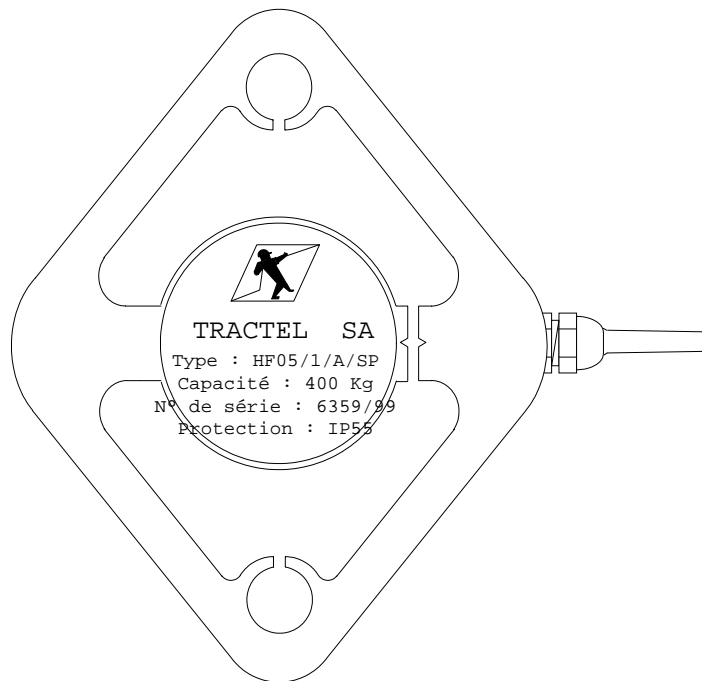




Mechanical Load Cell HF 05/A/2 Series



equipment in
accordance with
CE directives

**Operating
and
maintenance
manual**

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GENERAL WARNING

- 1- Reading and fully understanding the technical data sheets relating to this equipment is essential for the best use of this high technological material that you have received . All the technical data sheets are available on request.**
- 2- Before installing and operating Dynasafe equipment it is essential for the safe and correct operation of the material that this manual be read and fully understood and that all the instructions be followed. This manual should be made available to every operator. Extra copies of this manual will be supplied on request.**
- 3- The installation and the operation Dynasafe equipment should only be carried out in accordance with the appropriate health and safety at work regulations.**
- 4- Never apply to the Dynasafe a load or an effort in excess of the working load limit, and never use it for an operation for which it is not intended.**
- 5- TRACTEL S.A.S declines any responsibility for the consequences of dismantling or altering the machine by any unauthorised person.**
- 6- Dynasafe equipment must not be used in explosive atmospheres.**
- 7- Dynasafe equipment must only be used in a system designed for lifting people after ensuring that the appropriate operating coefficients have been used in accordance with the current regulations.**
- 8- Prior to the use of Dynasafe equipment with complementary equipment relaying the signals to an operating system, the user or installer of this system should carry out a specific risk analysis of the operating functions. The appropriate measures should be taken to obviate risks identified.**

