

COOL SYSTEM

Inoac cool system **Cold Gel Pack** **Cold Transport Containers**

“Cold Insulation” + “Transport” makes the best convenient solution.

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●Please be noted that product specification may be changed without any notice.

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●Any questions regarding this catalogue, please contact your nearby branch office, sales office or agency.

Inoac's original technology and innovation will forever change the cold distribution market.

"Safety", "Quality" and "Environment" — Fulfilling the needs of cold distributors in the field.

Maintenance and improvement of delivery quality is the most important factor in the transport of any product: supermarket fresh foods, food industry ingredients or temperature sensitive medical products.

"Quality control of cold distribution – Inoac Cool System", this effective and ideal cold insulation system securely and flexibly meets the needs of the most demanding distribution site.

Inoac Cool System – Five Advantages

- (1) A wide temperature range:** This system supports refrigerated product transportation with a broad range of temperature bands.
- (2) Cold insulation:** To give you the perfect cold environment for your products, we work with you to select the very best combination of materials to ensure optimum temperature control.
- (3) Eco-friendly:** Reusable, save the environment and save money.
- (4) Safe & Reliable:** No toxic or hazardous materials, very safe and very efficient cold insulation transport systems.
- (5) After-sales service:** On-the-spot testing of product temperatures and fine-tuning ensure the optimum cold solution.

Cold Gel Packs

Keeping Fresh & Cool

See Page 3



Cold Transport Containers

Efficient Delivery Of Cold Goods

See Page 13



COOL SYSTEM

Inoac Cool System
Distribution Examples



Milk Delivery



Delivery to Supermarket Stores



Home Delivery of Foodstuff



Transport of Pharmaceuticals



Food Service Industry

Keeping Fresh & Cool

Cold Gel Pack

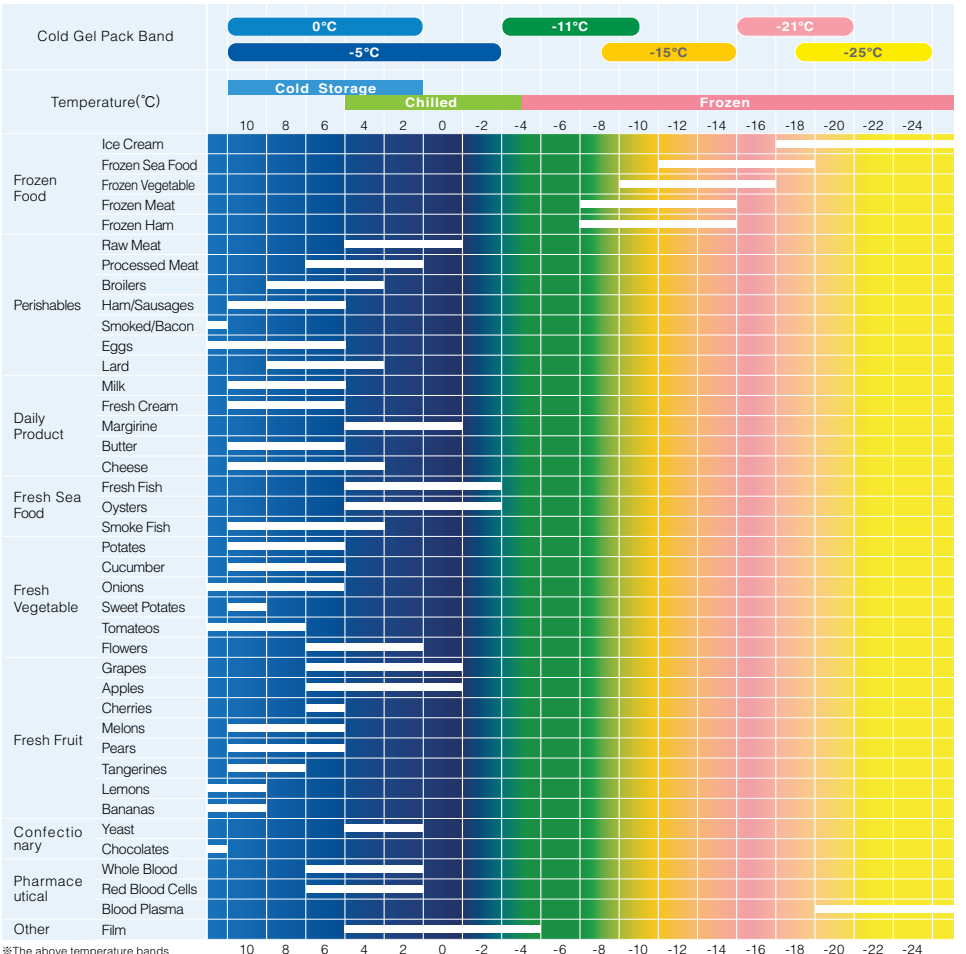
A must-have item to deliver fresher goods direct to the customer.



