

# FG085 Distortion Test Report

Date of Test: Dec. 5, 2015

Location of Test: JYE Tech Ltd., Guilin

## 1. Information about devices to be tested

Model: FG085

Part Number: 08503P

Number of devices to be tested: 5



Fig. 1

## 2. Equipment Used in the Test

- 1) GAD-201G automatic distortion meter (manufacturer: GW Instek, <http://www.gwinstek.com>)
- 2) DS1102E oscilloscope (manufacturer: Rigol, <http://www.rigol.com>)
- 3) 15V/1A switching mode power adapter

## 3. Test Setup and Procedures

- 1) Connection Diagram

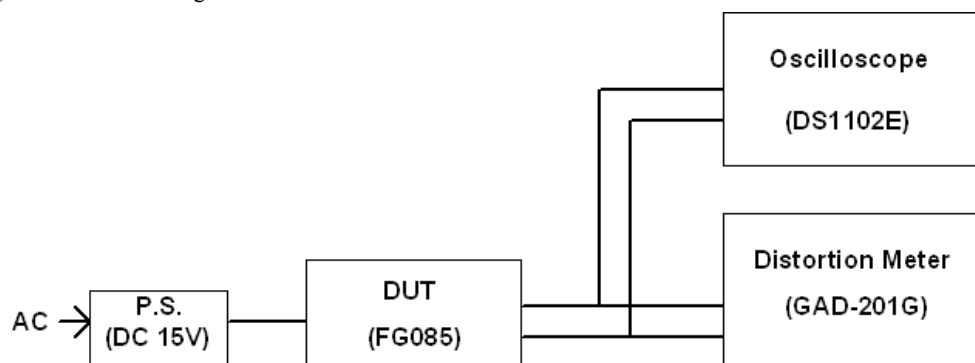


Fig. 2



Fig. 3

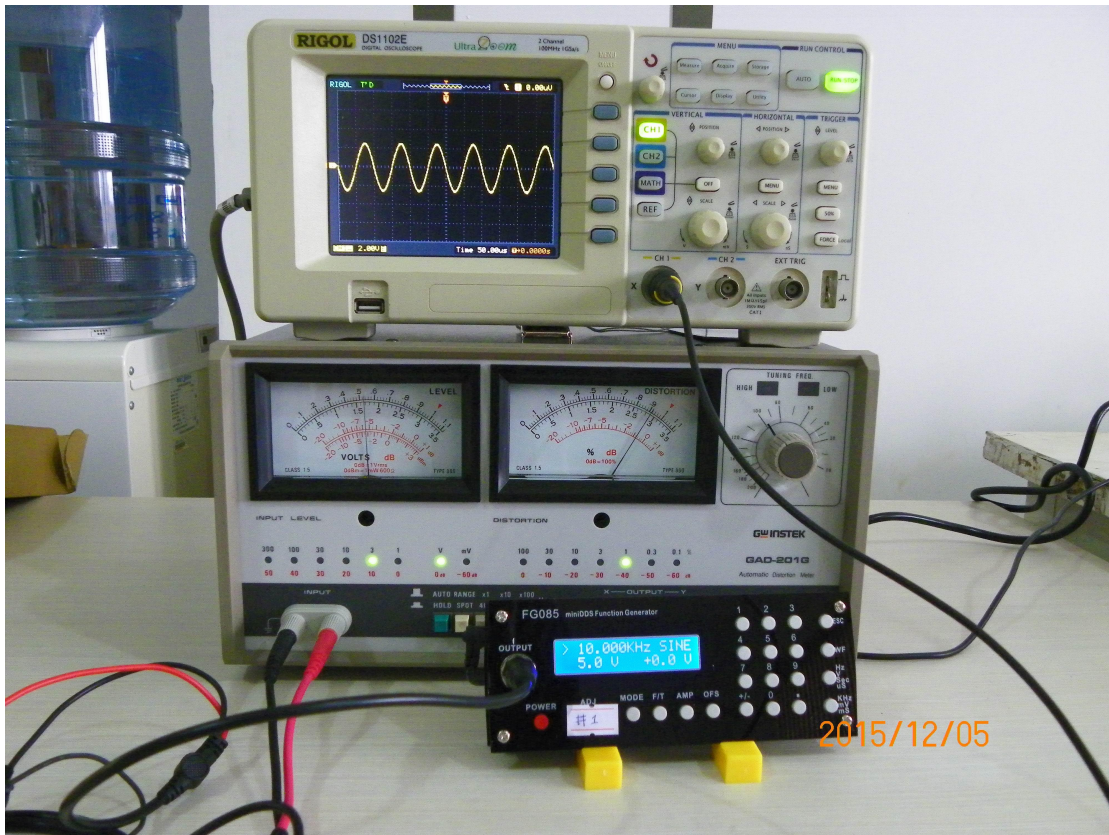
## 2) Test Procedures

- a) Connect distortion meter, oscilloscope, and DUT as described in 1 ) above.
- b) Power up distortion meter, oscilloscope, and DUT.
- c) Select distortion meter frequency range to 10K by depressing the push button labeled “10KHz” on front panel.
- d) Set oscilloscope sensitivity to 2V/div, timebase to 50us/div, and vertical position to the middle of vertical scale.
- e) Set DUT to following parameters respectively:
  - Condition 1: Output frequency: 10KHz  
Offset: 0V  
Amplitude: 5Vpp
  - Condition 2: Output frequency: 10KHz  
Offset: 0V  
Amplitude: 10Vpp
- f) Monitor waveform on oscilloscope to make sure waveform type, amplitude, and offset meet test conditions.
- g) On distortion meter turn the “Tuning Freq” knob to the direction indicated by the “High” or “Low” indicators if they light up until both indicators are off.
- h) Read test result on distortion meter by combining range indicator and scale reading.

