

TYPE APPROVAL CERTIFICATE

This is to certify:

That the Pipe Support (pipe clamps)

with type designation(s)

Pipe Clamps: MP-H, MP-HI, MP-L-I, MP-M, MP-MI, MP-MI-F, MP-MIS, MP-MRI, MP-MRXI, MP-MX, MP-MXI, MP-MXI-F, MP-P, MP-PI, MP-PI HDG, MP-U, MP-U-G, MP-U-I, MIP-H, MIP-M, MIP-T, MIP-M-F, MP-MR, MP-MX-F, MRP-C

Issued to

Hilti AG
Schaan, Liechtenstein

is found to comply with

EAD 280016-00-0602:2020 Products for installation systems for supporting technical building equipment
DIN 4102-1:1998-05 Fire behavior of building materials and building components – Part 1: Building materials; concepts, requirements and tests
DIN 4109-1:2018-01 Sound insulation in buildings – Part 1: Minimum requirements for all pipe clamps with rubber inlay

Application :

The products approved by this certificate are accepted for installation on all vessels classed by DNV.
The permissible operating loads and temperatures are to be in accordance with manufacturers instruction.
The selection of the pipe support system for the corresponding application shall be in accordance with manufacturers instruction.

Issued at **Hamburg** on **2024-10-18**

This Certificate is valid until **2029-10-17**.

DNV local unit: **Augsburg**

for **DNV**

Approval Engineer: **Ana Cristina Do Carmo Insfran**

Sven Klinger
Head of Section

This Certificate is subject to terms and conditions overleaf. Any significant change in design or construction may render this Certificate invalid.
The validity date relates to the Type Approval Certificate and not to the approval of equipment/systems installed.

LEGAL DISCLAIMER: Unless otherwise stated in the applicable contract with the holder of this document, or following from mandatory law, the liability of DNV AS, its parent companies and their subsidiaries as well as their officers, directors and employees ("DNV") arising from or in connection with the services rendered for the purpose of the issuance of this document or reliance thereon, whether in contract or in tort (including negligence), shall be limited to direct losses and under any circumstance be limited to 300,000 USD.



Product description

HILTI - Pipe Clamps

Type designation: MP-H, MP-HI, MP-L-I, MP-M, MP-MI, MP-MI-F, MP-MIS, MP-MRI, MP-MRXI, MP-MX, MP-MXI, MP-MXI-F, MP-P, MP-PI, MP-PI HDG, MP-U, MP-U-G, MP-U-I, MIP-H, MIP-M, MIP-T, MP-M-F, MP-MR, MP-MX-F, MRP-C are made of either galvanized steel or stainless steel with or without rubber EPDM or TPE inlay material. The pipe clamp system contains the pipe clamps and accessories.

Materials:

Pipe Clamp	Material	Standard	Insulation Material
MP-HI	DC01	DIN EN 10130	EPDM rubber
MP-M	S235JRG	DIN EN 10025	-
MP-MI	S235JRG	DIN EN 10025	EPDM rubber
MP-MXI	DD11	DIN EN 10111	EPDM rubber
MIP-T	DD11 mod DD11 mod 360 S235 JR	HN 547, HN 555-1 HN 555-5 EN 10025-2	-
MIP-H	DD11 mod DD11 mod 360 DC01 mod 235	HN 547 HN 555-5 HN 703	-
MIP-M	DC01 mod 235 DD11 mod 360 DD11 mod 140	HN 703 HN 555-5 HN 691	
MP-MX	DD11	DIN EN 10111	-
MP-MI-F	S235 JR	DIN EN 10025	EPDM rubber
MP-M-F	S235 JR	DIN EN 10025	-
MP-MX-F	DD11	DIN EN 10111	-
MP-MXI-F	DD11	DIN EN 10111	EPDM rubber
MP-MRI	Stainless steel, 1.4571/1.4404 (A4)	EN 10088, AISI 316Ti / AISI 316L	EPDM rubber
MP-MR	Stainless steel, 1.4571/1.4404 (A4)	EN 10088, AISI 316Ti / AISI 316L	-
MP-MRXI	Stainless steel, 1.4571/1.4404 (A4)	EN 10088, AISI 316Ti / AISI 316L	EPDM rubber
MP-PI	SPCC-SD FB - Q/BQB402, DC01	EN 10130	EPDM rubber
MP-MIS	S235JRG	DIN EN 10025	Silicone rubber
MP-H	DC01	DIN EN 10130	-

Pipe Clamp	Material	Standard	Insulation Material
MRP-C	sheet metal DX51D+Z275-N-A mod bow DD11 mod bow DC01 (St 12) connecting piece C10C+U	HN 657-4 HN 547 Q/ASP 312-2018 EN 10263-2	-
MP-L-I	DC01	DIN EN 10130	EPDM rubber
MP-P	SPCC-SD FB - Q/BQB402, DC01	EN 10130	-
MP-PI HDG	SPCC-SD FB - Q/BQB402, DC01	EN 10130	EPDM rubber
MP-U-I	DC01 DD11	DIN EN 10130 DIN EN 10111	TPE (thermoplastic elastomer)
MP-U	DC01 DD11	DIN EN 10130 DIN EN 10111	-
MP-U-G	DC01 DD11	DIN EN 10130 DIN EN 10111	EPDM rubber

Application/Limitation

The products approved by this certificate are accepted for installation on all vessels classed by DNV.

The permissible operating temperatures are to be in accordance with manufacturers instruction.

The selection of the pipe clamps for the corresponding application shall be in accordance with manufacturers instruction.

The use of the pipe clamps outside the range of application is subject to special consideration by DNV in each individual case.

For design and installation, the Hilti "product data sheets" and "Instruction for Use" specified online "www.hilti.group" are to be observed.

Type Approval Documentation

Tests carried out

Scope of type tests according to standards specified in page 1 additional:

- MIP-H, MIP-M, MIP-T, MP-M-F, MP-MR, MP-MX-F, MRP-C are found to comply with Hilti internal technical data generation method
- Shock resistance certification according to Technischen Weisungen des Bundesamtes für Bevölkerungsschutz Qualitätsmanagement für prüfpflichtige Komponenten im Bereich Zivilschutz 1750-026 for pipe clamps MP-M, MP-MI, MP-MX, MP-MXI
- Noise reduction test according to DIN EN ISO 10846-4

Marking of product

For traceability to this type approval certificate the products are to be marked with:

- Manufacturers name or trademark
- Type designation

Periodical assessment

For retention of the Type Approval, a DNV Surveyor shall perform periodical assessment after two years (+/- 90 days) and after 3.5 years (+/- 90 days) to verify that the conditions for the Type Approval are complied with. Refer to DNV-CP-0338, Sec.4.

The certificate is only valid if required periodical assessments are carried out with satisfactory results. To check the validity of this certificate, please look it up in <https://approvalfinder.dnv.com>

END OF CERTIFICATE