



CB TEST CERTIFICATE

Ref. Certificate No.

14360/M1

IEC SYSTEM FOR MUTUAL RECOGNITION OF TEST CERTIFICATES FOR ELECTRICAL EQUIPMENT (IECEE) CB SCHEME

Issued by:	KEMA Quality B.V.		
Product:	Moulded case circuit-breaker		
Applicant:	Hyundai Heavy Industries Co. Ltd.	1, Jeonha-Dong, Dong-Ku, 682-792 Ulsan,	Korea, Republic of
Manufacturer:	Hyundai Heavy Industries Co. Ltd.	1, Jeonha-Dong, Dong-Ku, 682-792 Ulsan,	Korea, Republic of
Factory:	Hyundai Heavy Industries Co. Ltd.	1, Jeonha-Dong, Dong-Ku, 682-792 Ulsan,	Korea, Republic of
Rating and principal characteristics:	<p>3 pole MCCB (thermal magnetic) $U_{imp} = 8 \text{ kV}$ $U_i = 750 \text{ Vac}$ $U_e = 440 \text{ Vac}$ $I_n = 250 \text{ A}, 225 \text{ A}, 200 \text{ A}, 175 \text{ A}, 150 \text{ A}, 125 \text{ A}$ (UPB 250 series) $I_n = 160, 125 \text{ A}, 100 \text{ A}$ (UPB 160 series) $I_n = 125 \text{ A}, 100 \text{ A}, 80 \text{ A}, 63 \text{ A}, 50 \text{ A}, 40 \text{ A}$ (UPB 100 series) $I_{cs} = I_{cu} = 150 \text{ kA}$ at 440 V (type X), 100 kA at 440 V (type L), 85 kA at 440 V (type H), 65 kA at 440 V (type S) Rated frequency = 50/60 Hz</p>		
Trade mark (if any):	HYUNDAI		
Model/Type reference:	UPB 250 X / L / H / S, UPB 160 X / L / H / S, UPB 100 X / L / H / S		
Additional information:	<p>Shunt, uvt and auxiliary switch included. This certificate is re-issued due to addition of lower current ratings on UPB 100 series.</p>		
Sample of product tested to be in conformity with IEC:	60947-2(ed.4)		
Test Report Ref. No:	2126941.51 and 2109600.51 (dated June 2008)		

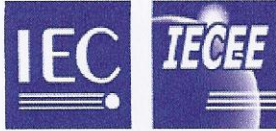
This CB Test Certificate is issued by the National Certification Body:

KEMA Quality B.V.
 Utrechtseweg 310
 P.O. Box 5185
 6802 ED Arnhem
 The Netherlands



Signed by: H.R.M. Barends

Date of issue: 2010-02-08



Test Report issued under the responsibility of:



**TEST REPORT
IEC/EN 60947-2
Low-voltage switchgear and controlgear - Part 2: Circuit-breakers**

Report Reference No......: 2126941.51
Date of issue.....: 2010-02-08
Total number of pages 12

CB/CCA Testing Laboratory.....: KEMA Quality B.V.
Address: Utrechtseweg 310, 6812 AR Arnhem, The Netherlands

Applicant's name.....: Hyundai Heavy Industries Co. Ltd.
Address: 1, Jeonha-Dong, Dong-Ku, Ulsan, Korea, 682-792

Test specification:

Standard: IEC 60 947-2:2006 (4th Edition) and/or
 EN 60 947-2:2006 (4th Edition)
Test procedure: CB / CCA
Non-standard test method.....: N/A

Test Report Form No......: IECEN60947_2A
Test Report Form(s) Originator: KEMA
Master TRF: Dated 2007-04

Copyright © 2007 IEC System for Conformity Testing and Certification of Electrical Equipment (IECEE), Geneva, Switzerland. All rights reserved.

This publication may be reproduced in whole or in part for non-commercial purposes as long as the IECEE is acknowledged as copyright owner and source of the material. IECEE takes no responsibility for and will not assume liability for damages resulting from the reader's interpretation of the reproduced material due to its placement and context.

