

YKK

Little Parts. Big Difference.

Waterproof and Incredibly Flexible!

AQUASEAL[®]

Fastening Products Group



AQUASEAL® zipper is the lightweight fully waterproof zipper to consider for equipment complying with the latest international maritime safety standards.

Features

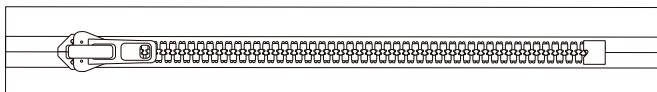
- ① **Light weight**
AQUASEAL® zipper weighs roughly half of conventional metal tight zipper.
- ② **Easy Opening and Smooth Operation**
Combining VISLON® technology with a seal between the zipper elements, AQUASEAL® zipper allows for easy and smooth operation with protection in critical situations.
- ③ **High resistance to corrosion**
Plastic and Stainless sliders have high resistance for use in salt water environments.
- ④ **Guaranteed quality**
For maritime safety applications a size 10 version with high compression elements and extra wide tape is available in closed end, sealed at 0.3 bar water pressure and each zipper is INDIVIDUALLY TESTED and laser marked for traceability. AQUASEAL® zipper range specified at 0.05 bar pressure also contains a size 5 option, the world's smallest waterproof fastener in its category, available in a full range of zipper functions.

Application

Wet-suit / Semi-dry suit / Dry Bag / Fishing Wader / Technical apparel (Sailing, motorcycle, etc) / Industries

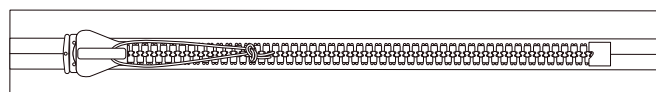
Classification

Closed-end (One end closed, Single-SEAL)

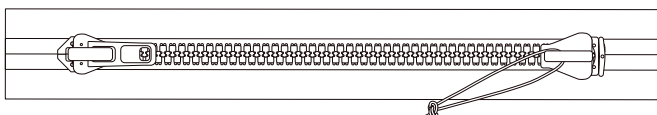


*With Fit in top stop but Standard top stop also available.

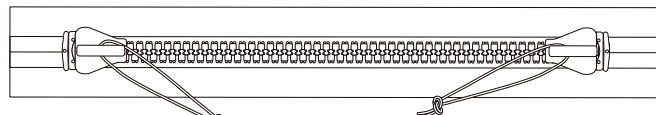
Closed-end (Both end closed, W-SEAL)



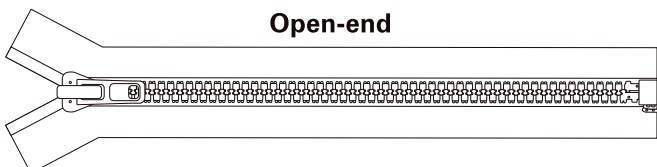
Closed-end (with 2 sliders back to back (SLSB-B), Single-SEal)



Closed-end (with 2 sliders back to back (SLSB-B), W-Seal)

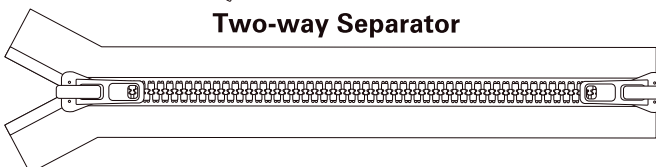


Open-end



*With Standard top stop but Fit in top stop also available.

Two-way Separator



*With Standard top stop but Fit in top stop also available.

Availability













Size	Chain Type	Tape	Classification		
			Closed End	Open End	Two-Way
5	VFWN	PU19B (Polyurethane)	Both ends closed One end closed	OR OL	MR
10	VFWB	PU23B (Polyurethane)	Both ends closed One end closed	OR OL	MR, ML
		PU31B (Polyurethane)	Both ends closed One end closed	OR OL	not available

*OR = Open, Right hand insertion *MR = Two-way, Right hand insertion *OL = Open, Left hand insertion *ML = Two-way, Left hand insertion

Material




Size	Element	Slider	Top stop	Bottom stop / Open parts	Tape
5	Polyamide	Polyamide	Polyamide / Polyurethane	Polyamide	Coating : Polyurethane Base tape : Polyester
10	Polyamide	Polyamide / Stainless / Zinc	Polyamide / Polyurethane	Polyamide	Coating : Polyurethane Base tape : Polyester

Parts variation




Size	Standard	Variation				
5	 NA (plastic)	 NFNT580 P-HIM01 (plastic with cord)	 NFTPH (plastic with D ring)	 NA9	 NA9LH2	 NF580TZ (plastic with T-bar)
10	 NA (plastic)	 NFNT580 P-HIM01 (plastic with cord)	 NF1580TZ (plastic with T-bar)	 SAZH (Stainless)	 DFNT (Zinc) *	 SFNT (Stainless)

*DFNT can be used with fresh water environment only.







