PRODUCT BROCHURE

An alternative to traditional low-slope roofing systems





Your vision. Our purpose.



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Your vision. Our purpose.

OneDek

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Web Industries | Marysville, WA

All Weather Insulated Panels, an industry leader in insulated wall, roof and deck systems, has pioneered the development of insulated roof decks for use in commercial, industrial and temperature-controlled environments. Our purpose at All Weather Insulated Panels is to deliver products and services that are tailored to fit your vision. YOUR MARKET. A Customer First approach. A purpose-built team. Three world-class manufacturing facilities in California, Arkansas and now, Pennsylvania. All Weather Insulated Panels is distinctly positioned to support your design intent, performance requirements and sustainability goals with our industry-leading lineup of insulated wall, roof and deck systems. YOUR NEEDS. Exceptional service, a national presence and proven experience in meeting all design requirements set our sustainable insulated wall, roof and deck systems apart from alternatives. Our laser focus on customers' most pressing demands reinforces our brand commitment to innovation, teamwork and accountability. YOUR SCHEDULE. When it comes to addressing supply-chain issues and solving project-specific details, All Weather Insulated Panels prioritizes its customers' convenience above all else. With reliable technical support, superior customer service and quick shipping turnarounds, we deliver on partnership, performance and project objectives. You're First. 📱 Your Your Timeline. Your Scope. Passion. Your Deliverable. Your Need. S Your Success. Your Scope. Your Passion. Your your your your Your Passion. Success. Deliverable. Your Vision. Your Your Scope. Goal.

All Weather Insulated Panels

Your vision. Our purpose.





world class manufacturing facilities are uniquely positioned to effectively service North America.

VACAVILLE, CA LITTLE ROCK, AR EAST STROUDSBURG, PA

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highly technical and resourceful employees working with you through your projects' lifecycle.

OUR VALUES:

ACCOUNTABILITY COURAGE INNOVATION TEAMWORK INTEGRITY



Introduction

OneDek insulated roof deck system is an alternative to traditional multi-layer, low-slope roofing systems.

OneDek insulated roof deck system installation is completed in just two primary steps, the insulated roof deck panel followed by a field applied PVC or TPO membrane.



OneDek simplifies the design, procurement and installation of a low-slope roof system by eliminating traditional components such as steel deck, vapor barrier, multiple layers of board insulation and cover board.

The Power of OneDek

High-Performance Features. Transformative Benefits. The Only Choice for Architects & Contractors.



Faster, simpler installation thanks to fewer components and elimination of insulation fasteners.



Poured-in-place polyisocyanurate foam sandwiched between two steel facings provide a higher R-value per inch when compared to traditional systems that utilize multiple layers of polyiso board stock foam.



Steel facings impermeable to air and water.





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Reduction in installation time and labor when compared to traditional low-slope roof construction.



OneDek is available with a 20-year full system warranty that covers deck, insulation and membrane.



A single source solution that includes the insulated roof deck and membrane, which simplifies project coordination.



Simplified, sustainable design reduces materials and waste used on site and offers improved energy efficiency compared to traditional systems with similar thickness.



Allows for phased construction, so that interior trades can work in parallel with membrane installation.



Traditional Systems

Lower R-value per inch.

Multi-component system requires a coverboard to create a hard surface for installation of membrane and durability for foot traffic.

System may be susceptible to absorption of moisture during installation.

Components sourced from numerous manufacturers.

Multiple components add complexity to the project design, procurement and installation.

Several components including b-deck, vapor barrier, insulation, cover board and membrane may add complexity to the installation process.

Multiple components require field fabrication to fit specific project conditions. Each component requires separate deliveries to the jobsite.

