Work Instruction

015 Research + Development
Operating Instructions
W_015_024

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proved	07.05.2013	Bernsmeister Hans-Gerd / Rumm Dieter / Weigl Bernhard
released	10.05.2013	Bauer Rupert / List Ronald
Revision 00	05/2013	

1 Purpose

This work instruction regulates the procedures regarding the design, preparation, verification and archiving of operating instructions for commercially available retrofit seats and for manuscripts for operating instructions for original seats.

2 Scope

GRAMMER R&D worldwide

3 Terminology

None

4 Responsibilities

The implementation of and compliance with this work instruction are the responsibility of the vice president R&D.

5 Description

5.1 Why operating instructions and manuscripts for operating instructions?

According to the Product Liability Act (Produkthaftungsgesetz) / Product Safety Act (Produktsicherungsgesetz), we are obliged to provide users of GRAMMER seats with information on how to operate the seats correctly without making any errors (obligation to instruct).

Operating instructions contain not only a description of the possible settings but also safety instructions and warnings aimed at preventing damage to health and accidents as well as maintenance instructions.

Examples include:

- safety instructions and warnings aimed at preventing accidents when using the seat
- notes indicating possible risks to persons during use of the seat and concerning the prevention of these risks
- notes indicating possible damage to material and concerning the prevention of this damage
- information on compliance with specific torque requirements, e.g. for retrofitting various components, such as armrests

If necessary, installation notes are also provided.

5.2 Who needs operating instructions or manuscripts for operating instructions?

Anyone who uses GRAMMER seats.

- The end consumer if he buys a new seat for his vehicle
- The end consumer if he buys a vehicle with our seat

A distinction must be made between the following:

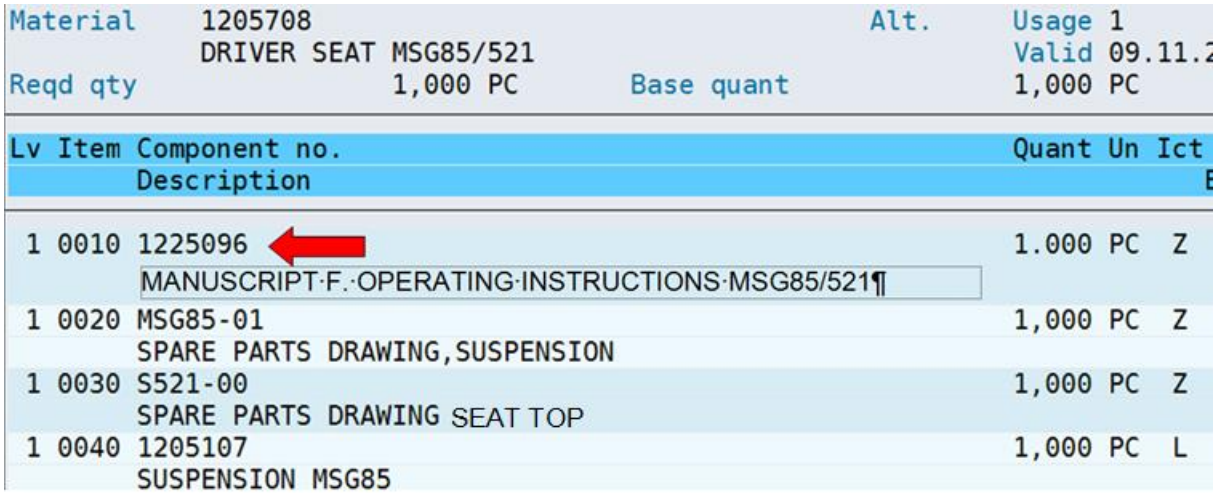
In the case of the sale of a commercially available seat to the end consumer (e.g. **ACTIMO**, **MAXIMO**, **COMPACTO**, etc.), this seat must be accompanied by printed **operating instructions** as a booklet. These **operating instructions** are listed in the parts list or corresponding functional unit of the seat assembly as a single part, just like all the other parts, and enclosed with every seat in production.

In the case of the sale of vehicles manufactured by our OEM customers that are fitted with one of our seats, the vehicle manufacturer must include information on how to operate our seat in the user manual for the entire vehicle. For this purpose, we supply the manufacturer with the **manuscript** for the operating instructions.
The **manuscript** for the operating instructions is not therefore a real part enclosed with the seat, but a WORD file supplied to the vehicle manufacturer for this purpose.

