

**DISPLAY Elektronik GmbH**

# DATA SHEET

**BACKLIGHT**

**DE LP-509-A**

*Product Specification*

*Version: 0*

20.10.2016

# GENERAL SPECIFICATION

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MODEL NO. :

**DE LP-509-A**

CUSTOMER P/N

Version No.	Change Description	Date
0	Original Version	20.10.2016

PREPARED BY: ZX

DATE: 20.10.2016

APPROVED BY: MH

DATE: 20.10.2016

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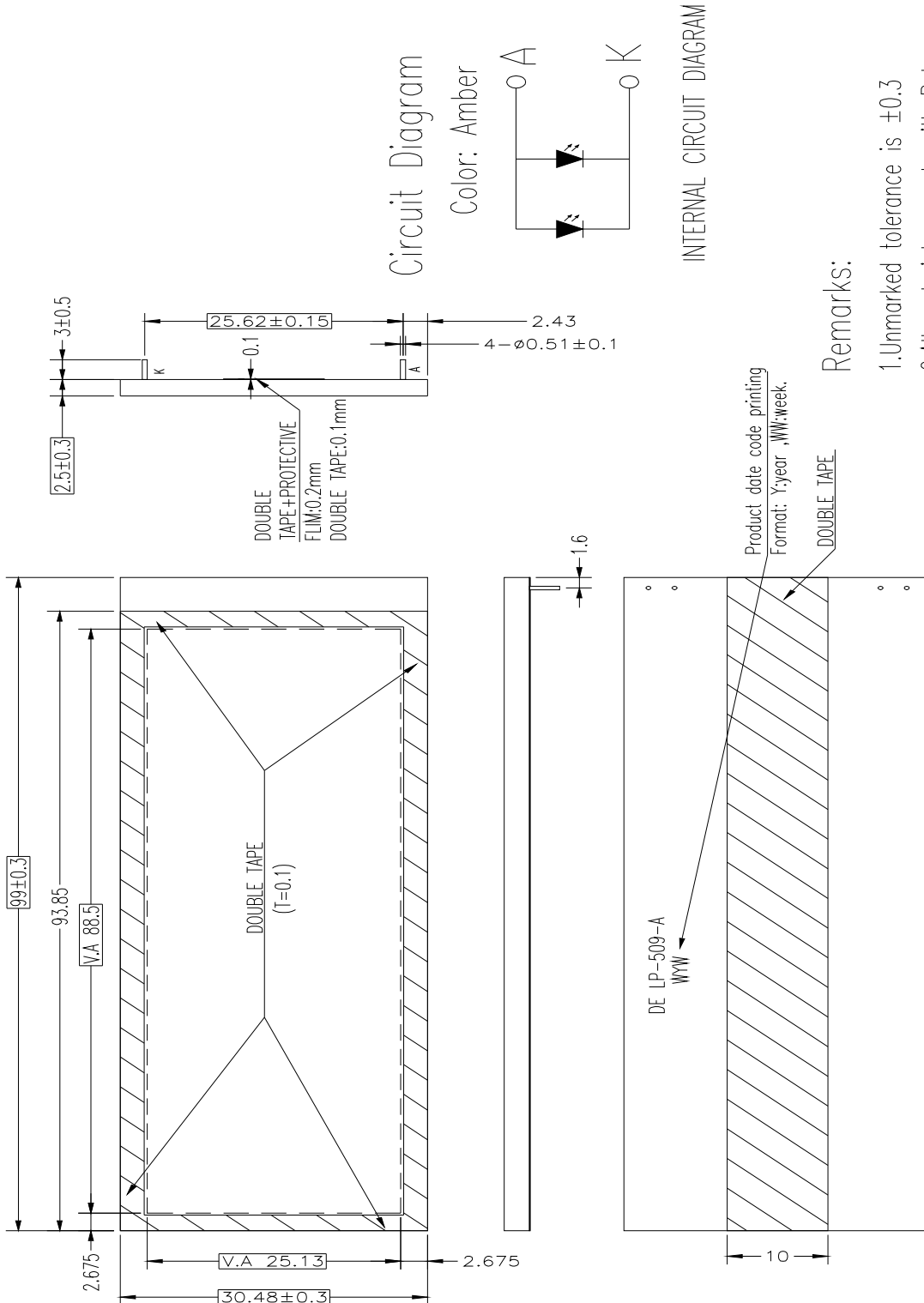
**5. RELIABILITY TEST..... FEHLER! TEXTMARKE NICHT DEFINIERT.**

**1. FEATURES**

Backlight Color: Amber

RoHS: Conformed

**2. EXTERNAL DIMENSION (unit: mm)**



**Remarks:**

1. Unmarked tolerance is  $\pm 0.3$
2. All materials comply with RoHS
3. [ ]: critical dimension.
4. Operation temperature:  $-20^{\circ}\text{C}$  to  $+70^{\circ}\text{C}$   
Storage temperature:  $-40^{\circ}\text{C}$  to  $+90^{\circ}\text{C}$

**3. ELECTRICAL/OPTICAL SPECIFICATIONS**

ELECTRICAL–OPTICAL CHARACTERISTICS

Ta=25°C. Unless specified, The Ambient temperature Ta=25°C

Item	Symbol	min.	typ.	max.	Unit	Condition
Forward Voltage	Vf	1.8	2.1	2.4	V	If= 20*2 mA
Power Dissipation	Pd			96	mW	If= 20*2 mA
Luminous Uniformity	ΔLv	70			%	MIN/MAX*100%
Luminance	Lv	50	140		cd/m <sup>2</sup>	If=20*2 mA T=25°C
Dominant Wave Length	λD	585	-	595	nm	
Lifetime	50000(brightness reduce half)				Hours	

**4. ACCEPT QUALITY LEVEL (AQL).**

4.1. AQL standard value: Critical defect =0, Major defect=0.65; Minor defect =2.5.

4.2. Inspection Plan: ANSI Z-1.4, Normal Inspection Level II, Single Sampling Plan.

**5. RELIABILITY TEST**

Test Item	Test Condition
High Temperature Storage	+90°C x 96h
Low temperature Storage	-40°C x 96h
High Temperature Operation	+70°C x 96h
Low Temperature Operation	-20°C x 96h
High Temperature, High Humidity	60°C x 90%RH x 4 Weeks
Thermal Shock	-20°C x 30min → 25°C x 10s → +70°C x 30min x 5 Cycles
Vibration Test	Frequency x Swing x Time 40Hz x 4mm x 4h
Drop Test	Height x Number of drop 1.0m x 6 drops