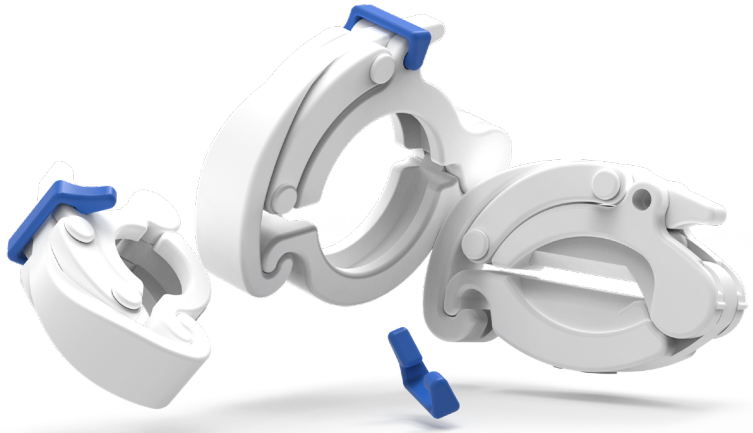
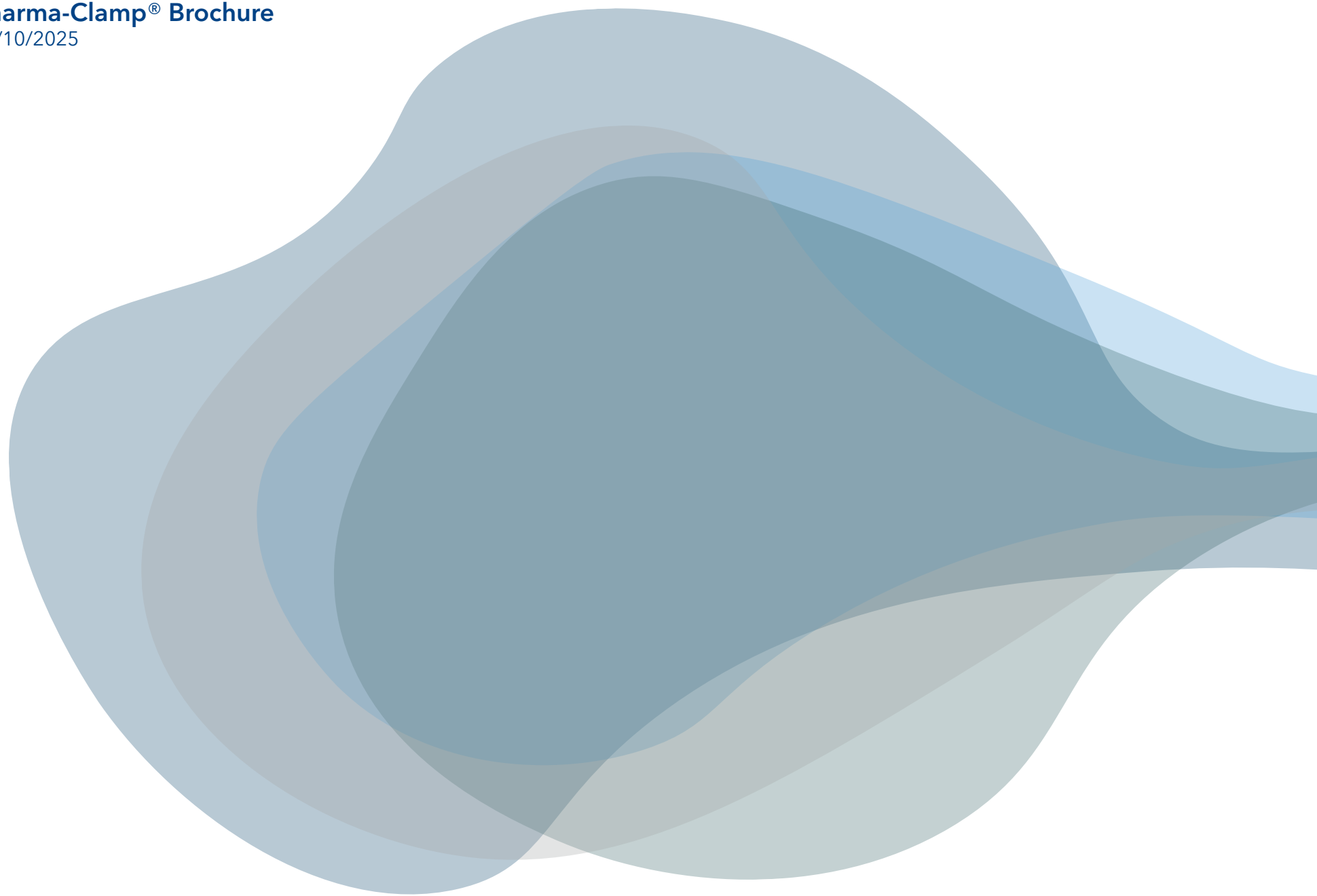


