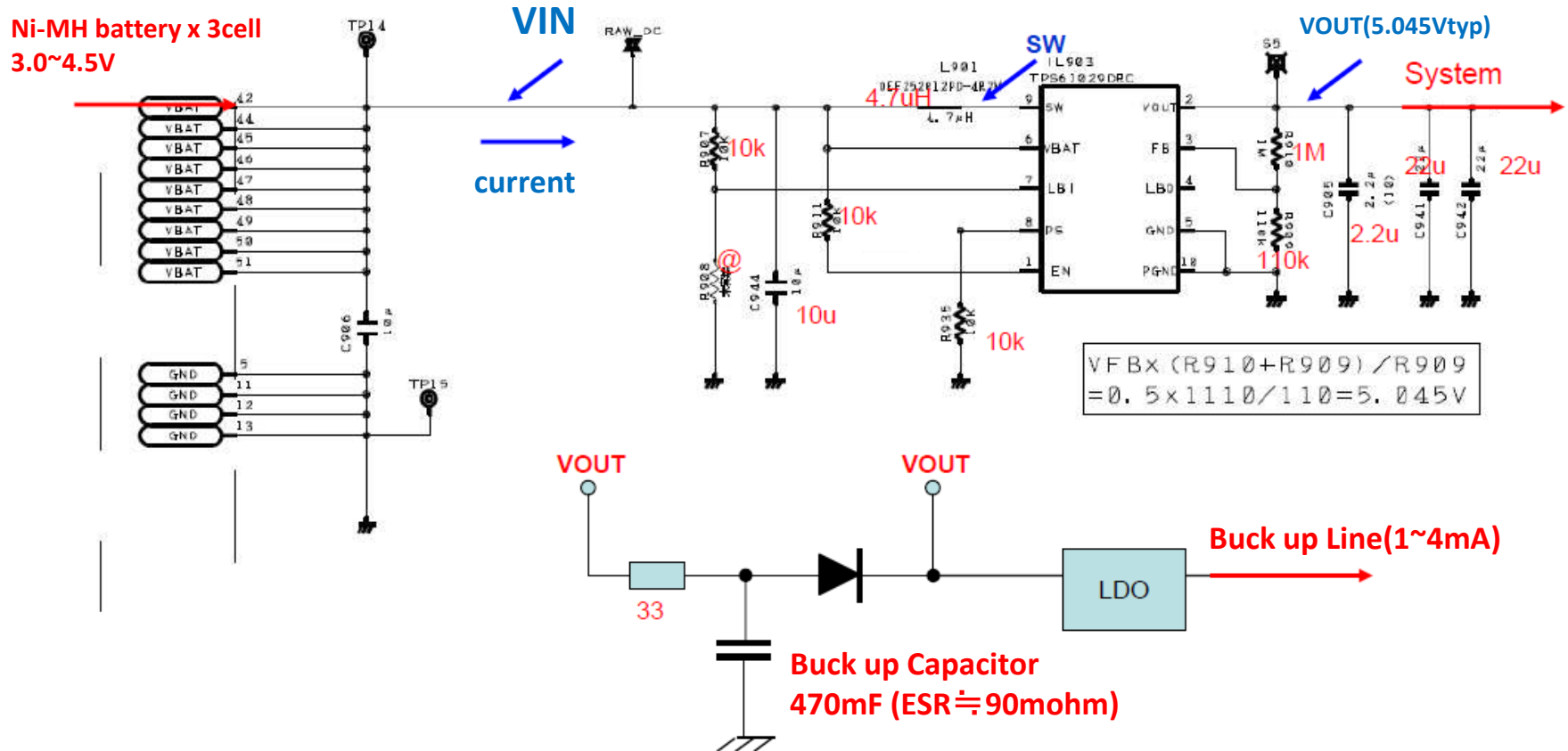
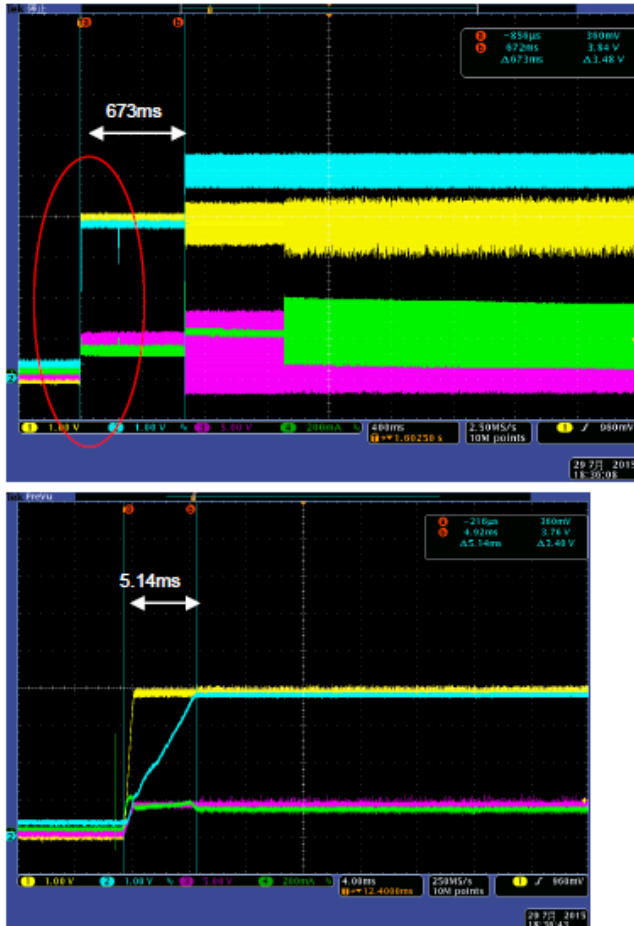


