



# ActivDri™ PWA Packets

## Technical Data Sheet

ZERUST®/EXCOR® ActivDri™ PWA Packets are patent-pending, economical, effective, and easy-to-use dual-action, moisture control Vapor Corrosion Inhibitor (VCI) sachet products that protect against environmental contaminants and humidity that aggressively corrode metal parts, components, electronics, and electrical components/equipment. Use ActivDri™ PWA Packet's dual-acting moisture and corrosion control to protect highly sensitive metal parts and electrical components from corrosion damage during operation, shipping, and storage.

ActivDri™ PWA Packets diffuse invisible, odorless, and non-toxic ZERUST® Vapor Corrosion Inhibitors (VCI) that settle onto exposed metal surfaces inside the packaging or enclosure. Upon removal from the packaging, the VCI will dissipate from the metal surfaces, allowing immediate painting, welding, or further processing. ActivDri™ PWA Packets ferrous metals and aluminum surfaces for up to 12 months<sup>†</sup> in a sealed enclosure and is compatible with yellow metals and silver. Additionally, ActivDri™ PWA Packets comply with Global Automotive Declarable Substance, TSCA, REACH, RoHS, and TRGS615 requirements.

For over 50 years, ZERUST® VCI technology has proven its performance and safety with thousands of customers worldwide. It is used to protect valuable metal items for manufacturers in industries such as automotive, agricultural, aerospace, and mining. ZERUST®/EXCOR® offers on-site support and service in more than 70 countries via a network of 21 joint venture partnerships. Check with your ZERUST®/EXCOR® representative for a comprehensive corrosion management solution that is most effective for your metal assets.

### Typical Properties

Appearance	White non-woven sachet.
Substrates	Multimetal protection. ActivDri™ PWA chemistry is designed for ferrous metals (carbon steel, silicon steel, stainless steel, cast iron) and aluminum surfaces. A mixed acid gas test (IEC 60068-2-60 Method 4) by an independent lab was completed, which showed compatibility with yellow metals and silver.
Vapor Inhibiting Ability (VIA)	Pass (NACE TM0208)

***This data sheet provides general guidelines for operation, application, and removal. Please contact your ZERUST®/EXCOR® account representative for more specific recommendations on your particular operation and conditions.***

### Operating Summary

- Do not open the original packaging or remove the ActivDri™ packets until you are ready to use the ActivDri™ packets.
- Only remove the required quantity of ActivDri™ packets from the original packaging. Close the container with the remaining ActivDri™ packets immediately and ensure the inner plastic bag is properly sealed for storage.
- Unused and/or exposed ActivDri™ packets should be utilized or placed back into the original container within 1 hour, and the inner plastic bag should be properly sealed for storage.
- Ensure the metal parts and/or electrical components needing corrosion protection are clean and dry.
- Pack and secure the components in an enclosure (ZERUST® ICT® VCI bags, plastic bags, containers, etc.). In addition, good general handling practices should be adopted – **see How to Use ZERUST® VCI Packaging document.**
- Add the appropriate number of ActivDri™ packets into the enclosure – dispersing them evenly. **See the Protection Info section on page 2 for usage amount recommendations.**
- Avoid leaving ActivDri™ packets in areas where sharp edges may potentially cut or damage the packet during storage and/or shipment.
- Insert additional ZERUST® VCI materials (ICT®510 VCI Poly or ICT®420 VCI Paper) as interleave for added protection in layered packages. Note that interleaved applications require an ActivDri™ packet placed within each layer with limited access to provide ample adsorption and VCI protection.
- Seal or close the enclosure to restrict airflow. Whenever possible, airtight enclosures are preferred.
- **Attention:** Data loggers cannot be used to detect humidity in an enclosure or package during a shipment, as ActivDri™ VCI chemistry affects the accuracy of humidity detection.



product information and photos

## Availability

ZERUST®/EXCOR® ActivDri™ PWA Packets are in stock for immediate delivery, sold in cases. Contact your ZERUST®/EXCOR® representative for ordering information.

Part Number	Model	Quantity
375-M-00212	ActivDri™ PWA5	1,000/Case
375-M-00213	ActivDri™ PWA10	500/Case
375-M-00214	ActivDri™ PWA25	200/Case

Part Number	Model	Quantity
375-M-00215	ActivDri™ PWA50	100/Case
375-M-00210	ActivDri™ PWA100	50/Case

## Protection Info‡

Model	Product Dimensions* W x H	Normal Environment**	
		Protection Volume (Up to)‡	Protection Duration (Up to)‡
ActivDri™ PWA5	2" x 4"	3.5 ft <sup>3</sup> (0.1 m <sup>3</sup> )‡	12 months‡
ActivDri™ PWA10	3 2/5" x 4"	7 ft <sup>3</sup> (0.2 m <sup>3</sup> )‡	
ActivDri™ PWA25	3 2/5" x 5"	17.5 ft <sup>3</sup> (0.5 m <sup>3</sup> )‡	
ActivDri™ PWA50	3 2/5" x 5 1/2"	35 ft <sup>3</sup> (1.0 m <sup>3</sup> )‡	
ActivDri™ PWA100	3 2/5" x 6 1/2"	53 ft <sup>3</sup> (1.5 m <sup>3</sup> )‡	

\* +/- 10%.

