

Technical Data Sheet of PVA 100-40 & 2099S

Chemical Name: Polyvinyl Alcohol 100-40 & 2099S

CAS NO.: 9002-89-5

Technical Data of PVA 100-40 & PVA 2099S:

Items	Specifications
New Standard Title	100-40
Old Standard Title	20-99S
Hydrolysis (mol/%)	99.8~100.0
Viscosity (mPa.s)	35.0~45.0
Volatile (wt%)	≤8
Ash (wt%)	≤0.7
PH	/
Purity (wt%)	≥90

Application

1. Textile industry: textile paste, fabric finishing agent, vinylon fiber raw materials;
2. Building decoration industry: 106, 107 glue, 801 glue, interior and exterior wall coatings, adhesives;
3. Chemical industry: polymeric emulsifiers, dispersants and polyvinyl formaldehyde, acetal, butyral resin;
4. Paper industry: paper adhesives;
5. Agriculture: soil amendments, pesticide adhesion synergists and polyvinyl alcohol films;
6. It can also be used in daily cosmetics and high-frequency quenching agent.

Package

Packages: in 20 kg/bag, 25 kg/bag, 800kg/bag.

Storage

PVA can be stored for a long period without denaturalization unless it contacts water directly.

During the storage, volatilization matter may slightly cause both moisture and weight loss but that will not affect the quality of PVA.

Then, when the volatilization matter gets low, PVA absorbs easily moisture and adds weight to it.

If it is not contaminated, PVA solution does not rot or deteriorate easily which makes it easier for storage

than any other macromolecular solution.

For the PVA with high viscosity and complete alcoholysis types, if they are made into a paste with a concentration higher than 8%, they can be stored at the ambient temperature lower than 20°C with increased viscosity, forming gel due to molecule crystallization without any change in nature.

Their fluidity can be restored to the original after heated and stirred. To avoid such happenings, in winter the frost resistance type PVA can be selected, or similar products with alcoholysis degrees of 88-97 (mol/mol)%, which perform slightly poor in PVA water resistance, or by combination of complete and partial alcoholysis types for freeze resistance.

For the PVA with a degree of alcoholysis smaller than 99 (mol/mol)%, its viscosity is consistent with few possibilities to gel at low temperatures.

Stainless steel tanks are suitable for storage of PVA paste. If only iron or carbon steel containers are available, 0.05% sodium nitrate or sodium benzoate can be added into the PVA paste to avoid rusting.

Given a long period of storage, the untreated PVA solution in water mildew and rot easily, when some 0.01%-0.05% antiseptic can be added, e.g. salicylic acid.