OneDek Insulated Roof Deck System

B-deck Either fastened or welded to steel structure. Other components of the roof assembly require separate fastening to complete the weather barrier. OneDek insulated roof deck panel R-values up to 57 Single component provides deck, vapor barrier and insulation. **Rigid boards** Rigid board insulation is laid in place, Smooth flat exterior staggered, up to three layers with a steel substrate lower R-value per inch than insulated OneDek membrane Provides flat consistent surface roof deck. The layers are either fastened through the steel deck (exposed on Field-applied TPO or PVC, either for application of membrane mechanically attached or fully adhered. and stability for foot traffic. interior) or glued down for installation. Non-skinning butyl Factory-applied sealant in both joint grooves

Multi-Step Traditional Systems



Diaphragm Systems

Diaphragm Shear Loads for OneDek RD1 & RD1-M 40/5-12 Insulated Roof Deck



OneDek RD1 & RD1-M Insulated Roof Deck

- Panel thickness = 2", 2.5", 3", 4", 5", 6"
- Support fastening: #12-24 DP4 Fasteners, 8" on center across 40" panel width
- Side-lap fastening: #14-14 x 1 1/2" DP2 Fasteners, 12" on center along length of panel joint
- Support thickness: 16 gauge-3/16" steel

Shear Design	ASD Ω _{df}	LRFD \$\Phi_df\$
Seismic	2.30	0.70
Wind	2.00	0.80

Panel Gauge	Fastening Fastener Svstem Lavout		Side-lap Stitch		Nominal (Unfactored) Shear Strength, S _{n^p} plf Span (ft)								
		24,040	eng opun	5	5.5	6	6.5	7	7.5	8	G'		
26 GA ext - 26 GA int	40/5-12	40/5	12″ o/c	844	823	802	781	759	738	717	28.0		
26 GA ext - 24 GA int	40/5-12	40/5	12″ o/c	856	851	845	840	835	829	824	39.5		

Notes:

- 1. Safety factors or resistance factors shall be applied to the tabulated nominal shear strength.
- ASD Available Strength (Allowable Service Applied Load) \leq S ./Q • LRFD Available Strength (Factored Applied Load) $\leq \phi_{ac} S_{ac}$
- 2. Design strength factors specified per requirements of AISI-S310. 3. The diaphragm shear spans shown are based on shear load testing
- per AISI-S907. 4. Refer to transverse load span table for allowable gravity
- and wind uplift loads.
- 5. White single-ply roofing membrane must be installed for weatherproofing.
- 6. Thermal effect due to temperature differentials have not been considered.
- 7. Structural capacity of steel supports has not been considered.
- 8. Panel attachment at rake edge or any perimeter edge, including cutouts, parallel to the length of the panels shall be fastened with #12-24 DP4 fasteners with RP-01 Roof Deck Plates at the same spacing used at the panel side lap.
- 9. All panel ends with straight horizontal cuts or skewed cuts shall be fastened with #12-24 DP4 fasteners with RP-01 Roof Deck Plates.
- 10. Consult your AWIP representative for snow load design
- 11. Consult your AWIP representative for project specific requirements.

Diaphragm Systems Diaphragm Shear Loads for OneDek RD1 & RD1-M 40/7-6 Insulated Roof Deck



- OneDek RD1 & RD1-M Insulated Roof Deck
- Panel thickness = 2", 2.5", 3", 4", 5", 6"
- Support fastening: #12-24 DP4 Fasteners, 8" on center a
- Side-lap fastening: #14-14 x 1 1/2" DP2 Fasteners, 6" on c
- Support thickness: 16 gauge-3/16" steel

Panel Gauge	Fastening Fastener System Layout		Side-lap Stitch	Nominal (Unfactored) Shear Strength, S _n , plf Span (ft)								
			/ weing opair	5	5.5	6	6.5	7	7.5	8	G'	
22 GA ext - 22 GA int	40/7-6	40/7	6″ o/c	1903	1861	1819	1777	1734	1692	1650	84.5	

Notes:

- 1. Safety factors or resistance factors shall be applied to the tabulated nominal shear strength. • ASD Available Strength (Allowable Service Applied Load) \leq S $/\Omega$
- LRFD Available Strength (Factored Applied Load) $\leq \phi_{u}S_{u}$
 - 2. Design strength factors specified per requirements of AISI-S310.
 - 3. The diaphragm shear spans shown are based on shear load testing per AISI-S907. 4. Refer to transverse load span table for allowable gravity
 - and wind uplift loads.
 - 5. White single-ply roofing membrane must be installed for weatherproofing.
 - 6. Thermal effect due to temperature differentials have not been considered.

