



**FEATURES**

Integrated 4 Emitters and Photo Detector  
Chip on Board Package

**APPLICATIONS**

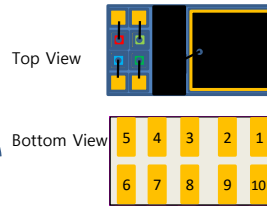
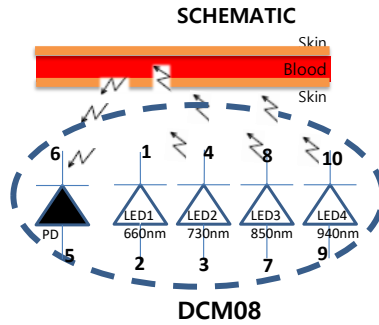
Reflective PPG Probes  
Wavelength Analysis on Skin  
Wearable Medical Device

**Reflective Blood Sensor**

**DCM08**

**PACKAGE DIMENSION (mm)**

w x h x t = 4.8 x 2.6 x 1.0  
PAD = 0.9 x 1.1



**ABSOLUTE MAX. RATINGS (Ta=25°C unless otherwise noted)**

SYMBOL	PARAMETER	MAX. RATED VALUE	UNITS
PD	Power Dissipation	120	mW
IF	Continuous Forward Current	50	mA
IFP	Peak Forward Current	100	mA
VR	Reverse Voltage	5	V
T stg	Storage Temp	-20 ~ +85	°C
T opr	Operating Temp	-20 ~ +80	°C
T sd	Soldering Temperature*1	240	°C

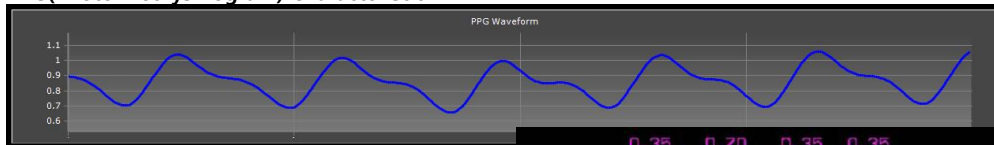
\*Soldering time : t < 3s, \*\*Moisture Sensitivity Level 3

\*\*\*Prebake 150°C 2HRs if Reflow Soldering

**CHARACTERISTICS (Ta=25°C unless otherwise noted)**

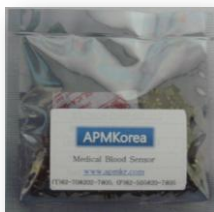
SYMBOL	CHARACTERISTIC	COMPONENTS	TEST CONDITION	MIN	TYP	MAX	UNITS
VF	Forward Voltage	LED1	IF=20mA		1.8	2	V
		LED2		1.7	1.9		
		LED3		1.4	1.55		
		LED4		1.55	1.75		
		PD	IF=10mA	0.5		1.3	
IR	Reverse Breakdown Current	LED1,2,3,4	VR=5V			10	uA
P O	Output Power	LED1	IF=20mA		2		mW
		LED2		3.2	4		
		LED3		3.8			
		LED4		1.7			
λ PEAK	Peak Wavelength	LED1	IF=20mA		660		nm
		LED2		730			
		LED3		850			
		LED4		940			
		PD			940		
Δλ	Half Wave Width	LED1	IF=20mA		50		nm
		LED2		50			
		LED3		50			
		LED4		50			
V BR	Reverse Breakdown Voltage	PD	IR=100uA	35			V
I D	Reverse Dark Current		V R=5V			20	nA
I L	Light Current		1mW@940nm		21		uA
S	Spectral Response Range			400		1050	nm
CJ	Junction Capacitance			VR=3V, f=1MHz		20	

**PPG(Photo Plethysmogram) Characteristic**



**Footprint**

**Packing Information**



Anti Static vinyl bag

Label sticker

