Thick film thermal printhead(with thermal historical control)

KD3006-DC72A

DC72 series has our own internally developed heat-history control function.
This product is best suited for applications which require 24 hours operation like factory production lines.

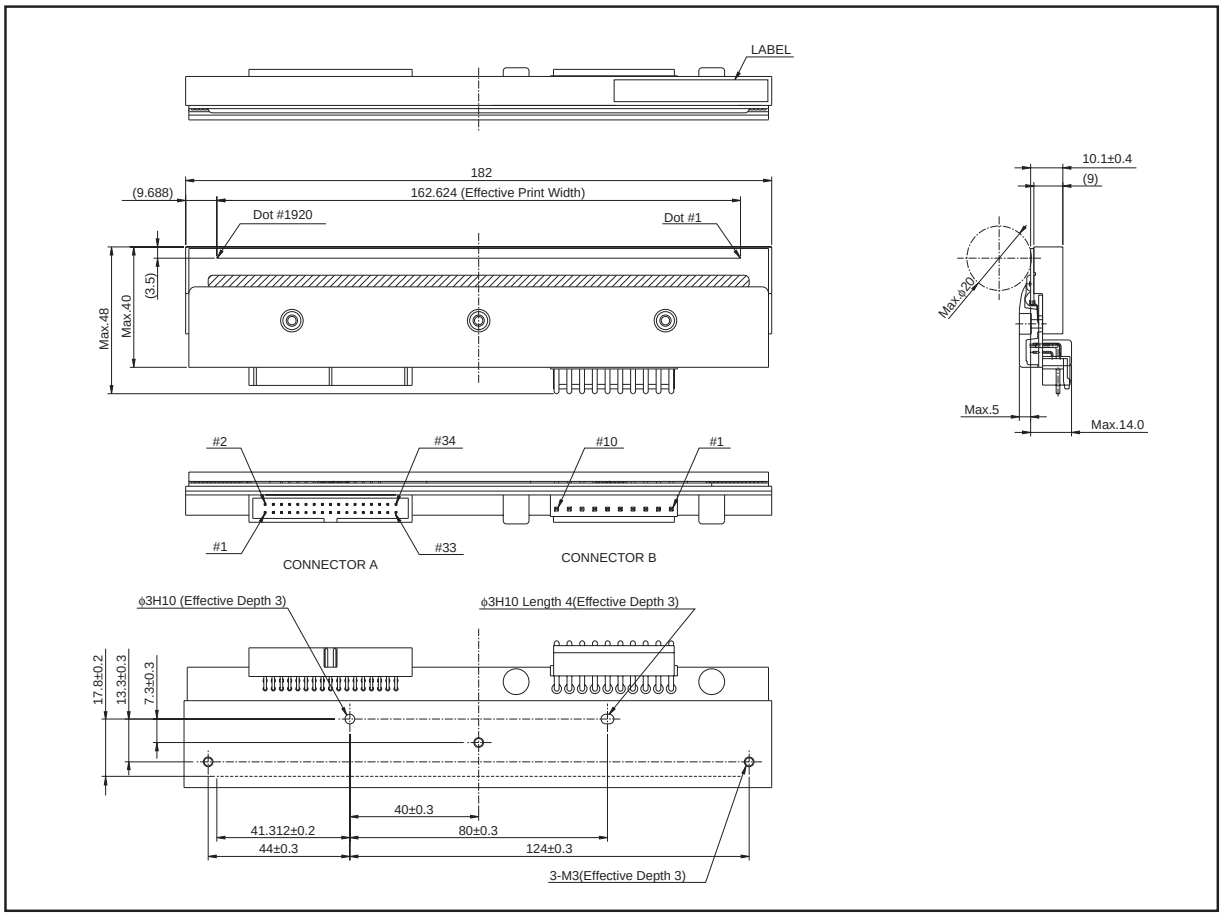
●Applications

High speed label printer
High speed bar code printer
High speed ticket printer
Various high speed terminal printers