	Shear Design	ASD $\Omega_{_{ m df}}$	LRFD \$\Phi_df\$
across 40" panel width	Seismic	2.30	0.70
center along length of panel joint	Wind	2.00	0.80

7. Structural capacity of steel supports has not been considered

8. Panel attachment at rake edge or any perimeter edge, including cutouts, parallel to the length of the panels shall be fastened with #12-24. DP4 fasteners with RP-01 Roof Deck Plates at the same spacing used at the panel side lap.

9. All panel ends with straight horizontal cuts or skewed cuts shall be fastened with #12-24 DP4 fasteners with RP-01 Roof Deck Plates and 1/4-14 DP3 or DP5 Fasteners, (2) per WC-01 clip at side joint at the same spacing and frequency as the design fastening system.

10. Consult your AWIP representative for snow load design.

11. Consult your AWIP representative for project specific requirements

Non-Diaphragm Systems

Wind Uplift Loads for OneDek RD1 & RD1-M Hidden Clip Fastening (PSF)



Panel Thickness	Panel Weight	Design Criteria		Panel Span (ft)										
- THICKHESS	(PSF)		2'-6"	3'-0"	3'-6"	4'-0"	4'-6"	5'-0"	5'-6"	6'-0"	6'-6"	7'-0"	7'-6″	8'-0"
2″	2.22	Panel/Deflection Limit	88	72	61	53	46	41	37	33	30	27	24	22
2.5″	2.34	Panel/Deflection Limit	109	89	76	65	57	51	46	42	38	35	32	30
3"	2.41	Panel/Deflection Limit	129	106	89	77	68	60	54	49	45	42	39	36
4"	2.62	Panel/Deflection Limit	165	135	115	99	87	78	70	64	58	54	50	46
5″	2.82	Panel/Deflection Limit	196	162	137	118	104	93	84	76	70	64	60	55
6"	2.98	Panel/Deflection Limit	223	184	156	135	119	106	95	87	79	73	68	63
8″	3.31	Panel/Deflection Limit	262	216	184	159	140	125	113	103	94	87	80	75

Fastening Pattern	Connection Strength	Panel Span (ft)											
		2'-6"	3'-0"	3'-6"	4'-0"	4'-6"	5'-0"	5'-6"	6'-0"	6'-6"	7'-0"	7'-6″	8'-0"
(2) Fasteners	16 gauge	61	51	42	37	32	29	26	24	22	20	19	18
	14 gauge	81	67	56	49	43	38	35	32	29	27	25	23
	12 gauge or 3/16"	98	81	59	52	46	41	37	34	31	29	27	25
(3) Fasteners per clip	16 gauge	92	77	59	52	46	41	37	34	31	29	27	25
	14 gauge	98	81	59	52	46	41	37	34	31	29	27	25

Notes:

1. Spans shown are based on transverse load testing per ASTM-E72 and strength of fastening.

- 2. Load span table is based on Allowable Stress Design (ASD).
- 3. There is no design for diaphragm resistance using hidden clip fastening. See OneDek RD1 Diaphragm Table.

