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INTERNATIONAL FIREPROOF TECHNOLOGY, INC 17528 Von Karman Avenue Irvine, California 92614 949-975-8588

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ADDITIONAL COMPANY NAME: INTERNATIONAL CARBIDE TECHNOLOGY CO., LTD Kern-Ko Village

Lu-Chu Hsiang Taovuan Hsien 338 Taiwan 886-3-3254301

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DC315 FIELD APPLIED INTUMESCENT COATINGS

CSI Section:

09 96 43 Fire-Retardant Coatings

1.0 RECOGNITION

DC315 has been evaluated for use as a fire-protective coating for foam plastic products. The coating has been evaluated for the contribution of wall and ceiling finish materials to room fire growth and as an alternate to the prescriptive thermal barrier required in Section 2603.4 of the IBC and Section 316.4 of the IRC. The coating has also been evaluated as an alternate to the prescriptive ignition barriers required in Section 2603.4.1.6 of the IBC and Sections R316.5.3 and R316.5.4 of the IRC. DC315 evaluated in this report is a satisfactory alternative to the following codes and regulations:

- 2018, 2015 and 2012 International Building Code® (IBC)
- 2018, 2015 and 2012 International Residential Code® (IRC)
- AC456
- AC377

2.0 LIMITATIONS

Use of DC315 recognized in this report is subject to the following:

2.1 The application of any additional interior finish over the fire-protective coating is limited to interior and exterior latex or waterborne acrylic paints. Additional applications of primers, including vapor retardant coatings, applied under the DC315 fire-protective coating is acceptable and shall be applied where noted in the tested systems listed in Tables 1 and 2 of this report.

- 2.2 Spray Foam Plastic insulation shall be installed in accordance with the manufacturer's installation instructions.
- **2.3** Approval of DC315 for use with any insulation product listed herein is conditional upon that insulation products' current approval for use with DC315. Users must independently verify the current validity of any evaluation report referenced herein.
- **2.4** The fire-protective coating recognized in this report is produced by International Fireproof Technology in Taoyan, Taiwan and Irvine, California.

3.0 PRODUCT USE

3.1 Design

- 3.1.1 Application as an Alternative Thermal Barrier **Assembly:** DC315, when applied to the foam plastic products in the average nominal thickness shown in Table 1 of this report, provides an alternative thermal barrier assembly to the prescriptive thermal barrier required in Section 2603.4 of the IBC and Section R316.4 of the IRC.
- 3.1.2 Application as an Alternative Ignition Barrier **Assembly:** DC315, when applied to the foam plastic products in the average nominal thickness shown in Table 2 of this report, provides an alternative ignition barrier assembly to the prescriptive ignition barrier required in Section 2603.4.1.6 of the IBC and item 3 of Sections R316.5.3 and R316.5.4 of the IRC.
- **3.1.3 Interior Finish:** The foam plastic insulation with DC315 coating installed as shown in Tables 1 and 2 of this report meets the requirements for interior finish in IBC Section 803.1 and IRC Section R302.9, and may be left exposed to the interior of the building. The combinations shown in Table 1 have been tested in accordance with NFPA 286 and have met the acceptance criteria of 2018 IBC Section 803.1.1.1 and 2015 and 2012 IBC Section 803.1.2.1, qualifying the assembly to be used where a Class A classification in accordance with ASTM E84 or UL723 is required as applicable to Sections 803.1.2 and 803.13 of the 2018 IBC, Sections 803.1.1 and 803.11 of the 2015 IBC and Sections 803.1.1 and 803.9 of the 2012 IBC.
- 3.1.4 Use as an interior finish or interior trim in **plenums:** Foam plastic insulations installed as shown in Table 1 of this report have been evaluated for use as an interior finish or interior trim in plenums as required by Section 2603.7 of the IBC and shall exhibit a flame spread index of 75 or less and a smoke-developed index of 450 or less when tested in accordance with ASTM E84 and meets the acceptance criteria of Section 803.1.1 of the 2018 and 2012 IBC and Section 803.1.2 of the 2015 IBC when tested to NFPA 286.

The product described in this Uniform Evaluation Service (UES) Report has been evaluated as an alternative material, design or method of construction in order to satisfy and comply with the intent of the provision of the code, as noted in this report, and for at least equivalence to that prescribed in the code in quality, strength, effectiveness, fire resistance, durability and safely, as applicable, in accordance with IBC Section 104.11. This document shall only be reproduced in its entirety.

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3.2 Application

3.2.1 General: DC315 shall be applied in accordance with International Fireproof Technology's installation instructions, the spray foam plastic manufacturer's installation instructions, this evaluation report and the applicable codes listed in Section 1.0 of this report. Where conflicts occur, the more restrictive governs. The manufacturer's published installation instructions and this report shall be available and strictly adhered to at all times at the jobsite during application.

3.2.2 Application: DC315 shall be applied to the applicable foam plastic insulation as shown in <u>Table 1</u> or <u>Table 2</u> of this report, as applicable. Before application of DC315, the foam plastic insulation shall be allowed to cool and cure a minimum of one hour or as required by the foam plastic manufacturer, as applicable. The surface of the foam plastic shall be clean, firm and dry before application. DC315 shall be thoroughly mixed before application.

