

Tobie Burr

From: us.tech.support <us.tech.support.3y@hirose-gl.com>
Sent: Tuesday, December 7, 2021 5:16 PM
To: Tobie Burr
Subject: RE: HT-102 (150-0229-6) question
Attachments: HR30-SC-211_crimp condition UL1571.pdf; HR30-PC-211_crimp condition UL1571.pdf; HR30 Crimp Quality Standards.pdf

Hi Tobie,

Attached are the Crimp Quality Standard and Crimp conditions.

Please let me know if I can be of further assistance.

Rachelle Sheffer
Senior Technical Support Engineer



www.hirose.com

2300 Warrenville Rd. • Suite 150 • Downers Grove • Illinois 60515

O: 630-599-7268 • *new email* us.tech.support.3y@hirose-gl.com

From: Tobie Burr <tobieb@tescomusa.com>
Sent: Tuesday, December 7, 2021 7:35 AM
To: us.tech.support <us.tech.support.3y@hirose-gl.com>
Subject: RE: HT-102 (150-0229-6) question

Hello,

Unfortunately, we are not the end user. A customer sends their crimper in for us to verify. I am attempting to do a little research before the next verification so we can provide a better service for them. I thought you might be able to help since it appears it is designed to work with a specific male/female contact (HR30-PC-111/HR30-SC-111).

Tobie Burr

TesCom Corporate Quality Specialist
(Direct) 512.655.6663
(Calibration Support) 512.244.6689 Option 2

ISO/IEC 17025:2005 and ANSI/NCSL Z540-1-1994 | Certificate Number AC-1417

Accredited Certificate <https://tescomcalibration.com/wp-content/uploads/2019/10/TesComCert.pdf>

Locations:

2600 Longhorn Blvd. Suite 112 Austin, TX 78758 | **Calibration**

903 EAST NAKOMA Suite 105 SAN ANTONIO, TX 78216 | **Calibration**

1315 Sunday Drive, Indianapolis IN 46217 **Billing Address**

(Technical Support) 512.244.6689 Option 3

(General Information) <https://tescomcalibration.com>

From: us.tech.support [<mailto:us.tech.support.3y@hirose-gl.com>]
Sent: Monday, December 6, 2021 5:04 PM
To: Tobie Burr <tobieb@tescomusa.com>
Subject: RE: HT-102 (150-0229-6) question

Hi Tobie,

Which contact are you crimping?

Rachelle Sheffer
Senior Technical Support Engineer



www.hirose.com
2300 Warrenville Rd. • Suite 150 • Downers Grove • Illinois 60515
O: 630-599-7268 • *new email* us.tech.support.3y@hirose-gl.com

From: Tobie Burr <tobieb@tescomusa.com>
Sent: Monday, December 6, 2021 8:32 AM
To: us.tech.support <us.tech.support.3y@hirose-gl.com>
Subject: HT-102 (150-0229-6) question

Hello,

I am looking for specifications related to HT-102 (150-0229-6) and ensuring a proper crimp has been done. Is there a document which shows a go/no-go dimension or pull force that should be achieved?