For correct assignment, the **manuscript for operating instructions** for the respective seats

- is provided with a Z marking and included in the parts list of the seat (procedure for **documents for non-configurable seats**).
- is included in the document data of the seat (procedure for **documents for configurable seats**).

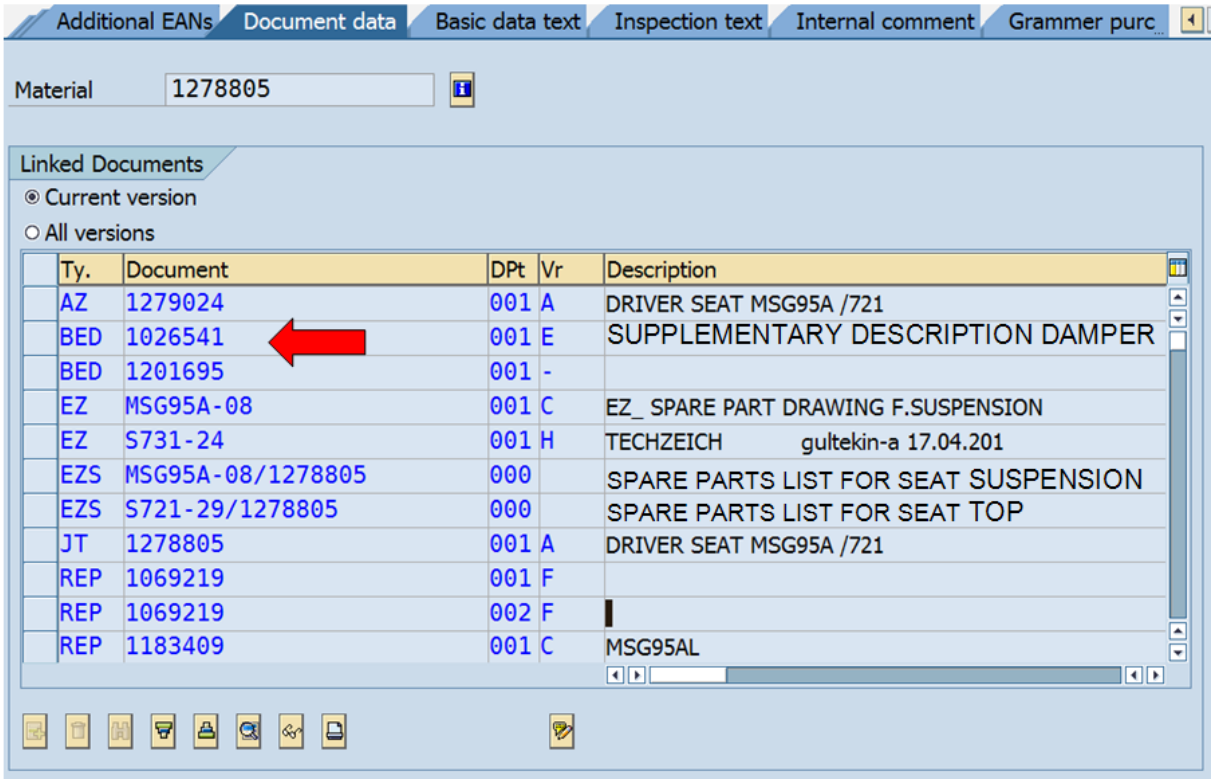
Non-configurable seats (SAP_Code CS11):



Material	1205708		Alt.	Usage	1
	DRIVER SEAT MSG85/521			Valid	09.11.2
Reqd qty	1,000 PC	Base quant		1,000 PC	

Lv	Item	Component no. / Description	Quant	Un	Ict
1	0010	1225096	1.000	PC	Z
		MANUSCRIPT·F.·OPERATING·INSTRUCTIONS·MSG85/521¶			
1	0020	MSG85-01	1,000	PC	Z
		SPARE PARTS DRAWING,SUSPENSION			
1	0030	S521-00	1,000	PC	Z
		SPARE PARTS DRAWING SEAT TOP			
1	0040	1205107	1,000	PC	L
		SUSPENSION MSG85			

Configurable seats (SAP_Code MM03):