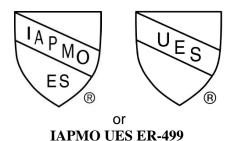
Spray polyurethane foam insulation is inherently irregular on the exposed face and can have small gaps, pin holes or minor surface irregularities. Intumescent coatings may appear to be translucent and will not hide the spray foams inherent irregularities. In the event of a fire, intumescent coatings expand and intumesce to form a protective barrier over the underlying spray foam insulation. The application rate described in Section 3.2 of this report has been shown through testing to provide adequate coverage for use over spray foam plastic insulation in accordance with the average nominal installed thickness listed in Tables 1 and 2. The application of additional intumescent paint to an assembly that already has the prescribed amount applied will not increase the fire performance and is not recommended by the manufacturer.

4.0 PRODUCT DESCRIPTION

DC315 intumescent coating is manufactured by International Fireproof Technology, Inc. and International Carbide Technology and is available in the colors of white, ice gray, dark gray and charcoal black. The coating is water-based and supplied in 5-gallon (18.9 L) pails weighing 58 lbs. (26.3 kg) and 55-gallon (208 L) drums weighing 640 lbs. (290 kg). The coating material has a maximum shelf life of 12 months when stored in factory-sealed containers at temperatures between 50°F and 90°F (10°C and 32°C). DC315 has a minimum 24-hour curing time.

5.0 IDENTIFICATION

DC315 pails and drums are identified by the International Carbide Technology or International Fireproof Technology name and address, product name (DC315), date of manufacture, product shelf life, conditions for storage and evaluation report number (ER-499). The container identification also includes the IAPMO Uniform Evaluation Service Mark of Conformity. Either Mark of Conformity may be used as shown below:



6.0 SUBSTANTIATING DATA

- **6.1** Manufacturer's descriptive literature and installation instructions. Test results are from laboratories in compliance with ISO/IEC 17025.
- **6.2** Data in accordance with the ICC-ES Acceptance Criteria for Spray-applied Foam Plastic Insulation, AC377, dated April 2016, editorially revised April 2018, including test reports in accordance with Appendix X of AC377.
- **6.3** Data in accordance with the ICC-ES Acceptance Criteria for Fire-protective Coatings Applied to Spray-applied Foam Plastic Insulation Installed Without a Code-Prescribed Thermal Barrier, AC456, dated October 2015, editorially revised July 2018.
- **6.4** Report of testing in accordance with ASTM E84 Surface Burning Characteristics of Building Materials.
- **6.5** Report of testing in accordance with NFPA 286 Standard Method of Fire Test for Evaluating Contribution of Wall and Ceiling Interior Finish to Room Fire Growth.
- **6.6** Report of Testing in accordance with ASTM D2697 Standard Test Method for Volume Nonvolatile Matter in Clear or Pigmented Coatings.
- **6.7** Report of testing in accordance with ASTM D1475 Standard Test Method for Density of Liquid Coatings, Inks and Related Products.
- **6.8** Report of testing in accordance with ASTM D2196 Standard Test Methods for Rheological Properties of Non-Newtonian Materials by Rotational Viscometer.

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7.0 STATEMENT OF RECOGNITION

This evaluation report describes the results of research carried out by IAPMO Uniform Evaluation Service on DC315 field applied intumescent coatings to the conformance to the codes shown in Section 1.0 of this report and documents the product's certification. This coating is produced at locations noted in section 2.4 of this report under a quality control program with periodic inspection under the supervision of IAPMO UES.

Brian Gerber, P.E., S.E. Vice President, Technical Operations Uniform Evaluation Service

Brian Derben

Richard Beck, PE, CBO, MCP Vice President, Uniform Evaluation Service

GP Russ Chaney
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For additional information about this evaluation report please visit $\underline{www.uniform\text{-es.org}} \text{ or email us at } \underline{info@uniform\text{-es.org}}$



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TABLE 1

Foam Plastic Products Approved for Use with DC315 As Assemblies Not Requiring A Prescriptive 15-Minute Thermal Barrier

(All alternative thermal barrier assemblies shown below are based on testing to NFPA 286)

