

# APPROVAL SHEET

Approval Specification	Customer's Approval Certificate
TO:	Checked & Approved by:
Part No.:	Date:
Customer's Part No.:	Please return this copy as a certification of your approval

## Shenzhen Huayuan Micro Electronic Technology Co.Ltd.

Tel: +86-0755-29881155-8006

Fax: +86-0755-29881157

E-mail: [sfsaw\\_sales@163.com](mailto:sfsaw_sales@163.com)

QQ: 3037058772

Website: <http://www.sfsaw.com> <http://www.szhywd.net>

Add: No.5 Zhuangcun Road, Xiner Community,  
Shajing Street, Baoan District, Shenzhen



Part No.	:	SFR390D
Pages	:	4
Date	:	2016/8/1
Revision	:	2.0

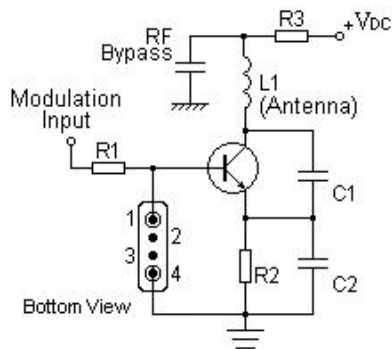
**Features**

- 1-port Resonator
- Metal Case for **SC04-06**
- **RoHS** compatible
- Package Code SC04-06
- **Electrostatic Sensitive Device(ESD)**

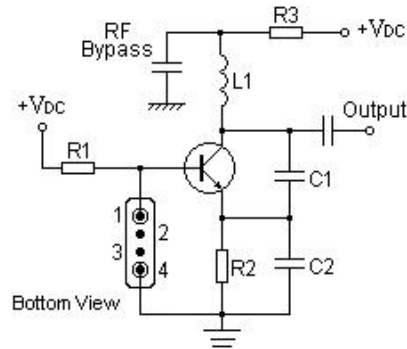


**Application**

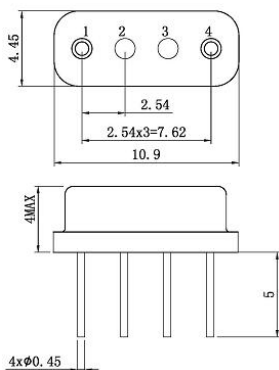
Typical Low-Power Transmitter Application



Typical Local Oscillator Application



**Package Dimensions (SC04-06)**



**Pin Configuration**

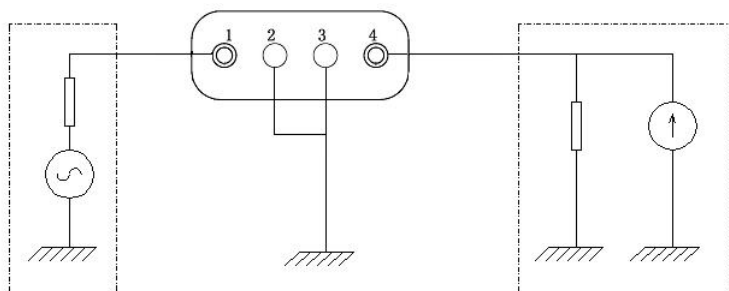
<b>1</b>	Input/ Output
<b>4</b>	Output/ Input
<b>2,3</b>	Case Ground

**Marking**

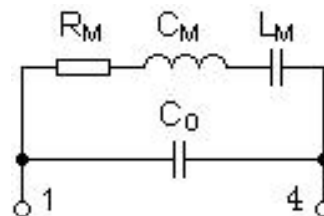


<b>SF</b>	Trademark
<b>R</b>	SAW Resonator
<b>390D</b>	Part number

## Test Circuit



## Equivalent LC Model



## Performance

## Maximum Rating

Item		Value	Unit
DC Voltage	$V_{DC}$	$\pm 30$	V
Operation Temperature	T	-40 ~ +85	$^{\circ}\text{C}$
Storage Temperature	$T_{stg}$	-40 ~ +85	$^{\circ}\text{C}$
RF Power Dissipation	P	25	dBm

## Electronic Characteristics

Test Temperature:  $25^{\circ}\text{C} \pm 2^{\circ}\text{C}$

Terminating source impedance:  $50\Omega$

Terminating load impedance:  $50\Omega$

Item			Minimum	Typical	Maximum	Unit
Center Frequency	Absolute Frequency	$f_c$		390.00		MHz
	Tolerance from 390.00MHz	$\Delta f_c$		$\pm 75$		KHz
Insertion Loss(min)		IL		1.4	2.0	dB
Quality Factor	Unloaded Q	$Q_U$		18086		
	$50\Omega$ Loaded Q	$Q_L$		1808		
Frequency Aging	Absolute Value during the First Year	$ f_A $		$\leq 10$		ppm/yr
DC Insulation Resistance between Any Two Pins			1.0			$M\Omega$
RF Equivalent RLC Model	Motional Resistance	$R_M$		11.2	18.3	$\Omega$
	Motional Inductance	$L_M$		82.07		$\mu\text{H}$
	Motional Capacitance	$C_M$		2.03		fF
	Static Capacitance	$C_0$	3.0	3.2	3.4	pF

