



ACTIV-8[®] AND ACTIV-8[®] HGL

Drier Accelerator and Stabilizer

TECHNICAL DATA

ACTIV-8 and **ACTIV-8 HGL** are drier accelerators and stabilizers when used with metal driers in waterborne and solvent-borne paints and coatings. **ACTIV-8** and **ACTIV-8 HGL** are solutions of the chelating agent 1,10-phenanthroline.

TYPICAL COMPOSITION

	ACTIV-8		ACTIV-8 HGL	
	by wt.	by vol.	by wt.	by vol.
1,10-phenanthroline	38%	28%	38%	31%
n-butanol	52%	61%	-	-
2-ethylhexoic acid	10%	11%	-	-
hexylene glycol	-	-	62%	69%

TYPICAL PROPERTIES

	ACTIV-8	ACTIV-8 HGL
Density at 25 °C (Mg/m³)	0.95	1.03
Weight/gallon (Lbs/gal)	7.89	8.59
Flash point, °F/°C	97/36	211/99
Volatile Organic Content	4.1 lbs/gal 492 g/L	5.3 lbs/gal 636 g/L

APPLICATIONS

ACTIV-8 and **ACTIV-8 HGL** are used in combination with manganese and/or cobalt driers in coatings that cure by oxidative polymerization to improve dry times. In general, **ACTIV-8** is used in solvent-borne coatings and **ACTIV-8 HGL** is used in waterborne coatings. Long term aging stability is also improved, especially in waterborne coatings where loss-of-dry often occurs.

DRIER RECOMMENDATIONS

- For waterborne coatings it is recommended to use 0.1-0.25% **ACTIV-8 HGL**, based on resin solids, in combinations with cobalt or manganese driers such that there is a 5 to 1 ratio of **ACTIV-8 HGL** to metal drier.
- For solvent-borne coatings it is recommended to use 0.2-0.5% **ACTIV-8**, based on resin solids, in combinations with cobalt or manganese driers such that there is a 10 to 1 ratio of **ACTIV-8** to metal drier.
- For the best overall combined performance of drying, long term loss-of-dry stability, and color, it is recommended that the driers and **ACTIV-8** be preblended in a suitable solvent. Preblending, in the absence of competitive substances, allows for the proper chelation of 1,10-phenanthroline with the drier metal.
- For a detailed explanation of how to determine the quantities of **ACTIV-8** or **ACTIV-8 HGL** to be used in a coating, as well as information on drier preblends, consult the ["How-to" Guide for the Use of ACTIV-8](#) on the Vanderbilt Minerals, LLC website.

STORAGE AND HANDLING

To maintain product quality, protect from freezing which can cause crystallization. If crystallization occurs, gently warm the product to dissolve the crystals.

ACTIV-8 and **ACTIV-8 HGL** will react with iron causing a reddish discoloration to white and light-colored paints. Care should be taken to insure **ACTIV-8** and **ACTIV-8 HGL**, do not come in contact with iron contaminants and are stored in lined metal containers.

Zinc in the form of zinc drier, zinc phosphate or zinc oxide blocks the activity of **ACTIV-8** and **ACTIV-8 HGL**. If **ACTIV-8** or **ACTIV-8 HGL** is to be used in a coating containing zinc, preblend **ACTIV-8** or **ACTIV-8 HGL** with the metal drier prior to exposure to zinc to allow for proper chelation.

CONTACT INFORMATION

For samples, product information and/or technical service please contact Vanderbilt Minerals, LLC or the Vanderbilt representative in your area:

Vanderbilt Minerals, LLC
33 Winfield Street, P.O. Box 5150
Norwalk, CT 06856-5150
P: (800) 562-2476
F: (203) 855-1220
www.vanderbiltminerals.com

Registered and pending trademarks appearing printed in bold in these materials are those of Vanderbilt Minerals, LLC. For a complete listing, please visit Trademark Listing.

09/18/2017

Before using, read, understand and comply with the information and precautions in the Safety Data Sheets, label and other product literature. The information presented herein, while not guaranteed, was prepared by technical personnel and, to the best of our knowledge and belief, is true and accurate as of the date hereof. No warranty, representation or guarantee, express or implied, is made regarding accuracy, performance, stability, reliability or use. This information is not intended to be all-inclusive, because the manner and conditions of use, handling, storage and other factors may involve other or additional safety or performance considerations. The user is responsible for determining the suitability of any material for a specific purpose and for adopting such safety precautions as may be required. Vanderbilt Minerals, LLC does not warrant the results to be obtained in using any material, and disclaims all liability with respect to the use, handling or further processing of any such material. No suggestion for use is intended as, and nothing herein shall be construed as, a recommendation to infringe any existing patent, trademark or copyright or to violate any federal, state or local law or regulation.