INSTALLATION OF HF 05/ A2

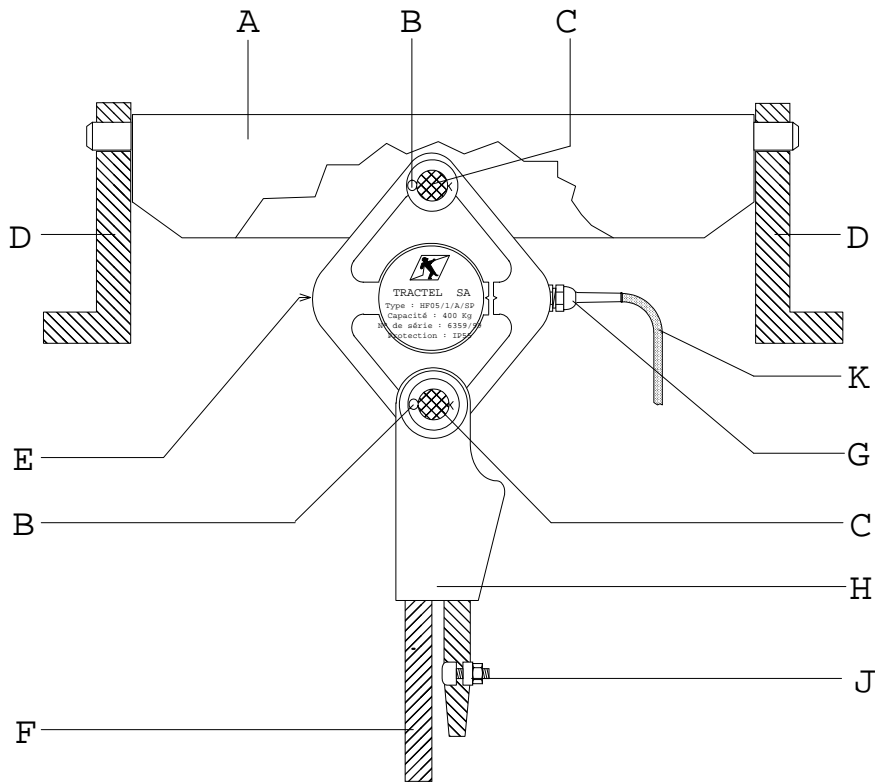


Fig. 1

Components of the load cell

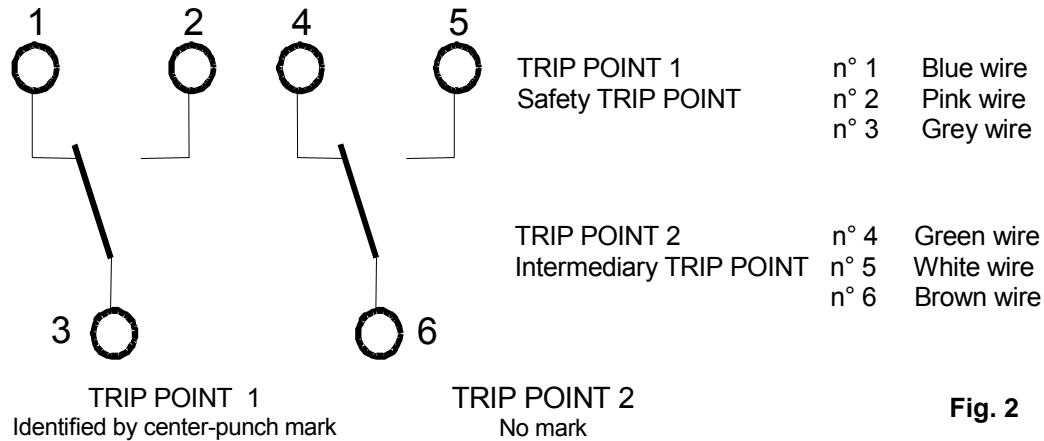
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|--------------------|-----------------------|---------------------|
| A – Suspension bar | E – Adjustable screw | J – Wire rope clamp |
| B – Safety pin | F – Wire rope | K – Lead (2m) |
| C – Anchor pin | G – Cable gland | |
| D – Bracket | H – Wedge end fitting | |

Procedure for installing the load cell

- Position the load cell on the suspension bar as illustrated above. If necessary drill a new hole in the suspension bar whilst ensuring that it remains aligned with the sheaving or bottom block.
- Check that the diameter of the anchor pin used is compatible with the anchor point of the load cell. If necessary, use washers on one side and the other of the load cell to align it correctly.
- Fit a safety pin to keep the anchor pin in position .
- Fit a wedge end fitting to the end of the wire rope.
- Mount the wedge fitting to the lower anchor point of the load cell using an appropriate anchor pin.
- Operate the lifting system up to the upper limit switch and ensure that the sheaving or bottom block does not foul the wedge end fitting.(If it does, readjust the upper limit switch so that there is an appropriate distance between the wedge end fitting and the bottom block. Also ensure that when the bottom is in the upper position the load cell is correctly aligned with the wire rope and is free of any lateral contact.)
- Wire the load cell correctly into the control box. Secure the cable.

OPERATION AND ADJUSTMENTS OF HF 05/ A2

Connection layout



The switching power is 4A 220 Vac (0.3A, 250 Vdc). (It is therefore possible to connect in series in the upper limit switch circuit).

Adjustment of the safety trip point

Essential conditions :

- the load cell and the monitor should be correctly mounted and wired.
- The hook of the lifting system should be free of any load.
- The test operation should have been successfully carried out.

Equipment required:

- A load (« Pm ») equivalent to 100% of the load limit of the lifting system.
- An additional load equivalent to 10 % of « Pm »

	ACTION	EXPLANATION
1	Lift the two loads (100% and 10 % of « Pm ») by ± 10 cm	The additional 10% represents the permitted overload value in accordance with the European directives. Should an overload condition be detected on the wire rope (without lifting the load) it indicates that the setting of the load cell (preset in the factory) is too low compared to the loads. Solution : release the tare screw (E- see fig. 1) (flat screw driver) by one turn at a time and restart at the beginning of point 1.
2	To adjust the safety trip point	Using the tare screw (E) and a flat screw driver. Do not forget to retighten the locking nut (O). The microswitch is normally closed (NC) so that when it opens it sets off the overload condition. Clockwise to reduce the value of trip point. Anticlockwise to increase the value of the trip point.
3	2 nd trip point	Repeat step 1 & 2 by lifting the load corresponding to trip point 2.

NOTES :