



## 8×8×10 ISO REFRIGERATED CONTAINER SYSTEM (RCS) | DoD CFD

### PURPOSE:

The Refrigerated Container System (RCS) provides for the safe transport and storage of perishable food items. It is an ISO-based container designed to be transportable by land, sea, and air and to operate in ambient temperatures ranging from -40°F (-40°C) to 125°F (52°C). The container is designed to operate on the ground at a fixed site location. The container is also able to receive power from an external electrical source, provided that the container is located within 20 feet of the electrical source. The RCS is durable and robust, designed for use in extreme hot, cold, humid, and dry environments.

### CHARACTERISTICS:

The RCS is dual powered and can be operated either through the use of the stand alone 10 kW JP-8 or diesel powered Tactically Quiet Generator (TQG) or through an external 208 V 3-phase 50/60 Hz power source. Either source allows for complete operation of the RCS to include, but not limited to the refrigeration unit (RU), TQG, interior lighting, and all associated control systems. All of the walls, the ceiling and the floor are fully insulated to minimize the heat transfer between the container interior and ambient conditions, with a heat leakage rate no greater than 48 BTU/hr/°F. The ribbed floor and wall spacer strips allow conditioned air to properly circulate around the cargo and provide for sufficient structure to load the container up to a maximum gross of 52,900 pounds (23,805 kg). An end-wall set of double doors provides full access to the container's interior and seals tightly against the container frame when closed. The right access door also contains an emergency escape door to prevent entrapment of personnel and can only be removed from inside the container. Floor drains are located at each corner of the ribbed floor to prevent water buildup within the RCS.

### CAPABILITIES & BENEFITS:

- Is easily transportable on military/commercial flatbed truck, railway car, ship, or any other ISO transportable conveyance; 8 foot (2.44 m) height allows for transport by C-130 and larger aircraft.
- Can be stacked up to 9 high and connected in tandem for transporting or storage.
- Operates from on-board 10 kW TQG or external electrical power sources.
- Has operator controlled internal lighting.
- Escape hatch permits emergency exit from container interior.
- Is equipped with a self-contained RU to provide both cooling and heating capabilities; can maintain internal temperatures of between 0°F to 40°F (-18°C to 4.5°C) in ambient temperature from -40°F to 125°F.
- Provides 798 cu ft (22.6 cu m) of single temperature storage capacity.

### COMMENTS:

The RCS has been fielded since 31 July 1998.

### POINT OF CONTACT:

#### Combat Feeding

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### AT A GLANCE:

- **CUBIC CAPACITY:**  
385 cu ft (11 cu m)
- **COOLING CAPACITY:**  
10,500 BTU/hr @ 35°F-110°F (1.67°C - 43°C) and 5200 BTU/hr @ 0°F-110°F (-17°C - 43°C)
- **DIMENSIONS:**  
96 in W × 96 in H × 117 in L (244 x 244 x 297 cm)
- **WEIGHT:**
  - Max. Gross Weight: 22,400 lbs (10,160 kg)
  - Tare Weight: 5,200 lbs (2,359 kg) (including refrigeration unit)
- **MAX PAYLOAD WEIGHT:**  
4,800 lbs (2,177 kg)
- **UTILITIES/POWER:**  
208/230 VAC, 3-Phase, 50-60 Hz
- **TRANSPORTATION:**  
Transportable by USMC MTRV or LVS
- 10-14 amps Nominal Current Rating
- Non-ozone depleting refrigerant (R-404A)