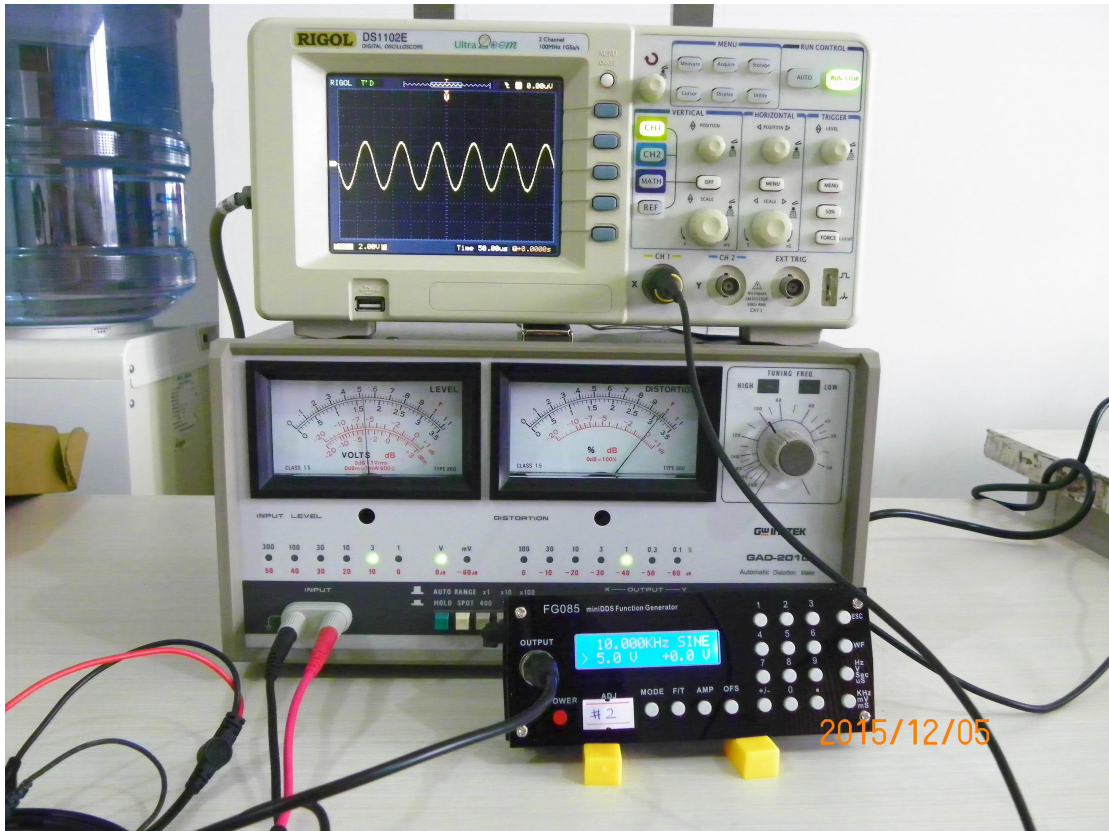
4. Test Results

Sample #	Distortion (%) under Condition 1 (5Vpp)	Distortion (%) under Condition 2 (10Vpp)
1	0.92	0.91
2	0.99	0.99
3	1.28	1.30
4	1.18	1.19
5	1.18	1.20