Our boost circuit of TPS61029

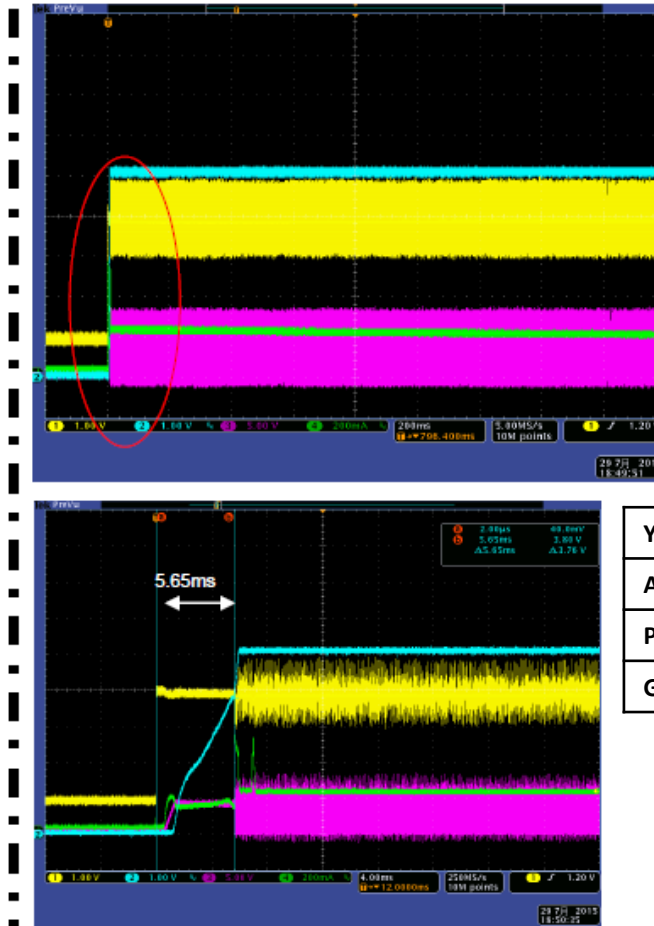


Indications (transient behavior shortly after inserting battery)

Zoom



Defective item (Soft start is too long)

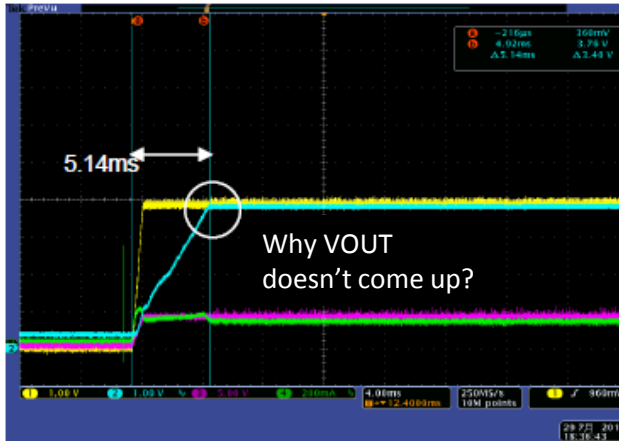


Good item

Yellow	VBAT
Aqua	VOUT
Pink	SW
Green	VBAT current

Some item have too long soft start and don't transit to PWM for long time(637ms).

