



本社：〒160-8366


東京都新宿区西新宿 6 丁目 24 番 1 号

西新宿三井ビルディング

報告書番号：PCN#20080616003A

2008 年 8 月 7 日

お客様各位

日本テキサス・インスツルメンツ株式会社  
営業・技術本部 ビジネスオペレーションズ部  
カスタマドキュメント マネージャ 牧 達郎 

データシート訂正 (SN65LBC174Axx/172Axx製品)のご案内

拝啓 貴社益々ご清栄の事とお喜び申し上げます。平素は弊社製品のご愛顧を賜り、厚く御礼申し上げます。さて、標題の件につきまして下記にご連絡させていただきます。ご査収の程、宜しくお願い申し上げます。

敬具

## － 記 －

通知タイプ	<input type="checkbox"/> Initial notice (Plan)		<input checked="" type="checkbox"/> Final notice		
変更概要	<input checked="" type="checkbox"/> Design/Specification		<input type="checkbox"/> Design	<input checked="" type="checkbox"/> Electrical	<input type="checkbox"/> Mechanical
	Wafer Fab		<input type="checkbox"/> Site	<input type="checkbox"/> Process	<input type="checkbox"/> Material
	Wafer Bump		<input type="checkbox"/> Site	<input type="checkbox"/> Process	<input type="checkbox"/> Material
	Assembly		<input type="checkbox"/> Site	<input type="checkbox"/> Process	<input type="checkbox"/> Material
	Test		<input type="checkbox"/> Site	<input type="checkbox"/> Process	
	Others		<input type="checkbox"/> Packing/Shipping/Labeling <input type="checkbox"/> -		
変更内容	データシート “FEATURES”, “Absolute maximum ratings”項 記載訂正 現行 : “Human body model Y, Z, and GND” 上限値 記載 変更後: “Human body model Y, Z, and GND” 上限値 記載更新				
対象製品	対象製品リスト参照				
変更時期	7 月上旬に実施いたしました。				
品質認定試験	<input type="checkbox"/> 計画		<input type="checkbox"/> 終了		
製品表示	<input checked="" type="checkbox"/> 変更無し		<input type="checkbox"/> 変更あり		
備考	—				

尚、ご不明な点、ご質問等がございましたら、担当営業或いは[pcn\\_tij@list.ti.com](mailto:pcn_tij@list.ti.com)にお問い合わせ下さい。

以上

## 変更内容

内容：今回のお知らせは、通知のみを目的としたものになります。

今回のお知らせは、発行済みのデータシートに訂正箇所がありその訂正をお知らせするものです。弊社 HPA (ハイパフォーマンスアナログ) "SN65LBC174Axx/172Axx"製品について、製品自身の変更はありませんが、製品特性をより反映する為にデータシート Page1記載 "FEATURES"及びPage3記載 "Absolute maximum ratings"項の"Human body model Y, Z, and GND"上限値の記載更新を実施しました。更新済のデータシートについては、下記webを参照ください。尚、今回の変更で、製品についての互換性(寸法/交差), 外観, 動作特性, 品質, 信頼性への影響はありません。

理由：データシートの訂正の為

## 対象製品リスト

対象製品名				
SN65LBC172A16DW	SN65LBC172ADW	SN65LBC172AN	SN65LBC174A16DWR	SN65LBC174ADWR
SN65LBC172A16DWG4	SN65LBC172ADWG4	SN65LBC172ANE4	SN65LBC174A16DWRG4	SN65LBC174ADWRG4
SN65LBC172A16DWR	SN65LBC172ADWR	SN65LBC174A16DW	SN65LBC174ADW	SN65LBC174AN
SN65LBC172A16DWRG4	SN65LBC172ADWRG4	SN65LBC174A16DWG4	SN65LBC174ADWG4	

詳細：

1. Datasheet# SN65LBC174Axx SLLS446C ⇒ SLLS446E  
<http://focus.ti.com/lit/ds/symlink/sn65lbc174a.pdf>

SN65LBC172Axx SLLS447B ⇒ SLLS447C  
<http://focus.ti.com/lit/ds/symlink/sn65lbc172a.pdf>