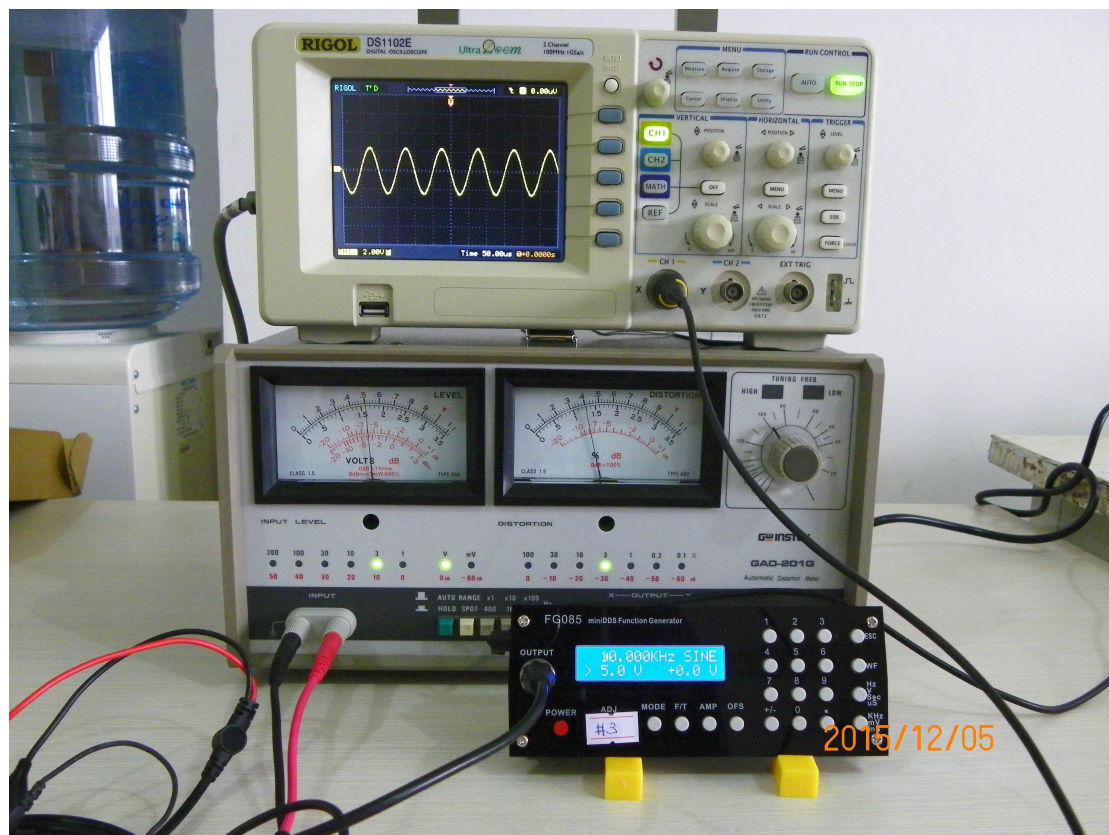
5. Photos



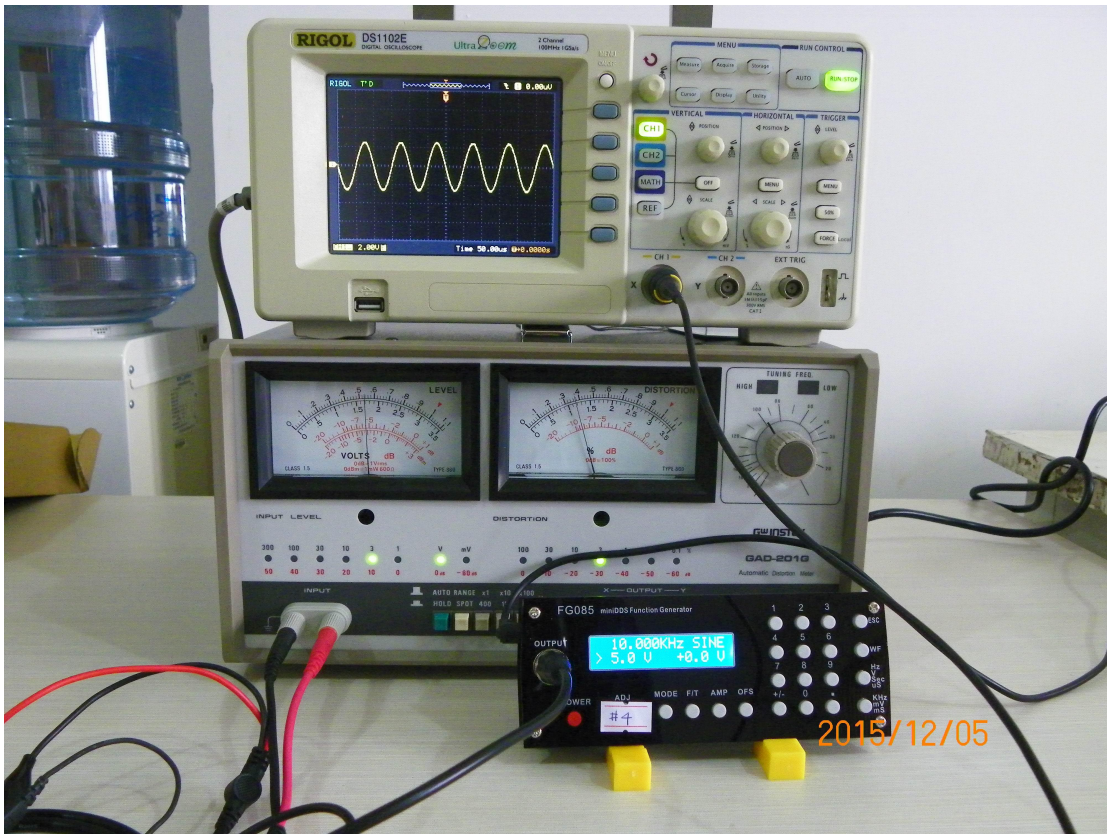