Unmount the buck up capacitor from board

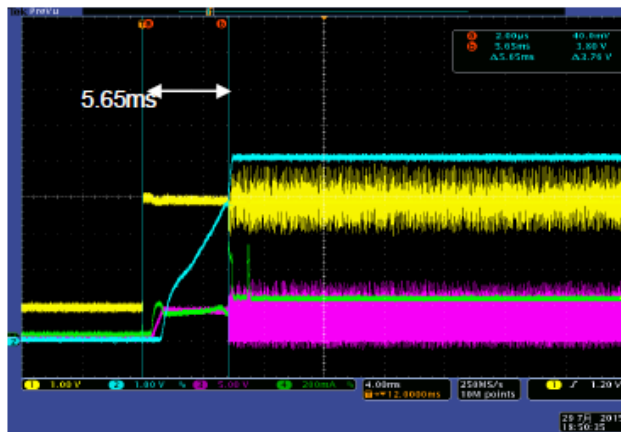


mount 470mF



unmount 470mF

Defective item (Soft start is too long)

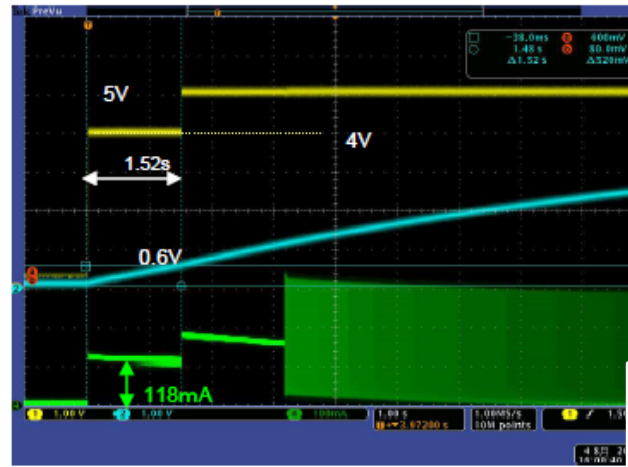
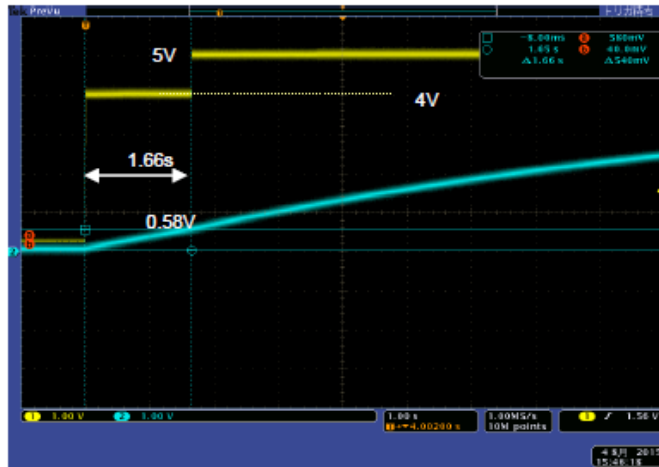


mount 470mF

Good item

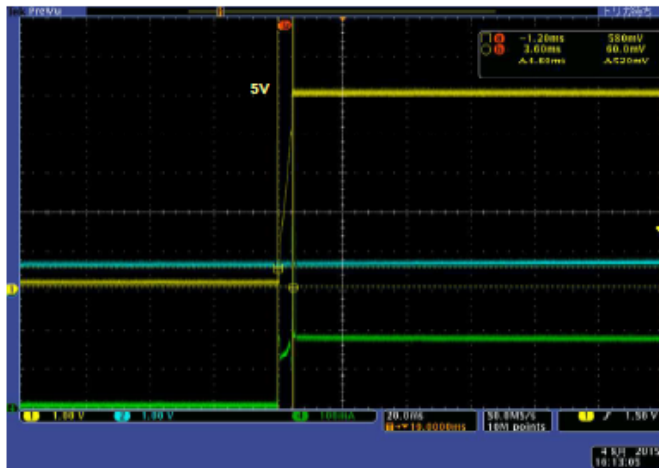
Yellow	VBAT
Aqua	VOUT
Pink	SW
Green	VBAT current

At sample having long soft start, we checked following. (VIN = 4.0V)



Yellow	VOUT
Aqua	Voltage of buck up capacitor
Green	VIN current

CHECK 1: The voltage of buck up capacitor (470mF) when PWM started
 → PWM started near 0.6V (of 470mF) every time.



Yellow	VOUT
Aqua	Voltage of buck up capacitor
Green	VIN current

CHECK 2: The behavior under being charged 0.6V (470mF)
 → PWM started shortly after power on.(4.8ms)