

Assembly Instructions

of

ThyssenKrupp D6C door operator

Conversion

to

TSG

Documentation history

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1 Essential information

1.1 Value of assembly instructions

The product assembly instructions are provided by the manufacturer or supplier to provide the information required by the customer or fitter to ensure proper, safe and reliable assembly. These brief assembly instructions serve to clarify the basic steps of mechanical assembly. The electrical connection, commissioning and settings of the TSG are explicitly not part of these instructions.

1.2 Copyright protection

We reserve all rights for this technical documentation. It may not be duplicated, made accessible to third parties or otherwise used in an unauthorised manner without our prior consent. Any changes require our explicit and prior written consent.

1.3 Instructions in the assembly manual

All instructions in the assembly manual must be followed without exception.

1.4 Informal activities performed by the fitter

The system fitter is personally responsible for participating in a training course. He or she must inform the manufacturer/supplier without delay of any missing or defective parts in the delivery.

1.5 Requirements for assembly personnel

Persons responsible for installation and maintenance must be instructed regarding generally applicable safety and labour health requirements. They must be familiar with Langer&Laumann products. Installation tools must be fully functional and measuring instruments must be subject to continuous monitoring.

1.6 Explanation of symbols



WARNING:

This symbol directs your attention to a possible hazard that could lead to severe bodily injuries or death.



CAUTION:

This symbol directs your attention to a possible hazard that could lead to minor bodily injuries. The same symbol is also used to warn of potential damage to property.





NOTE:

Your attention is drawn to applications and other useful information.

2 Activity performed

Replacement of the ThyssenKrupp **D6C** drive with a  **Langer & Laumann Ing. Büro GmbH TSG door drive**

3 Advantages

- Very economical package.
- A faulty control device and motor can be quickly and easily replaced with a TSG from  **Langer & Laumann Ing. Büro GmbH**.
- **Just a few** mechanical attachments are required.
- All necessary parts are included with delivery.
- The conversion is **very quick** and **easy** to perform.
- The electrical wiring can also be performed by **less experienced fitters**.
- **No hand-held** terminal is required for setting parameters. All parameters can easily be adjusted on the device.
- **Measurements are very easy** to perform.
- The conversion kit is available from  **Langer & Laumann Ing. Büro GmbH** as **warehouse inventory**.

4 Tools required

Angle grinder
Drilling machine
Metal drill bits, 9 and 11 mm
Hexagon socket wrench set
Fork wrenches size 10, 13
Screwdriver
Side cutter

5 Conversion instructions

1. Please remove all packaging and check against the parts list for completeness.
2. Disassemble the old door motor including gearbox. The remainder of the mechanics remains intact.
3. Remove the toothed wheel from the old door motor.
4. Disassemble the old door control electronics.
5. Fasten the toothed wheel onto the TSG drive.
6. Mount the TSG drive in the door machine. Set the toothed belt in place and tension it.
7. Stop with the door closed.
Due to a design error, the door stop is missing for the "Closed" position in D6C doors. The door panel runs up against the door frame, where it produces a closing noise or it runs up against a pushbutton. The function of this pushbutton in the original D6C drives is to report to the door electronics system that the door has reached the end stop. This is missing in the TSG D6C package. The pushbutton must be replaced with the adjustable buffer-type stop enclosed in the package. It must be adjusted so that the door does not strike the frame.
8. Auger.
In some doors, the auger has not turned completely to the end when the door opens. This causes a noise to be produced during the closing process. Make certain the tip of the car unlocking mechanism does not open until the auger has extended completely to the end.
9. For information regarding electrical commissioning, please refer to the enclosed TSG operating instructions.



CAUTION:

The mains connection voltage of the TSG is 230 VAC! However, the connection voltage of the original D6C door drive is 400 VAC! Connecting 400 VAC to the TSG electronics will cause the TSG electronics to fail and be destroyed!



NOTE:

The X1 inputs on the TSG V4 can be switched either to positive or negative.

6 Scope of delivery

Table 1: Scope of delivery

| Item | Article number | Name | Quantity |
|------|----------------|---|----------|
| 1 | 8.20.00152.04 | TSG electronics | 1 |
| 2 | 8.20.20002 | Motor, small left and gearbox 24V/2.8A/1:15, without pinion | 1 |
| 3 | | Small parts (cable strap, screws, washers, rubber pads, etc.) | 1 |
| 4 | 1.20.91020 | Assembly instructions for ThyssenKrupp D6C conversion to L&L | 1 |
| 5 | 1.20.91000 | TSG operating instructions | 1 |
| | | | |

7 Illustrations

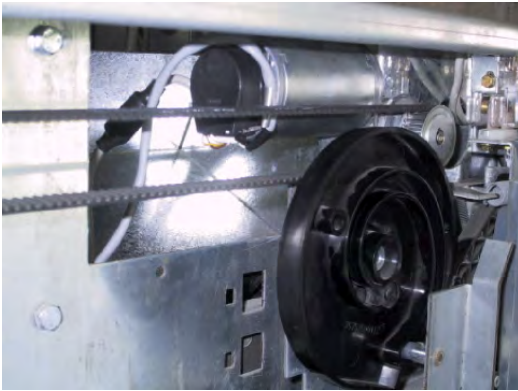


Fig. 1: D6C with auger



Fig. 2: D6C with Prisma



Fig. 3: Stop provided by an 8 mm screw

8 Contact

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