					Application	of DC315	-		Thickness of
Manufacturer's Name	Product Name	Product Density	Evaluation Report ^{1, 2}	Average Nom Thicknes			l Application ate ³		am (inches)
rame	Nume	Density	Report	Wet Film	Dry Film	gallons/100 square feet	sqft/gal	Vertical	Overhead
Accella Polyurethane Systems dba Bayseal	Bayseal CC X	1.9 pcf	ER-522	14	9	0.87	115	5.5	9.5
Accella Polyurethane Systems dba Bayseal	Bayseal CC XP	1.9 pcf	ER-522	14	9	0.87	115	5.5	9.5
Accella Polyurethane Systems dba Bayseal	Bayseal OC	0.5 pcf	ER-519 ESR-1655	14	9	0.87	115	8.5	14
Accella Polyurethane Systems dba Bayseal	Bayseal OCX	0.5 pcf	<u>ER-541</u>	14	9	0.87	115	9	14
Accella Polyurethane Systems	EcoBay CC	1.9 pcf	ER-520 ESR-3076	18	12	1.1	89	7.25	7.25
Accella Polyurethane Systems	EcoBay CC Polar	1.9 pcf	ER-520	18	12	1.1	89	7.25	7.25
Accella Polyurethane Systems dba Premium Spray Products	Foamsulate 210	2.4 pcf	ER-351	20	13	1.3	80	8	12
Accella Polyurethane Systems dba Quadrant	NatureSeal TM 500	0.5 pcf	<u>ER-285</u>	14	9	0.87	115	9	14
Accella Polyurethane Systems dba Quadrant	NatureSeal TM OCX	0.5 pcf	<u>ER-285</u>	14	9	0.87	115	9	14
Accella Polyurethane Systems dba Premium	Foamsulate TM 220	2.2 pcf	ER-352	14	9	0.87	115	5.5	9.5
Accella Polyurethane Systems	Foamsulate TM 50	0.5 pcf	ER-351	14	9	0.87	115	8.5	14



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					Application	of DC315		Maximum Thickness of	
Manufacturer's Name	Product Name	Product Density	Evaluation Report ^{1, 2}	Average Nom Thicknes			Application ate ³		oam (inches)
Tunic	Tunic		1	Wet Film	Dry Film	gallons/100 square feet	sqft/gal	Vertical	Overhead
Accella Polyurethane Systems	Foamsulate TM 50-NIB	0.5 pcf	ER-394	14	9	0.87	115	9	14
Accella Polyurethane Systems	QuadFoam® 500	0.5 pcf	<u>ER-271</u>	14	9	0.87	115	8.5	14
Accella Polyurethane Systems	QuadFoam® 500 OC	0.5 pcf	ER-590	22	14	1.3	73	10	11.5
Accella Polyurethane Systems	QuadFoam® 2.0	2.0 pcf	<u>ER-272</u>	14	9	0.87	115	5.5	9.5
Accella Polyurethane Systems	NeXGeN® 2.0	2.0 pf	ER-523	18	12	1.1	89	7.5	11.5
Accella Polyurethane Systems	Sealtite TM CC+	1.9 pcf	<u>ER-556</u>	14	9	0.87	115	5.5	9.5
Accella Polyurethane Systems	Sealtite TM OC+	0.75 pcf	<u>ER-557</u>	14	9	0.87	115	8.5	14
Acme Urethanes	WC50	0.5 pcf	ER-605	18	12	1.1	89	10	12
Barnhardt Manufacturing Company dba NCFI Polyurethanes	InsulStar	2.0 pcf	ESR-1615	14	9	0.87	115	5.5	9.5
Barnhardt Manufacturing Company dba NCFI Polyurethanes	InsulBloc®	2.0 pcf	ESR-1615	14	9	0.87	115	5.5	9.5
Barnhardt Manufacturing Company dba NCFI Polyurethanes	Sealite OCX	0.5 pcf	ESR-3826	18	12	1.1	89	10	14
BASF Corporation	Entertite® G	0.6 pcf	ESR-3102	14	9	0.87	115	8.5	14
BASF Corporation	Enertite® NM	0.5 pcf	CCRR- 1032; ESR-3102	14	9	0.87	115	8.5	14
BASF Corporation	Spraytite 158	2.0 pcf	CCRR 1031; ESR-2642	14	9	0.87	115	5.5	9.5
BASF Corporation	Spraytite 178	2.1 pcf	CCRR 1031; ESR-2642	20	14	1.25	80	5.5	11.5
BASF Corporation	Spraytite 81205	2.0 pcf	CCRR- 1031; ESR- 2642	14	9	0.87	115	5.5	9.5
BASF Corporation	Spraytite 81206	2.0 pcf	CCRR- 1031; ESR- 2642	20	14	1.25	80	5.5	11.5
BASF Corporation	Spraytite SP	2.0 pcf	CCRR- 1031; ESR- 2642	14	9	0.87	115	5.5	9.5