Cost-saving	Repeated-use cold gel packs freeze costs.
Eco-friendly	An eco-friendly natural gel. (Food additive type and industrial gel are also available.)
Practical	Integrated design with many kinds of cooler boxes.
Durable	Diverse product range from a simple mate to a superior durable plastic container.
Hygienic	Antimicrobial type available to order.

Products suited for Cold Gel Packs

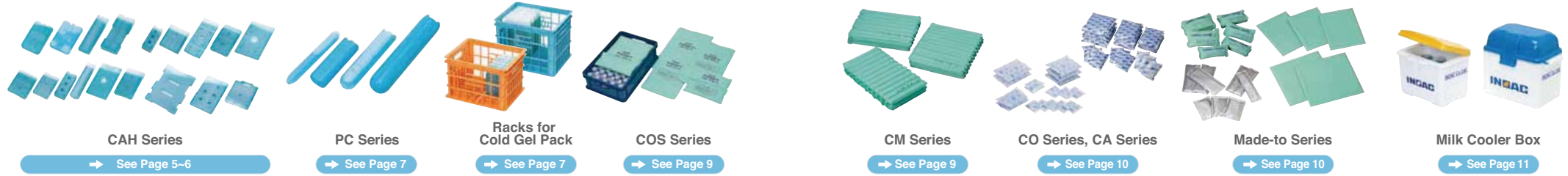
Six bands ensure the right temperature for the right products



Cold Gel Packs

Cold Transport Containers

Cold Gel Pack lineup



CAH Series

Reusable plastics container type

- Exceptional container strength
- Wide range of sizes
- Repeated-use and economical
- Special sizes and special shapes available
- Company name, logo or information can be included on the cold gel pack (made to order)



CAH Series



#	Code	Size (WxLxT, mm)	weight (g)	pcs (pcs/case)	Container type
1	CAH-200	90 x 150 x 19	210	80	Polyethylene plastic container
2	CAH-203	100 x 150 x 22	210	80 *	
3	CAH-250	55 x 195 x 30	275	70	
4	CAH-351	80 x 187 x 30	352	50	
5	CAH-500	140 x 195 x 25	530	30 *	

#	Code	Size (WxLxT, mm)	weight (g)	pcs (pcs/case)	Container type
6	CAH-501	115 x 187 x 30	500	30	Polyethylene plastic container
7	CAH-500P	78 x 200 x 41	530	30 *	
8	CAH-502P	70 x 300 x 40	500	40	
9	CAH-503R	155 x 264 x 18	580	30 *	
10	CAH-510	140 x 220 x 22	540	30 *	

Application

- Home delivery by consumer or agriculture cooperatives, or non-store retailing
- Home delivery of milk and daily products
- Delivery with repeated use
- Delivery of gifts & pharmaceuticals



Easy stock cold storage

(Product with the 'mark' in the table)

Stacked packs are secure and stable and will not collapse. The special design shape prevents the cold gel packs from sticking together, allowing quick freezing in large quantities.

