PRODUCT INFORMATIOIN

Acrylamide/Bis-acrylamide, 40% solution (Mix Ratio 37.5:1)

Product information for A0008:

Product Name: Acrylamide/Bis-acrylamide, 40% solution (Mix Ratio 37.5:1)
Product Code: A0007
Storage Temperature: 2–8 °C

Product Description:

The Acrylamide/Bis-acrylamide solution is used in protein and nucleic acid electrophoresis. The solution concentration (40%) is based on the total weight of both the acrylamide and bis-acrylamide. The mix or feed ratio (w/w) of acrylamide:bis-acrylamide is 37.5:1. The solution is prepared from electrophoresis grade acrylamide and bis-acrylamide in ultrapure water. The product is passed through a 0.2 µm filter.

The product is suitable for electrophoresis.

Precautions and Disclaimer:

This product is for R&D use only, not for drug, household, or other uses. Please consult the Material Safety Data Sheet for information regarding hazards and safe handling practices.

Storage/Stability

Store the product at 2–8 ^{o}C & darkness.

Procedure

The following formula may be used to calculate the volume of stock solution required for a gel concentration of <40%:

$$V_r = \frac{C \times Vt}{40\%}$$

Where:
Vr: is the required volume of Acrylamide/Bis-acrylamide, 40% Solution
C: is the final desired acrylamide concentration (%)
Vt: is the total volume of final solution to be prepared

To prepare gels for use in the Laemmli system, the following solutions may be combined as indicated in Tables 1 and 2.

Solution A - Acrylamide/Bis-acrylamide 40% Solution, Catalog Number A0008

20 Konrad Cres. Markham Ontario L3R 8T4 Canada
Tel: (905) 474 4493, (800) 313 7224 Fax: (905) 474 5794
Email: order@biobasic.com Web: www.biobasic.com

Solution B - Combine:

	Catalog No.	Amount
Tris Base	TB0194	7.28 g
TEMED	TB0508	92 ul

Adjust the pH of the solution to 8.9 with 1 M HCl and add ultrapure water to 40 ml final volume.

Solution C - Combine:

	Catalog No.	Amount
Tris Base	TB0194	1.21 g
TEMED	TB0508	92 ul

Adjust the pH of the solution to 6.9 with 1 M HCl and add ultra pure water to 20 ml final volume.

Solution D - Dissolve 1 g of Sodium Dodecyl Sulfate (Catalog Number SB0485) in 10 ml of ultrapure water and filter.

Solution E - Dissolve 60 mg of Ammonium Persulfate (Catalog Number AB0072) in 5 ml of ultrapure water.

Prepare fresh each day. See Tables 1 and 2 for mixing instructions.

Table 1.

Separating Gel Solution (Final volume = 20 ml)

Component	Final Acrylamide Concentration									
	5%	6%	7%	8%	9%	10%	11%	12%	15%	20%
Ultrapure Water (ml)	11.3	10.8	10.3	9.8	9.3	8.8	8.3	7.8	6.3	3.8
Solution A (ml)	2.5	3.0	3.5	4.0	4.5	5.0	5.5	6.0	7.5	10.0
Solution B (ml)	5.0	5.0	5.0	5.0	5.0	5.0	5.0	5.0	5.0	5.0
Solution D (ml)	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2	0.2
Solution E (ml)	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0

Table 2.

Stacking Gel Solution (Final volume = 8 ml)

Component	Final Acrylamide Concentration
	3%
Ultrapure Water (ml)	5.72
Solution A (ml)	0.60
Solution B (ml)	1.00
Solution D (ml)	0.08
Solution E (ml)	0.60

20 Konrad Cres. Markham Ontario L3R 8T4 Canada
Tel: (905) 474 4493, (800) 313 7224 Fax: (905) 474 5794
Email: order@biobasic.com Web: www.biobasic.com