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					Application	of DC315		Maximum Thickness of		
Manufacturer's Name	Product Name	Product Density	Evaluation Report ^{1, 2}	Average Nom Thickness	inal Installed ss ⁴ (mils)	Theoretical A		Spray Foam (inches)		
Tunic		·		Wet Film	Dry Film	gallons/ 100 square feet	sqft/gal	Vertical	Overhead	
BASF Corporation	Walltite HP+	2.0 pcf	CCRR- 1031; ESR- 2642	20	14	1.25	80	5.5	11.5	
BASF Corporation	Walltite US-N	2.0 pcf	CCRR- 1031; ESR- 2642	20	14	1.25	80	5.5	11.5	
BASF Corporation	Walltite US	2.0 pcf	CCRR- 1031; ESR- 2642	20	14	1.25	80	5.5	11.5	
Carlisle Spray Foam Insulation	SealTite Pro Closed Cell	1.9 pcf	ER-621	14	9	0.87	115	5.5	9.5	
Carlisle Spray Foam Insulation	SealTite Closed Cell	1.9 pcf	<u>ER-626</u>	14	9	0.87	115	5.5	9.5	
Carlisle Spray Foam Insulation	SealTite Pro OneZero Closed Cell	1.9 pcf	<u>ER-640</u>	14	9	0.87	115	5.5	9.5	
Carlisle Spray Foam Insulation	SealTite OneZero Closed Cell	1.9 pcf	<u>ER-650</u>	14	9	0.87	115	5.5	9.5	
Carlisle Spray Foam Insulation	SealTite PRO No Mix	0.5 pcf	<u>ER-616</u>	20	13	1.3	80	8	11.5	
Carlisle Spray Foam Insulation	SealTite PRO OCX	0.5 pcf	<u>ER-615</u>	14	9	0.87	115	9	14	
Carlisle Spray Foam Insulation	SealTite PRO High Yield	0.5 pcf	ER-623	14	9	0.87	115	8.5	14	
Carlisle Spray Foam Insulation	SealTite PRO Open Cell	0.5 pcf	ER-624	14	9	0.87	115	8.5	14	
Carlisle Spray Foam Insulation	Sealtite™ PRO No Trim 21	0.75 pcf	ER-618	20	13	1.3	80	11.5	11.5	
Carlisle Spray Foam Insulation	Sealtite™ No Trim 21	0.75 pcf	ER-627	20	13	1.3	80	11.5	11.5	
Certainteed	Certaspray CC	2.0 pcf	ESR-3758	14	9	0.87	115	5.5	9.5	
Certainteed	Certaspray OCX	0.5 pcf	ESR-3759	20	13	1.25	80	5.25	14	
Commercial Thermal Solutions	Tiger Foam® E84 Fire-rated SPF Class 1 Spray Foam System	2.1 pcf	ESR-3183	20	13	1.3	80	3.5	3.5	
Creative Polymer Solutions	Air Lok 45	0.5 pcf	ER-554	18	12	1.1	89	10	12	
DAP Foam, Inc.	Touch 'n Seal Class 1	2.2 pcf	ESR-3052	20	13	1.3	80	3.5	3.5	
DAP Foam, Inc.	Touch 'n Professional Class 1	2.2 pcf	ESR-3052	20	13	1.3	80	3.5	3.5	



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Demilec	HeatLok Agribalance	0.6 pcf	ESR-2600	18	12	1.1	89	7.5	11.5
					Application		Maximum	Thickness of	
Manufacturer's Name	Product Name	Product Density	Evaluation Report ^{1, 2}		Theoretical Application Rate ³			Spray Foam (inches)	
				Wet Film	Dry Film	gallons/ 100 square feet	sqft/gal	Vertical	Overhead
Demilec	APX	0.5 pcf	ESR-3470	20	13	1.3	80	8	10
Demilec	HeatLok Soy 200+	2.0 pcf	ESR-3210	18	12	1.1	89	7.5	11.5
Demilec	HeatLok XT-S	2.0 pcf	ESR-3824	14	9	0.87	115	7.5	11.5
Demilec	HeatLok XT-W	2.0 pcf	ESR-3883	14	9	0.87	115	7.5	11.5
Demilec	HeatLok HFO	2.0 pcf	ESR-4073	14	9	0.87	115	7.5	11.5
Demilec	HeatLok HFO Pro	2.0 pcf	<u>ER-565</u>	18	12	1.1	89	7.5	11.5
Demilec	Sealection 500	0.5 pcf	CCRR- 1063; ESR- 1172	18	12	1.1	89	7.5	11.5
Demilec	Sealection NM	0.5 pcf	ESR-2668	18	12	1.1	89	7.5	11.5
Dow	Styrofoam CM 2045	2.0 pcf	ESR-2670; ESR-1659	22	15	1.4	73	9.5	9.5
Dow	FROTH-PAK™	1.75 pcf	ESR-3228	20	14	1.3	80	3.5	3.5
Elastochem Specialty Chemicals Inc.	Insulthane Extreme	2.0 pcf	ESR-3809	18	12	1.1	89	7.25	7.25
Elastochem Specialty Chemicals Inc	Insulthane Proline Plus	2.0 pcf	ESR-3541	14	9	0.87	115	5.5	9.5
Energy One America	EOA 2000	2.0 pcf	ER-443	14	9	0.87	115	5.5	9.5
Energy One America	EOA 500	0.5 pcf	ESR-3686	14	9	0.87	115	9	14