\*\* Normal environment (below 0.2 ppm SO<sub>2</sub>)

## Moisture Adsorption Capacity (% wt of product)‡

Product Name	60% RH/77°F	70% RH/77°F	80% RH/77°F	85% RH/77°F	90% RH/77°F	95% RH/77°F
ActivDri™ PWA	14.03%	21.93%	38.68%	49.13%	64.98%	80.50%
Clay	20.50%	22.80%	25.53%	26.82%	29.42%	31.98%
Silica Gel	30.49%	33.15%	34.00%	33.97%	34.59%	34.85%
Product Name	60% RH/113°F	70% RH/113°F	80% RH/113°F	90% RH/113°F	95% RH/113°F	98% RH/113°F
ActivDri™ PWA	12.2%	22.2%	43.3%	78.5%	122.8%	139.1%
Clay	19.7%	22.0%	24.7%	29.5%	32.9%	35.4%
Silica Gel	26.3%	28.9%	29.1%	30.0%	32.5%	33.9%

## Storage

- Store in a cool, dry place and away from sunlight in the original packaging.
- Optimal storage temperature is < 85°F (29°C) and 50% RH for up to 2 years from the date of shipment.
- Unused ActivDri™ packets should be immediately placed back into the original container (inner plastic bag) and sealed for storage.

## Disposal

- The contents of ActivDri™ PWA Packets do not meet the criteria for hazardous waste according to 40 CFR 261 (no components listed on F, K, P, or U lists; not ignitable, not corrosive, not reactive, and not toxic).
- ActivDri™ PWA Packets may be disposed of in the general solid waste trash. Since ActivDri™ PWA generates ammonia, it is best practice to notify your solid waste hauler, especially if a large volume of unused ActivDri™ PWA Packets needs to be disposed of.
- Since regulations vary by location, ZERUST® advises our customers to review local regulations to ensure proper disposal.

## Precautions

- Do not install the packet where it will be submerged in water.
- ActivDri™ users with higher sensitivity to smell may detect the presence of an ammonia-like odor when opening the original container of ActivDri™. For such users, it is recommended to open the ActivDri™ container in a well-ventilated room before use.
- Avoid placing metal surfaces in direct contact with wood or cardboard (sources of moisture and acid).
- Do not disassemble. Keep away from children.
- Refer to the Safety Data Sheet (SDS) for more safety information.

### ‡ DECLARATION

Corrosion protection claims are based on Northern Technologies International Corporation (NTIC) internal laboratory testing performed under controlled parameters on contaminate-free substrates. Real-world application corrosion protection duration on different substrates will vary and depends on factors such as, but not limited to, the application or use, environmental / storage conditions, surface cleanliness, type of substrates, and coating thickness (where applicable). The use of the term "Up to" in reference to time is defined as any time duration from zero up to a specified time frame, but in no event beyond the specified time frame. The use of the term "for years" is based on NTIC's experience with its products but is in no way guaranteed. The use of the term "Up to" in reference to volume is defined as any volume from zero up to a specified volume but in no event beyond the specified volume of protection. It is the customer's / user's obligation to evaluate product performance, corrosion protection duration, safety, and suitability for intended use within the scope advised in the data sheet and to comply with all applicable laws and regulations. **LIMITED WARRANTY/DISCLAIMER** Warranty is limited to the replacement of a product that fails to meet specifications. For full warranty and disclaimer information, visit [www.zerust.com/warranty](http://www.zerust.com/warranty).

©2013-2024 Northern Technologies International Corporation (NTIC). All Rights Reserved. NTIC is the owner of the following trademarks: ActivPak®, Cor Tab®, EXCOR®, Flange Saver®, ICT®, Natur-VC1®, NTI®, Plastabs®, Z-CIS®, Zerion®, ZERUST®, 活乐特®, Z-PAK® and the Color "Yellow". ABRIGO®, UNICO®, and VALENO® are registered trademarks of EXCOR GmbH, a Joint Venture Partner of NTIC.

A product of:  
Northern Technologies  
International Corp  
4201 Woodland Road  
Circle Pines, MN 55014  
USA

Phone: +1 763.225.6600  
Fax: +1 763.225.6645  
sales@zerust.com  
www.zerust.com

Rev A1