## 2. SN65LBC174Axx

## 2-1. "FEATURES"(Page 1):

- Designed for TIA/EIA-485, TIA/EIA-422 and ISO 8482 Applications
- Signaling Rates† up to 30 Mbps
- Propagation Delay Times < 11 ns
- Low Standby Power Consumption 1.5 mA Max
- Output ESD Protection Exceeds 13 kV
- Driver Positive- and Negative-Current Limiting
- Power-Up and Power-Down Glitch-Free for Line Insertion Applications
- Thermal Shutdown Protection
- Industry Standard Pin-Out, Compatible With SN75174, MC3487, DS96174, LTC487, and MAX3042

## FEATURES

- Designed for TIA/EIA-485, TIA/EIA-422 and ISO 8482 Applications
- Signaling Rates <sup>(1)</sup> up to 30 Mbps
- Propagation Delay Times < 11 ns
- Low Standby Power Consumption 1.5-mA Max

(1) The signaling rate of a line is the number of voltage transitions that are made per second expressed in the units bps (bits per second).

- Output ESD Protection: 12 kV
- Driver Positive- and Negative-Current Limiting
- Power-Up and Power-Down Glitch-Free for Line Insertion Applications
- Thermal Shutdown Protection
- Industry Standard Pin-Out, Compatible With SN75174, MC3487, DS96174, LTC487, and MAX3042

## 2-2. "Absolute maximum ratings" (Page 3):

## absolute maximum ratings†

Supply voltage range, $V_{CC}$ (see Note 1)	-0.3 V to 6 V
Voltage range at any bus (DC)	-10 V to 15 V
Voltage range at any bus (transient pulse through 100 $\Omega$ , see Figure 8)	-30 V to 30 V
Input voltage range at any A or EN terminal, $V_I$	-0.5 V to $V_{CC} + 0.5$ V
Electrostatic discharge: Human body model (see Note 2)	Y, Z, and GND 13 kV
	All pins 5 kV
Charged-device model (see Note 3)	All pins 1 kV
Storage temperature range, $T_{stg}$	-65°C to 150°C
Continuous power dissipation	See Dissipation Rating Table
Lead temperature 1,6 mm (1/16 inch) from case for 10 seconds	260°C

† Stresses beyond those listed under "absolute maximum ratings" may cause permanent damage to the device. These are stress ratings only, and functional operation of the device at these or any other conditions beyond those indicated under "recommended operating conditions" is not implied. Exposure to absolute-maximum-rated conditions for extended periods may affect device reliability.

NOTES: 1. All voltage values, except differential I/O bus voltages, are with respect to GND.  
 2. Tested in accordance with JEDEC standard 22, Test Method A114-A.  
 3. Tested in accordance with JEDEC standard 22, Test Method C101.

## ABSOLUTE MAXIMUM RATINGS

over operating free-air temperature range (unless otherwise noted)<sup>(1)</sup>

			UNIT
Supply voltage range, $V_{CC}$ <sup>(2)</sup>			-0.3 V to 6 V
Voltage range at any bus (DC)			-10 V to 15 V
Voltage range at any bus (transient pulse through 100 $\Omega$ , see Figure 8)			-30 V to 30 V
Input voltage range at any A or EN terminal, $V_I$			-0.5 V to $V_{CC} + 0.5$ V
Electrostatic discharge	Human body model <sup>(3)</sup>	Y, Z, and GND	$\pm 12$ kV <sup>†</sup>
		All pins	$\pm 5$ kV
	Charged-device model <sup>(4)</sup>	All pins	$\pm 1$ kV
Storage temperature range, $T_{stg}$			-65°C to 150°C
Continuous power dissipation			See Dissipation Rating Table
Lead temperature 1,6 mm (1/16 inch) from case for 10 seconds			260°C

(1) Stresses beyond those listed under "absolute maximum ratings" may cause permanent damage to the device. These are stress ratings only, and functional operation of the device at these or any other conditions beyond those indicated under "recommended operating conditions" is not implied. Exposure to absolute-maximum-rated conditions for extended periods may affect device reliability.

(2) All voltage values, except differential I/O bus voltages, are with respect to GND.

(3) Tested in accordance with JEDEC standard 22, Test Method A114-A.