Additional EANs | Document data | Basic data text | Inspection text | Internal comment | Grammer purc

Material 1278805

Linked Documents

◉ Current version

○ All versions

Ty.	Document	DPt	Vr	Description
AZ	1279024	001	A	DRIVER SEAT MSG95A /721
BED	1026541	001	E	SUPPLEMENTARY DESCRIPTION DAMPER
BED	1201695	001	-	
EZ	MSG95A-08	001	C	EZ_ SPARE PART DRAWING F.SUSPENSION
EZ	S731-24	001	H	TECHZEICH gultekin-a 17.04.201
EZS	MSG95A-08/1278805	000		SPARE PARTS LIST FOR SEAT SUSPENSION
EZS	S721-29/1278805	000		SPARE PARTS LIST FOR SEAT TOP
JT	1278805	001	A	DRIVER SEAT MSG95A /721
REP	1069219	001	F	
REP	1069219	002	F	
REP	1183409	001	C	MSG95AL

5.3 Preparing operating instructions and document data

5.3.1 Manuscript for operating instructions

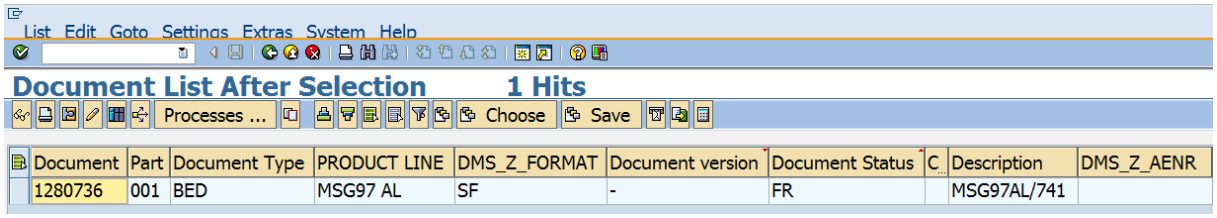
The entire manuscript for the operating instructions is prepared as a WORD file in A5 size (portrait format) and as a booklet (even / odd pages and headers / footers).

Graphics for front page and function illustrations are created in **ai format** (ADOBE Illustrator) and inserted as **wmf graphics** (exporting ai format with ADOBE Illustrator).

Manuscripts for operating instructions are written in the three languages **GERMAN, ENGLISH** and **FRENCH**. Other languages on request.

Archiving in the system archive (DMS):

Criteria for archiving:	Document Part	**001** (applies to a document and not to the page number)
	Document Type	**BED** (operating instructions)
	Plant Number	e.g. **1010**
	Production Area	**Driver's seat**
	Product Line	e.g. **MSG95AL** (seat type line)
	Format	**Special format** (document format A5 not available in the DMS)
	Document Version	e.g. **A** (index / revision status)
	Document Status	**FR** or **UN** (released / invalid)
	Description	Additional description for clarification if necessary
	Revision Number	**T01-XXX-XX**
	Original Application	**WORD**



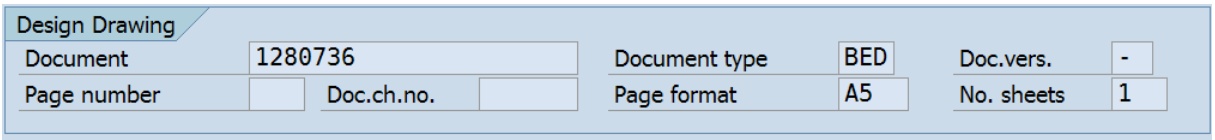
Document	Part	Document Type	PRODUCT LINE	DMS_Z_FORMAT	Document version	Document Status	C	Description	DMS_Z_AENR
1280736	001	BED	MSG97 AL	SF	-	FR		MSG97AL/741	

The manuscript for operating instructions in the system archive (DMS) can be opened as a **PDF** or **DOC** file.

In the basic data, manuscripts for operating instructions are labelled as the material type "**ZCHN**" (drawing).

Drawing data:

Document type	**BED**
Doc.version	**Index / revision status**
Page format	**5**
No. sheets	**Document page number** (For archiving 001 = no. of sheets **1**)



5.3.2 Operating instructions

The operating instructions are prepared in the same way as the manuscript for operating instructions with the following differences:

- The operating instructions are written in the languages **GERMAN, ENGLISH, FRENCH, ITALIAN, SPANISH** and **DUTCH**. Other languages on request.

