

PULSE GENERATOR
PERFORMANCE CHECK

Model: *AVDZ-A2-B-N*

S.N.: *9947*

Date: *NOV 6 2001*

- a) Output signal amplitude:
0 TO -50 V TO RL?/Ω
- b) Pulse width: *(50 nms max)*
40 NS TO 1.0 μS
- c) Rise time: *(0.4% MAX DUTY CYCLE)*
≤ 30 NS
- d) Fall time:
≤ 10 NS
- e) PRF: *0 TO 20 KHz*
(0.4% MAX DUTY CYCLE)
- f) Jitter, stability:
OK
- g) Prime power:
120/240 V
50-60 Hz



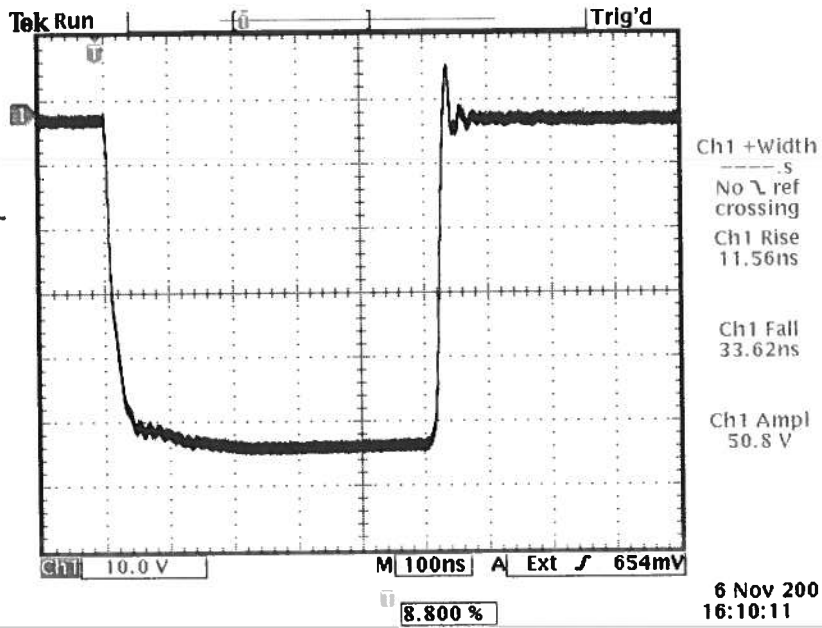
(A)

9947

$R_L = 0.94 \Omega$

$PBF = 1 \text{ KHE}$

LOAD
VOLTAGE



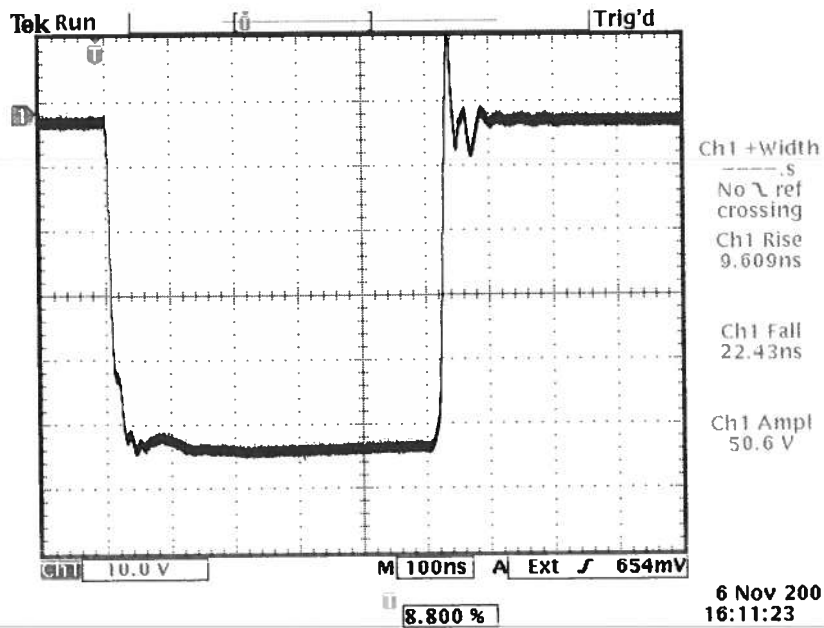
(B)

