

AVCO-REZ ECO CONC

HIGH CONCENTRATION, LOW FORMALDEHYDE REACTIVE RESIN FOR EASY-CARE FINISHES

AVCO-REZ ECO CONC is a modified Glyoxal resin, used as a thermosetting resin, to produce durable crease resistance and dimensional stability to cellulosic and polyester cotton fabrics. AVCO-REZ ECO CONC is a low free formaldehyde product, suitable for the Eco Standard application.

SPECIFICATION:

Appearance	Clear, yellow to red-brown liquid
Chemical nature	Modified dimethylol-dihydroxy-ethylene urea.
Ph (as is)	4.0 – 5.0
Solid content (R.I)	Approx 70%
Free Formaldehyde	Less than 75 p.p.m.(A.A.T.C.C), in properly cured fabrics.
Solubility	Dilutable in cold water in any proportion.
Storage	Stable at normal storage conditions for at least 12 months.

PROPERTIES:

1. Used for the resin finishing of woven and knitted cellulose fibres and their blends
2. Applied by normal dry crosslinking methods on fabric
3. Gives low formaldehyde levels on the treated fabric (below 75 ppm) meeting Ökotex standards
4. Gives "wash and wear" effects durable to washing up to the boil
5. Gives chlorine resistant finishing
6. Can be diluted in tap water thanks to its buffering/sequestering system 20-30 g/l
7. Minimises tendency to yellow
8. Gives excellent crease recovery and shrinkage control
9. Can be used with fluorochemical based water repellents
10. Because of high reactivity , an increase of stenter frame speed is possible for approx. 10%.
11. The hand of fabrics treated with AVCO-REZ ECO CONC - is softer than fabrics treated with U.F. or Melamin resins.

APPLICATION:**I. For fabric :**

- Ensure the fabric is well prepared, neutralised correctly and has not been treated with formaldehyde containing products such as cationic dye fixing agents in the preceding processes
- For optimum results the resin should be applied at pH 4-5
- In order to achieve optimum curing the fabric should be hydrophilic and free from alkali. The amount of AVCO-REZ ECO CONC required is first diluted in water, the additives followed by the prediluted catalyst are added and then the bath is set to Ph 4-5 and made up to final volume with water

Product	Wash & Wear on 100% Co	Easy care on Pe/Co	Low shrink finish on 100% Viscose
AVCO-REZ ECO CONC	20-50 g/l	10-40 g/l	40-90 g/l
AVCO-SOFT PE	10-30 g/l	10-30 g/l	20-40 g/l
AVCO-ELASTOGUM 230 NEW	10-30 g/l	10-30 g/l	20-40 g/l
AVCO-CATALYST PMC	20-30 g/l	10-20 g/l	20-60 g/l
Acetic acid	1ml/l	1ml/l	1ml/l
Pick up	70-80%	70-80%	20-60 g/l

Double process :

Drying : 110-130°C

Curing : 150-155°C

170-180°C

2.5-1.5 min

40-25 sec

Single process :

Rapid curing 160-170°C

60-45 sec

II.Wrinkle free application for garment :

Product	Garment 100% cotton
AVCO-REZ ECO CONC	40-70 g/l
AVCO-SOFT PE	20-30 g/l
AVCO-ELASTOGUM 230 NEW	20-30 g/l
AVCO-CATALYST PMC	20-40 ml/l
Acetic acid	1 ml/l
Pick up	60-80 %

The garments are treated in an industrial washing machine at 30°C using a liquor ratio between 1:10 and 1:20 for 15-30 min followed by hydroextraction. After tumble drying and pressing, the garments are cured at 150-155°C for 8-12 min in an oven.