

INDUTAINER IBCs

Industrial container of a unique design



INDUTAINER IBCs for paste-like and liquid products

- + Collapsible container system
- + Combines the advantages of RIBC and FIBC
- + Optimal load utilization of truck and ISO Container
- + Designed to ensure complete emptying
- + Optional discharging sideways

IBCs of a Unique Design

The INDUTAINER IBC is a collapsible IBC system which combines the advantages of the Rigid Intermediate Bulk Container (RIBC) with the advantages of the Flexible Intermediate Bulk Container (FIBC).

The INDUTAINER IBC is especially designed for transport and storage of middle to high viscosity liquids and sedimenting slurry. The solid side walls and a sandwich construction of two layers of coated fabric with interposed foamed polyurethane provide the necessary stability for holding liquids.

The base spout allows emptying through the centred square opening of a CP 8 pallet. When handling high viscosity liquids, drainage is improved by a simple discharge frame; the flexible base becomes cone-shaped and facilitates complete emptying.

Low acquisition costs, little space for storage and transport when empty, quick assembly, moisture resistance, discharge spouts or discharge valves for low to high viscosity liquids and excellent drainage without any residues are the great advantages of the INDUTAINER IBC.

Unique Features

- + Combines the advantages of RIBC and FIBC
- + Demands little space when empty and tare (8 kg) is low
- + Easy assembly by one person in less than 90 seconds

The combination of rigid foldable side walls with a flexible textile top and a flexible base offers significant advantages compared to alternative containers for transport and storage.



Collapsed INDUTAINER IBC

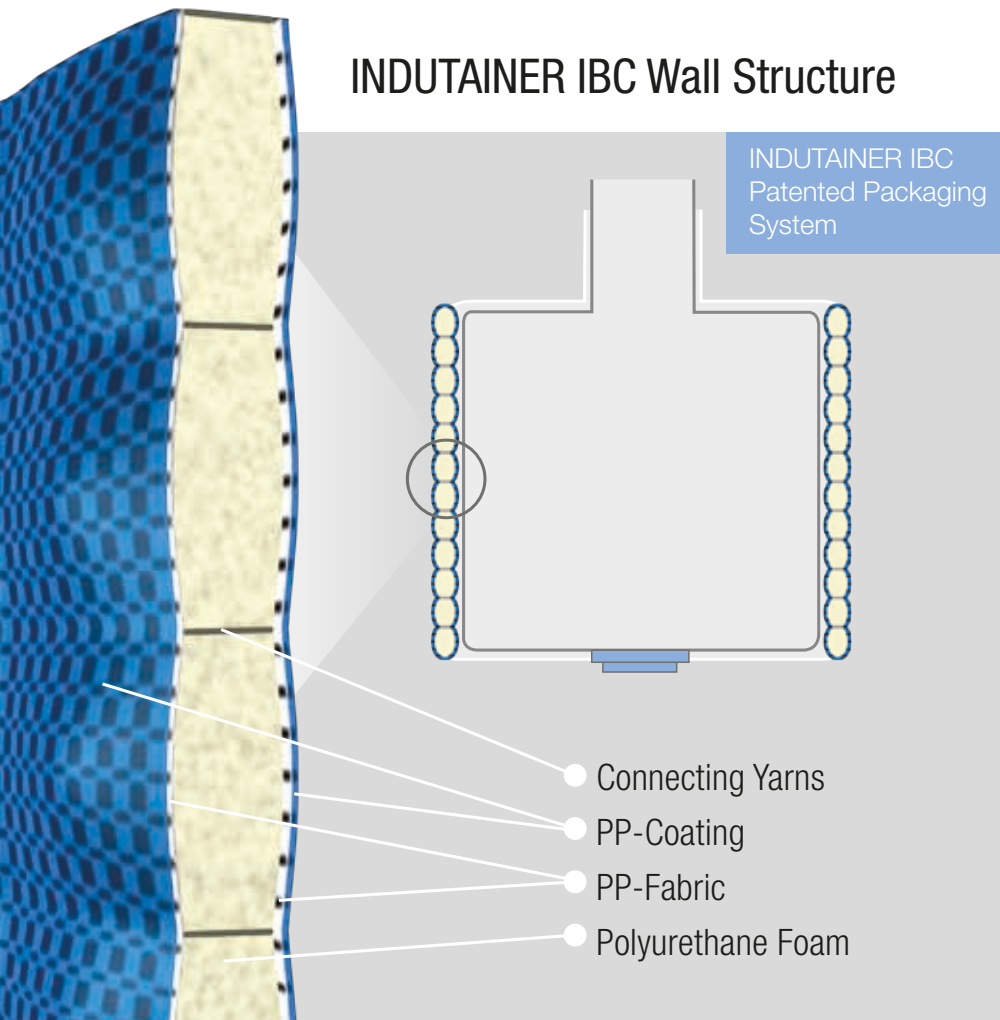


10 empty INDUTAINER IBCs on a single pallet



Assembled INDUTAINER IBC ready for filling

INDUTAINER IBC Wall Structure



Design & Dimension

All INDUTAINER IBCs are equipped with lifting loops for forklift handling, for suspended discharge and placement on a discharge frame.