4. Spans calculated with 26 gauge exterior and interior facings.

5. The lowest allowable load between panel design and connection strength

- must be used to determine maximum span. Fastening calculated with 1/4-14 Tek 3 for 16 gauge and 12 gauge purlins and 1/4-20 Tek 5 for 3/16" thick purlins.
- 7. Deflection Limit: L/240
- 8. Safety factor = 2.5 for buckling, 3.0 for shear, 3.0 for fastening. See Note #2 (ASD only).
- 9. White single-ply roofing membrane or single skin roof panels must be installed for weatherproofing.
- 10. Thermal effect due to temperature differentials have not been considered.
- 11. Structural capacity of purlins have not been considered.
- 12. Consult your AWIP representative for snow load design.
- 13. Consult your AWIP representative for project specific requirements.

Non-Diaphragm Systems Wind Uplift Loads for OneDek RD1 & RD1-M Through Fastening (PSF)



Panel Thickness	Panel Weight	Design Criteria		Panel Span (ft)										
THICKHESS	(PSF)		2'-6"	3'-0"	3'-6"	4'-0"	4'-6"	5'-0"	5'-6"	6'-0"	6'-6"	7'-0"	7'-6"	8'-0"
2″	2.22	Panel/Deflection Limit	88	72	61	53	46	41	37	33	30	27	24	22
2.5″	2.34	Panel/Deflection Limit	109	89	76	65	57	51	46	42	38	35	32	30
3″	2.41	Panel/Deflection Limit	129	106	89	77	68	60	54	49	45	42	39	36
4″	2.62	Panel/Deflection Limit	165	135	115	99	87	78	70	64	58	54	50	46
5″	2.82	Panel/Deflection Limit	196	162	137	118	104	93	84	76	70	64	60	55
6″	2.98	Panel/Deflection Limit	223	184	156	135	119	106	95	87	79	73	68	63
8″	3.31	Panel/Deflection Limit	262	216	184	159	140	125	113	103	94	87	80	75

Fastening Pattern	Connection Strength	Panel Span (ft)											
		2'-6"	3'-0"	3'-6"	4'-0"	4'-6"	5'-0"	5'-6"	6'-0"	6'-6"	7'-0"	7'-6"	8'-0"
(3) Fasteners Across Panel Width	16 gauge min.	71	59	50	43	38	34	31	28	26	24	22	21
(4) Fasteners Across Panel Width	16 gauge min.	95	79	67	58	51	46	41	38	35	32	30	28

Notes:

- 1. Spans shown are based on transverse load testing per ASTM-E72 and strength of fastening patterns.
- 2. Load span table is based on Allowable Stress Design (ASD). 3. If design for diaphragm resistance is required see OneDek RD1/RD1-M
- Diaphragm Table. 4. Spans calculated with 26 gauge exterior and interior facings.
- 5. The lowest allowable load between panel design and connection
- strength must be used to determine maximum span.
- Fastening calculated with ¼-14 Tek 3 for 16 gauge, 14 gauge, and 12 gauge purlins and ¼-20 Tek 5 for 3/16" thick purlins.

7. Deflection Limit = L/240.

8. Safety factor = 2.5 for buckling, 3.0 for shear, 3.0 for fastening. See note #2 (ASD only).

9. White single-ply roofing membrane or single skin roof panels must be installed for weatherproofing.

10. Thermal effect due to temperature differentials have not been considered

11. Structural capacity of purlins have not been considered. 12. Consult your AWIP representative for snow load design.

13. Consult your AWIP representative for project specific requirements.

OneDek Accessories

Edge Metal Solutions by Metal-Era

With installation that's a snap compared to other roof edge designs, Metal-Era edge metal products save you lots of time. Just as important, these prefabricated components come in a range of great-looking styles for your building. They're tested to the strictest building codes and are backed by some of the strongest warranties in the industry.

