

Client: **Elite Crete Systems**  
 Project: **Elite Crete E96 Testing**  
 Contact: **R&D Department**

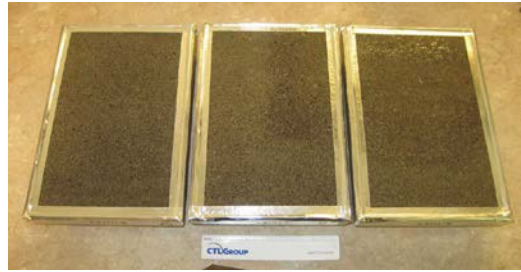
CTLGroup project no.: **281418**  
 CTLGroup project mgr.: **E. Rodenkirch**  
 Analyst/Technician: **M. Klaric, B. Demharter**  
 Approved: **E. Rodenkirch**

**ASTM E96-13 Standard Test Method for Water Vapor Transmission of Materials**

**RESULTS**

**E100-PT1 @ 8 mils    0.18    net perms (grains h<sup>-1</sup> ft<sup>-2</sup> in Hg<sup>-1</sup>)**

**SPECIMEN PHOTOGRAPH**



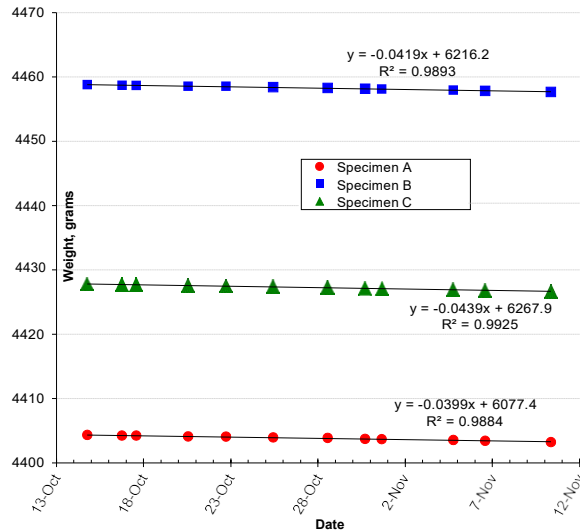
**SPECIMEN INFORMATION**

Client ID: **E100-PT1 @ 8 mils**  
 CTLGroup ID: **3757005**  
 Material type: **2-part epoxy**  
 Concrete cast date: **15-Jul-14**  
 Moist cure: **3 days**  
 Drying: **62 days**  
 Surface Profile: **CSP-3**  
 Coating Applied: **18-Sep-14**  
 Concrete thickness, in.: **1-in.**  
 Avg. Coating thickness, in.: **0.008**  
 Exposed area, in<sup>2</sup>: **56.3**  
 Mix Ratio A:B (wt:wt): **2.28:1**  
 No. Coats: **1**  
 No. Grams/Coat: **9.50**  
 Balance: **EP6102C s/n M028112**  
 Last Calibration: **5-Feb-14**  
 Prepared by: **MK/ER**

**DATA COLLECTED**

Specimen A		Specimen B		Specimen C	
date	wt, grams	date	wt, grams	date	wt, grams
9/29/14 17:48	4404.64	9/29/14 17:48	4459.08	9/29/14 17:49	4428.11
10/1/14 14:17	4404.63	10/1/14 14:18	4459.08	10/1/14 14:18	4428.09
10/3/14 16:16	4404.60	10/3/14 16:16	4459.07	10/3/14 16:16	4428.07
10/6/14 14:37	4404.50	10/6/14 14:37	4458.89	10/6/14 14:37	4428.00
10/8/14 18:32	4404.50	10/8/14 18:32	4458.95	10/8/14 18:32	4427.96
10/10/14 10:34	4404.39	10/10/14 10:34	4458.85	10/10/14 10:34	4427.83
10/14/14 18:40	4404.32	10/14/14 18:40	4458.77	10/14/14 18:40	4427.77
10/16/14 18:33	4404.21	10/16/14 18:33	4458.65	10/16/14 18:33	4427.68
10/17/14 14:03	4404.23	10/17/14 14:03	4458.64	10/17/14 14:03	4427.68
10/20/14 13:27	4404.08	10/20/14 13:27	4458.52	10/20/14 13:27	4427.54
10/22/14 17:31	4404.05	10/22/14 17:31	4458.51	10/22/14 17:31	4427.47
10/25/14 10:28	4403.91	10/25/14 10:28	4458.39	10/25/14 10:28	4427.40
10/28/14 13:33	4403.85	10/28/14 13:33	4458.26	10/28/14 13:34	4427.23
10/30/14 17:08	4403.70	10/30/14 17:08	4458.12	10/30/14 17:09	4427.12
10/31/14 15:43	4403.67	10/31/14 15:43	4458.08	10/31/14 15:43	4427.06
11/4/14 18:24	4403.54	11/4/14 18:24	4457.91	11/4/14 18:25	4426.91
11/6/14 14:13	4403.42	11/6/14 14:13	4457.81	11/6/14 14:13	4426.77
11/10/14 8:37	4403.20	11/10/14 8:38	4457.62	11/10/14 8:38	4426.59

**DATA GRAPH**



Results linear in boxed range used for calculations.

**CALCULATION OF RESULTS**

	Water Vapor Transmission, grams h <sup>-1</sup> m <sup>-2</sup>			Specimen A	Measured Permeance, Perms grains h <sup>-1</sup> ft <sup>-2</sup> in Hg <sup>-1</sup>		Average Measured Permeance, Perms grains h <sup>-1</sup> ft <sup>-2</sup> in Hg <sup>-1</sup> All Specimens	Net Perms, Corrected for Concrete Substrate grains h <sup>-1</sup> ft <sup>-2</sup> in Hg <sup>-1</sup>
	Specimen A	Specimen B	Specimen C		Specimen B	Specimen C		
<b>E100-PT1 @ 8 mils</b>	<b>0.046</b>	<b>0.048</b>	<b>0.050</b>	<b>0.16</b>	<b>0.17</b>	<b>0.17</b>	<b>0.17</b>	<b>0.18</b>
<b>Control Concrete</b>	<b>0.58</b>	<b>0.55</b>	<b>0.55</b>	<b>2.0</b>	<b>1.9</b>	<b>1.9</b>	<b>1.9</b>	<b>--</b>
<b>Aluminum Blanks</b>	<b>0.0016</b>	<b>0.0013</b>	<b>--</b>	<b>&lt;0.01</b>	<b>&lt;0.01</b>	<b>--</b>	<b>&lt;0.01</b>	<b>--</b>

**Notes**

- Water Method with coated side facing 50%RH/73°F and bottom side over water. Specimens exposed over 6.75 x 10.75 x 2.0-in. stainless steel flanged pans using SM5143 vacuum sealant tape. Results are specifically for these test conditions
- Permeance in PERMS (grains h<sup>-1</sup> ft<sup>-2</sup> in Hg<sup>-1</sup>) applies to specimens at thickness tested.
- Net permeance is calculated from the sum of the inverse perm values. These are a measure of resistance to moisture vapor movement: 1/Perm<sub>(total)</sub> = 1/Perm<sub>(concrete)</sub> + 1/Perm<sub>(coating)</sub>
- Uncoated concrete substrate (0.6 w/c) and aluminum blanks are used as control specimens.
- Calculation by least squares linear regression analysis per ASTM E96-13 Sect. 13.
- These results represent specifically the samples submitted for testing. This report may not be reproduced except in its entirety.