5Vpp -- Sample #1



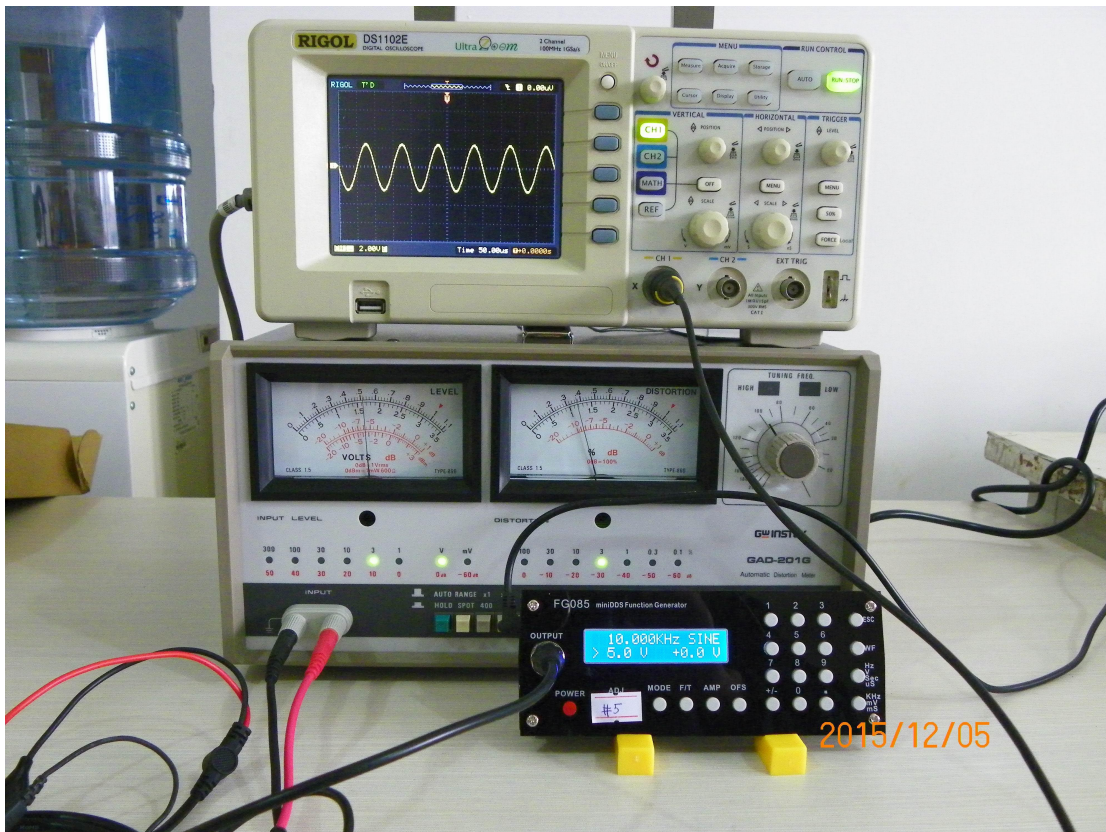
5Vpp -- Sample #2