For keeping milk cartons cool

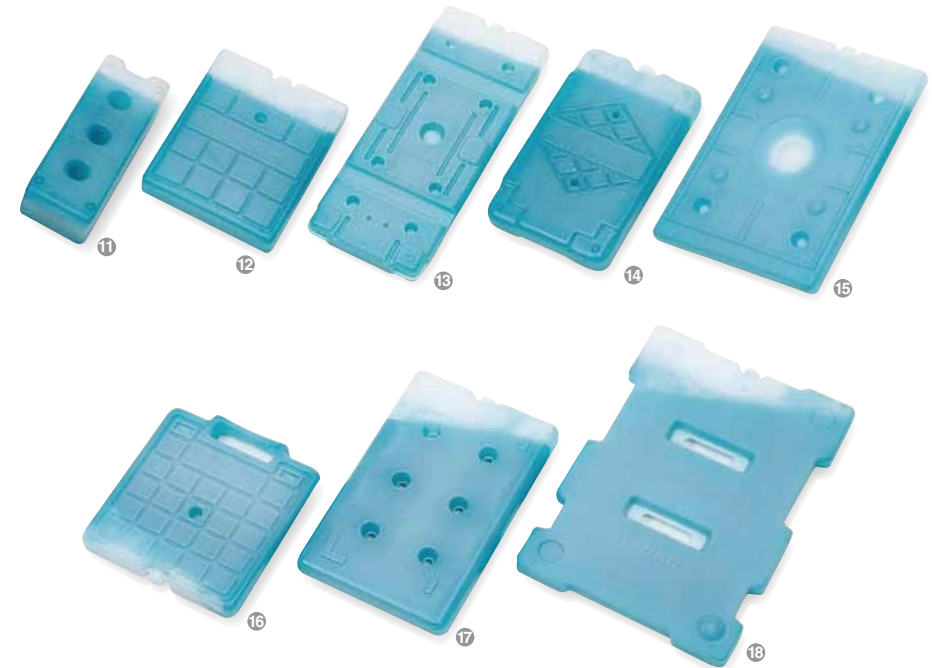
(PAT.No.5-12689)

The Pack exactly fits on the top of a milk carton for efficient temperature control.

Antibacterial Type

Antibacterial and antimold treatments are available upon request, including antibacterial agent.

CAH Series



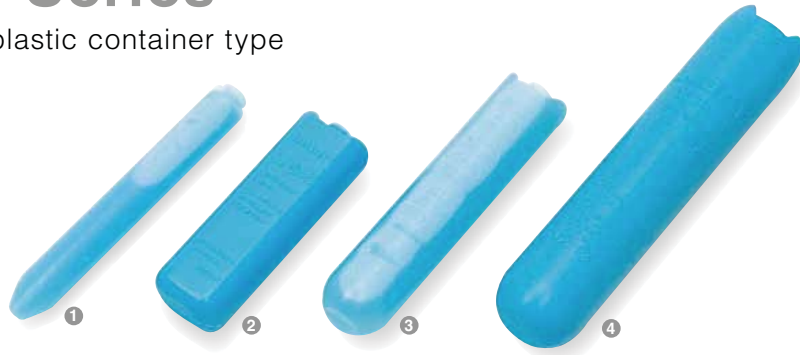
#	Code	Size (WxLxT, mm)	weight (g)	pcs (pcs/case)	Container type
11	CAH-700P	80 x 198 x 55	700	30 *	Polyethylene plastic container
12	CAH-701	152 x 185 x 29	695	32	
13	CAH-702	135 x 330 x 24	865	18 *	
14	CAH-800	142 x 235 x 30	847	20 *	
15	CAH-802	200 x 288 x 20	940	20 *	

#	Code	Size (WxLxT, mm)	weight (g)	pcs (pcs/case)	Container type
16	CAH-1000	200 x 210 x 33	1000	20	Polyethylene plastic container
17	CAH-1001	180 x 280 x 29	1180	15 *	
18	CAH-1200	250 x 355 x 23	1560	12 *	

*mark indicates stackable

PC Series

Rod plastic container type



The rod cold gel pack is ideal for use in restricted spaces

- Application**
- Delivery of foodstuffs in the food service industry
- Delivery of milk and daily products

#	Code	Size (mm)	weight (g)	pcs (pcs/case)	Container type
1	PC-100	26Φ × 200	89	40	Polyethylene plastic container
2	PC-200	48 × 155 × 39	215	72	
3	PC-300	45 × 200 × 42	265	40	
4	PC-500	56Φ × 260	547	30	

CAH Series Only

Racks for freezing Cold Gel Packs

Complete freezing of cold gel packs improves efficiency of order picking

- To ensure optimum cold temperatures, please freeze the cold gel pack before use, failure to freeze completely will give only partial results.
- The use of racks for freezing cold gel packs keeps everything neat and orderly allows cool air from a refrigerator or freezer to easily circulate, and enables efficient and total freezing of the cold gel packs.
- Easy order picking, carrying and handling.