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Manufacturer's Name	Product Name	Product Density	Evaluation Report ^{1, 2}		ge Nominal hickness ⁴ (mils)		Application te ³		am (inches)
		·	•	Wet Film	Dry Film	gallons/100 square feet	sqft/gal	Vertical	Overhead
Gaco Western	F1850	2.0 pcf	CCRR-1043	14	9	0.87	115	5.5	9.5
Gaco Western	F1880	2.2 pcf	CCRR-1106	14	9	0.87	115	9	12
Gaco Western	183M	2.0 pcf	CCRR-1002	14	9	0.87	115	5.5	9.5
Gaco Western	Gaco Green 052N	0.5 pcf	CCRR-1075; ESR-2478	14	9	0.87	115	11.25	11.25
Gaco Western	Gaco Firestop2 F5001	0.5 pcf	CCRR-1009	18	12	1.1	89	18	18
Gaco Western	GacoEZSpray F4500	0.55 pcf	CCRR-1107	14	9	0.87	115	8.5	14
General Coatings Manf. Corp.	Ultrathane 230	2.0 pcf	ESR-3033	22	15	1.4	73	5.5	7.5
Henry Company	Permax 1.8 (RT 2045 1.8)	1.8 pcf	ESR-3024	21	14	1.3	77	11.25	11.25
Henry Company	Permax 2.0 (RT 2045 2.0)	2.0 pcf	ESR-3024	21	14	1.3	77	11.25	11.25
Henry Company	Permax 2.0X Fast	2.0 pcf	ESR-3647	14	9	0.87	115	5.5	9.5
Henry Company	Permax 2.0X	2.0 pcf	ESR-3647	14	9	0.87	115	5.5	9.5
Henry Company	Permax 0.5LV	0.5 pcf	ESR-3646	18	12	1.3	89	11.5	11.5
ICP Adhesive and Sealants	Handi-foam E84 Class 1	2.0 pcf	ESR-2717	20	13	1.3	80	3.5	3.5
Icynene, Inc.	Classic Plus	0.7 pcf	ESR-1826	14	9	0.87	115	8.5	14
Icynene, Inc.	Classic	0.5 pcf	ESR-1826	14	9	0.87	115	8.5	14
Icynene, Inc.	Classic Ultra	0.5 pcf	ESR-1826	14	9	0.87	115	8.5	14
Icynene, Inc.	Classic Ultra Select	0.5 pcf	ESR-1826	14	9	0.87	115	8.5	14
Icynene, Inc.	MD-C-200	2.4 pcf	ESR-3199	22	14	1.4	73	6	10
Icynene, Inc.	ProSeal	2.0 pcf	ESR-3500	14	9	0.87	115	5.5	9.5
Icynene, Inc.	ProSeal HFO	2.0 pcf	CCRR-1108	14	9	0.87	115	5.5	9.5
Icynene, Inc.	ProSeal LE	2.0 pcf	ESR-3500	14	9	0.87	115	5.5	9.5
Johns Manville	JM Corbond® III Performance Insulation	2.0 pcf	<u>ER-146</u>	14	9	0.87	115	5.5	9.5
Johns Manville	JM Corbond® ocx SPF	0.5 pcf	<u>ER-372;</u> ESR-3777	14	9	0.87	115	9	14
Johns Manville	JM Corbond® MCS	2.0 pcf	ESR-3159	22	14	1.4	73	7.25	9.25
Johns Manville	JM Corbond® MCS+	2.0 pcf	<u>ER-546</u>	14	9	0.87	115	5.5	9.5



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Manufacturer's Name	Product Name	Product Density	Evaluation Report ^{1, 2}	Average N Installed T (mil	hickness ⁴	Rate 3 (gallo	Application ns/100 square et)	of Spra	ay Foam ches)
1 (11111)		Zensty	1100011	Wet Film	Dry Film	gallons/ 100 square feet	sqft/gal	Vertical	Overhead
Johns Manville	JM Corbond® oc	0.5 pcf	ESR-3776	18	12	1.1	89	7.5	11.5
LaPolla Industries	Foam-Lok FL 450	0.5 pcf	ESR-4242	14	9	0.87	115	8.5	14
LaPolla Industries	FL500	0.5 pcf	ESR-2847	14	9	0.87	115	8.5	14
LaPolla Industries	FL750	0.7 pcf	ESR-4322	14	9	0.87	115	8.5	14
LaPolla Industries	FLX-500	0.5 pcf	ER-401	14	9	0.87	115	9	14
Lapolla Industries	FoamLok FL2000- 4G	2.0 pcf	CCRR-1025	14	9	0.87	115	5.5	9.5
LaPolla Industries	FL 2000	2.0 pcf	ESR-2629	14	9	0.87	115	5.5	9.5
LaPolla Industries	Prime Gold	0.5 pcf	ESR-4323	14	9	0.87	115	8.5	14
Natural Polymers, LLC	Natural-Therm® 0.50 pcf	0.5 pcf	<u>ER-336</u>	21	14	1.3	77	8	12
Natural Polymers, LLC	Natural-Therm® 0.5 IB	0.5 pcf	ER-503	14	9	0.87	115	5.5	9.5
Natural Polymers, LLC	Natural-Therm® Light	0.5 pcf	ER-589	14	9	0.87	115	5.5	9.5
Natural Polymers, LLC	Natural-Therm® 2.0 IBW	2.0 pcf	ER-336	14	9	0.87	115	5.5	14
Natural Polymers, LLC	Natural-Therm® 2.0 IBS	2.0 pcf	ER-336	14	9	0.87	115	5.5	14
Natural Polymers, LLC	Natural-Therm® ZERO	2.0 pcf	ER-527	18	12	1.1	89	7.5	11.5
NuWool Company Incorporated	Nu-Seal 0.5	0.5 pcf	ER-504	21	14	1.3	77	8	10
NuWool Company Incorporated	Nu-Seal 2.0W	2.0 pcf	ER-504	21	14	1.3	77	11.25	11.25
Patriot Spray Foam, Inc.	Patriot 200	2.0 pcf	ESR-4065	14	9	0.87	115	5.5	9.5
Patriot Spray Foam, Inc.	Patriot 500	0.5 pcf	ESR-4064	20	13	1.3	77	6	14
Patriot Spray Foam, Inc.	Patriot 500 HY	0.5 pcf	ESR-4064	20	13	1.3	77	6	14
Polygreen Solutions	GreenSeal 44	0.5 pcf	ER-606	18	12	1.1	89	10	12
Preferred Solutions, Inc.	Staycell® 302	2.2 pcf	ER-569	14	9	0.87	115	5.5	9.5
Profoam	Proseal 2.0	2.0 pcf	ESR-3835	14	9	0.87	115	5.5	9.5
Rhino Linings.	ThermalGuard OC.5	0.5 pcf	ESR-2100	18	13	1.1	89	7.5	11.5
Rhino Linings	Thermal Guard CC2	2.0 pcf	ESR-2100	14	9	0.87	115	5.5	9.5
SES Foam, LLC	Nexseal 2.0	2.0 pcf	ER-374	14	9	0.87	115	5.5	9.5
SES Foam, LLC	Nexseal 2.0 LE	2.0 pc	ER-374	14	9	0.87	115	5.5	9.5
SES Foam, LLC	SES 2.0	2.0 pcf	ER-374	14	9	0.87	115	5.5	9.5
SES Foam, LLC	SES 2.0 LE	2.0 pcf	<u>ER-374</u>	14	9	0.87	115	5.5	9.5
SES Foam, LLC	SES Foam 0.5	0.5 pcf	ER-492	14	9	0.87	115	8.5	14
SES Foam, LLC	SucraSeal 0.5	0.5 pcf	ESR-3375	14	9	0.87	115	9	14



