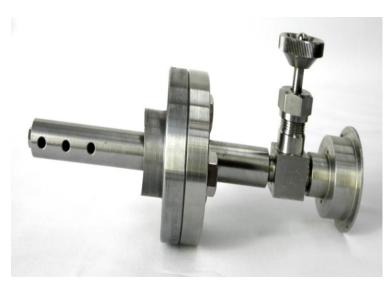


DRIP SAMPLER PRESSURE PLUS

Drip Sampler with Optimized Back Pressure

As Martechnic® pursues the strategy of the best possible technical solutions in the oil quality on-site monitoring and regularly checks its products for efficiency in on-board applications, the company has elaborated an improved design of the DRIP SAMPLER to meet the occurred challenges in pressure adjustments. The new version - the DRIP SAMPLER PRESSURE PLUS was designed with due regard to low and back pressure difficulties of the fuel oil flow in the bunkering line. The company's technical development in close cooperation with German Lloyd provides an optimal solution for drawing representative bunker fuel samples for accurate and reliable test results. The DRIP SAMPLER PRESSURE PLUS is in full compliance with the regulations of the MARPOL 73/78 Annex VI and the guidelines of the MSC-MEPC.2/Circ.18.



Features:

- Material: stainless steel (SUS304/1Cr18Ni9)
- Size: available in three sizes to cover range from DN 80 to DN 300

Benefits:

- Representative fuel oil samples
- · Optimized back pressure
- Three-hole bore connection on welded flange to secure right sampling direction

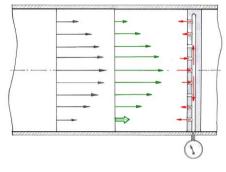
The improved design of the DRIP SAMPLER PRESSURE PLUS takes into account the fact that the fuel oil flow is not laminar, but on the contrary has a turbulent nature. A difference in diameters between the fueling hose and shipboard bunker pipes and elevation of the fueling hose up to the ship's manifold during bunkering process can cause a decrease in pressure and as a result a partial vacuum. The DRIP SAMPLER PRESSURE PLUS helps to eliminate this undesirable effect by improving the pressure situation, i.e. providing maximum back pressure for effective continuous bunker fuel sampling.

The practical design of the new version with a three-hole bore connection allows avoiding inaccuracies in the process of installation. In summer 2013 the DRIP SAMPLER PRESSURE PLUS has become integrated part of DIN 86210.



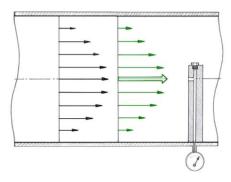
Pressure maintenance in traditional and improved versions

DRIP SAMPLER



pressure critical

DRIP SAMPLER PRESSURE PLUS



pressure optimized

Sample integrity according to the joint circular MSC-MEPC.2/Circ.18



Throughout the duration of the bunkering process the cubitainer is directly attached to the DRIP SAMPLER PRESSURE PLUS and sealed through a uniquely numbered seal strip. This assembly reliably protects from tampering and prevents any external contamination of the fuel oil sample during bunker operation.

In addition, the non-restricted operation of manual valve enables effective adjustment for controlling the flow of the primary sample.