If this Test Report Form is used by non-IECEE members, the IECEE/IEC logo and the reference to the CB Scheme procedure shall be removed.

This report is not valid as a CB Test Report unless signed by an approved CB Testing Laboratory and appended to a CB Test Certificate issued by an NCB in accordance with IECEE 02.

If this Test Report Form is used by non-CCA members, the CIG logo and the reference to the CCA Procedure shall be removed.

This report is not valid as a CCA Test Report unless signed by an approved CCA Testing Laboratory and appended to a CCA Test Certificate issued by an NCB in accordance with CCA

Test item description

Trade Mark: Hyundai
Manufacturer: Hyundai Heavy Industries Co. Ltd.
Model/Type reference.....: UBP 100 X/S/H/L, UBP 160 X/S/H/L, UBP 250 X/S/H/L
Ratings: In = 250 A, 225 A, 200 A, 175 A, 150 A, 125 A (UPB 250 series)
In = 160, 125 A, 100 A (UPB 160 series)
In = 125 A, 100 A, 80 A, 63 A, 50 A, 40 A (UPB 100 series)



Test Report issued under the responsibility of:



TEST REPORT
IEC/EN 60947-2
Low-voltage switchgear and controlgear - Part 2: Circuit-breakers

Report Reference No.: 2109600.51
Date of issue: 2008-06-26
Total number of pages: 49

CB/CCA Testing Laboratory: KEMA Quality B.V.
Address: Utrechtseweg 310, 6812 AR Arnhem, The Netherlands

Applicant's name: Hyundai Heavy Industries Co. Ltd.
Address: 1, Jeonha-Dong, Dong-Ku, Ulsan, Korea, 682-792

Test specification:

Standard: IEC 60 947-2:2006 (4th Edition) and/or
 EN 60 947-2:2006 (4th Edition)
Test procedure: CB / CCA
Non-standard test method: N/A

Test Report Form No.: IECEN60947_2A
Test Report Form(s) Originator: KEMA
Master TRF: Dated 2007-04

Copyright © 2007 IEC System for Conformity Testing and Certification of Electrical Equipment (IECEE), Geneva, Switzerland. All rights reserved.

This publication may be reproduced in whole or in part for non-commercial purposes as long as the IECEE is acknowledged as copyright owner and source of the material. IECEE takes no responsibility for and will not assume liability for damages resulting from the reader's interpretation of the reproduced material due to its placement and context.

If this Test Report Form is used by non-IECEE members, the IECEE/IEC logo and the reference to the CB Scheme procedure shall be removed.

This report is not valid as a CB Test Report unless signed by an approved CB Testing Laboratory and appended to a CB Test Certificate issued by an NCB in accordance with IECEE 02.

If this Test Report Form is used by non-CCA members, the CIG logo and the reference to the CCA Procedure shall be removed.

This report is not valid as a CCA Test Report unless signed by an approved CCA Testing Laboratory and appended to a CCA Test Certificate issued by an NCB in accordance with CCA

Test item description..... :

Trade Mark: Hyundai
Manufacturer: Hyundai Heavy Industries Co. Ltd.
Model/Type reference: UBP 100 X/S/H/L, UBP 160 X/S/H/L, UBP 250 X/S/H/L
Ratings: In = 250 A, 225 A, 200 A, 175 A, 150 A, 125 A (UPB 250 series)
In = 160, 125 A, 100 A (UPB 160 series)
In = 125 A, 100 A, 80 A (UPB 100 series)



CB TEST CERTIFICATE

Ref. Certificate No.

