



# EC TYPE-EXAMINATION CERTIFICATE

According to Annex V, Part A of 95/16/EC Directive

<b>Certificate No.:</b>	ABV 708/1
<b>Certification Body of the Notified Body:</b>	TÜV SÜD Industrie Service GmbH Westendstr. 199 80686 Munich – Germany Identification No. 0036
<b>Certificate Holder:</b>	INVENTIO AG Seestrasse 55 6052 Hergiswil – Switzerland
<b>Manufacturer of the Test Sample:</b> (Manufacturer of Serial Production – see Enclosure)	Schindler Aufzüge AG EBI Works Zuger Strasse 13 6030 Ebikon – Switzerland
<b>Product:</b>	Braking device acting on the traction sheave, as part of the protection device against overspeed for the car moving in upwards direction
<b>Type:</b>	MB940-HYB55
<b>Directive:</b>	95/16/EC
<b>Reference Standards:</b>	EN 81-20:2014 EN 81-50:2014 EN 81-1:1998+A3:2009
<b>Test Report:</b>	ABV 708/1 of 2015-10-15
<b>Outcome:</b>	The safety component conforms to the essential health and safety requirements of the mentioned Directive as long as the requirements of the annex of this certificate are kept.
<b>Date of Issue:</b>	2015-10-16

Achim Janocha  
Certification Body "lifts and cranes"



**Annex to the EC Type-Examination Certificate  
No. ABV 708/1 of 2015-10-16**



Industrie Service

**1 Scope of application**

- |       |  |                  |
|-------|--|------------------|
| 1.1   | Permissible brake moment when the brake device acts on the traction sheave while the car is moving upward  | 10000 - 18000 Nm |
| 1.2   | Maximum tripping speed of the overspeed governor and maximum rated speed for a traction sheave diameter of 900 mm (in relation to the rope's center) and car suspension of 1:1 |                  |
| 1.2.1 | Maximum tripping speed   | 12.50 m/s        |

According to the tripping speed, a tripping rotary speed of 254 rpm of the traction sheave is calculated on the basis of the traction sheave's diameter of 900 mm and the car suspension of 1:1.

If deviating traction sheave diameters, car speeds or car suspensions are used, care must be taken that these rotary speeds are not exceeded during operation and tripping of the overspeed governor.

**2 Terms and Conditions**

- 2.1 Above mentioned safety component represents only a part at the protection device against overspeed for the car moving in upwards direction. Only in combination with a detecting and triggering component in accordance with the standard (two separate components also possible), which must be subjected to an own type-examination, can the system created fulfil the requirements for a protection device.
- 2.2 In order to provide identification and information about the design and its functioning and to show the environmental conditions and connection requirements, drawing M41600529 with stamp dated 2015-10-16 is to be enclosed with the EC type-examination certificate and the Annex thereto.
- 2.3 The type-examination certificate may only be used in combination with the corresponding annex and enclosure (List of authorized manufacturer of the serial production). The enclosure will be updated immediately after any change by the certification holder.

**3 Remarks**

- 3.1 In the scope of this type-examination it was found out, that the brake device also functions as a brake for normal operation (using at least two single brakes), is designed as a redundant system and therefore meets the requirements to be used also as a part of the protection device against overspeed for the car moving in upwards direction.
- 3.2 Checking whether the requirements as per section 5.9.2.2 of EN 81-20:2014 (D) have been complied with is not part of this type examination.
- 3.3 Other requirements of the standard, such as reduction of brake torque respectively brake force due to wear or operational caused changes of traction are not part of this type examination.
- 3.4 This EC type-examination certificate was issued according to the following standards:
- EN 81-1:1998 + A3:2009 (D), Annex F7
  - EN 81-20:2014 (D), part 5.6.6.11
  - EN 81-50:2014 (D), part 5.7
- 3.5 A revision of this EC type-examination certificate is inevitable in case of changes or additions of the above mentioned standards or of changes of state of the art.

