

Dynasylan® 6498

Vinyl silane concentrate (oligomeric siloxane)

Technical data

Properties and test methods	Value	Unit	Method
Boiling point	> 242 / > 468	°C / °F	ASTM D-1120
SiO ₂ -content	approx. 45	% w/w	AN-SAA 0754
Flash point	> 75 / 167	°C / °F	DIN EN ISO 2719 (Pensky-Martens, closed-cup)
Viscosity, dynamic (20 °C / 68 °F)	3 - 7	mPa·s / cSt	DIN 53015
Density (20 °C / 68 °F)	approx. 1	g/cm ³	DIN 51757

Registrations

Dynasylan® 6498

EINECS/ELINCS (EU):	Yes
AICS (Australia):	No
DSL/NDSL (Canada):	*
PICCS (Philippines):	Yes
TSCA (USA):	Yes
IECSC (P.R. China):	Yes
ENCSC (Japan):	Yes
ECL (South Korea):	Yes
* = information on request	

Dynasylan® 6498 is a vinyl silane concentrate (oligomeric siloxane) containing vinyl and ethoxy groups.

Dynasylan® 6498 is a colourless, nearly odorless low-viscosity liquid.

Dynasylan® 6498 is an excellent compatibiliser between inorganic fillers (e.g. kaolin, MDH, ATH) and organic polymers (e.g. EPDM, EVA, PE).

The high boiling point of **Dynasylan® 6498**, together with its high flash point, gives it outstanding advantages with respect to safety and handling during processing. From an environmental viewpoint it should be noted that the amount of released hydrolysis ethanol (VOC) is significantly reduced compared to monomeric vinyl silanes.

Safety and handling

Before considering the use of Dynasylan® products please read its Material Safety Data sheet (MSDS) thoroughly for safety and toxicological data as well as for information on proper transportation, storage and use. The Material Safety Data Sheet is available after registration on our website www.dynasylan.com or upon request from your local representative, customer service or from Evonik Industries AG, Product Safety Department, E-MAIL sds-im@evonik.com.

Packaging and storage

Dynasylan® 6498 is supplied in 25 kg and in 200 kg drums and 1.000 kg bulk containers. The containers must remain tightly sealed and stored in a cool, well-ventilated place protected against moisture. In the unopened container the shelf life of **Dynasylan® 6498** is 12 months.

Properties and application

Dynasylan[®] 6498 is excellent as an adhesion promoter, dispersion and hydrophobation agent in mineral filled compounds. In the presence of moisture, the ethoxy groups of **Dynasylan**[®] 6498 hydrolyse to produce ethanol and reactive silanol groups. These silanol groups react with the filler via silicon-oxygen bridges. The vinyl functional groups of **Dynasylan**[®] 6498 react with the polymer phase in the presence of radicals: A major field of application for mineral-filled compounds is the cable industry. EPDM and EVA can be processed into highly filled cable compounds through the adhesion promoting and hydrophobising effect of **Dynasylan**[®] 6498.

The EPDM and EVA polymers with **Dynasylan**[®] 6498 are for the halogen-free, non-toxic, environmentally-friendly flame retardant cable compounds (HFFR) based on ATH and MDH.

In addition, **Dynasylan**[®] 6498 can be used in many other applications such as filler and pigment coating, dispersions etc.

Typical property improvements obtained by using **Dynasylan**[®] 6498 in filled polymers are:

- improved filler dispersion
- good processability
- significantly reduced water-uptake excellent balance between tensile strength and elongation at break at a high level
- improved chemical resistance
- strongly reduced tendency to stress cracking
- higher impact strength
- higher abrasion resistance

This information and all technical and other advice are based on Evonik's present knowledge and experience. However, Evonik assumes no liability for such information or advice, including the extent to which such information or advice may relate to third party intellectual property rights. Evonik reserves the right to make any changes to information or advice at any time, without prior or subsequent notice. EVONIK DISCLAIMS ALL REPRESENTATIONS AND WARRANTIES, WHETHER EXPRESS OR IMPLIED, AND SHALL HAVE NO LIABILITY FOR, MERCHANTABILITY OF THE PRODUCT OR ITS FITNESS FOR A PARTICULAR PURPOSE (EVEN IF EVONIK IS AWARE OF SUCH PURPOSE), OR OTHERWISE. EVONIK SHALL NOT BE RESPONSIBLE FOR CONSEQUENTIAL, INDIRECT OR INCIDENTAL DAMAGES (INCLUDING LOSS OF PROFITS) OF ANY KIND. It is the customer's sole responsibility to arrange for inspection and testing of all products by qualified experts. Reference to trade names used by other companies is neither a recommendation nor an endorsement of the corresponding product, and does not imply that similar products could not be used.

Europe/Middle-East/Africa/RoW

Evonik Industries AG

Inorganic Materials
Rodenbacher Chaussee 4
63457 Hanau-Wolfgang
Germany
PHONE +49 6181 59 13636
FAX +49 6181 59 13737
dynasytan@evonik.com
www.dynasytan.com

Asia / Pacific

Evonik Degussa (SEA) Pte. Ltd.

Inorganic Materials
3 Internatioanl Business Park
#07-18, Nordic European Centre
Singapore 609927
PHONE +65 6809 6830
FAX +65 6809 6630
dynasytan@evonik.com
www.dynasytan.com

Asia / Pacific

Evonik Taiwan Ltd.

Inorganic Materials
Artist Construction Bldg.
9F, No. 133
Min Sheng East Road, Sec 3
Taipei, 105 Taiwan, R.O.C.
Taiwan
PHONE +886 227 17 1242
FAX +886 227 17 2106
dynasytan@evonik.com
www.dynasytan.com

North America

Evonik Corporation

Inorganic Materials
P.O. Box 677
299 Jefferson Road
Parsippany, NJ 07054-0677
USA
PHONE (TOLL FREE) +1 800 237 67 45
PHONE +1 973 929 8513
FAX +1 973 929 8503
dynasytan@evonik.com
www.dynasytan.com

Asia / Pacific

Evonik Degussa (Shanghai) Co. Ltd.

Inorganic Materials
55, Chungdong Road
Shanghai 201108
P.R. China
PHONE +86 21 6119 1053
FAX +86 21 6119 1075
dynasytan@evonik.com
www.dynasytan.com

Asia / Pacific

Evonik Japan Co. Ltd

Inorganic Materials
12th Floor Monolith Building
2-3-1, Nishi-Shinjuku-ku
Tokyo 163-0912
Japan
PHONE +81 353 23 7300
FAX +81 353 23 7399
dynasytan@evonik.com
www.dynasytan.com

Latin America

Evonik Brasil Ltda.

Inorganic Materials
Alameda Campinas, 579
01404-000 São Paulo-SP
Brazil
PHONE +55 11 3146 4123
FAX +55 11 3146 4109
dynasytan@evonik.com
www.dynasytan.com

Asia / Pacific

Evonik Korea Ltd.

Inorganic Materials
94, Galsan 1-dong
Bupyeong-gu
Incheon, 403-081
Korea
PHONE +82 32 510 2433
FAX +82 32 505 2510
dynasytan@evonik.com
www.dynasytan.com

Asia / Pacific

Evonik India Pvt. Ltd.

Inorganic Materials
Krislon House
Saki Vihar Road, Anderi (E)
Mumbai - 400 072
India
PHONE +91 226 7238 800
FAX +91 226 7238 811
dynasytan@evonik.com
www.dynasytan.com