



SYNPOL PRODUCTS PRIVATE LTD.

Regd Office & Factory: 77, G.V.M.S. AUDYOGIC VASAHA LTD.,
ODHAV, AHMEDABAD – 382 415, INDIA

PRODUCT CODE : POLYAMIDE / 02.10

Synpol 115 (80 % in Xylene)

TYPE : Reactive polyamide resin solution for the manufacture of lacquers which cure at room temperature and at elevated temperatures.

SPECIFICATIONS :

1) Appearance	Clear yellowish brown viscous resin.
2) Density @ 25 ⁰ C.	0.97 - 0.98
3) % Solid @ 120 ⁰ C for 2 hrs.	77 - 79
4) Solvent	Xylene
5) Viscosity @ 25 ⁰ C. by Hoppler, poises	38 - 54
6) Colour gardner	11 max.

MIXING RATIOS :

- For lacquers for metals, wood cardboard, plastics, moulded objects, and brickwork :
Synpol 450 XX 100 parts
Synpol 115 (80 % in Xylene) 50 - 70 parts
- For lacquers for leather, artificial leather, textiles, and paper :
Synpol 450 XX 100 parts
Synpol 115 (80 % in Xylene) 100 - 150 parts

RATE OF CURE : Curing @ 25⁰ C. of clear coating, film thickness 20 microns.

Set to touch	After 60 - 90 minutes
Tack free dry	After 4 - 6 hrs.
Hard dry	After 2 - 4 days
Full cure	After 5 - 7 days

SUGGESTIVE FORMULATIONS :

	<i>1. Clear coating. for wood, metal, etc.</i>	<i>2. Clear coating for artificial leather, etc.</i>	<i>3. White enamel</i>
Part I			
Synpol 450 XX	32.4	26.5	38.5
Titanium dioxide	---	---	31.2
Xylene	38.0	---	1.5
Cellosolve	9.6	27.0	---
n-Butanol	---	---	1.0
M.I.B.K.	---	14.5	2.8
Cyclohexanone	---	7.0	---
	80.0	75.0	75.0
Part II			
Synpol 115 (80 % in Xylene)	20.0	25.0	24.0
Xylene	---	---	1.0
Total	100.0	100.0	100.0
Mixing ratio by weight on solids			
Synpol 450 XX : Synpol 115 (80 % in Xylene)	3 : 2	1 : 1	3 : 2
Pigment binder ratio	---	---	40 : 60

continued.....

DISCLAIMER: Above Specifications are subject to change without prior notice and company reserves the right to modify the same at any time

FILM PROPERTIES : The properties of the cured films are dependent to a very large extent on the mixing ratio of the components. The permissible variations are given in the following table.

Mixing ratio (on solids)		Film properties	
Synpol 450 XX parts by weight	Synpol 115 (80 % in Xylene) parts by weight	Resilience	Resistance to water, chemicals and solvents
1	1	Maximum	Minimum
2	1	Good	Average
3	1	Minimum	Maximum

The cured lacquer films exhibit the following characteristics ;

- Excellent adhesion to metals, wood, ceramics, plaster, and brickwork, and also to paper, leather, and moulded plastics.
- High gloss, both as a transparent lacquer and as a pigmented enamel.
- Surface hardness such as is otherwise only associated with stoving enamels.
- High flexibility in spite of great surface hardness
- Heat resistance, i.e., good ageing resistance for many months at temperatures up to 100⁰ C.
- Good resistance to weathering, water, and a large number of chemicals.
- Good resistance to electrical surface leakage.

SOLUBILITY : Synpol 115 (80 % in Xylene) is soluble in aromatic hydrocarbons, higher alcohols, glycol ethers and chlorinated hydrocarbons. It is partially soluble in methanol, esters, and ketones and is insoluble in water.

MATERIAL SAFETY DATA :

Product name	Synpol 115 (80 % in Xylene)
Flash point ⁰ C. (Abel closed cup)	30
Flammability	Moderate fire risk
Toxicity	Mild toxicity by exposure and inhalation due to presence of very small quantity of polyamines.
Handling	Keep away from sources of ignition, provide all electric connections of flame-proof design. Wear safety glasses, rubber gloves and protective clothings.
Emergency treatment and measures	
1 Hygienic precautions	Adequate ventilations.
2 Hygienic treatments (First Aid)	Flush eyes thoroughly with water. Apply ophthalmic cortisone for conjunctivitis and keratities. Wash out contaminated skin with soap and water. Gastric lavage (stomach wash), if swallowed, followed by saline catharsis.
3 Fire precautions (in case of outbreaks)	Use dry chemical or carbon dioxide. Water spray may help to keep containers cool, to dilute leaked resins and to diffuse vapours.
Spills and leakage	Absorb liquid materials in sand and collect solid material and burn under hood in incinerator.
Disposal and waste treatment	Spray into furnace under controlled conditions.

STORAGE : Synpol 115 (80 % in Xylene) should be stored in cool place under shade. The properties are so adjusted to have storage stability of minimum 6 months.

PACKING : 25 kgs. M.S. drums, 50 kgs. Plastic carboys and 180 kgs. M.S. barrels.

DISCLAIMER : Information in this literature is to the best of our knowledge true and accurate. However, since conditions under which our products may be used are beyond our control, recommendations are made without warranty or guarantee.

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