Pharma-Clamp®

Property of Ultrapharma BV



Ultrapharma bv

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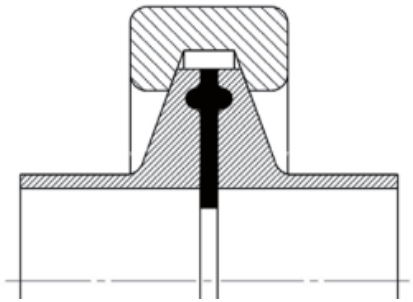
1. Single Use System (SUS)

The Pharma-Clamp® is designed to make Single Use Systems (SUS) easier to install. The market for SUS is exploding due to new production methods in the biotech and pharmaceutical markets. More drugs are manufactured in smaller volumes and some of these drugs are even metal sensitive. This allows for a completely new way of production. Complete single use production sets are prefabricated with all necessary connections and instruments installed. Small or large volume media bags connected with tubing, flow meters, filters, TC connections, pinch valves and many more are prefabricated in clean rooms. These sets can contain many TC connections and therefore it is important to work with a Tri-Clamp that is easy to install. With hundreds or more sets to be build it is import to think about Repetitive Strain Injury (RSI) reduction for workers.

2. Materials

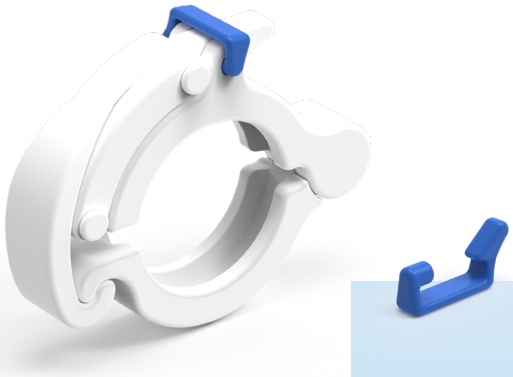
The Pharma-Clamp® is made from glass filled nylon. This material is extremely strong and is stable during heat exposure and mechanical load. Most of the SUS assemblies are Gamma irradiated once they have been double bagged. Our Pharma-Camps® can be irradiated to 50kGy, before they start to degrade. This is more than sufficient for SUS applications.

The Pharma-Clamp® is easy to use because there is only one way to close it, no adjustments possible. Typically all SUS configurations are exposed to low pressures, therefore no extreme torque is required. We designed the Pharma-Clamp® in such a way that it fits with all makes of non-metallic fittings. You only need so much gasket compression to seal the connection. No need for useless over-tightening of the gasket and deformation of the plastic ferrules. The Pharma-Clamp® cannot be installed incorrectly, when closed it can take 10 bars pressure without any problem. This is just a safety remark.



3. Over-compression

Over-Compression will lead to protrusion of the gasket inside the fluid stream causing all kinds of problems especially when working with emulsions containing solids. These can congregate at the frontside of the gasket. An undesirable situation. If a connection leaks then the ferrule or gasket is out of specification, something that does happen more often than you would think. Plastic ferrules are often undersized causing failures.



The blue clip is an anti- tamper device that prevents unwanted opening of the clamp. This tamper device can be removed without destruction. It can be placed back if needed. A tie-wrap with tab, such as in the photo, can also be used to lock the clamp and does provide another feature related to registration of date, file or any data.