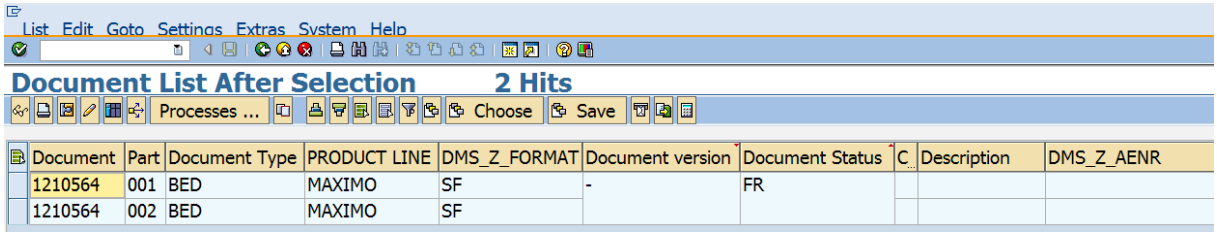
- For operating instructions, cover pages are specified that conform to the **GRAMMER CORPORATE DESIGN**.

The cover pages are decided on in collaboration with Marketing.

Archiving in the system archive:

Criteria for archiving:	Document Part	**001** (cover pages) / **002** (content pages) (applies to document and not to page number)

All other archiving criteria same as for manuscript for operating instructions.



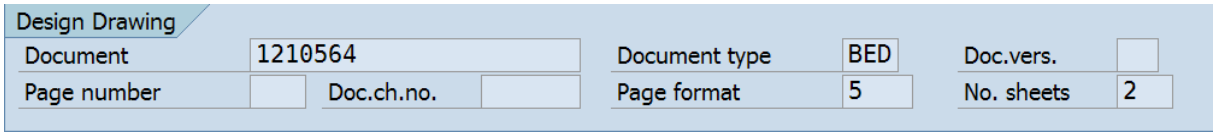
Document	Part	Document Type	PRODUCT LINE	DMS_Z_FORMAT	Document version	Document Status	C	Description	DMS_Z_AENR
1210564	001	BED	MAXIMO	SF	-	FR			
1210564	002	BED	MAXIMO	SF					

The operating instructions in the system archive (DMS) can be opened as a **PDF** or **DOC** file (the cover pages only in **PDF** format).

In the basic data, operating instructions are labelled as the material type "**HALB**" (semi-finished products).

Drawing data:

Document type	**BED**
Doc.version	**Index / revision status**
Page format	**5**
No. sheets	**Document page number** (For archiving 001 and 002 = no. of sheets **2**)



5.4 Help with locating existing operating instructions

To make it easier to locate existing operating instructions or manuscripts for operating instructions, the GBS contains the file

