TYPE-EXAMINATION REPORT

Report No. 2012AF0740

Page 1 of 7

Product category Safety protection devices of lifts

Product name Lift traction machine

Model/Type WSH1

Client Shenyang Bluelight Drive Technology Co., Ltd.

Manufacturer Shenyang Bluelight Drive Technology Co., Ltd.

SHENZHEN INSTITUTE OF SPECIAL EQUIPMENT INSPECTION AND
GUANGDONG STATION OF ELEVATOR QUALITY SUPERVISION

Explanation

1. The Laboratory is a legal inspection body for elevator type examinations authorized by General Administration of Quality Supervision, Inspection and Quarantine of the People's Republic of China, with certificate number TS7610038-2011.

2. The Laboratory has obtained the authorization from the China National Accreditation Service for Conformity Assessment (CNAS), with the certificate number L0916.

3. The report, if without the appropriative seal for inspection stamped by the Laboratory, shall be invalid.

4. The report, if without the signatures by specific inspector(s), reviser(s) and approver(s), shall be invalid.

5. Any incomplete copy of the report shall be invalid.

6. Any altered version of the report shall be invalid.

7. The inspection department and the inspector(s) shall undertake the responsibility for the inspection results concerning the regulated items.

8. The inspection results shall only apply to the inspected samples.

- Honggang Home Office

  Name & Address: Shenzhen Institute of Special Equipment Inspection and Test Tailao Building No. 1032 Honggang Road Luohu District Shenzhen China

- Elevator Component Laboratory

  Name & Address: Luohu Branch Office of Shenzhen Institute of Special Equipment Inspection and Test

  No. 6 Chunwang Road Qiaoxiang Industrial Area East Side to Dabe Road Luohu District Shenzhen China

  (Enter from the crossing of the Weixing Road at the south of the Dynamic)

  Post Code: 518109 Tel: 0755-28079351 Fax: 0755-28079349

  Website: www.sise.org.cn

  E-mail: szmtl@sise.org.cn

TYPE-EXAMINATION REPORT

Product	Lift traction machine		
Type code	WYT–H	Sample No.	20120637
Product No.	/	Date of manufacture	/
General technical data	Maximum rated speed	8.0 m/s	
	Maximum rated load	16000kg	
Client	Name	Shenyang Bluelight Drive Technology Co.,Ltd.	
	Address	No.37 Shiji Road,Hunnan New District,Shenyang,China	
Manufacturer	Name	Shenyang Bluelight Drive Technology Co.,Ltd.	
	Address	No.37 Shiji Road,Hunnan New Distrct,Shenyang,China	
Sample condition	Normal		
Place of inspection	Jiangsu Alpha Lift Co.,Ltd.		
Date of inspection	2012/12/21	Type of inspection	Type-Examination
Condition of inspection	Ambient temperature 8.8℃ Humidity 44% Voltage 407V	Inspection item	All suitable item
Standard for inspection	TSG T7001-2005 Regulation for Type Tests of Elevators GB7588-2003 Safety rules for the construction and installation of electric lifts (eqv. EN81-1:1998)		

By the Type-Examination, the product is confirmed to be in accordance with TSG T7001-2005 Regulation for Type Tests of Elevators & GB7588-2003 Safety rules for the construction and installation of electric lifts (eqv. EN81-1:1998).

Conclusion

Date: December 26th, 2012

Date of issue

Approved by

Reviewed by

Inspected by

SHENZHEN INSTITUTE OF SPECIAL EQUIPMENT INSPECTION AND TEST

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TYPE EXAMINATION REPORT

Report No.[illegible]

Page [illegible]

1. General technical data table

Type code	WYT-H	Apply the environment	Indoor
Rated speed	[illegible]	Rated output torque	3625 N·m
Product No.	/	Date of manufacture	/
Construction pattern	Gearless	Traction ratio	1:1
Rated load	1600 kg	Hand winding device	With
Allowable radial load of the traction sheave shaft	35000kg		

Type code	WYT–H8.0E1	Product No.	/
Rated power	[illegible]kW	Rated rotate speed	215rpm
Rated voltage	380V	Rated current	17[illegible].7A
No-load current	6A	Overload protective device	thermistor
Rated frequency	[illegible]53.8Hz	Working frequency	/
Carrier frequency	/	Insulation class	F
Protection class	IP41	Construction style	Outer rotor
Working form	S5	Frequency of starter	240/h
Manufacturer	Shenyang Bluelight Drive Technology Co., Ltd.		

Reduction device	Reduction style	/	Reduction ratio	/
	Construction	/	Lubricating Oil	/
	Reduce level	/	Width between centres	/

Traction sheave	Groove quantity	16	Shape of groove	R s
	Hoist ropes diameter	[illegible]	Driving sheave pitch diameter	[illegible]
	Hardness of the surface	HB 240-276	Heat treatment requirements	
	Round the rope method	Double wrap		

motor shaft	Type code	EC-4026Er-100	Function position
Service Brake	Insulation class	F	Brake drum diameter
DC40V	Activate voltage	DC90V	Maintain voltage
[illegible]	Variable speed system	Variable voltage variable frequency control	
Driving system	Control	Frequency converter	
	Speed feedback	Rotary encoder	