#	Mark	Size (mm)	pcs (pcs/case)
1	CAH-500 18pc type	External dimension 380×305×258 Inside dimension 337×285×246	10

#	Mark	Size (mm)	pcs (pcs/case)
2	CAH-503R 20pc type	External dimension 380×305×295 Inside dimension 350×285×283	10

Cold Gel Packs : Freezing Band

Cold Gel Packs are ideal for delivery of frozen food.

- Ideal for cold delivery of frozen food, when combined with dry ice, deep-frozen delivery of ice cream is possible.
- At a glance temperature bands, each temperature band has a different color gel. Even when packs are mixed, temperature bands are quickly identified and easily checked during order picking or sorting after collection.

Temperature bands of Cold Gel Packs: Six bands from melting point 0 to -25°C are available and give a good range of temperature control

Temperature bands of cold gel packs	0°C	-5°C	-11°C	-15°C	-21°C	-25°C
Classification by the color of gel and cap	Blue	Blue with Black cap	Green	Yellow with Yellow Cap	Red	Yellow
Freezing temperature required by Freezer	≤ -10°C	≤ -15°C	≤ -21°C	≤ -25°C	≤ -31°C	≤ -35°C
Latent heat of fusion (kJ/kg)	314	314	272	293	230	230
Melting Point (°C)	0	-3	-11	-15	-21	-24
Specific gravity	1.00	1.05	1.14	1.05	1.15	1.11
Specific heat	>Melting point	0.95	0.92	0.81	0.90	0.79
	<Melting point	0.50	0.56	0.56	0.41	0.55
Expansion rate after precooling (%)	10.0	10.9	10.8	8.7	7.5	5.0
pH	7	6	6	6	6	6

Cap for the -5°C band

The 0°C/-5°C band can be identified by the color of caps.



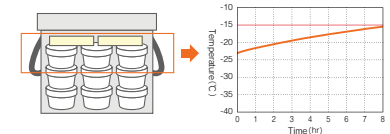
Cap for the -15°C band

The 15°C/-25°C bands can be identified by the color of caps.



DATA ▶ Cold Ice Cream Endurance Test

With the outside air temperature of 35°C, ice cream was precooled, to -25°C, placed in NeoAce, and covered by -25°C band cold gel packs.



Cold Gel Packs

Cold Transport Containers

COS Series

A mat type ideal for keeping milk and daily products cool



- The mat is placed directly on top of the milk crate.
- Folded segments makes it easy to take out products and maintain cold temperature.

■ Application

Delivery of milk and daily products.

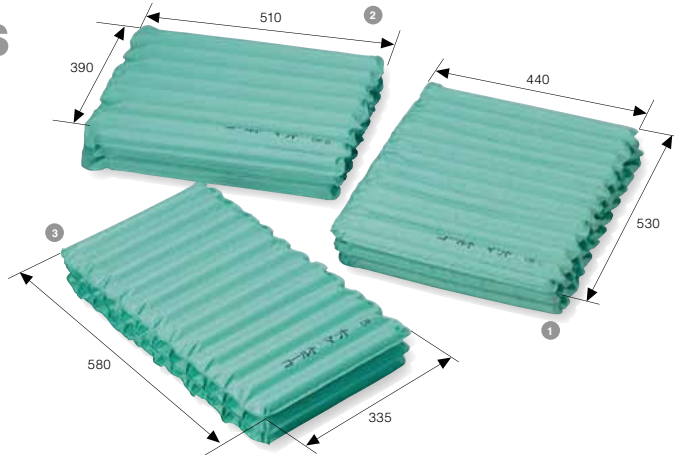
#	Code	Size (mm)	weight (g)	pcs (pcs/case)	Container type
1	COS- 800-5	280×520×10	954	18	EVA
2	COS-1002-5	305×245×22	1060	10	
3	COS-1600-5	280×510×20	1754	10	