(4) Tested in accordance with JEDEC standard 22, Test Method C101.

## 3. SN65LBC172Axx

## 3-1. "FEATURES" (Page 1):

- Designed for TIA/EIA-485, TIA/EIA-422, and ISO 8482 Applications
- Signaling Rates† up to 30 Mbps
- Propagation Delay Times <11 ns
- Low Standby Power Consumption  
1.5 mA Max
- Output ESD Protection Exceeds 13 kV
- Driver Positive- and Negative-Current Limiting
- Power-Up and Power-Down Glitch-Free for Live Insertion Applications
- Thermal Shutdown Protection
- Industry Standard Pin-Out, Compatible With SN75172, AM26LS31, DS96172, LTC486, and MAX3045
- Designed for TIA/EIA-485, TIA/EIA-422, and ISO 8482 Applications
- Signaling Rates† up to 30 Mbps
- Propagation Delay Times <11 ns
- Low Standby Power Consumption  
1.5 mA Max
- Output ESD Protection (12 kV)
- Driver Positive- and Negative-Current Limiting
- Power-Up and Power-Down Glitch-Free for Live Insertion Applications
- Thermal Shutdown Protection
- Industry Standard Pin-Out, Compatible With SN75172, AM26LS31, DS96172, LTC486, and MAX3045

3-2. "Absolute maximum ratings" (Page 3):

**absolute maximum ratings†**

Supply voltage range, $V_{CC}$ (see Note 1)	–0.3 V to 6 V
Output voltage range, $V_O$ , at any bus (steady state)	–10 V to 15 V
Output voltage range, $V_O$ , at any bus (transient pulse through 100 $\Omega$ , see Figure 8)	–30 V to 30 V
Input voltage range, $V_I$ , at any A, G, or $\overline{G}$ terminal	–0.5 V to $V_{CC} + 0.5$ V
Electrostatic discharge: Human body model (see Note 2)	Y, Z, and GND 13 kV
	All pins 5 kV
Charged-device model (see Note 3)	All pins 1 kV
Storage temperature range, $T_{stg}$	–65°C to 150°C
Continuous power dissipation	See Dissipation Rating Table
Lead temperature 1,6 mm (1/16 inch) from case for 10 seconds	260°C

† Stresses beyond those listed under "absolute maximum ratings" may cause permanent damage to the device. These are stress ratings only, and functional operation of the device at these or any other conditions beyond those indicated under "recommended operating conditions" is not implied. Exposure to absolute-maximum-rated conditions for extended periods may affect device reliability.

- NOTES: 1. All voltage values, except differential I/O bus voltages, are with respect to GND.  
2. Tested in accordance with JEDEC standard 22, Test Method A114–A.  
3. Tested in accordance with JEDEC standard 22, Test Method C101.

**absolute maximum ratings†**



Supply voltage range, $V_{CC}$ (see Note 1)	–0.3 V to 6 V
Output voltage range, $V_O$ , at any bus (steady state)	–10 V to 15 V
Output voltage range, $V_O$ , at any bus (transient pulse through 100 $\Omega$ , see Figure 8)	–30 V to 30 V
Input voltage range, $V_I$ , at any A, G, or $\overline{G}$ terminal	–0.5 V to $V_{CC} + 0.5$ V
Electrostatic discharge: Human body model (see Note 2)	Y, Z, and GND 12 kV
	All pins 5 kV
Charged-device model (see Note 3)	All pins 1 kV
Storage temperature range, $T_{stg}$	–65°C to 150°C
Continuous power dissipation	See Dissipation Rating Table
Lead temperature 1,6 mm (1/16 inch) from case for 10 seconds	260°C

† Stresses beyond those listed under "absolute maximum ratings" may cause permanent damage to the device. These are stress ratings only, and functional operation of the device at these or any other conditions beyond those indicated under "recommended operating conditions" is not implied. Exposure to absolute-maximum-rated conditions for extended periods may affect device reliability.

- NOTES: 1. All voltage values, except differential I/O bus voltages, are with respect to GND.  
2. Tested in accordance with JEDEC standard 22, Test Method A114–A.  
3. Tested in accordance with JEDEC standard 22, Test Method C101.