

**CLIENT:** **SUNGHYUN CHEMICALS CO., LTD**  
465 Chogeum-ro Geumwang-eup Eumseong-gun  
Chungbuk, Korea

**Test Report No: RJ3838P-10**

**Date: June 10, 2015**

**SAMPLE ID:** Hicote ET Vermiculite SFRM SGS Korea File No; AYAA15-07869.

**SAMPLING DETAIL:** Test samples were submitted to the laboratory directly by the client. No special sampling conditions or sample preparation were observed by QAI.

**DATE OF RECEIPT:** Samples were received at QAI on March 26, 2015.

**TESTING PERIOD:** April 27 thru May 6, 2015.

**AUTHORIZATION:** QAI Test Proposal SP-2014-081803 Rev.2 dated February 19, 2015 signed by June Lee of SGS Korea Co., Ltd on February 23, 2015.

**TEST REQUESTED:** Compressive Strength Test per ASTM E 761-92 (Reapproved 2005), *Standard Test Method for Compressive Strength of Sprayed Fire-Resistive Material Applied to Structural Members*.

**TEST PROCEDURE:** The SFRM was applied to a 175 mm (7") wide x 600 mm (24") long x 1.5 mm (16 gage) thick galvanized steel plate at a uniform thickness of 22 mm following the manufactures specification. The test specimens were conditioned to constant weight for a minimum of 8 days at a temperature of  $20^{\circ} \pm 5^{\circ}\text{C}$  and a relative humidity of  $50 \pm 5\%$  prior to testing.

**TEST RESULTS:**

Test #	Density of SFRM (pcf)	Compressive Strength at 10% Deformation (psi)
1	20.3	35.2
2	20.6	35.4
<b>Average</b>	<b>20.5</b>	<b>35.3</b>

**Tested By**



David Royer  
Laboratory Technician

**Signed for and on behalf of  
QAI Laboratories, Inc.**



Larry Burmer  
Project Leader-Physical Testing