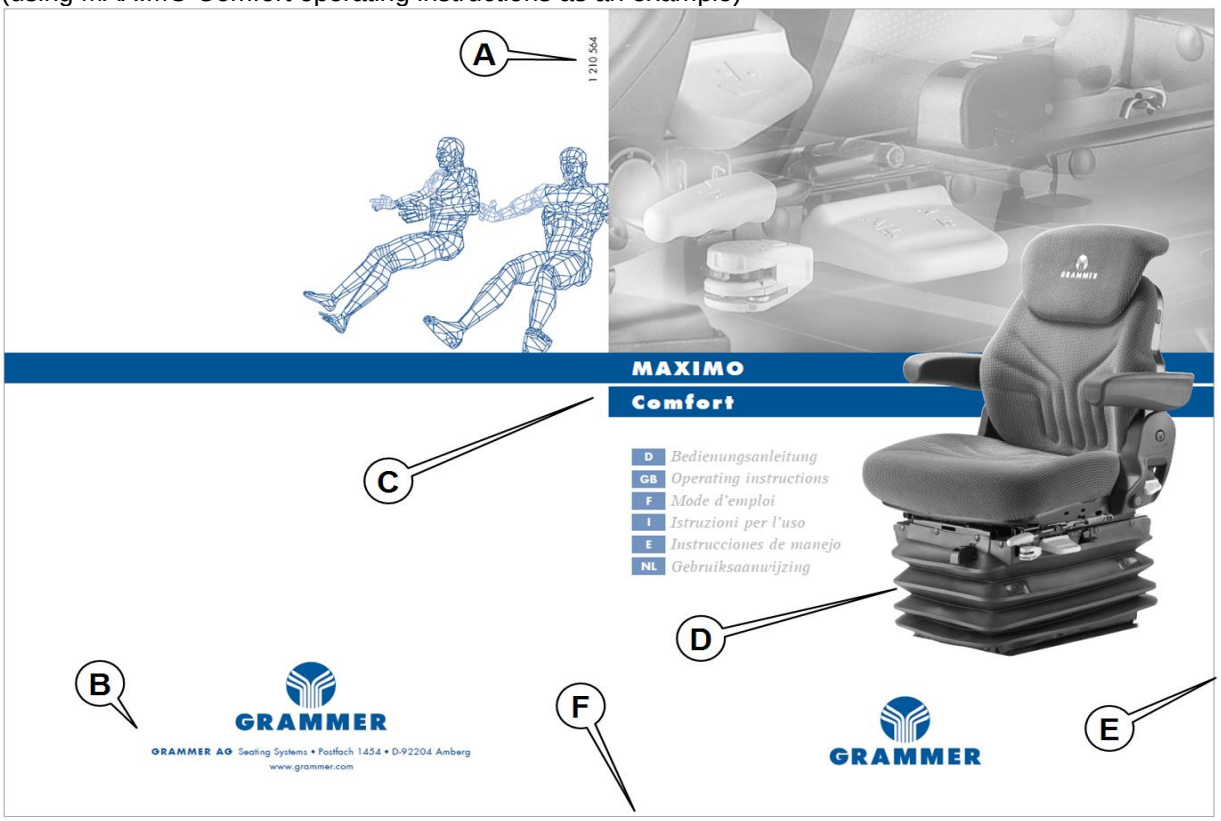
“I_015_002_Graphics_for_Operating_Instructions_Front_Page”)

with an overview of front page images with type designations, which can be used to establish whether existing instructions can be used when preparing manufacturing documents.

5.5 Layout of the operating instructions

5.5.1 Operating instructions

Cover pages:
(using MAXIMO Comfort operating instructions as an example)