Product Information

#	Code	Size (mm)	weight (g)	pcs (pcs/case)	Container type
4	COS-1601-5	330×555×16	1762	10	Polyethylene Plastic Container
5	COS-1603-5	300×500×18	1738	10	

CM Series

A tubular mat type , tube Cold Gel Packs in a soft cover



Product Information

#	Code	Size (WxLxT,mm)	weight (g)	pcs (pcs/case)	Remark Innercontainer	Inner container	Outer container
1	CM-B	440×530×26	2325	10	12 tubes	Polyethylene plastic container	Soft PVC containing nylon fabric
2	CM-T	510×390×29	2120	10	8 tubes		
3	CM-M	335×580×29	2240	10	12 tubes		

- Products are easy to cover with these flexible wrap mats.

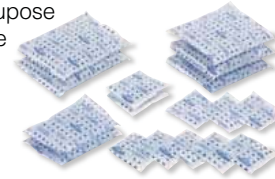
■ Application

Cold Insulation for mid-size containers

※Possible to hold by L side

CO Series

General-pupose pouch type



■ Application

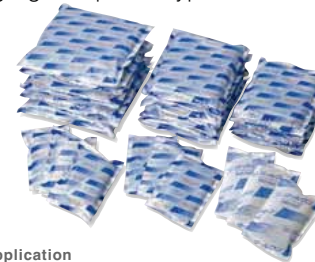
- Home delivery and gifts (uncooked meat, ham, sausage, alcoholic beverage, etc.)
- Take away Japanese /Western -Style confectionery, delicatessen or sea food.
- Direct Delivery from producers, delivery of perishables, pharmaceuticals, etc.

Mark	g	Size (mm)	PC	Min. Case (pcs)
CO- 30	30	85×80	400	10
CO- 40	40	85×90	350	10
CO- 50	50	85×100	300	10
CO- 100	100	120×120	144	5
CO- 200	200	105×160	72	5
CO- 300	300	150×160	48	5
CO- 400	400	150×180	36	5
CO- 500	500	150×220	30	5

※Please note that any products specification or other details may be changed without notice

CA Series

High-grade pouch type



■ Application

- Home delivery and gifts (uncooked meat, ham, sausage, alcoholic beverage, etc.)
- Take away Japanese /Western -Style confectionery, delicatessen or sea food.
- Direct delivery from producers, delivery of perishables, pharmaceuticals, etc.



Nonwoven fabric pouch type
Prevents condensation on the cold gel pouches.

Mark	Size (mm)	weight (g)	Min. Case (pcs)	Remarks	PKG Material
CA- 100	180×110	103	150	All side sealed	Nylon-polyethylene pouch
CA- 150	170×110	153	100		
CA- 200	180×110	204	80		
CA- 300	210×165	305	60		
CA- 400	210×165	407	48		
CA- 500	210×165	507	36		
CA- 600	220×195	608	28		
CA- 800	250×190	810	24		
CA- 900	255×240	910	16		
CA-1000	255×240	1010	12		
CAF-200	180×110	206	80	Nonwoven fabric Pouch	
CAF-500	210×165	511	36		

※The product external size includes 10 mm seal width

Custom-Made Serieese

We have an assortment of types: a slim type that can be used for showcases of confectionery , a bag type suitable for ice packs, and an aluminum pouch.



Slim Type



Aluminum Pouch Type

Milk Cooler Box

Hamper for delivering milk

Increased cold power with a double structure of insulating material and interior box
When combined with INOAC's cold gel packs, you can rest assured of superior temperature control during daytime home deliveries.



1 Small size

2 Medium/Large size

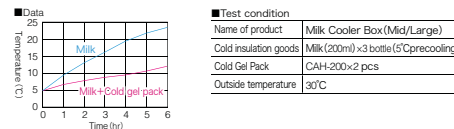
Printing on the box

Brand name and store names can be printed or stickered.