Product Specifications

Product Line	Anchor-Tite Standard Fascia	Anchor-Tite Drip Edge	Perma-Tite Gold Coping**	Seal-Tite WR Gutter	Seal-Tite Industrial Downspout	Seal-Tite LT Downspout	Scupper	Collector Box
Versions	• Single-Ply	• Standard	• Tapered	• Chamfer	• Closed • Open Face	• Corrugated	• Welded • Quicklock	• Welded • Quicklock
Standard Sizes	5.5", 7"	4.5", 6", 7.5"	Exterior 6" Interior 4"	7 3/4"	Min. 3" Max. 5.5"	Corrugated: 4"x5"	Custom	Custom
Wind Warranty	Lifetime, 215 MPH	Lifetime, 215 MPH	Lifetime, 215 MPH	30 Year, 160 MPH	5 Year Workmanship	5 Year Workmanship	5 Year Workmanship	5-Year Workmanship
Cover Materials	24 ga., 22 ga. .040"	24 ga., 22 ga. .040"	24 ga., 22 ga. .040", .050", .063"	24 ga., 22 ga., .040", .050", .063"	24 ga., .040"	24 ga., 22 ga., .032", .040", .050"	24 ga., 22 ga., 040" , 050", 063"	24 ga., 22 ga., 040" , 050", 063"
Design Elements	Extruded Aluminum Anchor Bar Snap-on Cover 12 ft. Lengths	Extruded Aluminum Anchor Bar Snap-on Cover 12 ft. Lengths	16 ga. Anchor Clip Flush Face Profile Snap-on Cover	Extruded Aluminum Bracket 2-Piece Adjustable Bracket	Provided with Downspout Straps/Hangers	Provided with Downspout Straps/Hangers	Available with TPO or PVC coated Backside Picture Frame	Available in Raised or Dropped orientation w/ Scupper
ANSI/SPRI/ FM 4435/ ES-1 or ANSI/SPRI GT-1 Tested	×	X	×	×	NA	NA	NA	NA
FM Approved	Х	Х	Х	Х	NA	NA	NA	NA
Miami-Dade County Approved	Х	Х	Х	Х	NA	NA	NA	NA

**Note: Tested Max Wall Width: 24" (.40"/24ga.) 32" (.050"/.063"/22ga.)



Anchor-Tite Advantages

- Lifetime, 215 MPH wind warranty
- Simple, snap-on design cover with need to strip-in or heat weld
- Prefabricated miters and accessories ensure proper fit and eliminate field fabrication
- Manufactured in 12' lengths with prepunched holes to reduce installation time



Perma-Tite Gold Coping Advantages

- Lifetime, 215 MPH wind warranty • Reduces labor time and costs with
- simple, snap-on installation
- Prefabricated miters, fasteners and accessories ensure proper fit and eliminate field fabrication
- Facilitates correct placement and proper thermal movement with slotted fastening holes



Seal-Tite WR Gutter Advantages

- Includes manufacturer's 30 Year, 160 MPH wind warranty
- ANSI/SPRI/GT-1 tested to comply with International Building Code
- Slotted fastening holes to ensure correct fastener placement and spacing
- Prefabricated miters, fasteners and accessories ensure proper fit and eliminate field fabrication

Edge Metal Color Chart



Standard Colors



Colonial Red



Interstate

(Regal) Blue



Midnight (Extra Dark) Bronze

Patina Green 🔺

Premium Colors







Weathered Zinc

14









Stone White



Evergreen



Mansard Brown



Sky (Military) Blue





Matte Black 🔺



Slate Blue

Sand Stone 🔳 🖈



Granite

Hartford Green





(Classic) Copper Penny





Our colors are deep, rich and true. Made of Sherwin-Williams' Eluropon[®] High Performance Hylar 5000[®]/Kynar 500[®] finish. they offer the ultimate in resistance against fading and weathering Custom colors are also available.

Accessories

Scuppers, Internal Drains, Tapered Insulation

OneDek roofing accessories play a pivotal role in ensuring the durability, functionality, and overall performance of the roofing systems. These accessories, ranging from tapered insulation to flashing and drainage solutions, are specifically designed to address the unique challenges of roofs with minimal slope. Effective low-slope roofing accessories help manage water runoff and prevent leaks. Every OneDek order with accessories goes through a review by AWIP's technical team in an effort to optimize the performance of the overall system.