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					Applicati		Maximum Thickness		
Manufacturer's Name	Product Name	Product Density	Evaluation Report ^{1, 2}	Average Nom Thickness		Theoretical App ³ (gallons/100 s		_	ray Foam iches)
			1	Wet Film	Dry Film	gallons/ 100 square feet	sqft/gal	Vertical	Overhead
Specialty Products	IBS Envelo- Seal 0.50	0.5 pcf	ER-656	21	14	1.3	77	8	12
Specialty Products	Envelo-Seal 2.0 IBW	2.0 pcf	<u>ER-656</u>	14	9	0.87	115	5.5	14
Sustainable Polymer Products	2.0 CC	2.0 pcf	ER-511	18	12	1.1	89	7.5	11.5
Sustainable Polymer Products	0.5 OCX	0.5 pcf	ER-512	20	13	1.3	80	7.5	11.5
Sustainable Polymer Products	.50 OC	0.5 pcf	ER-513	20	13	1.3	80	8	11.5
SWD Urethane	Quik-Shield 104	0.4 pcf	TER-1803	18	12	1.1	89	8	14
SWD Urethane	Quik-Shield 106	0.5 pcf	CCCR-1011	24	15	1.5	67	11.25	11.25
SWD Urethane	Quik-Shield 108	0.5 pcf	CCRR-1051	14	9	0.87	115	8.5	14
SWD Urethane	Quik-Shield 100X	0.5 pcf	CCRR-1050	18	12	1.1	89	7.25	11.25
SWD Urethane	Quik-Shield 112XC	2.0 pcf	CCRR-1011	14	9	0.87	115	5.5	9.5
SWD Urethane	Quik-Shield 118	2.0 pcf	CCRR-1093	14	9	0.87	0.87 115		9.5
ThermoSeal	2000/2000W	2.0 pcf	ER-581	14	9	0.87	115	5.5	9.5
ThermoSeal	CCX	2.0 pcf	ESR-4137	18	12	1.1	89	7.5	11.5
ThermoSeal	OCX	0.5 pcf	CCRR-1095	18	12	1.1	89	7.5	11.5
ThermoSeal	ONE	2.45 pcf	ER-603	20	13	1.3	80	5.5	9.5
ThermoSeal	TS 360	0.4 pcf	ER-603	20	13	1.3	80	8	14
ThermoSeal	TS 500	0.5 pcf	ER-603	18	12	1.1	89	8	14
ThermoSeal	TS 800	0.8 pcf	ER-603	20	13	1.1	89	8	14
UTC	7041 0.5 lb	0.5 pcf	ESR-3244	20	13	1.3	80	5.5	14.75
UTC	7040 0.5 lb	0.5 pcf	ESR-3244	20	13	1.3	80	5.5	14.75
Universal Polymers Corporation	UPC 500	0.5 pcf	ESR-3803	18	12	1.1	89	8.5	14
Victory Polymers	Hi-R OC	0.5 pcf	ER-675	14	9	0.87	115	8.5	14
Victory Polymers	VPC-50 OC	0.5 pcf	ER-674	14	9	0.87	115	8.5	14
Victory Polymers	VPC- Onestroke	0.5 pcf	<u>ER-599</u>	18	12	1.1	89	10	12
Victory Polymers	VPC-Superlift	2.0 pcf	ER-655	18	12	1.1	89	7.5	11.5
Victory Polymers	VPC- Superyield	2.0 pcf	ER-655	18	12	1.1	89	7.5	11.5
XtremeSeal, LLC	XtremeSeal 2.0 LE	2.0	ER-537	14	9	0.87	115	5.5	9.5
XtremeSeal, LLC	XtremeSeal 0.5 LX	0.5	ER-538	14	9	0.87	115	8.5	14

