One-Step PAGE Gel Fast Preparation Kit (10%)

E303

Version 22.1

Product Description

One-Step PAGE Gel Fast Preparation Kit is designed for the rapid preparation of polyacrylamide gels. This product adopts the pre-mixed formula of the stacking gel and the resolving gel. It only needs to mix the reagents in pairs and add the APS to make the gel. After pouring the resolving gel, the stacking gel can be directly poured, which is simple and fast. The supplied stacking gel is colored for easy adding samples and distinguishing between different gels. The APS provided with it has good stability and polymerization effect, and there is no need to add TEMED in the process of preparing gels. This kit can make 125 mini PAGE gels (calculated based on 0.75 mm thickness gels), and the casted gels can be used for denaturing or native PAGE gel electrophoresis.

Components

Components	E303-01 (125 gels/0.75 mm)
Stacker A	80 ml
Stacker B	80 ml
Resolver A (10%)	250 ml
Resolver B	250 ml
APS	8 ml

Storage

APS: Store at -30 ~ -15℃ and transport at ≤0℃. It can be stored at 2 ~ 8℃ at least 3 months.
Other components: Store at 2 ~ 8℃. Adjust the shipping method according to the destination.

Applications

It is applicable for the preparation of polyacrylamide gels, and the casted gels can be used for denaturing or native PAGE gel electrophoresis.

Notes

For research use only. Not for use in diagnostic procedures.

1. The dosage of the improved APS is for reference only, and the actual dosage can be increased or decreased according to personal experimental habits and experience.
2. The polymerization speed is closely related to the dosage of the APS and temperature. More APS and higher temperature can speed up the polymerization.
3. Acrylamide is neurotoxic, please wear a lab coat, disposable gloves and masks for operation.

Experiment Process

For example: Preparation of a 0.75/1.0/1.5 mm mini gel

Resolving Gel

Thickness of gel	Resolver A	Resolver B	APS
0.75 mm	2.0 ml	2.0 ml	40 µl
1.0 mm	2.7 ml	2.7 ml	60 µl
1.5 mm	4.0 ml	4.0 ml	80 µl

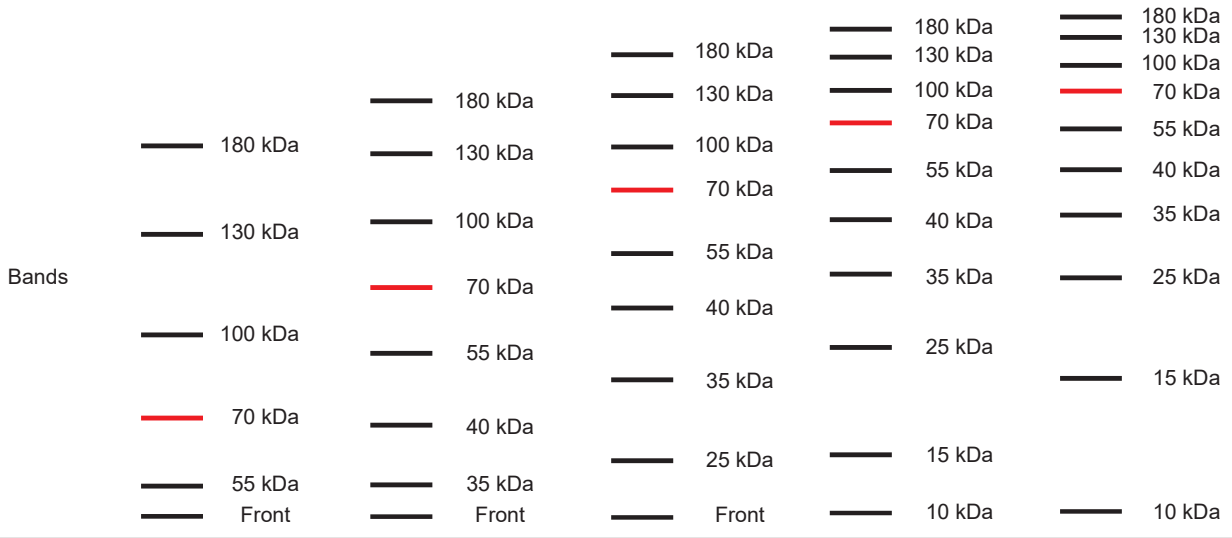
Stacking Gel

Thickness of gel	Stacker A	Stacker B	APS
0.75 mm	0.5 ml	0.5 ml	10 µl
1.0 mm	0.75 ml	0.75 ml	15 µl
1.5 mm	1.0 ml	1.0 ml	20 µl

1. Invert the solution upside down 6 - 8 times to mix thoroughly.
2. Preparation of resolving gel: Take equal volumes of Resolver A and Resolver B, 2.0/2.7/4.0 ml each, and mix well.
3. Preparation of stacking gel: Take equal volumes of Stacker A and Stacker B, 0.5/0.75/1.0 ml each, and mix well.
4. Add 40/60/80 µl of APS to the mixed solution in step 2 and mix thoroughly immediately. Then pour it into the gel-making glass plate so that the liquid level is about 1.5 cm away from the edge of the short glass plate.
   ▲This solution is excessive, please do not inject all.
   ▲Avoid vigorous shaking during the mixing operation, and avoid pouring air bubbles into the gel-making glass plate during the gel making process.
   ▲After pouring the resolving gel, the stacking gel should be injected into the glass plate within 3 minutes. If you find it difficult to prepare, you can also choose to pour the resolving gel and seal it with ddH_2O or alcohol, and then pour the stacking gel after the resolving gel has polymerized.
5. Add 10/15/20 µl of APS to the mixed solution in step 3, mix thoroughly immediately. Gently pour the mixed solution into the gel-making glass plate without waiting for the resolving gel to polymerize, and then insert the comb.
   ▲The stacking gel solution can be poured gently along the long glass plate to avoid dispersing the resolving gel.
6. After the gel has polymerized (about 15 min at room temperature), remove the comb and perform electrophoresis. The recommended electrophoresis voltage is 150 - 200 V, and the electrophoresis can be stopped when the bromophenol blue indicator reaches the bottom edge.
   ▲Please try to use freshly prepared running buffer.

Gel concentration selection (for reference only)

Cat.No.	E301	E302	E303	E304	E305
Concentration	6%	8%	10%	12%	15%



▲ The above is a schematic diagram of the electrophoresis results of 180 kDa Prestained Protein Marker (Vazyme #MP102) in PAGE gels of different concentrations in Tris-Glycine-SDS buffer system (for reference only).