Material: ULTRAMID® (BASF) Glass filled Nylon 66
Temperature range -20°C to 150°C
Color: White
Maximum Gamma Irradiation 50kGy

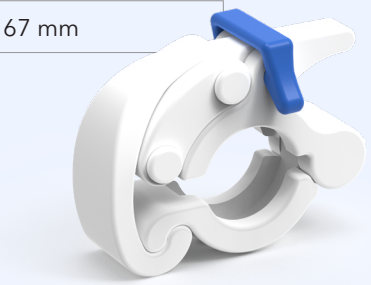
Compound number CMD-1057
Pharma-Clamp® Compliance:
Meets: USP41 Cytotoxicity <87>, ISO10993-5
Meets: EC 10/2011
Meets: FDA
Certified TSE/BSE (ADIF) free (EME/410/01)

ANIMAL DERIVED INGREDIENT FREE
ADIF

4. Available sizes

The Pharma-Clamp® is available for Tri-Clamp flange sizes
25 mm (3/4") 50,5 mm (1" + 1-1/2"), 64 mm (2") , 77,5 mm 2,5", 91 mm (3") , 119 mm (4") and 167 mm (6")

DN Size	Article Number	Flange Size
1/2"	UPCL-075NG	25 mm
3/4"	UPCL-075NG	25 mm
1"	UPCL-150NG	50.5 mm
1-1/2"	UPCL-150NG	50.5 mm
2"	UPCL-200NG	64 mm
2-1/2"	UPCL-250NG	77.5 mm
3"	UPCL-300NG	91 mm
4"	UPCL-400NG	119 mm
6"	UPCL-600NG	167 mm



Features & Benefits

Easy installation of non-metallic TC fittings
Reduction in RSI versus traditional Wing Nut clamps
Steam sterilization resistant during autoclaving or SIP up to 150°C
Gamma irradiation up to 50kGy
USP & FDA conformity
ADIF (Animal Derived Ingredient Free)
Lot traceability
Temper option build in
Designed to meet ASME BPE and DIN32676 standards

Applications

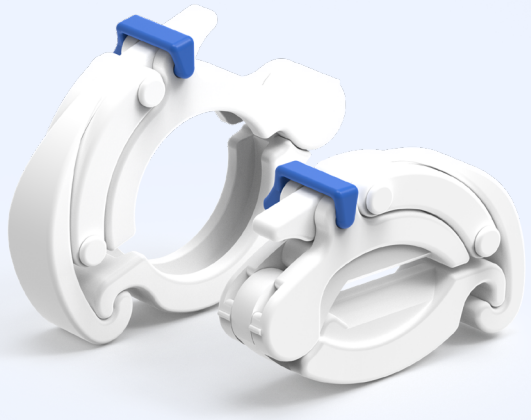
Single Use Systems
Metal sensitive drug manufacturing
Media bag assemblies
Gamma irradiated assemblies and components

