

High-Definition CRT Display Video Output Applications

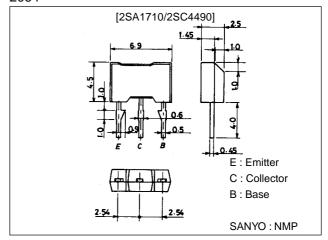
Features

- · High breakdown voltage (V_{CEO}≥300V).
- · Excellent high frequency characteristic.
- · Adoption of MBIT process.

Package Dimensions

unit:mm

2064



():2SA1710

Specifications

Absolute Maximum Ratings at Ta = 25°C

Parameter	Symbol	Conditions	Ratings	Unit	
Collector-to-Base Voltage	V _{CBO}		(-)300	V	
Collector-to-Emitter Voltage	VCEO		(-)300	V	
Emitter-to-Base Voltage	V _{EBO}		(–)5	V	
Collector Current	IC		(–)100	mA	
Collector Current (Pulse)	I _{CP}		(–)200	mA	
Collector Dissipation	PC		1	W	
Junction Temperature	Tj		150	°C	
Storage Temperature	Tstg		-55 to +150	°C	

Electrical Characteristics at Ta = 25°C

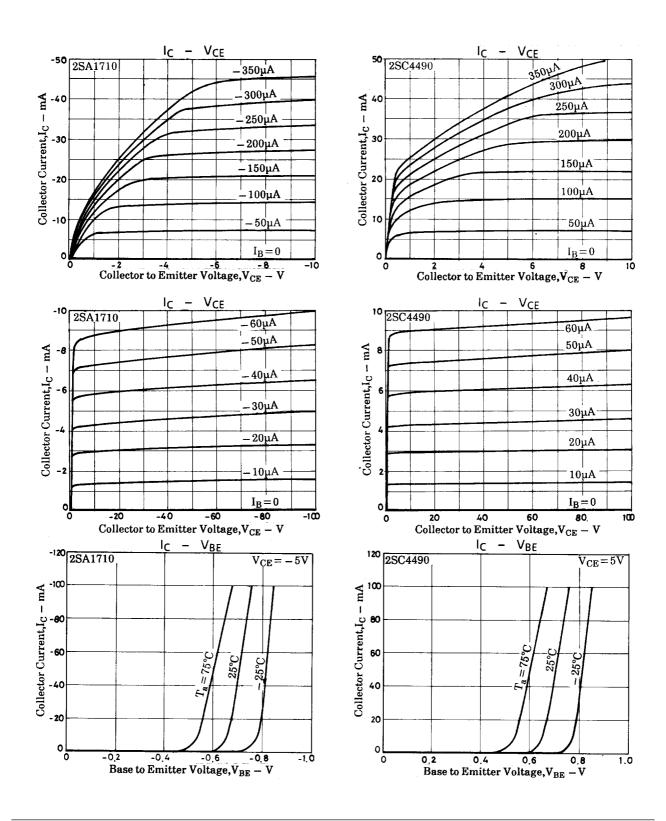
Parameter	Symbol	Conditions		Ratings		
Falametei	Syllibol	Conditions	min	typ	max	Unit
Collector Cutoff Current	I _{CBO}	V _{CB} =(-)200V, I _E =0			(-)100	nA
Emitter Cutoff Current	I _{EBO}	V _{EB} =(-)4V, I _C =0			(–)100	nA
DC Current Gain	h _{FE}	V _{CE} =(-)10V, I _C =(-)10mA	70*		280*	
Gain-Bandwidth Product	fT	V _{CE} =(-)30V, I _C =(-)10mA		70		MHz
Collector-to-Emitter Saturation Voltage	VCE(sat)	I _C =(-)20mA, I _B =(-)2mA			(–)0.6	V
Base-to-Emitter Saturation Voltage	V _{BE(sat)}	I _C =(-)20mA, I _B =(-)2mA			(–)1.0	V
Output Capacitance	C _{ob}	V _{CB} =(-)30V, f=1MHz		(3.1)		pF
				2.6		pF

