

## Product Description

10× Fast Transfer Buffer is a high-efficiency, safe, and non-toxic transfer buffer developed for rapid wet transfer in Western blot workflows. This product is supplied as a 10× concentrate and should be diluted with deionized water and ethanol to a 1× working solution before use. The formulation does not contain highly toxic components, and ethanol can be used in place of methanol during buffer preparation, making the workflow safer and more environmentally friendly. This buffer enables convenient operation and can complete membrane transfer in 20-40 min with low heat generation. In most cases, an internal ice pack in the transfer unit is sufficient and an external ice bath is not required. It is also suitable for proteins spanning a wide molecular-weight range, helping support simultaneous transfer of both small and large proteins on the same membrane. This product is compatible with Tris-Glycine, HEPES, and Bis-Tris gel systems.

## Components

Components	BR4D421-01
10× Fast Transfer Buffer	500 mL

## Storage

Store at 16-30°C.

## Protocol

1. Prepare 1× Fast Transfer Buffer according to the table below. Dilute 10× Fast Transfer Buffer with deionized water first, then add ethanol.

Components	Volume
10× Fast Transfer Buffer	100 mL
Deionized water	700 mL
Ethanol	200 mL

2. Prepare the transfer membrane and gel, then assemble the transfer apparatus.

3. Add 1× Fast Transfer Buffer to the transfer tank. Refer to the table below for recommended transfer times for gels of different concentrations at 500 mA or 400 mA. If the required transfer time exceeds the recommended range, perform the transfer in an ice bath. For proteins smaller than 20 kDa, a transfer time of 5-15 min is generally recommended; for proteins of 20-150 kDa, 15-25 min is recommended; for proteins larger than 150 kDa, 25-30 min is recommended. The transfer time may be shortened for low-molecular-weight proteins and extended for high-molecular-weight proteins as needed.

Gel concentration	6%	7.5%	10%	12.5%	15%
Recommended time at 500 mA	15-20 min	15-20 min	20-25 min	20-25 min	25-30 min
Recommended time at 400 mA	20-25 min	20-25 min	25-30 min	25-30 min	30-35 min

## Notes

1. For Research Use Only. Not for use in diagnostic procedures.
2. For better transfer performance, pre-cool the prepared transfer buffer at 4°C or in an ice bath before use.
3. If precipitation appears, warm in a water bath until completely dissolved before use.
4. Absolute ethanol is not required. If using ethanol of a different concentration, adjust the added volume according to the actual ethanol concentration.
5. For your safety and health, please wear a lab coat and disposable gloves when operating.