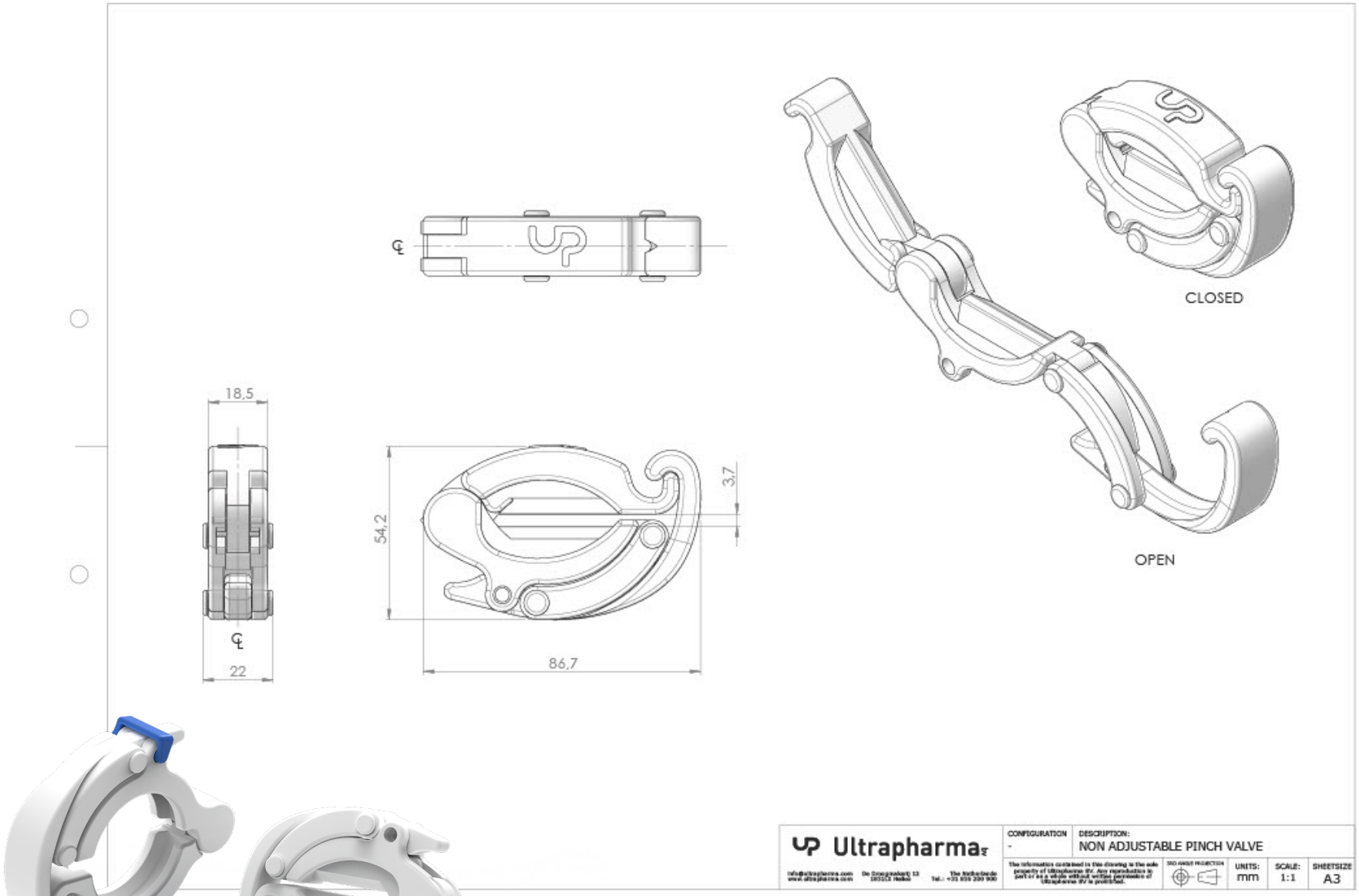
5. Pinch Valve family edition

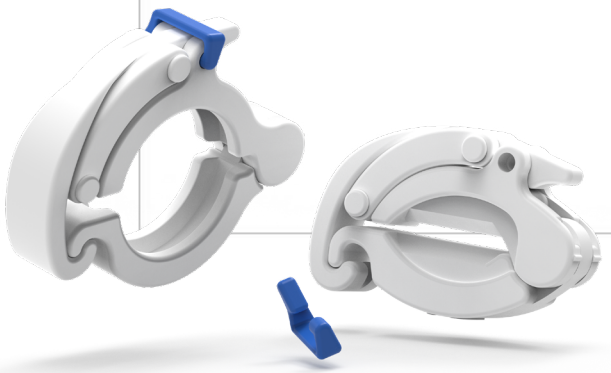
Created with the same DNA, our new pinch valve for tubing. Clearly recognized by the hook and the arm. This pinch Valve has the same operational features as the Pharma-Clamp®. It is non adjustable and can be used in a range of tubing wall thicknesses. The same applies here, the pressure is always low and therefore no excess of force is needed to stop the flow inside the tubing.

Article Number	Wall thickness tubing
UPPV-37NG	Min. 2.40 mm Max. 3.40 mm

Example of Silicone tubing with a 50-65 shore A hardness.		
1/8″ x 5/16″ (3.18 mm × 7.94 mm)	3/16 x 3/8″ (4.76 mm × 9.53 mm)	¼″ x 7/16″ (6.35 mm × 11.11 mm)
5/8″ x 13/16″ (15.88 mm × 20.64 mm)	3/8″ x 9/16″ (9.53 mm × 14.29 mm)	¼″ x ½″ (6.35 mm × 12.70 mm)
3/8″ x 5/8″ (9.53 mm × 15.88 mm)	3/8″ x 9/16″ (9.53 mm × 14.29 mm)	½″ x ¾″ (12.70 mm × 19.05 mm)




18,5
22
54,2
3,7
86,7
CLOSED
OPEN
Ultrapharma
CONFIGURATION
-
DESCRIPTION:
NON ADJUSTABLE PINCH VALVE
UNITS:
mm
SCALE:
1:1
SHEETSIZE
A3



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Notes

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