A Part number of the operating instructions

B Contact address

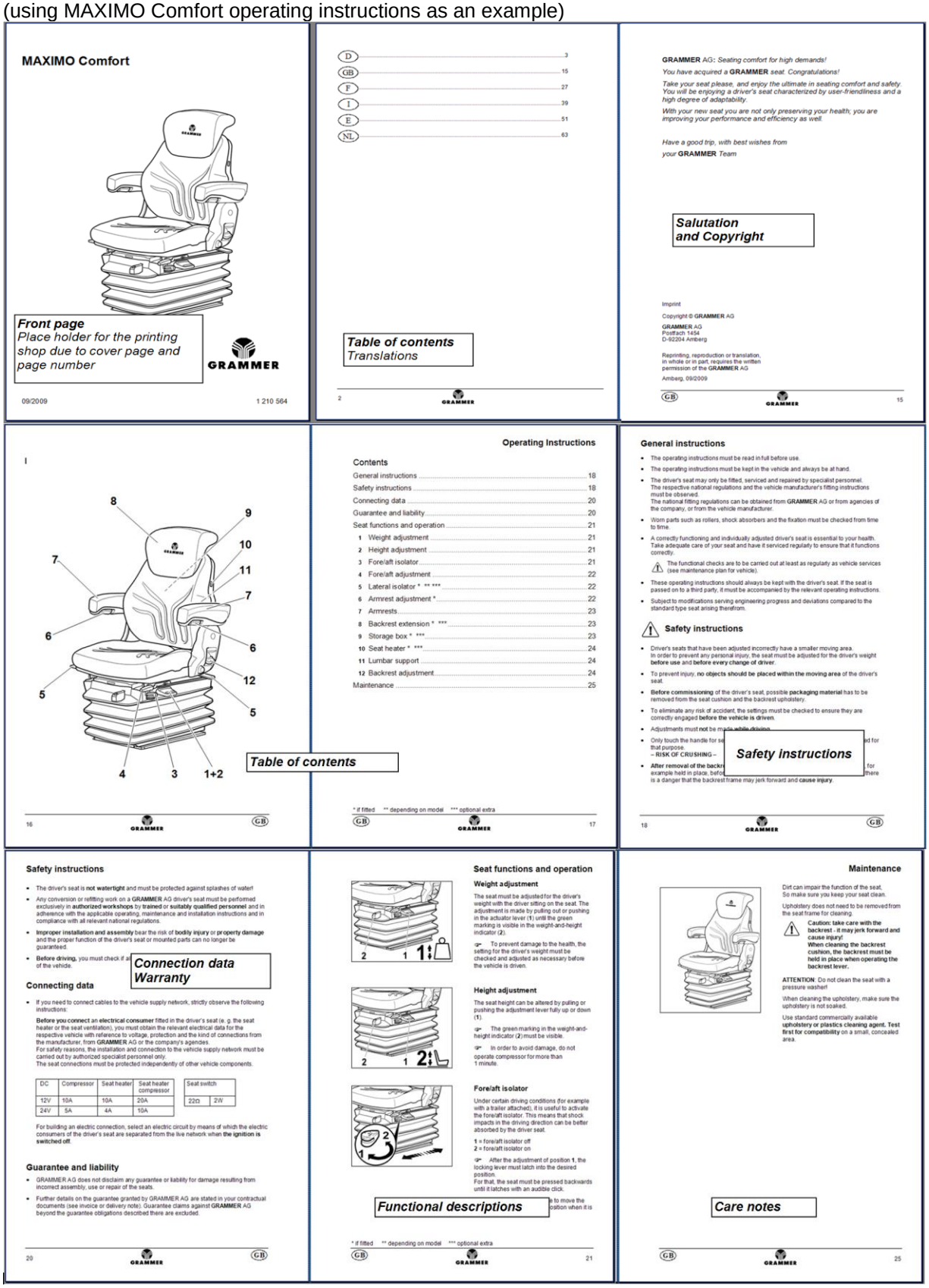
C Seat designation

D Picture of the seat (requires a high-resolution image in EPS format)

E Height 216 mm (cutting size for the printing shop)

F Width 303 mm (cutting size for the printing shop)

Content pages:
(using MAXIMO Comfort operating instructions as an example)



MAXIMO Comfort

Front page
Place holder for the printing shop due to cover page and page number

09/2009 1 210 564

D 3
GB 15
F 27
I 39
E 51
NL 63

Table of contents
Translations

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GRAMMER AG: *Seating comfort for high demands!*

You have acquired a **GRAMMER** *seat. Congratulations!*

Take your seat please, and enjoy the ultimate in seating comfort and safety. You will be enjoying a driver's seat characterized by user-friendliness and a high degree of adaptability.

With your new seat you are not only preserving your health; you are improving your performance and efficiency as well.

Have a good trip, with best wishes from
your **GRAMMER** *Team*

Salutation and Copyright

Imprint

Copyright © **GRAMMER** AG

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Postfach 1454
D-92204 Amberg

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Amberg, 09/2009

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* if fitted ** depending on model *** optional extra

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General instructions

- The operating instructions must be read in full before use.
- The operating instructions must be kept in the vehicle and always be at hand.
- The driver's seat may only be fitted, serviced and repaired by specialist personnel. The respective national regulations and the vehicle manufacturer's fitting instructions must be observed. The national fitting regulations can be obtained from **GRAMMER** AG or from agencies of the company, or from the vehicle manufacturer.
- Worn parts such as rollers, shock absorbers and the fixation must be checked from time to time.
- A correctly functioning and individually adjusted driver's seat is essential to your health. Take adequate care of your seat and have it serviced regularly to ensure that it functions correctly.

  ⚠ The functional checks are to be carried out at least as regularly as vehicle services (see maintenance plan for vehicle).
- These operating instructions should always be kept with the driver's seat. If the seat is passed on to a third party, it must be accompanied by the relevant operating instructions.
- Subject to modifications serving engineering progress and deviations compared to the standard type seat arising therefrom.

