



# TAE solution (50X)

## For research use only

Catalogue number: BI-2401

### Product Description

Tris-Acetate-EDTA (TAE) buffer is most commonly used for DNA agarose gel electrophoresis, but is also used for non-denaturing RNA agarose gel electrophoresis. Double-stranded DNA tends to run faster in TAE than in other buffers. Buffer circulation or replacement during extended electrophoresis can remedy the lower buffering capacity. TAE is beneficial for high resolution of long nucleic acid fragments (longer than 1500 bp) on agarose gels. It has a lower buffering capacity than TBE, and in general, nucleic acid fragments move more slowly in TAE gels (apart from linear dsDNA, which tends to run faster).

### Specification

- **Concentration:** 50X.
- **1X Buffer composition :** 40 mM Tris, 20 mM acetic acid, 1 mM EDTA, pH 8.2-8.4.
- **Shelf life:** 12 months

### Notes

- Dilute the buffer to 1X working concentration before use.
- Use fresh 1X buffer for each electrophoresis.
- Not for use in diagnostic procedures.

### Applications

- Agarose and polyacrylamide gel preparation.
- Native and denaturing RNA analysis
- Northern blotting

### Storage

- Store at room temperature

### References

1. Sambrook, J., Fritsch, E.F., Maniatis T. (1989), Molecular Cloning: a laboratory manual, 2nd. ed., B.23, p. 6.7, Cold Spring Harbor, N. Y.: Cold Spring Harbor Laboratories