9947

$$R_c = 1.56 \Omega$$

$$P_{RF} = 1 \text{ kW}$$

LOAD
VOLTAGE





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"-B" Functional Test & Calibration Certificate

| | | | | | | | |
|---------------------------------------|------------------|-------------------------------------|------------|------------------------------------|-----------|---------------|----------------------------|
| Date of test: | November 6, 2001 | | | | Tester: | MJC | |
| Programmed model name: | AVOZ-A2-B-N | | | | | | |
| Programmed serial number: | 9947 | | | | | | |
| Firmware revision: | 2.30 | | | | | | |
| Internal trigger checked at: | 2 Hz | 20 Hz | 200 Hz | 2 kHz | 20 kHz | | |
| Actual measured output ¹ : | 2.005 Hz | 20.04 Hz | 200.0 Hz | 2.001 kHz | 20.00 kHz | | |
| External trigger checked: | yes | | | | | Gate checked: | yes |
| Manual trigger checked: | yes | | | | | | |
| Pulse compression checked: | yes | Low Amplitude PW Distortion Nulled: | | | | N/A | |
| Pulse width checked at: | 100 ns | 1 us | | | | | 100 Hz, -50V to 1 Ohm |
| Actual measured output ² : | 101.6 ns | 1.001 us | | | | | |
| PWin = PWout mode checked: | N/A | DC mode checked: | | | | N/A | |
| Duty Cycle Limit: | 0.4% | | | | | | |
| Delay nulled: | yes | | | | | | |
| Delay checked at: | 100 ns | 1 us | | | | | 100 Hz, -50V to 1 Ohm |
| Actual measured output ¹ : | 101.4 ns | 1.001 us | | | | | |
| Double pulse checked: | N/A | | | | | | |
| Invert mode checked: | N/A | | | | | | |
| ECL/TTL modes checked: | N/A | | | | | | |
| Zout switch checked: | N/A | | | | | | |
| Amplitude checked at: | -10V | -20V | -50V | | | | 100 Hz, 200 ns to 1 Ohm |
| Actual measured output ² : | -10.4V | -21.2V | -50.4V | | | | |
| Amplitude polarity: | - | | | | | | |
| Zout calibration: | N/A | | | | | | |
| Electronic amplitude control: | N/A | | | | | | |
| External amplify mode: | N/A | | | | | | |
| Ultravolt flux removed: | N/A | | | | | | |
| Monitor V/I Ratio: | N/A | | | Monitor offset nulled: | | | |
| LCD Monitor calibrated: | N/A | | | Monitor offset nulled: | | | |
| Offset checked at: | N/A | | | | | | |
| Actual measured output ² : | N/A | | | | | | |
| Offset nulled (output on): | N/A | | | Amplitude-dependent offset nulled: | | | |
| Offset nulled (output off): | N/A | | | | | | |
| RS-232 checked: | yes | | | | | | |
| Sync pulse width checked: | 200 ns | | | | | | |
| Circuit Boards: | PS: | 93 | Main: | 108B | | | |
| Overload Trigger Resistance: | Trips at: | N/A | Installed: | 7.2k | | | |
| DC fuses: | Positive: | 1A | Negative: | N/A | | | |
| AC Current at 115 VAC: | Quiescent: | 0.46A | Max. Load: | 0.67A | | | |
| AC fuse: | 1A | | | | | | |
| Photographed: | yes | | | | | | |

¹ Checked with: Fluke PM6681 Counter, referenced to Datum ExacTime 9390-6000 GPS Frequency Reference

² Checked with: Tektronix TDS3052 digital oscilloscope for PW ≥ 5 ns,
Tektronix 7704A/7S11/7T11/S4 sampling oscilloscope system for PW < 5 ns.