⚠ **Safety instructions**

- Driver's seats that have been adjusted incorrectly have a smaller moving area. In order to prevent any personal injury, the seat must be adjusted for the driver's weight **before use** and **before every change of driver**.
- To prevent injury, **no objects should be placed within the moving area** of the driver's seat.
- **Before commissioning** of the driver's seat, possible **packaging material** has to be removed from the seat cushion and the backrest upholstery.
- To eliminate any risk of accident, the settings must be checked to ensure they are correctly engaged **before the vehicle is driven**.
- Adjustments must **not** be made **while driving**.
- Only touch the handle for se[illegible] ad for that purpose.
  – RISK OF CRUSHING –
- **After removal of the backr[illegible]** for example held in place, befo[illegible] there is a danger that the backrest frame may jerk forward and **cause injury**.

Safety instructions

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Safety instructions

- The driver's seat is **not watertight** and must be protected against splashes of water!
- Any conversion or refitting work on a **GRAMMER** AG driver's seat must be performed exclusively in **authorized workshops** by **trained** or **suitably qualified personnel** and in adherence with the applicable operating, maintenance and installation instructions and in compliance with all relevant national regulations.
- **Improper installation and assembly** bear the risk of **bodily injury** or **property damage** and the proper function of the driver's seat or mounted parts can no longer be guaranteed.
- **Before driving,** you must check if a[illegible] of the vehicle.

Connection data Warranty

Connecting data

- If you need to connect cables to the vehicle supply network, strictly observe the following instructions:

  Before you connect an **electrical consumer** fitted in the driver's seat (e. g. the seat heater or the seat ventilation), you must obtain the relevant electrical data for the respective vehicle with reference to voltage, protection and the kind of connections from the manufacturer, from **GRAMMER** AG or the company's agencies.
  For safety reasons, the installation and connection to the vehicle supply network must be carried out by authorized specialist personnel only.
  The seat connections must be protected independently of other vehicle components.

DC	Compressor	Seat heater	Seat heater compressor
12V	10A	10A	20A
24V	5A	4A	10A

Seat switch	
22Ω	2W

For building an electric connection, select an electric circuit by means of which the electric consumers of the driver's seat are separated from the live network when **the ignition is switched off**.

Guarantee and liability

- GRAMMER AG does not disclaim any guarantee or liability for damage resulting from incorrect assembly, use or repair of the seats.
- Further details on the guarantee granted by GRAMMER AG are stated in your contractual documents (see invoice or delivery note). Guarantee claims against **GRAMMER** AG beyond the guarantee obligations described there are excluded.

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Seat functions and operation

Weight adjustment

The seat must be adjusted for the driver's weight with the driver sitting on the seat. The adjustment is made by pulling out or pushing in the actuator lever (**1**) until the green marking is visible in the weight-and-height indicator (**2**).

☞ To prevent damage to the health, the setting for the driver's weight must be checked and adjusted as necessary before the vehicle is driven.

Height adjustment

The seat height can be altered by pulling or pushing the adjustment lever fully up or down (**1**).

☞ The green marking in the weight-and-height indicator (**2**) must be visible.

☞ In order to avoid damage, do not operate compressor for more than 1 minute.

Fore/aft isolator

Under certain driving conditions (for example with a trailer attached), it is useful to activate the fore/aft isolator. This means that shock impacts in the driving direction can be better absorbed by the driver seat.

1 = fore/aft isolator off
2 = fore/aft isolator on

☞ After the adjustment of position **1**, the locking lever must latch into the desired position.
For that, the seat must be pressed backwards until it latches with an audible click.

Functional descriptions

* if fitted ** depending on model *** optional extra

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Maintenance

Dirt can impair the function of the seat. So make sure you keep your seat clean.

Upholstery does not need to be removed from the seat frame for cleaning.

⚠ **Caution: take care with the backrest - it may jerk forward and cause injury!**
When cleaning the backrest cushion, the backrest must be held in place when operating the backrest lever.

ATTENTION: Do not clean the seat with a pressure washer!

When cleaning the upholstery, make sure the upholstery is not soaked.

Use standard commercially available **upholstery or plastics cleaning agent. Test first for compatibility** on a small, concealed area.

Care notes

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5.5.2 Manuscript for operating instructions

Front and content pages:
(using MSG95G/731 operating instructions as an example)

Front and content pages correspond 1:1 with the content pages of the operating instructions (here as in the previous MAXIMO Comfort example), but only in the languages **GERMAN, ENGLISH** and **FRENCH**

6 Applicable documents

Graphics for Operating Instructions Front Page	I_015_002

7 Changes