Technical Note

JBScreen Buffer Preparation

General Notes:

- Chemicals used are of MicroSelect grade for Molecular Biology
- Buffers are prepared as 1 M stock solutions. The pH is adjusted to the value indicated in the specification of the particular condition with HCl (Imidazole, Tris, Acetate), NaOH (Bicine, CHES, HEPES, MES, ADA, CAPS, Glycine, Citric Acid, L-Malic Acid, MOPS, PIPES, Succinate, Tricine), KOH (Maleic Acid), Citric Acid (Citrate) or Acetic Acid (Acetate) (23°C; Fisher pH electrode)
- pH values indicated are those of the buffer used, not those of the JBScreen condition
- Percentages given are w/v or v/v values as indicated in the data sheets
- The final volume is adjusted with >18 MOhm water
- Solutions are sterile filtered (0.2 μm filter) and filled under sterile conditions

Examples:

**JBScreen Classic 1/D6 (30% w/v PEG 3000, 0.1 M Tris HCl pH 8.5, 0.2 M Lithium Sulfate):**
- 30 g of PEG 3000
- 10 ml of 1 M Tris pH 8.5 (adjusted with HCl)
- 2.19 g of Lithium Sulfate
were dissolved and the volume was adjusted to 100 ml using >18 MOhm water

**JBScreen Cryo 1/C6 (20% v/v Glycerol, 20% w/v PEG 4000, 10% v/v 2-Propanol, 50 mM Sodium Acetate pH 4.6, 100 mM Sodium Chloride):**
- 20 ml of Glycerol
- 20 g of PEG 4000
- 10 ml 2-Propanol
- 5 ml of 1 M Sodium Acetate pH 4.6 (adjusted with Acetic Acid)
- 0.58 g Sodium Chloride
were dissolved and the volume was adjusted to 100 ml using >18 MOhm water

**JBScreen Pentaerythritol 4/D2 (35% w/v Pentaerythritol ethoxylate (15/4 EO/OH), 0.1 M HEPES pH 7.5, 0.2 M Ammonium Sulfate):**
- 35 g of Pentaerythritol (15/4 EO/OH)
- 10 ml of 1 M HEPES pH 7.5 (adjusted with NaOH)
- 2.64 g Ammonium Sulfate
were dissolved and the volume was adjusted to 100 ml using >18 MOhm water

Please contact xtals@jenabioscience.com with comments or suggestions.