Treat your company to the best: make a special request, e.g. your company colors on the main box or lid.



A double structure of insulating material and interior box ensures a cold storage performance



- ☉ The keyhole against theft are available.
- ☉ Please contact us the color and lot in detail.

#	Code	Size (mm)	Capacity	Feature	Pcs/ Case
1	Small Size	External dimension 265x235x205 Inside dimension 205x125x160	6 bot x 200ml	Suitable for hanging wall. The Inner box has a drainage hold	12 per case
2	Mid/LargeSize	External dimension 310x210x280 Inside dimension 235x145x240	8 bot x 200ml 2 bot x 900ml	Floor use only	12 or 16 per case

Cold Gel Pack Q&A

Q What are the cold gel packs made of?

Answer

A mixture of water, gel (natural polymer), preservative, and coloring agent is sealed in a polyethylene plastic container bag or pouch. We mainly produce and sell cold gel packs made of gel (natural polymer). We also make cold gel packs from water-soluble polymers or synthetic polymers.

Q How many cold gel packs should I use in my cooler box?

Answer

Please contact us with the answer to the questions below, and we will be able to calculate the optimum quantity

- Type of cooler box
- Internal dimensions of cooler box
- hours for the temperature to be maintained
- Nature and type of product
- Temperature to be kept
- Product precooling temperature
- product weight etc

We will be able to make an initial assessment, later we can carry out fine tuning test under actual delivery conditions to find the optimum solution.

Q When I used cold gel packs were not completely frozen, the products were not kept cool enough. Why?

Answer

For optimum results the cold gel pack must be completely frozen, this allows the packs to maintain the target temperature. In addition, when freezing the packs, use a freezer or quick freezer with a minimum internal temperature of 10°C lower than the pack's temperature band. Please check the technical specifications.

Q I tried to cool a drink using the cold gel packs, but drink wasn't that cold. Why?

Answer

The cold gel packs act as a cold blanket designed to prevent warming up, they do not make things significantly colder. Heat energy from the outside is absorbed by the cold gel packs thus maintaining the temperature of any pre-cooled product. A lukewarm drink, for example, will be helped to stay lukewarm, not effectively made colder.

Q How many times can I use the cold gel packs?

Answer

The cold gel in a pouch, such as CA series, is generally for one-way use. However, unless the pouch is damaged, you can use pouch repeatedly. (Terms of the quality guarantee is three months in summer season of normal use). The cold gel in a plastic container, such as CAH series, can also be used repeatedly. However, due to light or heat the consistency of the gel will deteriorate. If the container is damaged or the consistency of the gel deteriorates, please use a replacement.

Q How should I dispose of a used cold gel pack?

Answer

Temperature bands are subject to different disposal instructions. 0°C band gel: Dispose of the gel as burnable rubbish and the container as recycle plastic (or as non-burnable rubbish, the classification differs according to the municipality). If you use the in large quantities for business use, dispose of them as industrial waste. Freezing band gel: Dispose of the entire product including the container as non-burnable rubbish or industrial waste.

Efficient Delivery of Cold goods

Cold Transport Containers

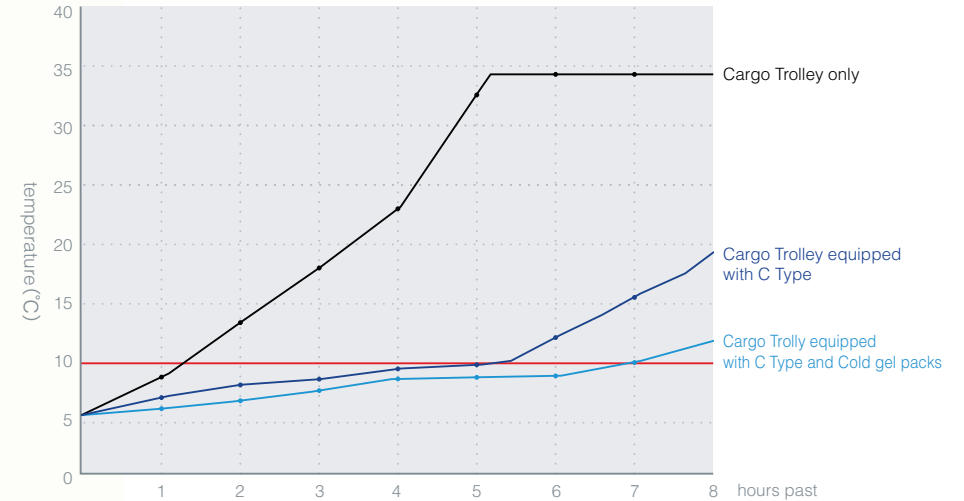
With aluminum and polyethylene foam outer layer the containers are strong and sturdy. (50kg of tensile strength.)