NL-16726

IEC SYSTEM FOR MUTUAL RECOGNITION OF TEST CERTIFICATES FOR ELECTRICAL EQUIPMENT (IECEE) CB SCHEME

Issued by:	KEMA Quality B.V.		
Product:	Moulded case circuit-breaker		
Applicant:	Hyundai Heavy Industries Co. Ltd.	1, Jeonha-Dong, Dong-Ku, 682-792 Ulsan,	Korea, Republic of
Manufacturer:	Hyundai Heavy Industries Co. Ltd.	1, Jeonha-Dong, Dong-Ku, 682-792 Ulsan,	Korea, Republic of
Factory:	Hyundai Heavy Industries Co. Ltd.	1, Jeonha-Dong, Dong-Ku, 682-792 Ulsan,	Korea, Republic of
Rating and principal characteristics:	3 pole MCCB (electronic trip unit MOR-25-SO) $U_{imp} = 8 \text{ kV}$ $U_i = 750 \text{ Vac}$ $U_e = 440 \text{ Vac}$ $I_n = 250 \text{ A}, 160 \text{ A}, 100 \text{ A}$ (respectively UPB 250 X/L/H/S, UPB 160 X/L/H/S, UPB 100 X/L/H/S) $I_{cs} = I_{cu} = 150 \text{ kA}$ at 440 V (type X), 100kA at 440 V (Type L), 85kA at 440 V (type H), 65kA at 440 V (type S) Rated frequency = 50/60 Hz		
Trade mark (if any):	HYUNDAI		
Model/Type reference:	UPB 250 X/L/H/S, UPB 160 X/L/H/S, UPB 100 X/L/H/S with trip unit MOR-25-SO		
Additional information:	including shunt and auxiliary switch		
Sample of product tested to be in conformity with IEC:	60947-2(ed.4)		
Test Report Ref. No:	2125119.50		

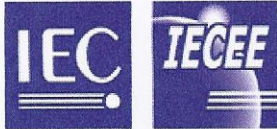
This CB Test Certificate is issued by the National Certification Body:

KEMA Quality B.V.
 Utrechtseweg 310
 P.O. Box 5185
 6802 ED Arnhem
 The Netherlands



Signed by: F.S.Strikwerda

Date of issue: 2009-08-28



Test Report issued under the responsibility of:



**TEST REPORT
IEC/EN 60947-2
Low-voltage switchgear and controlgear - Part 2: Circuit-breakers**

Report Reference No.: 2125119.50
Date of issue: 2009-08-21
Total number of pages: 59

CB/CCA Testing Laboratory.....: KEMA Quality B.V.
Address: Utrechtseweg 310, 6812 AR Arnhem, The Netherlands

Applicant's name.....: Hyundai Heavy Industries Co. Ltd.
Address: 1, Jeonha-Dong, Dong-Ku, Ulsan, Korea, 682-792

Test specification:

Standard: IEC 60 947-2:2006 (4th Edition) and/or
 EN 60 947-2:2006 (4th Edition)
Test procedure: CB / CCA
Non-standard test method.....: N/A

Test Report Form No.: IECEN60947_2A
Test Report Form(s) Originator.....: KEMA
Master TRF: Dated 2007-04

Copyright © 2007 IEC System for Conformity Testing and Certification of Electrical Equipment (IECEE), Geneva, Switzerland. All rights reserved.

This publication may be reproduced in whole or in part for non-commercial purposes as long as the IECEE is acknowledged as copyright owner and source of the material. IECEE takes no responsibility for and will not assume liability for damages resulting from the reader's interpretation of the reproduced material due to its placement and context.

If this Test Report Form is used by non-IECEE members, the IECEE/IEC logo and the reference to the CB Scheme procedure shall be removed.

This report is not valid as a CB Test Report unless signed by an approved CB Testing Laboratory and appended to a CB Test Certificate issued by an NCB in accordance with IECEE 02.

If this Test Report Form is used by non-CCA members, the CIG logo and the reference to the CCA Procedure shall be removed.

This report is not valid as a CCA Test Report unless signed by an approved CCA Testing Laboratory and appended to a CCA Test Certificate issued by an NCB in accordance with CCA

Test item description

Trade Mark: Hyundai
Manufacturer: Hyundai Heavy Industries Co. Ltd.
Model/Type reference: UPB 100 X/L/H/S, UPB 160 X/L/H/S, UPB 250 X/L/H/S with electronic trip unit MOR-25-SO
Ratings: In = 100 A, 160 A, 250 A