

Waterbased Coating – 1740 Aziridine Cross-Linker

1740 Aziridine Cross-Linker

- 1740 Aziridine Cross-Linker is a chemical additive that can be blended with INXCAC waterbased softfeel coatings and other waterbased coatings to improve film-hardness/durability.
- Provides benefit of improved block resistance, rub/abrasion resistance, heat resistance and water/alcohol resistance.
- 1740 will not enhance/improve the set-speed/drying-rate of the coating – all 1740 benefits will not be realized until the coating-film has fully dried.
- Contact your INXCAC Technical Sales Representative to verify that 1740 is suitable/beneficial for your specific coating product and application.

PPE/Handling

- The use of Personal Protection Equipment (PPE) is recommended to prevent 1740 contact with eyes, skin or clothing during handling/use.
- Protective safety glasses, chemical-resistant gloves, chemical-resistant smocks/aprons and footwear are recommended during handling/use.
- For more specific details regarding 1740 safety and handling, please reference the 1740 SDS prior to handling/use.

Dosage

- A typical dosage of 1.5 - 2.0% (unless otherwise stated) by weight is recommended for use with INXCAC waterbased coatings to impart the above-mentioned benefits.
- Maximum dosage should not exceed 2.0% – exceeding the maximum dosage can have a negative effect on the dried coating-film and result in potential quality-issues related to poor rub/abrasion resistance and blocking.

Mixing

- 1740 must be thoroughly blended into the coating prior to use.
- Use of a mixing-blade/propeller is necessary to ensure proper blending – stirring will not adequately incorporate the 1740 into the coating.
- During use, continuous/slow agitation is recommended to ensure homogenous/consistent results.

Instructions

- Do not add 1740 to a volume of coating that cannot be consumed within 8-hours after the 1740 addition.
- 1740 will slowly dissolve after addition and will become ineffective if the coating is not consumed within 8-hours.
- **1740 cannot be re-added to coating that has already been catalyzed with 1740.**
- 1740 use instructions:
 - 1) Determine the amount of coating for 1740 addition and calculate a dosage of 1.5 - 2.0% – when sourcing/using coating in 5-gallon pails, an 8 oz companion bottle of 1740 that is provided is suitable for use with a single pail.
 - 2) Thoroughly mix the coating and test for temperature/viscosity prior to adding 1740.
 - 3) While mixing the coating, slowly add 1740 to the coating and mix thoroughly to ensure complete and homogenous incorporation – 1740 is viscous and will sink/settle on the bottom of the container.
 - 4) Once 1740 has been thoroughly mixed into the coating, the coating is ready for use and can be pumped to the press.
 - 5) Continuous, slow agitation is recommended during use to keep 1740 suspended and homogenous in the coating.
 - 6) Any remaining coating should be marked/identified as 1740 cannot be re-added for future use.

Filtration

- When catalyzing large volumes of coating with 1740 for extended periods of use, skinning or dried clumps can develop in the coating container.
- It is suggested to install an in-line filter/strainer between the coating container and coating-pump to filter out any dried coating material that may potentially contaminate the coating system and/or cause quality-issues related to the condition of the coating-unit.
- Continuous coating agitation in the container can aid in preventing the development of skinning or dried clumps.

Anilox Use - Considerations

- When using anilox application systems, coating that has been catalyzed with 1740 can dry into the anilox cells with prolonged/extended exposure during long-runs.
- On long-runs/extended periods that will require 1740-use over multiple-shifts, it is recommended to stop periodically and clean the coating system/anilox – this will help to prevent anilox cell contamination and volume-loss:
 - Cleaning the coating system/anilox between shifts is suggested
 - Use hot water or INXCAC 501 Cleaner
 - Scrub the anilox cells with an anilox brush – use anilox cleaner if necessary
- Periodic deep-cleaning using an anilox cleaner with an anilox brush can help to prevent contamination and volume-loss.
- In cases where 1740 has been used continuously for extended periods, it may be necessary to have the anilox roller professionally cleaned afterward to remove dried coating and restore anilox cell volume.

Cleaning - Considerations

- Addition of 1740 improves the dried film-hardness and chemical-resistance of the respective coating product.
- When using a coating catalyzed with 1740, residual coating that dries on the coating blanket/plate, anilox/rollers, chamber/recovery-pan, cylinders, coating-pump or other mechanical parts/surfaces around the coating-unit may prove more difficult to clean compared to coatings that do not have 1740 added.
- Use of INXCAC 501 Cleaner can help to improve cleaning of dried coating-films that have had 1740 added.

Sofffeel Coating - Considerations

- Consult the respective Waterbased Sofffeel TDS for any other considerations when using 1740.
- Reference the TDS section 'Catalyst 1740 Instructions for Use' for additional details, recommendations and considerations for 1740 use.

Leftover Coating

- Contact your INXCAC Technical Sales Representative to discuss how to use any remaining coating that has been catalyzed with 1740.
- **Do not re-catalyze coating that has already had 1740 added.**