For SI: 1 mil = 0.0254 mm, 1 inch = 25.4 mm, $1 \text{ pcf} = 16.02 \text{ kg/m}^3$

Notes:

Approval of DC315 for use with any insulation product listed herein is conditional upon that insulation product's current approval for use with DC315. Users must independently verify the current validity of any evaluation report referenced herein.

^{2.} ER – Evaluation Reports from IAPMO Uniform Evaluation Service

 $CCRR-Code\ Compliance\ Research\ Reports\ from\ Intertek.$

ESR - Evaluation Service Reports from ICC-ES.

TER-Technical Evaluation Report from DrJ Engineering

^{3.} Theoretical coating application rates are based strictly on the average nominal thickness requirements and shall be increased for site-specific conditions such as foam plastic surface texture, overspray loss, container and other residues, application technique and environmental conditions.



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4. Average nominal installed thickness shall be determined by taking measurements of the wet film thickness on the surface of the SPF or using medallions. Measurements shall be made and recorded within 5 minutes of application. Two measurements shall be made at each location avoiding the thicknest and thinnest spots to determine average nominal thickness. When medallions are used the medallion shall measure between 4 and 10 square inches with the smallest dimension being 1³/4 inches. (Medallion size and number of measurements are based on Section 3.4.2 of AC456)

Revised: 06/26/2019

TABLE 2
Foam Plastic Products Approved for Use with DC315 As Assemblies Not Requiring A Prescriptive Ignition Barrier
(All alternative ignition barrier assemblies shown below are based on testing to NFPA 286 as modified by Appendix X of AC 377)

				I I	Application of 1	DC315			
Manufacturer's Name	Product Name	Product Density	Evaluation Report ^{1, 2}	Installed	e Nominal Thickness ⁴ nils)	Theoretical Application Rate per		Thickness of am (inches)	
				Wet Film	Dry Film	Gallon ³ (square feet)	Vertical	Overhead	
Accella Polyurethane Systems	Bayseal OC 0.5 lb	0.5 pcf	ER-519 ESR-1655	4	3	400	9.5	11.5	
Accella Polyurethane Systems	Foamsulate 220	2.0 pcf	<u>ER-352</u>	4	3	400	7.5	11.5	
Accella Polyurethane Systems	QuadFoam® 500	0.5 pcf	<u>ER-271</u>	4	3	400	7.5	11.5	
Accella Polyurethane Systems	Foamsulate™ 50	0.5 pcf	ER-351	4	3	400	7.5	11.5	
Accella Polyurethane Systems	Foamsulate TM 50-HY	0.5 pcf	ER-540	4	3	400	7.5	11.5	
Accella Polyurethane Systems	Sealtite TM OC+	0.75 pcf	ER-557	4	3	400	14	14	
Acme Urethanes	WC50	0.5 pcf	ER-605	4	3	400	8	14	
BASF	158 Spraytite	2.0 pcf	ESR-2642	4	3	400	5.5	11.5	
BASF	Enertite	0.5 pcf	ESR-3102	4	3	400	11.5	15.5	
BASF	Spraytite 178	2.0 pcf	ESR-2642	4	3	400	5.5	11.5	
BASF	Spraytite 81206	2.0 pcf	ESR-2642	4	3	400	5.5	11.5	
BASF	Spraytite 81205	2.0 pcf	ESR-2642	4	3	400	5.5	11.5	
BASF	Spraytite SP	2.0 pcf	ESR-2642	4	3	400	5.5	11.5	
BASF	Walltite US	2.0 pcf	ESR-2642	4	3	400	5.5	11.5	
BASF	Walltite US-N	2.0 pcf	ESR-2642	4	3	400	5.5	11.5	
BASF	Walltite HP+	2.0 pcf	ESR-2642	4	3	400	5.5	11.5	
Carlisle Spray Foam Insulation	SealTite PRO No Mix	0.5 pcf	ER-616	4	3	400	7.5	11.5	
Carlisle Spray Foam Insulation	SealTite No Mix	0.5 pcf	ER-622	4	3	400	7.5	11.5	
Carlisle Spray Foam Insulation	Sealtite™ PRO No Trim 21	0.75 pcf	<u>ER-618</u>	4	3	400	14	14	
Carlisle Spray Foam Insulation	Sealtite™ No Trim 21	0.75 pcf	ER-627	4	3	400	14	14	
Certainteed	CertaSpray X	0.5 pcf	ESR-3759	4	3	400	11.5	11.5	
Creative Polymer Solutions	Air Lok 45	0.5 pcf	ER-554	4	3	400	8	14	
Demilec	Agribalance	0.6-0.8 pcf	ESR-2600	4	3	400	7.5	11.5	
Demilec	Heatlok XT-w	2.0 pcf	ESR-3883	4	3	400	7.5	11.5	