Size	Volume
930 x 930 x 550 – 1,160 mm	500 – 1,200 l

Customized measurments possible



Type of Pallet	Size	Payload
CP 3	45 x 45 x 6 inch	1,000 kg
CP 8 Centred opening	45 x 45 x 6 inch	1,500 kg
CP 9	45 x 45 x 6 inch	1,500 kg

Safe Working Load SWL	Safety Factor SF
Lifting loops sewn into vertical seams	
500 – 1,500 kg	5:1 Single Trip
500 – 1,000 kg	6:1 Multi Trip

Inner Liner

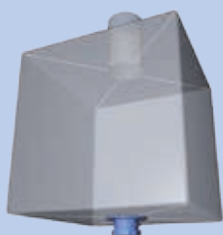
The inliner is the primary packaging and will contain the product.

The glued inner liner enables quick assembly, easy filling and facilitates quick and complete drainage.

Filling Holes

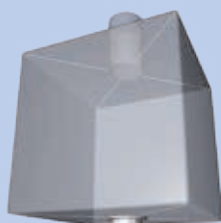
- + Filling Spouts: Ø 12.5 to 24.5 inch
- + Screw Caps: Ø 1, 2 and 3 inch

Filling Spout



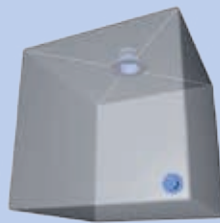
Butterfly Valve
Partial discharge possible
Ø 2 and 3 inch

Filling Spout



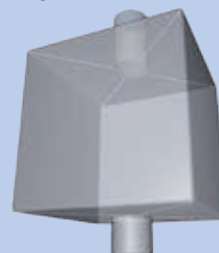
Slide Valve
Partial discharge possible
Ø 5 inch

Screw Cap



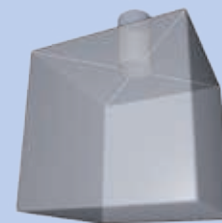
Sideways 2 inch valve
Partial discharge possible
Ø 2 inch

Filling Spout



Bottom Spout
No partial discharge
Ø 6.5 to 12.5 inch

Filling Spout



Flat Base
Discharge by suction or
base cross out

Material

- + LDPE mono film
- + LDPE/EVOH/LDPE co-ex film
- + LDPE/PA/LDPE co-ex film
- + LDPE/AL/PET laminated film
- + PE/MET/PE – metallized film

Design

- + Top with filling spout or screw cap
- + Body dimensions variable as needed
- + Base according to graphs

Properties

- + Defined gas barrier properties
- + Physiologically harmless
- + Defined temperature resistance
- + Ventilation valves upon request
- + Food and non-food application
- + Aseptic application

Inliner with Screwcap and Discharge Valve

Filling the inliner works via a screw cap, the discharge via the corner valve.

The INDUTAINER IBC is the secondary packaging. The inliner is the primary packaging and will contain the product.

Unique Features

- + Inliner fastend factory assembled
- + Filling is possible without entrapped air
- + Filling is possible from the top or via the corner valve
- + Fits existing filling devices



The inliner will be fastened factory made and attached to one INDUTAINER side.



A variety of discharge valves is available.



Closed inliner after filling.
Afterwards the fabric filling spout will be closed.



A large variety of screw caps and valves used as filling- and discharge opening are available.

- + Inliner produced as a pillow liner, the folding fits perfectly to the INDUTAINER handling.
- + Multilayer inliner matches the filling material.
- + Inliner will be fastened factory assembled and fixated at one INDUTAINER side.
- + No need for an additional handling of the inliner. This ensures a high level of process stability.
- + Inliner will unfold itself while being filled.
- + Filling is possible without entrapped air.
- + Inliner oneway / INDUTAINER IBC reusable.

Filling via Filling-Spout



Inliner four-slided glued



Easy filling via filling spot

Discharging via Bottom Spout

The 3 inch butterfly valve is suitable for low viscosity products. For high viscosity products the 5 inch slide valve or the base spot are preferred. The slide valve and the butterfly valve allow a partial discharge of the liquid product. INDUTAINER IBCs with a flat base are mostly used for sedimenting slurry.

Emptying is done by cross-cutting the base. The flat base design is also the right choice for products to be discharging by suction.



3 inch butterfly valve incl. adapter and camlock connection



5 inch slide valve unhindered drainage

Cone-Shaped Base Formed by using a Discharge Frame



Base prior to discharge



Base spout



Butterfly valve

Unique Features

- + Designed for a quick and complete emptying
- + Choice of multiple base valves
- + Fits existing discharge devices



Discharge Frame



Suspended discharge



Free-standing on a pallet



Free-standing in a discharge frame

Application Examples

The INDUTAINER IBC is especially designed for transport and storage of middle to high viscosity liquids and sedimenting slurry.