Top stop

Single-Seal		W-Seal
		
Description		
Standard Type	Fit-in Type	Fit-in Type (sealed)
Code		
—	TS-NEWH	TS-SEAL

Bottom stop / Open parts

Bottom stop		Open-parts
Standard	2 sliders back to back	
		
Description		
Standard Type	Fit-in Type (sealed)	Standard Type
Code		
—	BS-SEAL	—

Reinforcement Tape (Optional)

Reinforcement Tape(Width:9mm)			Reinforcement Tape(Narrow type,Width:6mm)		
					
for bottom	for bottom	for top	for bottom	for bottom	for top
Description	Use with closed end	Use with W-seal (both end closed)	Use with closed end	Use with W-seal (both end closed)	
Code	B-HOKYO	W-HOKYO	B-HKYO1	W-HKYO1	

Smart use of zippers

- Slowly move the slider when operating. Angular pulling may cause element mis-engagement and may result in poor waterproof performance or damage zippers.
- Overstretching of the top and bottom stops should be avoided.
- AQUASEAL® zipper may be susceptible to UV degradation, discolouration, creasing, de-lamination or wear through friction.
- Folding or crushing the zipper may affect its performance.
- YKK does not recommend the use of this item on walking water balls, or similar items. YKK will not provide warranties and accepts no liability for such use.

Cleaning

- Regular cleaning with fresh water and the use of a suitable lubricant is advised in order to prevent damage to the tape and seals.

Maintenance

After cleaning the zipper, we recommend the application of lubricant to the zipper in order to maintain the proper waterproof performance.

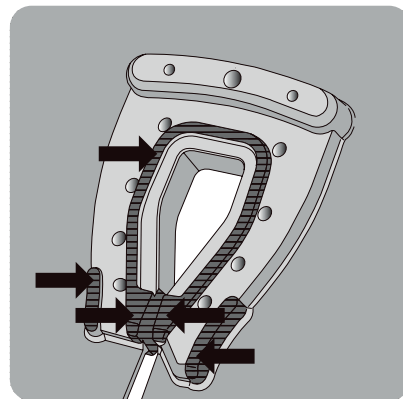
Apply lubricant along the zipper elements and operate the slider a few times to lubricate the entire zipper.

For W-seal (both end closed) application,

1. Apply lubricant to the Top-Seal as indicated in the diagram.
2. The lubricant will then become distributed along the zipper elements, by operating the slider a few times.

For Single-seal or Open-end applications,

1. Apply wax/lubricant along the zipper elements.
2. The lubricant will then become distributed along the zipper elements, by operating the slider a few times.



Installation Guide

Method	Recommendations
Sewing	Normal sewing in combination with seam tape.
Welding	Direct welding will depend on material compatibility, welding equipment and setting. Please test before production. When applying heat pressure during attachment, damage to the tape and elements should be avoided.
Gluing	Gluing will depend on the compatibility of fabric, zipper tape and glue. Please test before production.

Storage

- Do not fold or bend the zippers when they are stored.
 - Do not store the garment/goods in temperatures over 60°C (140°F).
 - Store with the zipper completely closed, taking care not to bend it.
- Storing the zipper in an opened position for a long period will deform the seal.

Disclaimer

The purchaser/user is solely responsible for testing the AQUASEAL® zippers for suitability in any proposed application. Any proposed use of AQUASEAL® zippers must be fully and appropriately tested by the purchaser/user. For uses in life/limb or other safety critical circumstances, field trials are recommended. To the extent permitted by law, YKK disclaims all implied warranties with respect to AQUASEAL® zippers, including without limitation any implied warranties of merchantability and fitness for any particular purpose. In no event shall YKK be liable for any indirect, special, incidental, or consequential damages relating to AQUASEAL® zippers, whether based on breach of express or implied warranty, breach of contract, negligence, strict liability or any other basis.

Visit our website and contact us for more information.

<http://www.ykkfastening.com/water-protective/>