Tobie Burr

TesCom Corporate Quality Specialist
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				TAD No.	TAD-P-0506	No.	P 1	版数	Edition	Ver. 2	
圧着条件表 CRIMP CONDITION (圧着機用 Automatic crimping machine use)								管理番号 Re:111784-11 作成年月 Date:2017/03/10 承認 Approved:T.ITO			
下記端子に圧着使用される指定の電線は所定の圧着性能を得る為に、弊社純正アプリーカーにおいて下表の通りに設定し管理願います。 Please make sure that the wire you will be crimping to our crimp contacts will have the value established and controlled per the table below in order to secure the specified crimp performance in our genuine applicator.											
適用端子品名 Applicable contact Part number				適用電線 Applicable wire							
				AWG Size		計算断面積 (mm ²) Sec area (mm ²)		被覆外径 (mm) Insulation OD (mm)		その他 Others	
HR30-PC-211 CL130-0016-0				26 ~ 30		0.141 ~ 0.057		—		—	
No.	電線 Wire			芯線側クリップハイト (mm) Conductor side(mm)		被覆側クリップハイト (mm) Insulator side(mm) ()は参考値 ()Reference		引っ張り強度 Crimp barrel tensile strength		備考 Remarks	
	電線名 UL Style	仕様 Specification									
1	UL1571 撚り線 Stranded wire	AWG Size	26	0.52 ~ 0.58		0.85 ~ 1.00		16.6N			
		芯線構成 Construction	7/0.16 mm								
		計算断面積 Sec area	0.141mm ²								
		被覆外径 Insulator OD	— mm								
2	UL1571 撚り線 Stranded wire	AWG Size	28	0.48 ~ 0.54		0.85 ~ 1.00		10.4N			
		芯線構成 Construction	7/0.127 mm								
		計算断面積 Sec area	0.085mm ²								
		被覆外径 Insulator OD	— mm								
3	UL1571 撚り線 Stranded wire	AWG Size	30	0.46 ~ 0.52		0.80 ~ 0.95		6.5N			
		芯線構成 Construction	7/0.102 mm								
		計算断面積 Sec area	0.057mm ²								
		被覆外径 Insulator OD	— mm								
注意 Caution 1. 本圧着条件表の設定値は、弊社純正アプリーカー用の設定値となります。アプリーカーは部品に割れ、欠け等の明らかな破損が無い状態で使用してください。 Standards of the crimp condition are for our genuine applicator. Please use the applicator for parts in a state without the clear damage such as breaking or the miss. 2. クリップハイト設定値を外れた場合は品質上の重大な事故となる可能性が有ります。クリップハイトは品質を決める重要な要点の一つです。 Controlling the crimp height is an important task to decide the quality of the crimping. It may lead to a serious quality problem if the crimp height is not properly established. 3. クリップハイトの調整方法及び測定方法は、取扱説明書を参照して下さい。尚、被覆側のクリップハイトは、電線メーカー、ロットの違い等により特定出来ない場合があります。 Please refer to an instruction manual for the method of adjustment and measurement of the crimp height. The crimp height shown on the wire insulators will ,in many case, be for reference only as they will differ per each cable manufacturer and the production volume. 4. 引っ張り強度の条件は、芯線部加締めのみでの設定値であり、被覆部の加締めは含んでおりません。 Conditions of the tensile strength are a standard in the case of crimped the conductor only, it does not include the insulation. 5. 弊社では、芯線側クリップハイトの最適値を精度よく設定する為に電線毎に試験を実施してクリップハイトの設定をする事を原則としています。上記以外の新たな電線のクリップハイトの設定値につきましては、弊社生産技術部又は技術本部までご連絡下さい。 Hirose's internal rule is to establish a crimp height by performing a crimp testing on every wire in order to provide a precise crimp height strictly. As such, it is recommended that our engineers are consulted, if any other wires are to be used besides these.											

圧着条件表 CRIMP CONDITION

(圧着機用 Automatic crimping machine use)

管理番号 Re:111785-8-11

作成年月 Date: 28.8.2001

承認 Approved: *H. Taniyama*

当社の下記端子に圧着使用される指定の電線は所定の圧着性能を得る為に、クリンプハイトを下表の通りに設定し管理願います。

Please make sure that the wire you will be crimping to our crimp contacts will have the crimp height established and controlled per the table below in order to secure the specified crimp performance.