Further Application Possibilities

INDUTAINER IBCs are also used for event technology such as:

- + Ballast tank for staging
- + Ballast tank for set building
- + Cistern

Subsequent positioning of the INDUTAINER IBC inside the scaffold is possible without any difficulties.

While being filled, the IBC will unfold itself and fits in perfectly into the measurements of the scaffold.



Unique Features

- + Dimensions while folded: 43 x 40 x 4 inch
- + Weight: 8 kg
- + Dimension filled: 37.5 x 37.5 x 40 inch, diameter: ca. 96 inch



Transport & Storage

Unique Features

- + Moisture resistant
- + Optimal load utilization of truck and ISO Container
- + Regulatory approval for transportation




Two layer stowage in a storage facility



One layer stowage on truck



Two layer stowage a 20' Container



DEKRA tested packaging. Load securing according §§ 22 & 23 STVO, §§ 30 & 31 STVZO, DIN EN 12195-1 and VDI-Guideline 20700 ff

Deutsches Technologiezentrum
für Ladungs- & Transportgutsicherung



Deutsche
Akkreditierungsstelle
D-PL-19044-01-00



Completed transport assessment according to:
ASTM 4003-98, ASTM 4169-09, EUMOS 40509,
DIN 30786-2, Pitch & Roll
Climatic chamber: BS EN ISO 2233/2001
Manual Handling: ISTA 3 Serie



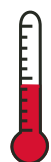
22 INDUTAINER IBCs of 1100 kg each = 24,2 t



20 INDUTAINER IBCs of 1000 kg each = 20 t

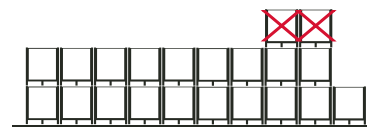
By means of four vertical wooden posts and two wooden cross girders the INDUTAINER IBC can properly can be tied down to the truck. In a 20' container, a tow layer stowage allows the best load utilization. The INDUTAINER IBC can also be stacked two layers in a storage facility.

Safety & Recycling



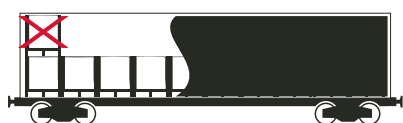
Product filling temperature

Maximum 174 °F / 80 °C



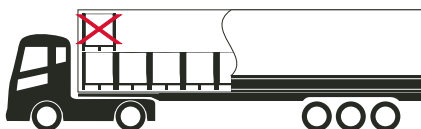
Storage facility

Not more than two layer stacking



Railway

Only one layer stowage



Truck

Only one layer stowage



20' ISO Container

Two layer stowage allowed

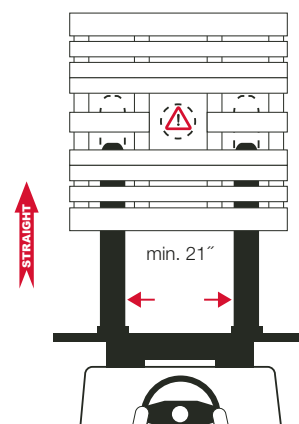


Forklift truck

Transport of single
INDUTAINER IBC only

Using CP8 pallets:

Move the forks straight into to the pallet to avoid damaging the centre bottom valve. Do not use hand or electric pallet trucks



Security advice

Because of the sensitivity of woven polypropylene fabric to UV light the INDUTAINER IBC should be protected from sunlight. Also, the IBC should be protected from rain to prevent water from collecting on top of the INDUTAINER IBC.

Single or Multi Trip

The Single Trip INDUTAINER IBC with a Safety Factor (SF) of 5:1 is designed and intended to be used for one filling only. The Multi Trip INDUTAINER IBC with a Safety Factor (SF) of 6:1 is designed and intended for a limited number of filling and discharge cycles. According to ISO 21898:2004, an IBC of this category must not be reused if damaged. A repair is not allowed. The replacement of a removable inner liner is however permitted.

Quality, Service and Innovation

The INDUTAINER IBC is produced within the EU by a contractual partner who is certified according to ISO 9001:2008 and ISO 14001:2004. We are continuously aiming at improving the quality and design of our products. It is our ambition to develop the best solutions for our customers.

Disposal of INDUTAINER IBC

After using the INDUTAINER IBCs, they can be disposed via the company for recycling industrial and commercial plastic packaging (RIGK).

Energy recycling

The INDUTAINER IBC is made of polypropylene (PP), polyethylene (PE) and polyurethane (PU). These materials are highly valued organic fuel and are excellent materials for energy recovery. The fuel value for example of mineral coal is with 24-27 MJ/kg lower than the fuel value of PU (25-32 MJ/kg). The fuel value of PP and PE is much higher at 43 MJ/kg.

Environment protection

With a capacity of up to 1000 liters the INDUTAINER IBC is a lightweight and environmentally friendly packaging. The INDUTAINER IBC is due to its lay-flat design within the delivery and the return delivery very efficient in logistics and storage. Due to its light weight freight costs and carbon dioxide emissions are significantly reduced.



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