

# Near edge type thermal printhead(11.81dots / mm)

## SH3004-DC90A

SH-DC90 series achieves high quality print and high reliability, by Rohm unique Step Free Technology.

SH-DC90 series is near edge type thermal head, whose heater line is formed at the angle of the glaze. Therefore, peeling-off ribbon at the hot state and large size platen can be used with this thermal head and is best suitable for the packaging printer market which requires the continuous print at high speed.

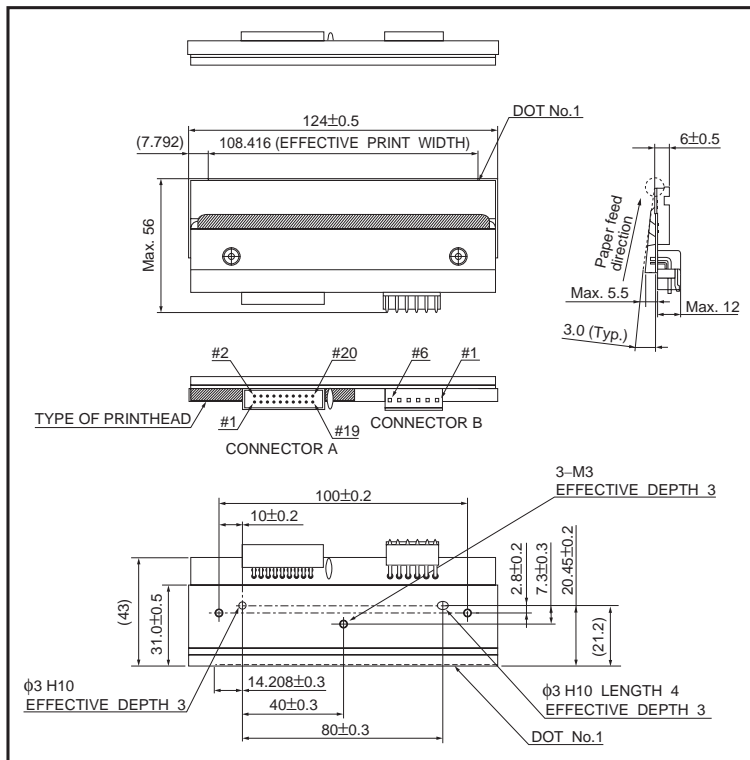
### ●Applications

- Barcode label printers
- Packaging printers
- Ticket printers
- General purpose portable printers

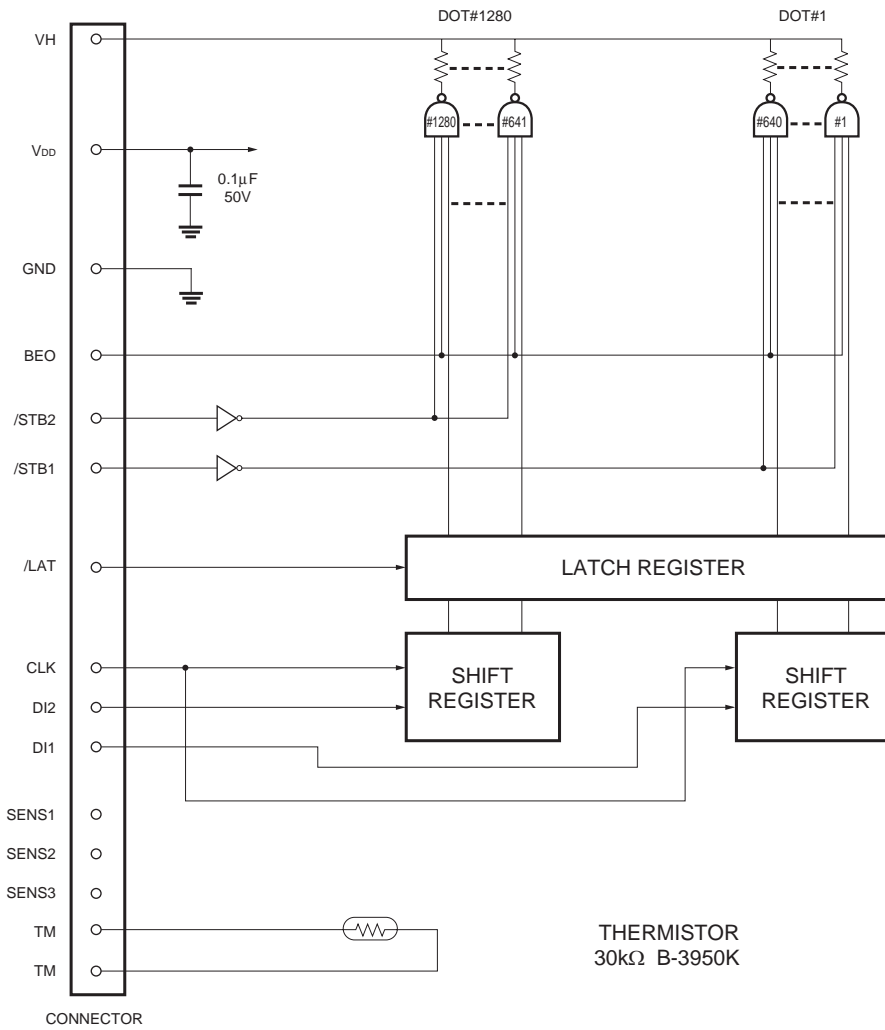
### ●Features

- 1) ROHM unique "STEP FREE" structure contributes to better anti-corrosion characteristics, less scratch break down, and better heat efficiency.
- 2) Thermal head contacts with the media by angle at the print, so that good print quality can be obtained for the thick media.
- 3) It has good anti-ESD characteristic by applying hard, conductive layer as the heat element protective coating.
- 4) Mounting space can be minimized, which contributes to the downsizing of the printer.