High-performance cold insulation storage	Superb shielding and insulation gives outstanding cold storage.
Increased transport efficiency	Consolidated delivery and stacking operations increase loading efficiency.
Compact	When not in use containers, you can fold and stack away.
Ease of handling	Some product allow container stacking.
Easy maintenance	Outstanding strength and easy maintenance.

NeoCarter C Type : Cold insulation data

After precooling to 5°C, chilled food was loaded the NeoCarter C Type and exposed to an outdoor air temperature of 35°C and product temperature recorded.



Advanced support from customized to regular thermal insulation

We will do the request such as shape, size, and external printing

After collection, containers fold up, compact and space saving.

Ideal for train transport, light weight and easy-to-use.

Thermal Insulation delivery for warm goods is possible.

Precautions for handling

- Depending on the product, combine with cold gel packs or thermal gel packs.
- Avoid the use of 60°C and higher or -30°C lower.

Cold Transport Container lineup(NeoCarter)

A Type
→ See Page 15

B Type
→ See Page 16

C Type
→ See Page 17

S Type
→ See Page 17

Special Type
→ See Page 18

Cold Transport Container lineup(NeoAce)

Cargo Trolley Type
→ See Page 19

Z Pack
→ See Page 20

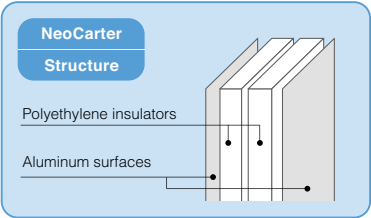
Folding Type
→ See Page 20

For Pharmaceuticals
→ See Page 20

Other Neoace/NeoCarter
→ See Page 21

NeoCarter®

Cold storage container with high insulating and shielding properties



- A composite material of aluminum and polyethylene foam is used for the surface materials. It reflects the sunlight and demonstrates outstanding insulating and cold storage performance. By using Inoac's original reinforced material, the surface material has a tensile strength of more than 100kg for the vertical and horizontal directions.
- The handle area of box type is designed to take up 50kg.
- Four standard products – A, B, C and S types – are available.
- We have stocks of standard products, ready for immediate order dispatch.
- Ideal delivery of cold storage goods. When combined with cold gel packs, more effective cold insulation is achievable.
- When not in use, containers fold up is very compact. No more wasted space in the warehouse or truck luggage compartment.
- Easy to clean with water or a neutral detergent.
- Single unit special orders and custom designs are available.

NeoCarter A Type

The cooler bag has top and front side zippers for easy opening and closing. A flap to prevent any leakage of cold air is located on opening /closing section. Handles are attached to both sides make truck loading smooth and easy, and also saves time.



- The container front and side zippers make it easy to load/unload products.

- **Application**
- Small deliveries of chilled foods
- Transport of plastic container including chilled foods

Code	Inside size (mm)	Internal volume (ℓ)	Code	Inside size (mm)	Internal volume (ℓ)
A-1	400×350×300	40	A-7	650×450×450	130
A-2	400×350×450	60	A-8	700×450×450	140
A-3	450×350×450	70	A-9	750×450×450	150
A-4	500×350×450	75	A-10	590×400×500	115
A-5	550×350×450	85	A-11	735×475×435	150
A-6	600×450×450	120	A-12	650×455×460	135

NeoCarter B Type

The cooler bag with a top side zipper for easy opening and closing.



- Only the top cover can be opened and closed with the zipper.
- A reliable bag well suited to small deliveries of food items.