2、Item Description and Inspection Result

No	Items	Technical requirements	Test results	Comment
2	fixing condition	1.2 Assembly adjustment	Each component should be correctly adjusted and fixed. Movable parts can be turned flexibly. Each adjustment device can be reliably locked up.	meet the requirements	pass
3		1.3 Notices and markings	Brake releasing spanner should be painted red. Detachable parts and hand wheels should be painted yellow.	meet the requirements	pass
4		2.1 Rope diameter ratio	The pitch circle diameter of the traction sheave should not be less than 40 times of the diameter of the traction rope.	44	pass
		2.2 Pulley / alley	Ductile cast iron should be adopted, of which the abrasion resistance should not be [illegible]	[illegible]	meet the

		3.3 Connection of the components braked	The component on which the brake operates shall be coupled to the traction sheave, drum or sprocket by direct and positive mechanical connection. Band brakes shall not be used.	meet the requirements	pass
	14	3.4 Pressure on the brake shoe	The brake shoe or pad pressure shall be exerted by guided compression springs or weights.	meet the requirements	Pass
	15	3.5 Working state	To hold off the brake a continuous power current is required in normal operation.	meet the requirements	Pass
	16	3.6 Starting and release voltages	Respectively, the minimum starting voltage of the brake should not exceed 80% of the rated voltage of the solenoid.	DC 48V	Pass
	17		Respectively, the maximum release voltage should not exceed 55% of the rated voltage of the solenoid.	DC 36V	Pass
	18		The delayed time of the operation of the brake should not exceed 0.5s.	0.5s	Pass
	19	3.7 Pressure resistance	Tests should be conducted for the pressure resistance of the brake coil. The voltage upon the earth is 1000V, and during min, no puncture should occur.	meet the requirements	Pass
	20	3.8 Brake setting	All the mechanical components of the brake which take part in the application of the braking action on the drum or disk shall be installed in two sets.	meet the requirement	pass
	21	4 Manual emergency operation devices	If the manual effort required to move the car in the upward direction with its rated load does not exceed 400N the machine shall be provided with a manual means of emergency operation allowing the	meet the requirement	pass
	22		Measures should be taken to prevent the wire rope from getting off the groove in case of loosing		pass

				When necessary, tests may be conducted for the overall efficiency
/	/	34	10 Overall efficiency	The results should be determined by the efficiency indication given by the applicant.
				For outdoor elevators, appropriate measures should be adopt
ce /	/	35	11 Requirements under special circumstances	which are fit for the operating circumstances and in accordan with the project requirements.
uld he / on	/	36		For explosion-proof elevators, relevant protection measures sho be adopted and a risk evaluation should be conducted to verify safety of the product performance under explosion-protect circumstance.

TYPE-EXAMINATION CERTIFICATE

Certificate No: TS7610038-2012 0657 **Page 1 of 2**

Product & type: Lift gearless traction machine, WYT－H

Name and address of certificate Holder: Shenyang Bluelight Drive Technology Co.,Ltd.

No.37 Shiji Road,Hunnan New Distrct,Shenyang,China

Manufacturer's name & address: Shenyang Bluelight Drive Technology Co.,Ltd.

No.37 Shiji Road,Hunnan New Distrct,Shenyang,China

Date of Submission for Type-Examination: 2012-12

Test Laboratory: Jiangsu Alpha Lift Co.,Ltd

Date of Inspection: 2012-12-21

The following documents, bearing the type-examination number shown above, are annexed to this certificate: Inspection report No.2012EH0046

And additional information: see the appendix TS7610038-2012 0657.

This certificate covers the following different sizes products of the same type mentioned above.

For the product type WYT－H of the traction machine whose motor rated power ≤81.7kW and line speed of the traction sheave ≤8.0m/s.

Certificate issued on the basis of the following requirement:

TSG T7001-2005 Regulation for Type Tests of Elevators

GB7588-2003 Safety rules for the construction and installation of electric lifts (eqv EN81-1:1998)

By the Type-Examination, the product is confirmed to be in accordance with TSG T7001-2005 Regulation for Type Tests of Elevators & GB7588-2003 "Safety rules for the construction and installation of electric lifts（eqv EN81-1:1998）.

The approved body address : 1032 Honggang Road,Luohu District,Shenzhen,China

Date of issued: December 26th,2012

SHENZHEN INSTITUTE OF SPECIAL EQUIPMENT INSPECTION AND TEST

GUANGDONG STATION OF ELEVATOR QUALITY SUPERVISION AND TEST

(stamp)

Product configuration table

Product type	WYT–H	Environment applied to	Indoor		
Max. rated power（kW）	81.7	Max. line speed of the traction sheave（m/s）	8.0		
Construction pattern	AC Permanent-magnet synchronous without reduction device				
Motor	Construction pattern	AC three-phase outer-rotor motor	Brake	Construction pattern	Electromagnetic disc type
	Height of the centre（mm）	595		Function position	Motor shaft
Reduction device	Reduction style	/	Traction sheave	Supporting style	Two-side support
	Width between centres（mm）	/		Shape of groove	R shape
	Reduce level	/		Method of wrapping rope	Double wrap

Covering principle of lift traction machine:

For the same type-series to the test traction machine, the certificate covers products whose motor rated power and line speed of the traction sheave are no more than the test sample. The client should list parameters of all covered products when submission. "The same type-series" means: the whole construction pattern, style and width between centres of the reduction box, construction pattern of the motor and brake are the same.

Lift rated speed and Lift rated load are determined by the following formula:

Lift rated speed = Line speed of the traction sheave / Traction rate

Lift rated load = Rated load of the traction machine * Traction rate