

Data sheet	
status	Product specification
date of issue	July 1990

LTD133

Liquid crystal display

DEVICE DESCRIPTION

The LTD133 is a 3 1/2-digit 7 segment clock display with AM and PM functions. It is designed for use with the PCF1175 clock circuit.

QUICK REFERENCE DATA

Viewing area dimensions	32.5 x 14.1 mm
Overall glass dimensions	37.5 x 20.8 mm
Thickness	1.9 +/- 0.2 mm
Digit height	8.5 mm
Preferred viewing direction	12 o'clock
Driving method	MUX 1:2

DISPLAY MODE

scale 1:1



7222271

Fig.1 Clock display.

TYPE DEPENDENT CHARACTERISTICS (1)

TYPE	ILLUMINATION MODE	CONNECTION METHOD	RELIABILITY GRADE	FAMILY CHARACTERISTICS (2)	OPERATING VOLTAGE (V)
LTD133F-21	transflective	for conductive rubber	extended	TF3	typ. 5

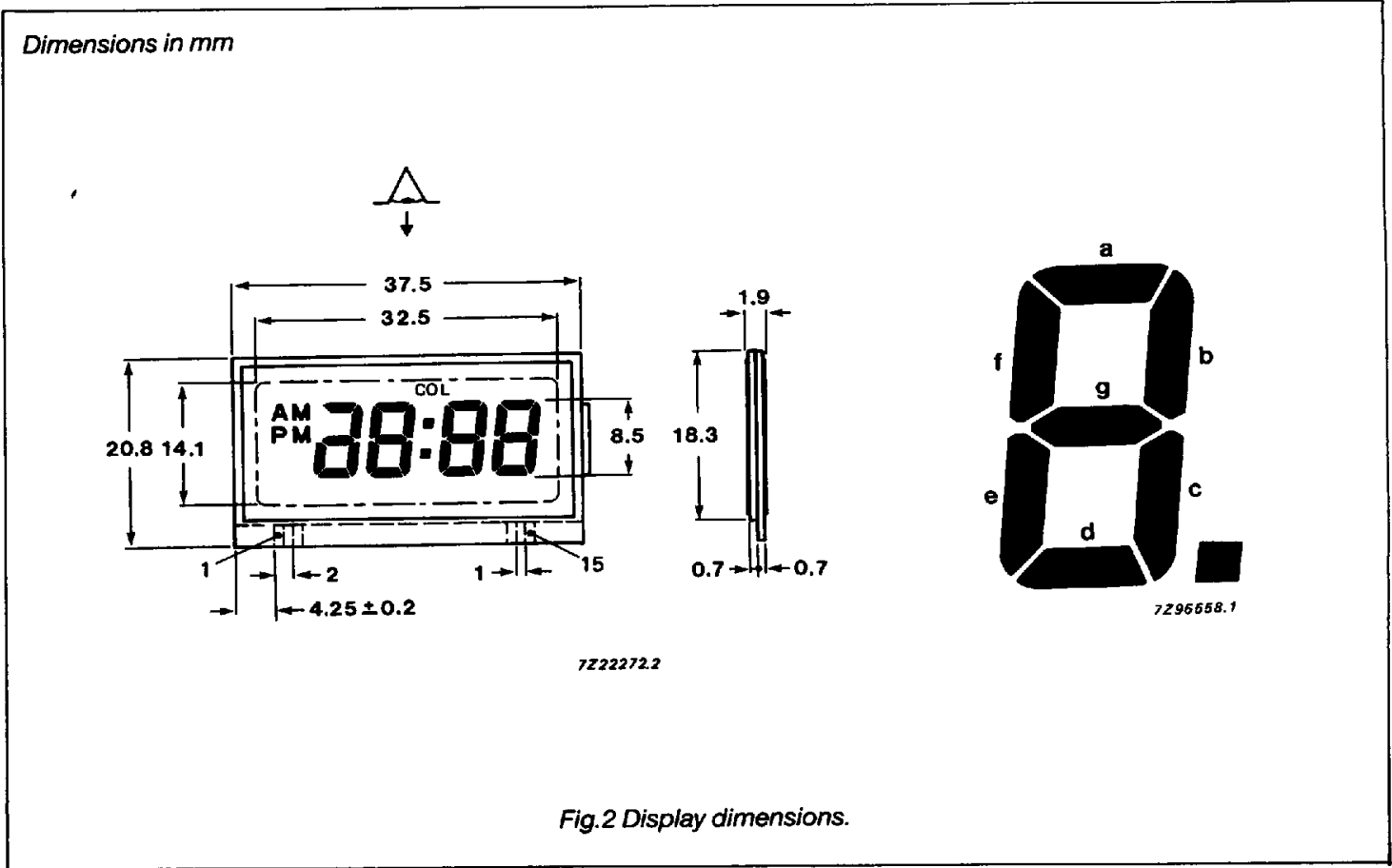
Note: (1) drive method = 1:2

(2) see chapter "Family Characteristics" for complete specification

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MECHANICAL DATA



Liquid crystal display**LTD133****PIN DESCRIPTION**

PIN NO.	SEGMENT ASSIGNED TO COMMON 1	SEGMENT ASSIGNED TO COMMON 2
1	comm 1	n.c.
2	n.c.	comm 2
3	AM	PM
4	a2	adeg1
5	b1	c1
6	f2	e2
7	g2	d2
8	b2	c2
9	a4	col
10	f3	e3
11	g3	ad3
12	b3	c3
13	f4	e4
14	g4	d4
15	b4	c4

RATINGS

Limiting values in accordance with Absolute Maximum System (IEC 134)

Maximum voltage between any two connections (see note)

 $V_{\max}$

10 V RMS

Note: maximum DC component = 0.1 V

TYPE	RELIABILITY TESTS		
	Damp heat steady state T_{amb} /R.H./21 days	Low temperature storage T_{amb} /duration	High temperature storage T_{amb} /duration (dry)
LTD133F-21	+80 °C/90%/21 days	40 °C/21 days	+85 °C/21 days