### ●Dimensions (Unit : mm)



●Equivalent circuit



DI No.	DOT No.
DI2	1280 to 641
DI1	640 to 1

STB No.	DOT No.
/STB 2	1280 to 641
/STB 1	640 to 1

●Pin configuration

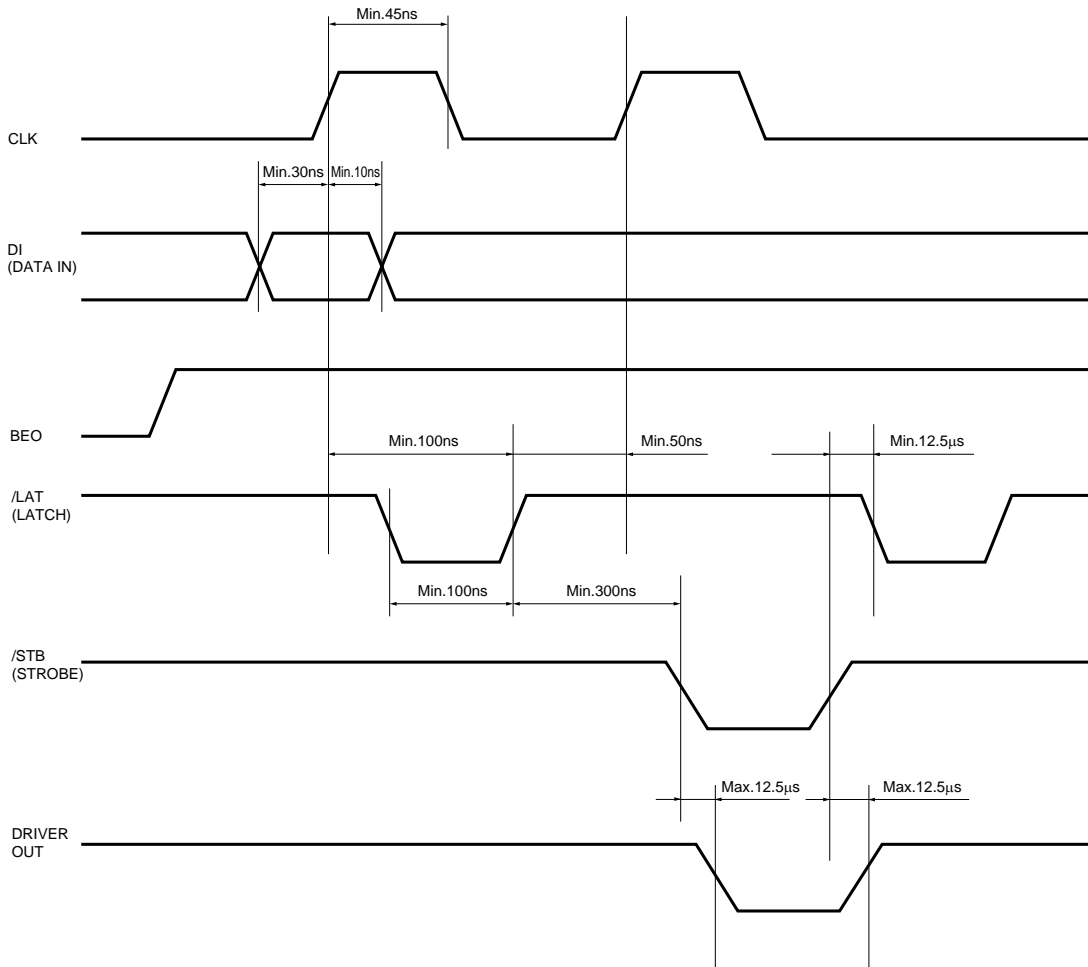
HIROSE

No.	Circuit	No.	Circuit
1	V <sub>DD</sub>	2	BEO
3	GND	4	DI2
5	N.C.	6	CLK
7	LAT	8	N.C.
9	N.C.	10	DI1
11	N.C.	12	N.C.
13	V <sub>DD</sub>	14	STB2
15	STB1	16	TM
17	TM	18	SENS1
19	SENS2	20	SENS3

JST

No.	Circuit
1	VH
2	VH
3	VH
4	GND
5	GND
6	GND

●Timing chart



●Characteristics

Parameter	Symbol	Typical	Unit
Effective printing width	-	108.416	mm
Dot pitch	-	0.0847	mm
Total dot number	-	1280	dots
Average resistance value	Rave	850	Ω
Applied voltage	V <sub>H</sub>	24	V
Applied power	P <sub>O</sub>	0.57	W / dot
Print cycle	SLT	0.28	ms
Maximum number of dots energized simultaneously	-	1280	dots
Maximum clock frequency	-	10	MHz
Maximum roller diameter	-	φ50	mm
Running life / pulse life	-	150 / 10 <sup>8</sup>	km / pulses
Operating temperature	-	5 to 45	°C

### Notes

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