**Enclosure to the EC Type-Examination Certificate  
No. ABV 708/1 of 2015-10-16**

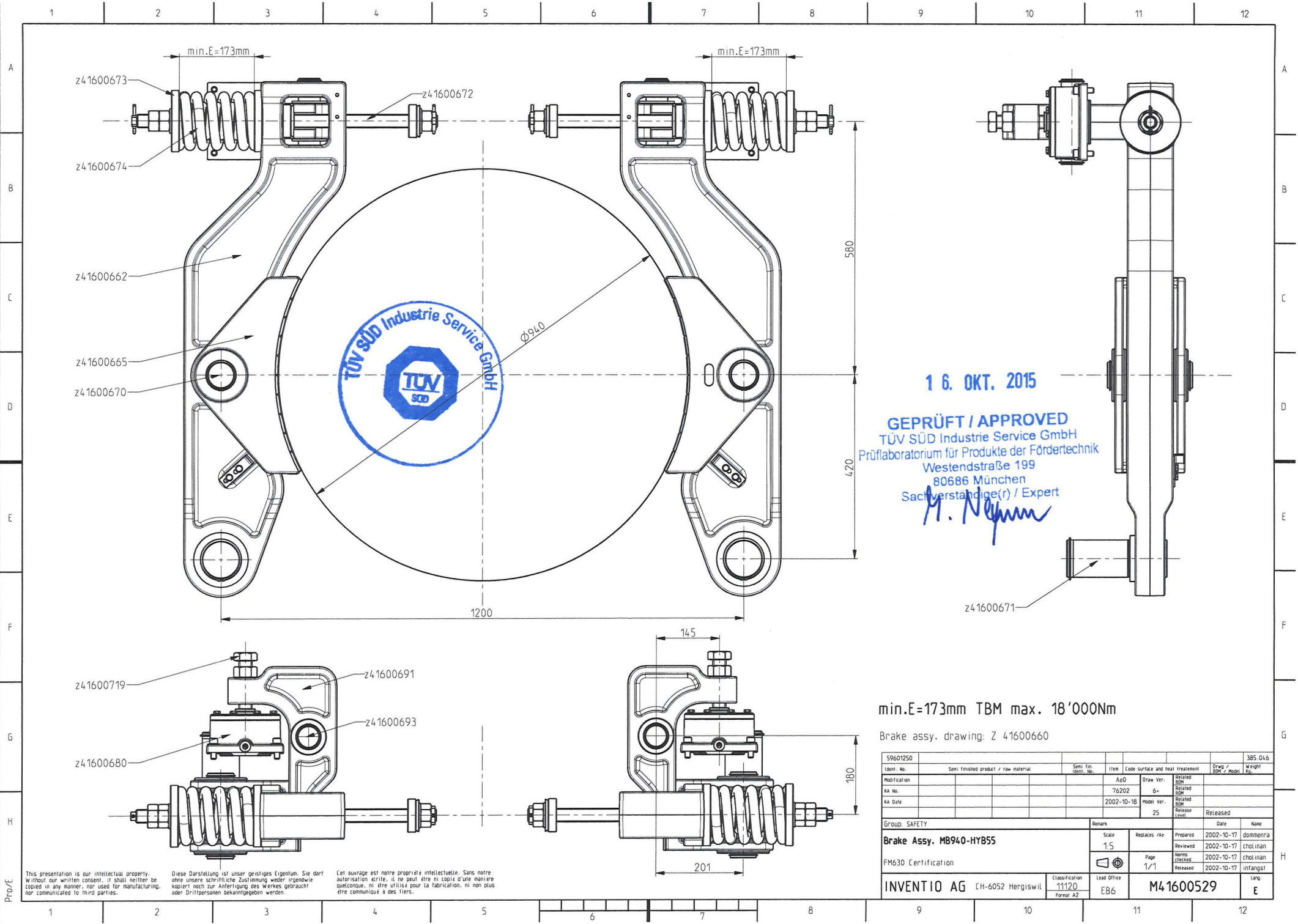


Industrie Service

**Authorised Manufacturer of Serial Production – Production Sites (valid from: 2015-10-16):**

**Company** Schindler Aufzüge AG  
**Address** EBI Works  
Zugerstrasse 13  
6030 Ebikon – Switzerland

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1 6. OKT. 2015  
**GEPRÜFT / APPROVED**  
 TÜV SÜD Industrie Service GmbH  
 Prüflaboratorium für Produkte der Fördertechnik  
 Westendstraße 199  
 80686 München  
 Sachverständige(r) / Expert  
*M. Neumann*

min.E=173mm TBM max. 18'000Nm

Brake assy. drawing: Z 41600660

59601250		385.04.6	
Ident. No.	Semi finished product / raw material	Semi fin. Ident. No.	Item
Modification		Code surface and heat treatment	Draw / Mod.
KA No.	76202	Draw Ver.	6+
KA Date	2002-10-18	Model Ver.	Z5
Group: SAFETY		Remark	Date
Brake Assy. MB940-HYB55		Scale	1:5
FM630 Certification		Replaces / A/E	Prepared 2002-10-17 dommenra
		Page	1/1
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INVENTIO AG CH-6052 Hergiswil		Classification	11120
		Lead Office	EB6
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