






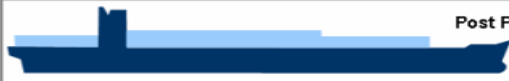

Container Transport

The Containerships and Containers

Eric Ting

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Five Generations of Containerships:

Generation (Year Range)	Ship Type	Length	Draft	TEU
First Generation (1956-1970)	 Converted Cargo Vessel	135 m	< 9 m	500
	 Converted Tanker	200 m	< 30 ft	800
Second Generation (1970-1980)	 Cellular Containership	215 m	10 m 33 ft	1,000 – 2,500
Third Generation (1980-1988)	 Panamax Class	250 m	11-12 m	3,000
	 Panamax Plus	290 m	36-40 ft	4,000
Fourth Generation (1988-2000)	 Post Panamax	275 – 305 m	11-13 m 36-43 ft	4,000 – 5,000
Fifth Generation (2000-?)	 Post Panamax Plus	335 m	13-14 m 43-46 ft	5,000 – 8,000

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Container Types:

Dry cargo (DC):

general purpose dry van for boxes, cartons, cases, sacks, bales, pallets, drums in standard, high or half height.

High cube (HQ):

palletwide containers for [europallet](#) compatibility.

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Open top:

bulkainers for bulk minerals, heavy machinery.

Reefer:

temperature controlled from -25°C to $+25^{\circ}\text{C}$ [reefer](#).

Flat rack:

flushfolding flat-rack containers for heavy and bulky semi-finished goods, out of gauge cargo.

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Tank containers:

for bulk liquids and dangerous goods.

Ventilated containers:

for organic products requiring ventilation.

Rolling floor for difficult to handle cargo.

Gas bottle.

Generator.

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20' DC

20'x8'x8'6" DRY VAN

Weight

Tare	2,360 kgs	5,200 lbs
Payload	21,640 kgs	47,710 lbs
Gross Weight	24,000 kgs	52,910 lbs

* Start from YMLU 251965

Tare	2,370 kgs	5,230 lbs
Payload	28,110 kgs	61,970 lbs
Gross Weight	30,480 kgs	67,200 lbs

Door Opening

Width	2,340 mm	7' 8.1"
Height	2,280 mm	7' 5.8"
Inside Cubic	33.2 cu.m.	1,173 cu.ft.

Measure

Overall

Inside

Length	6,058 mm	19' 10.5"	5,896 mm	19' 4.1"
Width	2,438 mm	8'	2,352 mm	7' 8.6"
Height	2,591 mm	8' 6"	2,393 mm	7' 10.2"

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40' DC

40'x8'x8'6" DRY VAN

Weight

Tare	3,970 kgs	8,750 lbs
Payload	26,510 kgs	58,450 lbs
Gross Weight	30,480 kgs	67,200 lbs

* Start from YMLU 489951

Tare	3,950 kgs	8,710 lbs
Payload	28,550 kgs	62,940 lbs
Gross Weight	32,500 kgs	71,650 lbs

Door Opening

Width	2,340 mm	7' 8.1"
Height	2,280 mm	7' 5.8"
Inside Cubic	67.68 cu.m.	2,390 cu.ft.

Measure

Overall

Inside

Length	12,192 mm	40'	12,025 mm	39' 5.4"
Width	2,438 mm	8'	2,352 mm	7' 8.6"
Height	2,591 mm	8' 6"	2,393 mm	7' 10.2"

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40' HQ

40'x8'x9'6" HIGH CUBE

Weight

Tare	4,170 kgs	9,190 lbs
Payload	26,310 kgs	58,010 lbs
Gross Weight	30,480 kgs	67,200 lbs



45' HQ

45'x8'x9'6" HIGH CUBE

Weight

Tare	5,100 kgs	11,240 lbs
Payload	27,400 kgs	60,410 lbs
Gross Weight	32,500 kgs	71,650 lbs

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20' Open Top

YMLU620000-620969
20'x8'x8'6" OPEN TOP

Weight

Tare	2,460 kgs	5,423 lbs
Payload	21,540 kgs	47,487 lbs
Gross Weight	24,000 kgs	52,910 lbs



40' Open Top

YMLU640000-640929
40'x8'x8'6" OPEN TOP

Weight

Tare	4,100 kgs	9,039 lbs
Payload	26,380 kgs	58,161 lbs
Gross Weight	30,480 kgs	67,200 lbs

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20' Reefer

20'x8'x8'6" REEFER

Weight

Tare	3,000 kgs	6,610 lbs
Payload	27,480 kgs	60,590 lbs
Gross Weight	30,480 kgs	67,200 lbs



40' Reefer

40'x8'x9'6" REEFER HIGH CUBE

Weight

Tare	4,710 kgs	10,380 lbs
Payload	27,790 kgs	61,270 lbs
Gross Weight	32,500 kgs	71,650 lbs

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20' Flat Rack

YMLU680390 - 680989
20'x8'x8'6" FLAT RACK

Weight

Tare	2,800 kgs	6,170 lbs
Payload	31,200 kgs	68,790 lbs
Gross Weight	34,000 kgs	74,960 lbs



40' Flat Rack

YMLU700520 - 702019
40'x8'x8'6" FLAT RACK

Weight

Tare	4,900 kgs	10,800 lbs
Payload	40,100 kgs	88,410 lbs
Gross Weight	45,000 kgs	99,210 lbs

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Q & A

Thanks for your attention.



Class Discussion

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