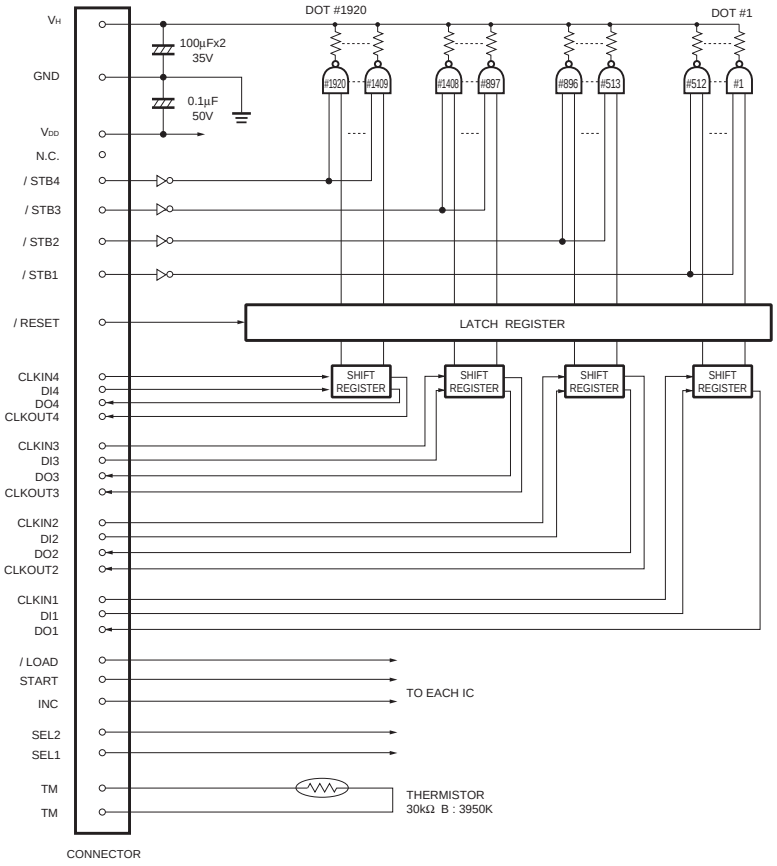
●Features

1) Newly developed thick-film fast response thermal element and driver LSI with the function of thermal history control which is added the future history control are employed for this series. It is possible to print with super high speed of 10 inches / s or 250 mm / s.
2) 150km life realized by attributing durable new protection film.
3) New partial glaze construction makes it compatible with the thermal transfer application.

●Dimensions (Unit : mm)



●Equivalent circuit



DI No.	DOT No.
DI4	1920 to 1409
DI3	1408 to 879
DI2	896 to 513
DI1	512 to 1

/ STB No.	DOT No.
/ STB4	1920 to 1409
/ STB3	1408 to 897
/ STB2	896 to 513
/ STB1	512 to 1

CLK No.	DOT No.
CLKIN4	1920 to 1409
CLKIN3	1408 to 897
CLKIN2	896 to 513
CLKIN1	512 to 1

Fig.1

●Pin assignments

CONNECTOR A

No.	Circuit	No.	Circuit
1	VDD	18	/ LOAD
2	VDD	19	/ RESET
3	NC	20	START
4	NC	21	TM
5	SEL2	22	TM
6	SEL1	23	DI2
7	CLKIN4 (CP)	24	DO2
8	CLKOUT4	25	DI1
9	CLKIN3	26	DO1
10	CLKOUT3	27	/ STB2
11	DI4	28	/ STB1
12	DO4	29	CLKIN2
13	DI3	30	CLKOUT2
14	DO3	31	CLKIN1
15	/ STB4	32	NC
16	/ STB3	33	NC
17	INC	34	NC

CONNECTOR B

No.	Circuit
1	VH (COM)
2	VH (COM)
3	VH (COM)
4	VH (COM)
5	VH (COM)
6	GND
7	GND
8	GND
9	GND
10	GND

●Characteristics

Parameter	Symbol	Typical	Unit
Effective printing width	–	162.624	mm
Dot pitch	–	0.0847	mm
Total dot number	–	1920	dots
Average resistance value	Rave	1000	Ω
Applied voltage	V_H	24	V
Applied power	P_O	0.50	W/dot
Print cycle	SLT	0.41	ms
Maximum number of dots energized simultaneously	–	1920	dots
Maximum clock frequency	–	8	MHz
Maximum roller diameter	–	ϕ20.0	mm
Running life / pulse life	–	150/(1×10⁸)	km/pulses
Operating temperature	–	5 to 45	°C

●Data sheets

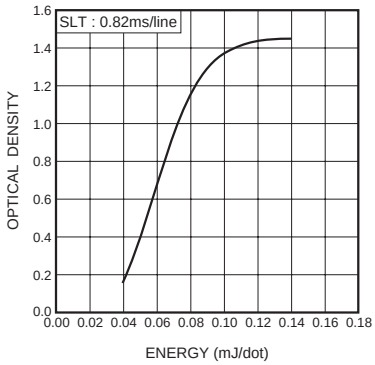


Fig.2 Representative density curve

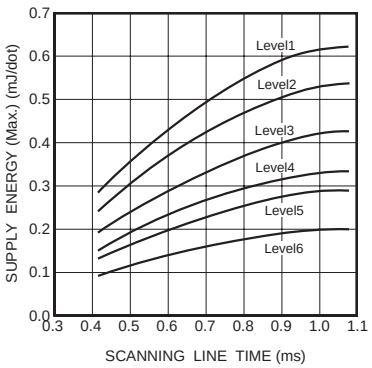


Fig.3 Maximum energy curve

Notes

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