Scuppers

Internal Drains



Tapered insulation

BIM & Design Services

Our Customer First mentality means our team is available to assist you every step of the way, from design calculations through to the estimating and sales process. Go to <u>awipanels.com/contact</u> to get started with your sales rep today.

Glimpse3D

BIM 3D Viewer

Use our 3D Viewer to see our construction details like never before. Get a great visualization of standard finishes by selecting colors for roof and wall panels. Our convenient tool allows you to "Explode" and "Assemble" all of the various components in the detail and investigate each individual object up close. With the ability to hide or make components translucent, our easy-to-use interface provides understanding of how the components fit together.



BIM Configurator

Our BIM Configurator lets you design, configure and download BIM objects from All Weather Insulated Panels in more than 140 different formats including Revit, ArchiCAD and Tekla, as well as 2D drawings and PDF datasheets.

BIM Bundle

From insulated roof and wall panels to insulated decks, the BIM Bundle puts together a package specific to your product needs. Simply indicate your requirements, and a custom BIM Bundle will be sent to you from our digital team. With global Revit prowess and great direct product knowledge, our internal team creates and manages all the Revit project files with multiple levels of detail and materials to ensure you can deliver your product specification.

> Scan to access our BIM tools







Customer Testimonials



AWIP's OneDek solution provides value to stakeholders that aren't possible with other products. Our ability to "dry-in" zoned areas on large projects by eliminating the need of "shingled" installation has been key in expediting timelines and provides flexibility to our

Time is our most valuable resource. The time we've saved using OneDek on our high-performance structures has allowed us to produce more work, without adding additional labor or risk. If you design or build conditioned structures, I recommend getting educated on how the many benefits of OneDek can add value to your operation.



clients' critical path scheduling.

Soule Buildings

With the OneDek roof system, the initial price is comparable to traditional systems - the real payoff comes from the savings in the labor costs associated with faster install times. These time savings really benefit us when it comes to phased construction. We can lay down all panels and have the building dry, which allows our crew and other traders to come and perform work on other parts of the building. With the ease of installation, I'm glad we made the decision as a company to switch to insulated panels years ago.

Ron Lewis

CEL Construction

The RD1 flat profile allowed much better adhesion of coverboard and TPO. We work primarily in the cold storage industry, so it's crucial that we have a good thermal seal. If you want your system to have a good thermal envelope, the RD1 is the way to go.

Robert Brate

Nationwide Steel Works

We were able to install the structural deck and insulation in one shot, which helped us to complete the 100,000-square-foot installation in roughly six weeks. Since OneDek is a great new product and better overall low-slope roof system for installers and building owners, we were excited about being part of the OneDek project and look forward to more OneDek project installations in the future.





We Are Planet Passionate

At All Weather Insulated Panels, we are genuinely committed to our planet and making an impact on future generations. We design products that improve the efficiency of buildings, strive for net zero carbon manufacturing, are active in community activities that positively impact the environment and serve as a Green Business Certification Inc. (GBCI) education provider.



Our 2030 Global Commitments





• Net zero carbon

CARBON

by 2030

ENERGY

- 60% direct renewable energy by 2030
- 20% on-site renewable energy generation by 2030
- Install solar PV systems on all owned facilities by 2030
- Zero emission company cars by 2025

LEED Credits

Using All Weather Insulated Panels can contribute to LEED version 4.1 credits in the following categories:

Materia







CIRCULARITY

- manufacturing by 2030 • 50% reduction in product CO₂ intensity from our primary supply partners
- 1 billion PET bottles upcycled into our manufacturing processes by 2025
- Zero company waste to landfill by 2030



WATER

- 26 million gallons of rainwater harvested annually by 2030
- 5 active ocean clean-up projects by 2025

Indoor Sustainable Sites and Resources Environment Energy Innovation and Atmosphere







1 (888) 970-AWIP (2947) awipanels.com sales@awipanels.com



Scan for the most current product information

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