

Dynamic Wind Uplift Resistance CSA A123.21-2020 – Summary Document

Document No.: 22-06-B0008-2-AARS0026
Document Date: March 25, 2022

Reference Documentation:

CSA A123.21-2014 Report No: 22-06-B0008-2
Supplementary Report No.: 19-06-B0042-M RV2

Manufacturer:	IKO Industries Ltd.		IKO System Identification:
	40 Hansen Road South		
	Brampton, Ontario, Canada		AARS026
	L6W 3H4		

SECTION 1.0: Roof System Summary:

"IKO INNOVI™ TPO OVER SELF ADHERED VAPOUR RETARDER" – Adhesive Adhered Roofing System	
Roof Membrane – Cap Sheet:	IKO Innovati TPO
Insulation:	IKO IKOTerm™
Insulation:	IKO IKOTerm™
Vapour Retarder:	IKO MVP Vapour Retarder
Deck:	Steel Deck, 22 ga, RD938, 230 MPa (33.4 ksi)

SECTION 2.0: System Dynamic Wind Uplift Resistance (DUR) Testing Details:

Test Date	Measured Dynamic Wind Uplift Resistance of tested specimen, as per CSA A123.21-20 kPa (psf)	Dynamic Wind Uplift Resistance Rating, DUR (with 1.5X safety factor) as per CA A123.21-14 kPa (psf)
March 17, 2022	3.59 (75.00)	2.39 (50.00)

Measured Dynamic Wind Uplift Resistance: 3.59 kPa (75.00 psf)*

* Value does not include resistance factor. Applicable resistance factor shall be applied.

SECTION 3.0: Tested Product and Substitutable Products:

Roof Membrane (Cap Sheet)		
Tested Product	IKO InnovI TPO – 45 mil	
Product Size	Roll Thickness: 1.14 mm (0.045”), Roll Width: 2.4 m (8’), Roll Length 30.5 m (100’)	
Attachment Method	Fully adhered with IKO InnovIBond™ Membrane Adhesive SPR – see securement section for details	
Substitutable Product(s)		
Manufacturer	Product Identification	
IKO Industries Ltd.	InnovI TPO - 60 mil	InnovI TPO – 80 mil

Cover Board		
Tested Product	Optional layer	
Product Size	n/a	
Attachment Method	Ribbon adhered with IKO Millennium Adhesive	
Fastening Rate	305 mm (12”) o.c.	
Substitutable Product(s)		
Manufacturer	Product Identification	
IKO Industries Ltd.	IKOTherm CoverShield (12.7 x 2440 x 2440 mm) (½” x 4’ x 4’)	
Georgia-Pacific®	DensDeck Prime®	
USG®/CGC	Securock® Glass-Mat	Securock® Gypsum-Fiber

Insulation (Top Layer)			
Tested Product	IKO IKOTherm		
Product Size	38 x 1220 x 1220 mm (1.5" x 4' x 4')		
Attachment Method	Ribbon adhered with IKO Millennium Adhesive		
Fastening Rate	305 mm (12”) o.c.		
Substitutable Product(s)			
Manufacturer	Product Identification		
IKO Industries Ltd.	IKOTherm III	IKOTherm 25 psi	IKOTherm III 25 psi
	IKOTherm Tapered	IKOTherm III Tapered	IKOTherm 25 psi Tapered

Insulation (Bottom Layer)			
Tested Product	IKO IKOTherm		
Product Size	38 x 1220 x 1220 mm (1.5" x 4' x 4')		
Attachment Method	Ribbon adhered with IKO Millennium adhesive		
Fastening Rate	305 mm (12”) o.c.		
Substitutable Product(s)			
Manufacturer	Product Identification		
IKO Industries Ltd.	IKOTherm III	IKOTherm 25 psi	IKOTherm III 25 psi
	IKOTherm Tapered	IKOTherm III Tapered	IKOTherm 25 psi Tapered

Vapour Retarder	
Tested Product	IKO MVP Vapour Retarder
Product Size	Roll Width 1 m (39.4"), Roll Length 32 m (105')
Attachment Method	Self-adhered to substrate primed with IKO S.A.M. Adhesive
Fastening Rate	n/a
Substitutable Product(s)	
Manufacturer	Product Identification
IKO Industries Ltd.	MVP Sand

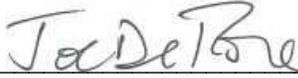
Thermal Barrier	
Tested Product	Optional layer
Product Size	12.7 x 1220 x 2440 mm (1/2" x 4' x 8')
Attachment Method	Ribbon adhered with IKO Millennium adhesive
Fastening Rate	305 mm (12") o.c.
Substitutable Product(s)	
Manufacturer	Product Identification
Georgia-Pacific®	DensDeck Prime®
USG®/CGC	Securock® Glass-Mat Securock® Gypsum-Fiber

Membrane Adhesive Securement	
Tested Product	InnoviBond Membrane Adhesive SPR
Fastening Rate	Fully adhered (2 sided dry)
Substitutional Product(s)	
Manufacturer	Product Identification
IKO Industries Ltd.	InnoviBond Membrane Adhesive

Cover Board/Insulation/Thermal Barrier Adhesive Securement	
Tested Product	IKO Millennium Adhesive – ribbon adhered
Fastening Rate	305 mm (12") o.c.
Substitutional Product(s)	
Manufacturer	Product Identification
n/a	n/a

Note: This is not a comprehensive report but a summary of the performance results produced for the roof assembly documented herein tested in accordance to CSA A123.21-2020. Please refer to the reference documents stated on page 1, or consult the manufacturer, for detailed information pertaining to the test specimen configuration and construction.

Approved by:

A handwritten signature in black ink that reads "Joe DeRose".

Joe DeRose, P. Eng. Ext. 10221
Technical Manager
Building Science Division

Reported by:

A handwritten signature in black ink that reads "Jordan Church".

Jordan Church, B. Tech., Ext. 11546
Operations Manager
Building Science Division

Accreditation: *Element is an ISO 17025 accredited test lab under A2LA. In addition, CSA A123.21 can be found under our scope of accreditation listing.*

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