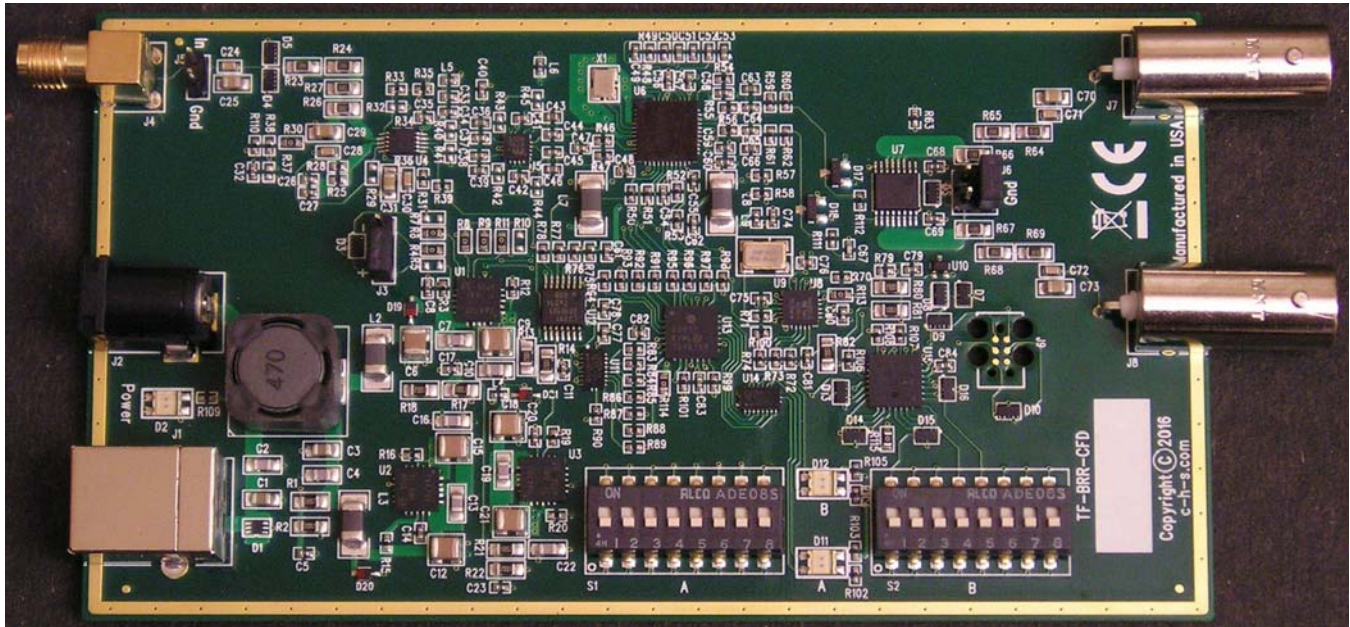


## TF-BRR-CFD

### BroadR-Reach Clock Frequency Divider Test Fixture



### Salient Features

- Facilitates BroadR-Reach, P802.3bw 100BASE-T1 and P802.3bp 1000BASE-T1 distortion tests, as well as P802.3bp 1000BASE-T1 PAM test
- Produces two identical clock signal outputs phase locked to the input clock
- SMA connector clock input, AC-coupled, 50 Ohm terminated, 50mVpp-5Vpp
- Supports input clock frequencies of 10 MHz, 25 MHz, 66.66667 MHz, 125 MHz and 750 MHz (+/-1.1%), switch controlled
- Testpoint access for oscilloscope observation of the input clock
- Input clock 200 Hz low-pass jitter-rejection filter
- Output frequency equals the input clock frequency divided by 1, 5/2, 20/3, 25/2 or 75, per input frequency selection (nominally 10 MHz output for the above-cited input frequencies)
- BNC connector clock output, AC-coupled, 50 Ohm back-terminated, 3.0, 3.3 or 4.2Vpp (50% less when far-end terminated), output amplitude jumper controlled
- Individual-buffer-produced or shared-buffer-produced outputs, jumper controlled
- LEDs flash yellow for error conditions (including USB power input voltage out of range) or green for warnings (including loss of frequency lock)
- USB powered, requiring 4.5V-5.5V @ 450 mA
- Can support input frequencies between 64 KHz and 2 GHz
- Can support output frequencies between 2 KHz and 200 MHz
- Compact 5.00" x 2.75" x 0.70" (12,70 cm x 6,99 cm x 1,78 cm) printed circuit board

## TF-BRR-CFD Ordering Summary

- Part number TF-BRR-CFD includes the hardware test fixture (USB power, SMA and BNC signal cables not included)
- Currently-supported frequency configurations:

Frequency Configuration	Supported In Firmware Versions	Nominal Input Frequency (MHz)	Division By	Nominal Output Frequency (MHz)
0	All	66.67	20/3	10
1	All	125	25/2	10
2	All	10	1	10
3	>=6	25	5/2	10
4	>=10	750	75	10

- Firmware updates can be produced upon request to allow about-to-be-purchased or extant units to support additional frequency configurations in the range of 64 KHz to 2 GHz input frequency, and 2 KHz to 200 MHz output frequency
- Contact CHS regarding installing firmware upgrades (not available in the field)

## Contact Crescent Heart Software

- Internet: [www.c-h-s.com](http://www.c-h-s.com); E-mail: [sales@c-h-s.com](mailto:sales@c-h-s.com); Telephone: (+1)503-232-2232
- Crescent Heart Software, a Tektronix® Embedded Systems Tools Partner, is headquartered in Portland, Oregon USA
- Information presented herein is subject to change without notice (datasheet Rev 9 (November, 2020): deleted locked-frequency phase-locked-output functionality)