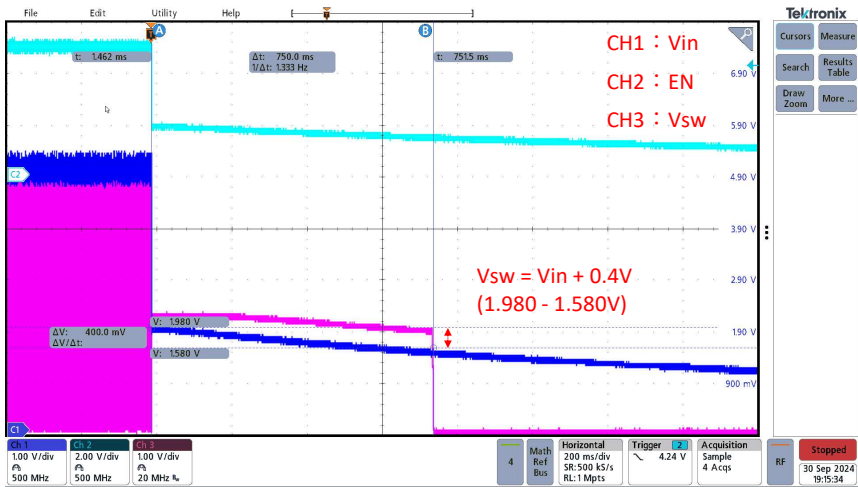


We have two questions about TPS62821.

- When the power supply of the product using TPS62821 is turned off , as shown in the waveform below, for a short period of time the voltage of Vsw is higher than the voltage of Vin.
The datasheet states that Vsw is Vin+0.3V for Absolute Maximum Ratings , but up to what voltage is actually permissible ?
- Are there any relaxation conditions, such as a period for which Vsw can exceed Vin+0.3V without any problems?

Measurement waveform



From datasheet

7.1 Absolute Maximum Ratings⁽¹⁾

		MIN	MAX	UNIT
Pin Voltage Range	VIN, FB, EN, PG, NC	-0.3	6	V
	SW (DC)	-0.3	VIN + 0.3	
	SW (DC, in current limit)	-1.0		
	SW (AC), less than 10ns ⁽²⁾	-2.5		
Power Good Sink Current			1	mA
Operating Junction Temperature Range, TJ		-40	150	°C
Storage temperature, Tstg		-65	150	°C

- (1) Stresses beyond those listed under *Absolute Maximum Ratings* may cause permanent damage to the device. These are stress ratings only, which do not imply functional operation of the device at these or any other conditions beyond those indicated under *Recommended Operating Conditions*. Exposure to absolute-maximum-rated conditions for extended periods may affect device reliability.
- (2) While switching.