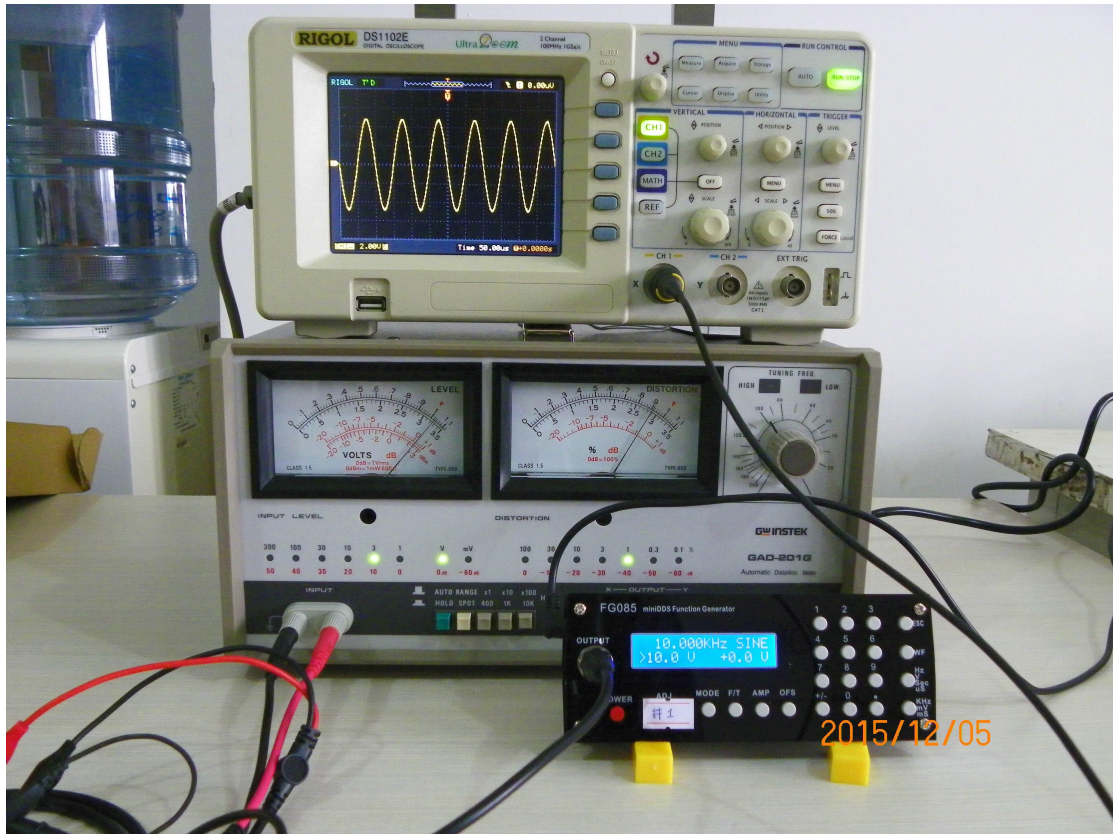
5Vpp -- Sample #3



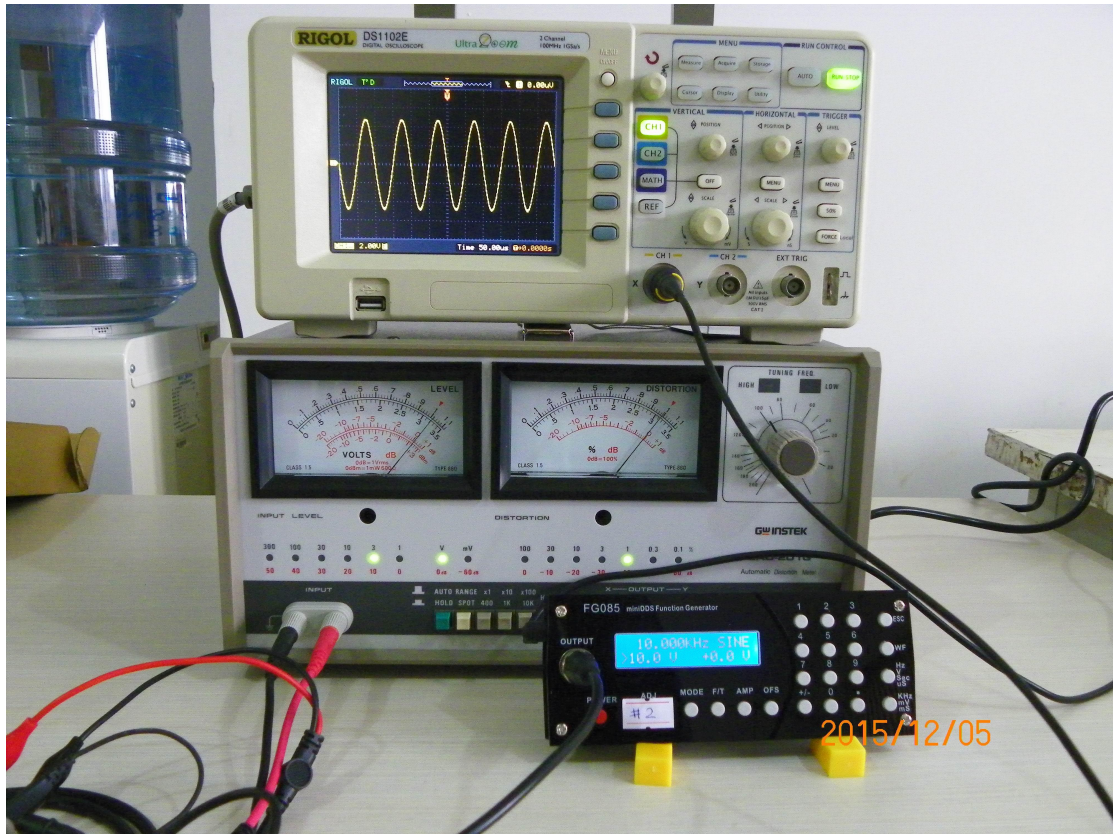