- **Application**
- Small deliveries of chilled foods
- Transport of plastic container including chilled foods

Code	size (mm)	Internal volume (ℓ)
B-1	400×350×450	60
B-2	500×350×450	75
B-3	600×450×450	120
B-4	700×450×450	140

Cooler inner bag for folding containers

The bag is placed inside a folding container and in combination with cold gel packs prevent product temperature up. This system allows containers with bags to be stacked and makes truck loading quick and easy. The bags fold up and take up little space in the luggage compartment of a truck. Single unit custom-made sizes can be ordered.



Code	Size (External.W×D×H,mm)	Code	Size (External.W×D×H,mm)
40L Type	490×330×250	50L Type	490×330×300

>> How to fold >>

Slowly flatten the bag from above and fasten the side with the velcro type tape. Bag volume will be reduced to less than 20% of the original and takes up little storage space after delivery.



Cold Gel Packs

Cold Transport Containers

NeoCarter C Type

Popular Cage Trolley Type



- Cooler cover for installing inside of a case trolley.
- Outstanding cold storage performance, and quick loading/unloading.
- Choose a zipper type or velcro type fastener for opening.

Application

Delivery of chilled foods to supermarket
 Low temperature transportation of fresh fish and meat

Code	Size (mm)	Inner volume (L)	Remark
C-1	730×550×1450 ※For outsize of Cage Trolley 800W×600D×1700Hmm	580	
C-1M	730×550×1450 ※For outsize of Cage Trolley 800W×600D×1700Hmm	580	Velcro type
C-2	790×600×1450 ※For outsize of Cage Trolley 850W×650D×1700Hmm	687	
C-2M	790×600×1450 ※For outsize of Cage Trolley 850W×650D×1700Hmm	687	Velcro type

NeoCarter S type

Sheet type with exceptional flexibility

- Sunlight shielded for loading platform.
- Cover cold products with the sheet to prevent product temperature up.

Application

For truck platform
 Cover cold products with the sheet to prevent product temperature up



Code	size (mm)	Area (m ²)	weight (kg)
S-1	1200×2000	2.40	1.0
S-2	2400×3000	7.20	2.4
S-3	3600×5400	19.44	6.6

Code	size (mm)	Area (m ²)	weight (kg)
S-4	1600×2100	3.36	1.1
S-5	1800×2900	5.22	1.9

NeoCarter Special type

We design the best system for your products and your delivery vehicle.

Folding C Type

When not in use, trolleys fold up for compact storage.



C Type for six-wheel trolleys



Dust proof cover

Light and easy-to-use dust cover.



Inner bag 25 liter x 2 pc

The two sections enable separate transportation of chilled and dried items in one container.



Light truck shipper

When delivering milk, this "Shipper" is loaded and used on the carrier of delivery truck.



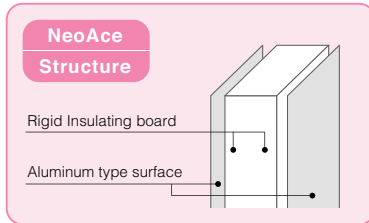
Cold Gel Packs

Cold Transport Containers

NeoAce®

Lightweight container with excellent constant temperature control.
Higher level of cold storage control

- As compared with NeoCarter, NeoAce has better cold insulation control.
- We designed the optimum system to meet your requirement, e.g. for cage trolleys or for pharmaceuticals delivery.
- All types are custom-made
- Options such as cold gel pack pockets or card holders are available



NeoAce® Neo Ace For Cage Trolleys



■ Application
For delivering frozen foods and ice cream to stores

NeoAce® Z-Pack



■ Application
Transportation of chilled and frozen goods between a center and branches

When Foldied
JPN PAT. No.3312878

NeoAce® Folding Box Type

Folding box with excellent durability, light blocking and insulating properties.

*Ideal for small deliveries, custom-made to meet your needs



■ Application
Small deliveries of frozen goods and ice creams Low temperature transportation in the transportation business

NeoAce® For Pharmaceuticals Delivery



■ Application
Cold delivery and tranport of phamaceuticals to hospitals and drugstores

Cold Gel Packs

Cold Transport Containers

