

The function generator I have can control rise/fall time by 0.1[ns], and the minimum rise/fall time is 1.0[ns].

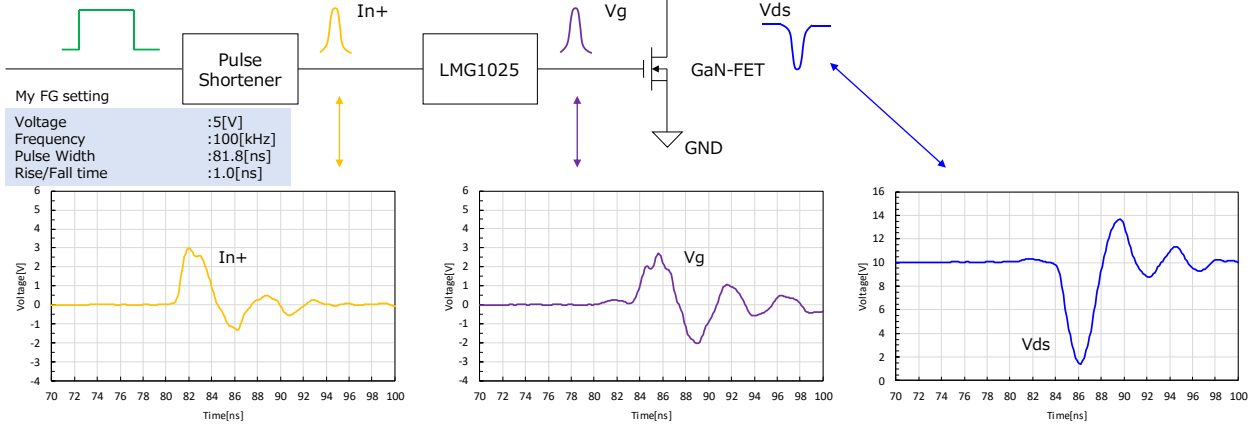
I tried to generate 1.0[ns] from the board while controlling pulse width and rise/fall time with FG, but I could not get reproducibility yet. In+ and Vg were still 2.0~3.0 [ns], and they were variable.

Moreover, I measured waveform of a resistor load voltage by differential probe because I think the waveform of the resistor relates the current of LD.

The result was 1.5[ns].

My question is below.

1. Did you measure FWHM of peak when you evaluated the pulse width(In+, Vg, and other pulse)?
2. If generating short pulse, are the pulse width and peak quite variable?(Is that stable?)
3. Is the pulse width of Vr shorter than In+ and Vg?



Also, I would like to give me your advice.

I made an experimental board which generates short pulse while referencing LMG1025-Q1EVM and documents.

Schematic and layout are almost same as the LMG1025-Q1EVM.(I used LMG1020 and epc2019 actually.)

I measured the board, and rise waveform of the resistor load was fluctuating.

Do you know the cause of fluctuating?