5Vpp -- Sample #4



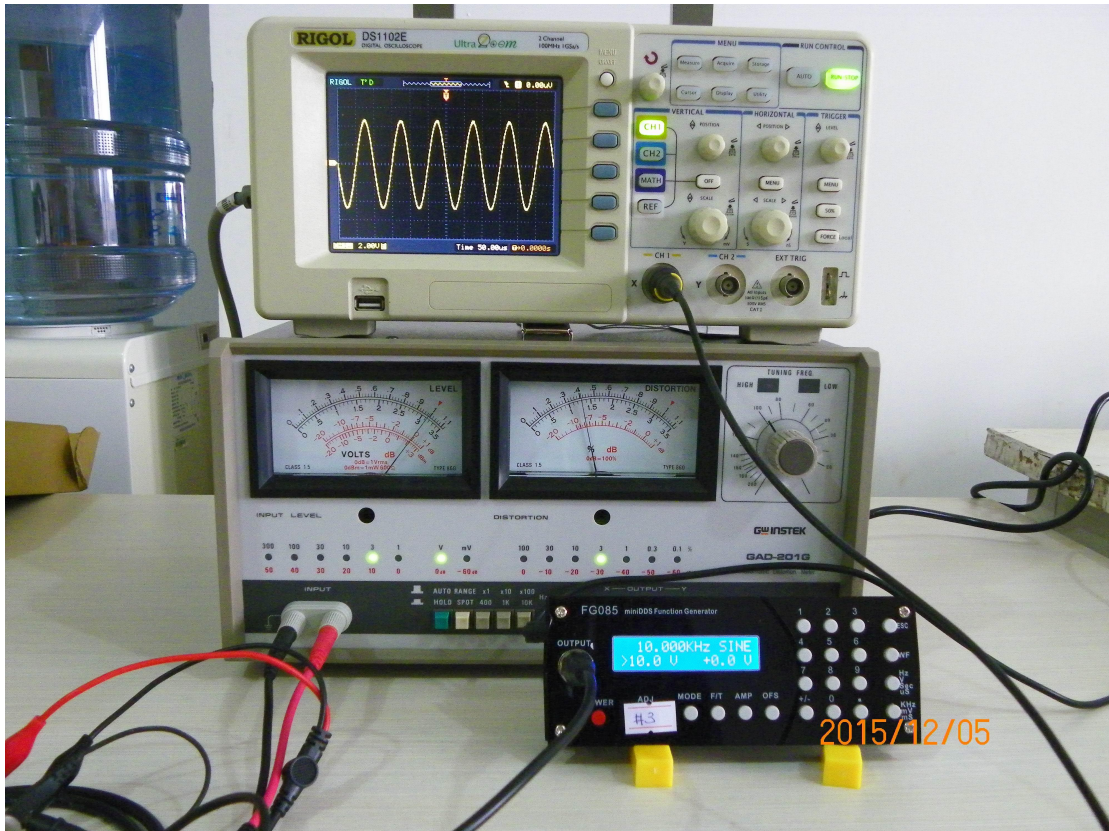
5Vpp -- Sample #5



