502
3	1.150	3.920	22	38
4	1.184	4.091	131	206
5	1.123	3.900	132	242
Average				369

Requirement: ASTM C 503-96
1000 psi, min.*****
End of Report

REPORT OF TEST

DataChem Laboratories CHAIN-OF-CUSTODY

First Sampling Date: 15-Jul-2005

Page 1 of 1

Results due by: 20-Jul-2005

Project / Job / Task: P0567001
 Client: SHAMLOCK MINING
 Root Set ID: 05E-0377 *
 Account: 08002
 Reporting Group: 01
 Split: _____
 Comments: _____
 Analysis: _____

Date Sampled	Field #	Field Name	DOC Sample Name	DOC Sample ID	QC	Matrix	Customer ID	Reporting Group	#
05-21-2005		HONEYCOMB	05E03100			SOLID	CALUMET	01	1
									2
									3
									4
									5
									6
									7
									8
									9
									10

<p style="text-align: center;">ORIGINAL FIELD SAMPLE CHAIN-OF-CUSTODY</p> <p>Prepared By: (Signature) _____ Date/Time: _____ Reason for Transfer: _____ Storage Location: _____</p>	<p style="text-align: center;">SAMPLE PREPARATION ANALYSIS CHAIN-OF-CUSTODY</p> <p>Sample Prep. Analysis for: _____ Lab Notebook No. _____ Prepared/Analyzed by: _____ Date/Time: _____</p> <p>Requisitioned By: (Signature) _____ Date/Time: _____ Received By: (Signature) _____ Reason for Transfer: _____ Storage Location: _____</p>
---	---