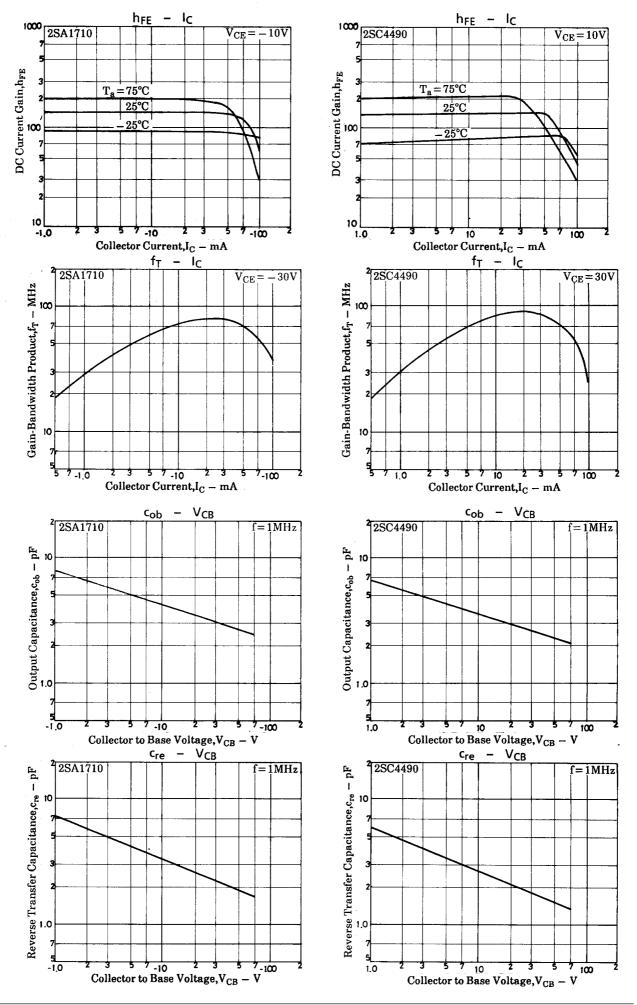
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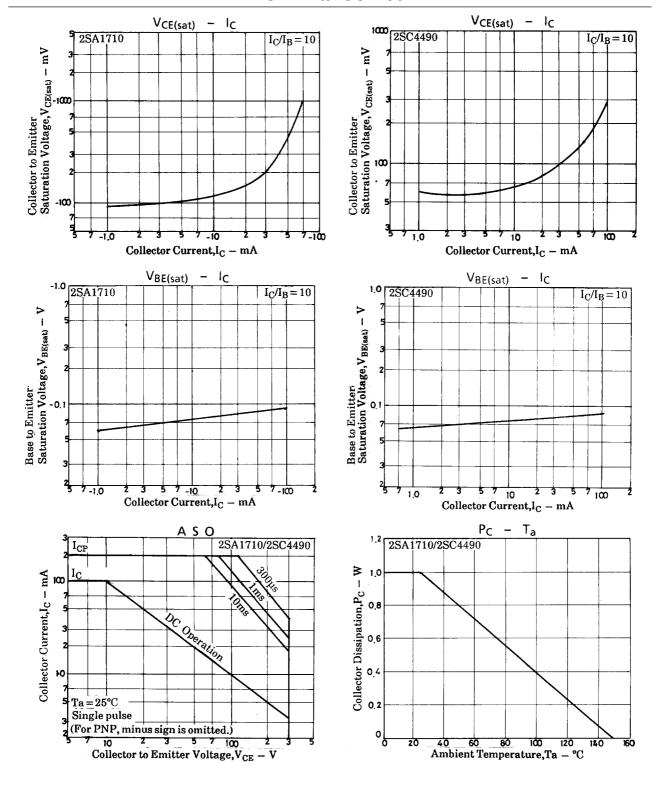
Parameter	Symbol	Conditions	Ratings			Unit
Faiametei	Symbol	Conditions	min	typ	max	O IIII
Reverse Transfer Capacitance	C _{re}	V _{CB} =(-)30V, f=1MHz		(2.3)		pF
				1.8		pF
Collector-to-Base Breakdown Voltage	V(BR)CBO	I _C =(-)10μA, I _E =0	(-)300			V
Collector-to-Emitter Breakdown Voltage	V(BR)CEO	I _C =(−)1mA, R _{BE} =∞	(-)300			V
Emitter-to-Base Breakdown Voltage	V _{(BR)EBO}	I _E =(-)10μA, I _C =0	(–)5			V

$\mbox{\ast}$: The 2SA1710/2SC4490 are classified by 100mA \mbox{h}_{FE} as follows :

70 Q 140 100 R 200 140 S 28







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