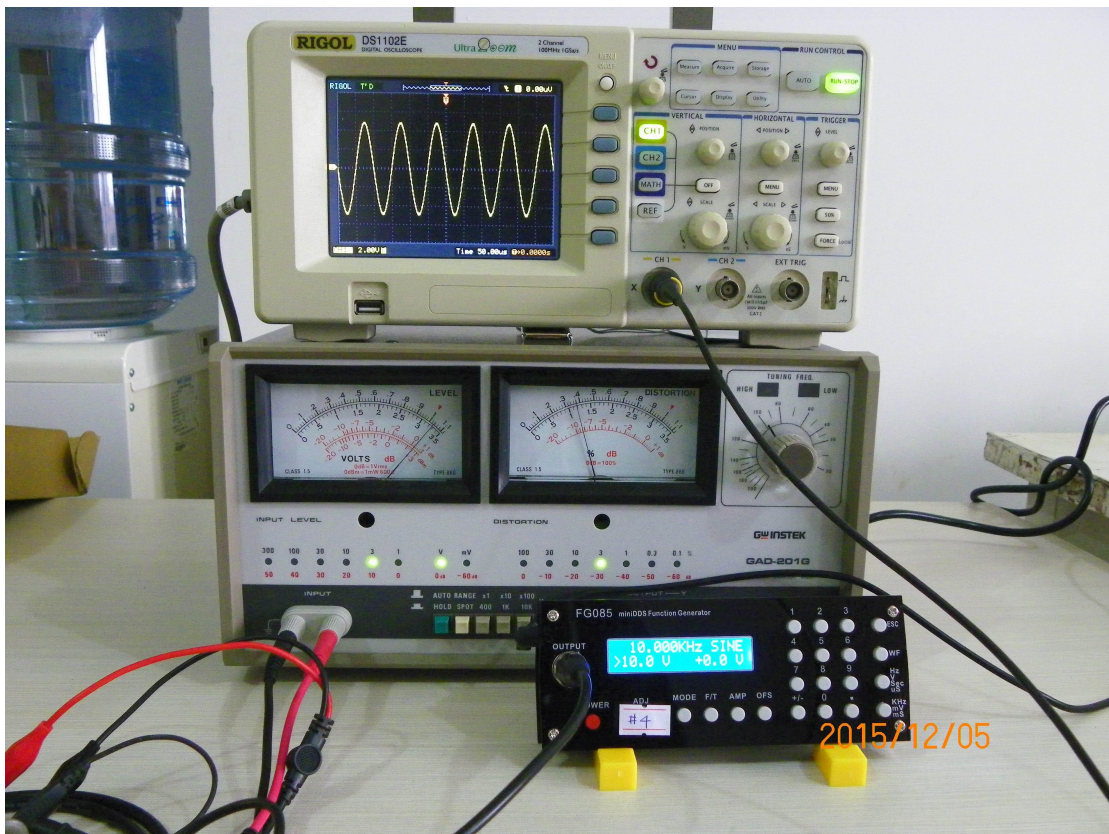
10Vpp -- Sample #1



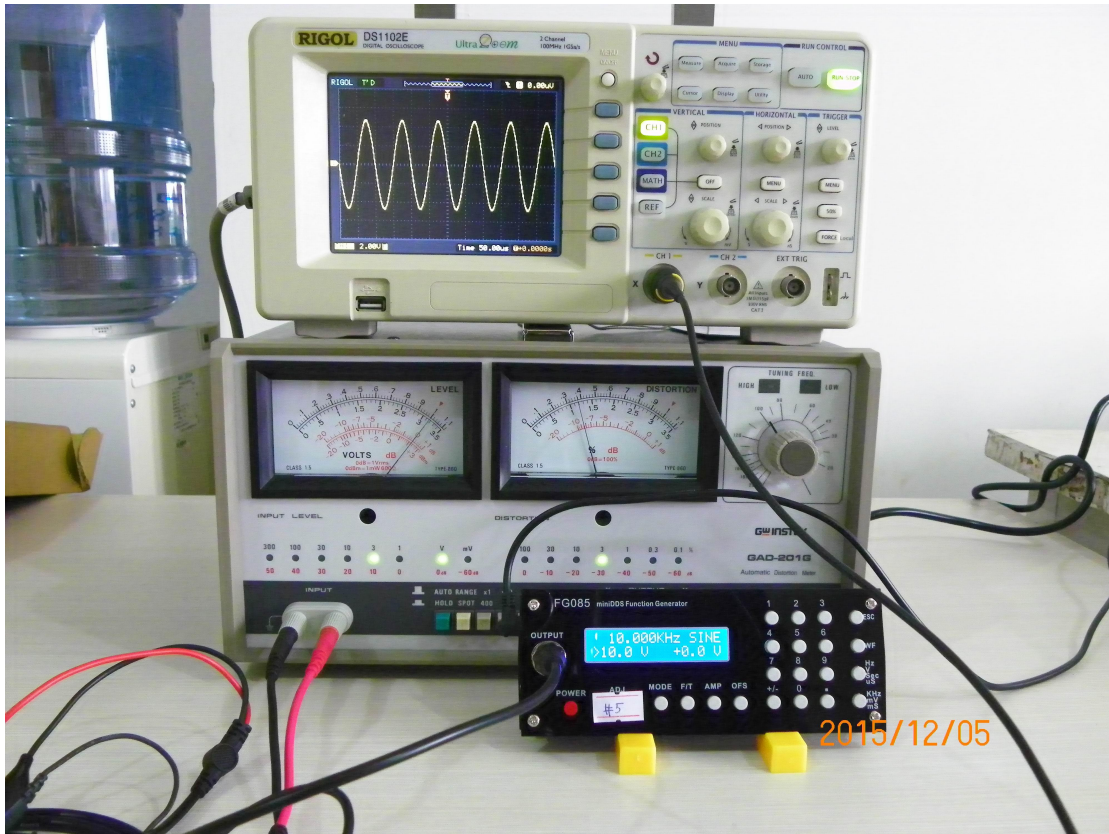
10Vpp -- Sample #2



10Vpp -- Sample #3



10Vpp -- Sample #4



10Vpp -- Sample #5

10Vpp -- Sample #2