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Manufacturer's	Product	Product	Evaluation -		Application of DC315				
Name Name	Name	Density	Report ^{1, 2}	Average Nomin Thickness ⁴		Theoretical Application Rate per Gallon ³	Spray Fo	am (inches)	
				Wet Film	Dry Film	(square feet)	Vertical	Overhead	
Demilec	Sealection 500	0.5 pcf	ESR-1172	4	3	400	7.5	11.5	
Energy One America	EOA 2000	2.0 pcf	ER-443	4	3	400	7.5	11.5	
Gaco Western	EZSpray F4500	0.55 pcf	CCRR-1107	4	3	400	12	16	
Gaco Western	Gaco Green 052N	0.5 pcf	CCRR- 1075; ESR- 2478	4	3	400	11.25	11.25	
General Coatings	Ultra-Thane 230	2.0 pcf	ESR-3033	4	3	400	7.5	11.5	
Henry	Permax LV	0.5 pcf	ESR-3646	4	3	400	11.5	11.5	
Icynene, Inc.	Classic Plus	0.7 pcf	ESR-1826	4	3	400	8	14	
Icynene, Inc.	Classic	0.5 pcf	ESR-1826	4	3	400	5.5	11.25	
Icynene, Inc.	Classic Ultra	0.5 pcf	ESR-1826	4	3	400	5.5	11.25	
Icynene, Inc.	Classic Ultra Select	0.5 pcf	ESR-1826	4	3	400	5.5	11.25	
Icynene, Inc	ProSeal	2.0 pcf	ESR-3500	4	3	400	8	14	
Icynene, Inc	ProSeal LE	2.0 pcf	ESR-3500	4	3	400	8	14	
Johns Manville	JM Corbond® III Performance Insulation	2.0 pcf	ER-146	4	3	400	7.5	11.5	
LaPolla	FL500	0.5 pcf	ESR-2847	4	3	400	5.5	11.5	
NCFI	Sealite	0.5 pcf	ESR-1154	4	3	400	12	14	
Natural Polymers, LLC	Natural- Therm [®] Zero	1.9 pcf	<u>ER-527</u>	4	3	400	7.5	11.5	
Patriot	200	2.0 pcf	ESR-4065	4	3	400	8	14	
Patriot	500	0.5 pcf	ESR-4064	4	3	400	5.5	11.25	
Patriot	500 HY	0.5 pcf	ESR-4064	4	3	400	5.5	11.25	
Polygreen Solutions	GreenSeal 44	0.5 pcf	ER-606	4	3	400	8	14	
Rhino Linings	ThermoGua rd	0.5 pcf	ESR-2100	4	3	400	8	12	
SES Foam, LLC	SES 0.5	0.5 pcf	ER-492	4	3	400	9.5	11.5	
Sustainable Polymer Products	.50 OC HY	0.5 pcf	<u>ER-514</u>	4	3	400	7.5	11.5	
Sustainable Polymer Products	2 lb. CC	2.0 pcf	ER-511	4	3	400	7.5	11.5	



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				Applica	ation of DC315		24	7D1 : 1
Manufacturer's Name	Product Name	Product Density	Evaluation Report ^{1, 2}	Average Nominal I Thickness ⁴ (m	Theoretical Application Rate per	Maximum Thickness of Spray Foam (inches)		
1 (4111)	1 (41110	2 charty	Ttoport.	Wet Film	Wet Film Dry Film		Vertical	Overhead
Sustainable Polymer Products	.50 lb OCX	0.5 pcf	<u>ER-512</u>	4	3	400	7.5	11.5
SWD	QS 108	0.5 pcf	CCRR-1051	4	3	400	8	12
Universal Polymers Corporation	UPC 500	0.5 pcf	ESR-3803	6	4	267	8.5	14
Victory Polymers	VPC- Onestroke	0.5 pcf	ER-599	4	3	400	8	14

For SI: 1 mil = 0.0254 mm, 1 inch = 25.4 mm, $1 \text{ pcf} = 16.02 \text{ kg/m}^3$

Notes:

- Approval of DC315 for use with any insulation product listed herein is conditional upon that insulation products' current approval for use with DC315.
 Users must independently verify the current validity of any evaluation report referenced herein.
- ER Evaluation Reports from IAPMO Uniform Evaluation Service CCRR – Code Compliance Research Reports from Intertek.
 ESR – Evaluation Service Reports from ICC-ES.
- 3. Theoretical coating application rates are based strictly on the average nominal thickness requirements and shall be increased for site-specific conditions such as foam plastic surface texture, overspray loss, container and other residues, application technique and environmental conditions.
- 4. Average nominal installed thickness shall be determined by taking measurements of the wet film thickness on the surface of the SPF or using medallions, Measurements shall be made and recorded within 5 minutes of application. Two measurements shall be made at each location avoiding the thickest and thinnest spots to determine average nominal thickness. When medallions are used the medallion shall measure between 4 and 10 square inches with the smallest dimension being 1³/4 inches. (Medallion size and number of measurements are based on Section 3.4.2 of AC456)