適用端子品名 Applicable contact Part number				適用電線 Applicable wire			
				AWG Size	計算断面積 (mm ²) Sec area (mm ²)	被覆外径 (mm) Insulation OD (mm)	その他 Others
HR30-SC-211 CL130-0017-3				26 ~ 30	0.057 ~ 0.141	φ1 以下	
No.	電線 Wire			芯線側クリンプハイト (mm) Conductor side(mm)	被覆w側クリンプハイト (mm) Insulator side(mm) ()は参考値 ()Reference	引っ張り強度 Crimp barrel tensile strength	備考 Remarks
	電線名 UL Style	仕様 Specification					
1	UL1571 撚り線 Stranded wire	AWG Size	26	0.52 ~ 0.58	0.85 ~ 1.00	16.6N	Snメッキ軟銅線 Tin plated annealed copper wire
		芯線構成 Construction	7本/φ0.16mm				
		計算断面積 Sec area	0.141mm ²				
		被覆外径 Insulator OD	φ0.97 mm				
2	UL1571 撚り線 Stranded wire	AWG Size	28	0.48 ~ 0.54	0.85 ~ 1.00	10.4N	Snメッキ軟銅線 Tin plated annealed copper wire
		芯線構成 Construction	7本/φ0.124mm				
		計算断面積 Sec area	0.085mm ²				
		被覆外径 Insulator OD	φ0.88 mm				
3	UL1571 撚り線 Stranded wire	AWG Size	30	0.46 ~ 0.52	0.80 ~ 0.95	6.5N	Snメッキ軟銅線 Tin plated annealed copper wire
		芯線構成 Construction	7本/φ0.102mm				
		計算断面積 Sec area	0.057mm ²				
		被覆外径 Insulator OD	φ0.7 mm				
4							

注意 Caution

1. クリンプハイト設定値を外れた場合は品質上の重大な事故となる可能性があります。クリンプハイトは品質を決める重要な要点の一つです。

Controlling the crimp height is an important task to decide the quality of the crimping. It may lead to a serious quality problem if the crimp height is not properly established.

2. クリンプハイトの調整方法及び測定方法は、取扱説明書を参照して下さい。尚、被覆側のクリンプハイトは、電線メーカー、ロットの違い等により特定出来ない場合があります。

Please refer to an instruction manual for the method of adjustment and measurement of the crimp height. The crimp height shown on the wire insulators will, in many case, be for reference only as they will differ per each cable manufacturer and the production volume.

3. 弊社では、芯線側クリンプハイトの最適値を精度よく設定する為に電線毎に試験を実施してクリンプハイトの設定をする事を原則としています。上記以外の新たな電線のクリンプハイトの設定値につきましては、弊社生産技術部又は技術本部までご連絡下さい。

Hirose's internal rule is to establish a crimp height by performing a crimp testing on every wire in order to provide a precise crimp height strictly. As such, it is recommended that our engineers are consulted, if any other wires are to be used besides these.

ヒロセ電機株式会社 生産技術部

Production Engineering Department Hirose Electric Co., Ltd.

CRIMP CONTACT : CRIMP QUALITY STANDARD					
PART NO.		CODE NO.		PART NO.	
HR30-PC-211		130-0016-0-00		HR30-PC-111	
HR30-SC-211		130-0017-3-00		HR30-SC-111	
				CODE NO.	
				130-0022-3-00	
				130-0023-6-00	

A-A (Crimp-Contact cross-section image)
: where the jacket is removed.

CHECK POINT		MEASURE (mm)	REMARKS
COVER LOCATION.	C	0. 2~0. 5	
LOCATION OF TIP OF THE CORE.	D	0. 2~0. 8	
BELL-MOUTH.	E	0. 2~0. 5	
BENT-UP.	F	2°MAX	
BENT-DOWN.	G	2°MAX	
TWIST.	H	± 2°MAX	
ROLLING.	I	± 5°MAX	
CUT-OFF TAB.	J	0. 1MAX	
STRIP LENGTH.	K	1. 5~2. 0	Strip length prior to crimping.
HEIGHT OF METAL CUT-OUT TEETH.	L	0. 1MAX	

NOTE 1 To adjust applicator. please check the crimp condition (crimp height and configuration) by using cable.

COUNT	DESCRIPTION OF REVISIONS	DESIGNED	CHECKED	DATE
△				

TITLE		HRS HIROSE ELECTRIC CO., LTD.		
HR30- * C - * * * CRIMP QUALITY STANDARD		APPROVED	HY. KOBAYASHI	20181214
		CHECKED	HY. KOBAYASHI	20181214
		CHARGED	HY. KISHI	20181214
		WRITTEN	HY. KISHI	20181214
TECHNICAL SPECIFICATION		ETAD-C0365-00 △		