



Frozen and Deglycerolized Red Blood Cells (DRBCs)

A JTS clinical practice guideline for the clinical use of DRBCs as a supplement to liquid cold-stored RBCs

CHARACTERISTICS

- Decreased proteins
- Decreased inflammatory markers
- Decreased D-dimer level
- 80% viable RBCs
- Hct ~38%
- May decrease non-hemolytic reactions
- Increased tissue oxygenation
- No difference in clinical outcomes

PROCESSING

- Processing takes hours – consider pre-thawing and processing
- Primarily used at Role 2 or higher
- Requires specific storage/processing equipment
- Has 10-year shelf life in cryoprotectant at -65° C
- After thawing and processing must be stored at 1-6° C, now with a 14-day shelf life

DOCUMENTATION

Clinician: Document type of RBCs used

Laboratory:

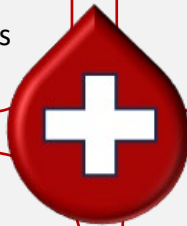
- Blood component identifiers
- Date shipped frozen blood received at blood bank
- Date of thaw/processing
- Expiration date
- Date of transfusion
- Indications for transfusion
- Transfusion reaction

MONITORING

Clinical: Treat as a routine liquid-stored RBC transfusion

Labs: Consider pre & post transfusion

- H/H
- Base excess
- Lactate level



- Actuate documentation
- ✓ Number of units transfused
 - ✓ Time of transfusion (on 518 form and in clinical record)
 - ✓ Number of DRBC transfused
 - ✓ Transfusion reaction



This information is pulled from the evidence-based Joint Trauma System (JTS) Frozen and Deglycerolized Red Blood Cells Clinical Practice Guideline (CPG). JTS CPGs can be found at the [JTS CPG website](#) or the [JTS Deployed Medicine site](#).