



Basic aspects of Container Transport

Most goods shipped around the world are transported in containers. There are many different types and sizes of cargo transport units, but they all have one thing in common i.e. the importance of being in sound condition. Transporting goods in containers is often regarded as being parallel to transporting goods under deck. Therefore, it is important that the condition of the cargo transport unit (CTU) reflects this fact. Goods should be as safe in a container as they are under deck in the cargo hold.

Remember that all of the containers used in international transport must have a valid safety approval plate, i.e. a CSC plate, which is the abbreviation for the Container Safety Convention.

Inspections before packing and loading:

The outside of the container:

- No holes or cracks in the walls or roof.
- The doors and the closing devices must operate properly.
- If possible, a visual inspection of the underside of the container should also be carried out to detect whether or not there are any significant corrosion problems with the door sills, the bottom side rails, cross members and e.g. bottom end rails.
- There should be no markings or labels from the previous cargo, e.g. IMO placards.



The inside of the container:

- The container must be watertight. You can test this by entering the container, closing both doors tightly and then by looking for incoming light through cracks, holes, door gaskets etc.
- The container interior is dry, and the ventilation is working as intended (vents unblocked).
- The floor is smooth and clean, no nails or other protrusions. In addition, the doors and walls must not have anything on them which could damage the cargo.
- The container is clean, free of cargo residues and neutral in odor.

An inspection during and after packing and loading

- The container is packed and loaded, and the cargo lashed appropriately for the anticipated transit stresses, i.e. longitudinal, lateral and vertical.
- When securing the goods inside the container, keep in mind the restrictions of the structures and lashing points in the CTU. A lashing configuration is only as strong as its weakest link.
- It is of the utmost importance that the goods are secured sufficiently by the doors so that nothing can fall out from the container when the doors are being opened. Falling goods are a serious threat that can result in bodily injuries/death and cargo damage.
- If necessary, make sure that enough dehumidifiers are placed inside the container.
- The doors have been properly closed. (Strong steel wire cables, padlocks or high security seals provide good protection from cargo theft.)

Moisture in containers

- Large temperature variations create condensation. Cold cargo meet hot temperature and perhaps with bad ventilation and no dehumidifiers inside the container, then there will be condensation.
- If the container is loaded on deck (outdoors) in warm tropical climates and exposed to direct sunlight during the day, it gets very hot inside the container. At night the temperature drops and may even occasionally be exposed to cooling such as rain or seawater spray. These large temperature changes inside the container during sea voyages can also cause condensation.
- Good ventilation and dehumidifiers should always be used when transporting moisture-sensitive cargo, especially when exposed to large temperature differences during transport.



REMEMBER that if a container is damaged or not cleaned and thus not suitable for your goods, you should reject it and demand a replacement unit!

Useful links:

UCIRC is the technical standard according to which all shipping containers are annually inspected.

IICL6 is the technical standard from the “Institute of International Container Lessors” that many of the container leasing companies use when assessing the conditions of the cargo transport unit.

CSC International Convention for Safe Containers (CSC)

CTU code IMO/ILO/UNECE Code of Practice for the Packing of Cargo Transport Units

