Theoretically Calculated Max Power Consumption of the STM32H7 System-On-Module @ 25°C

Description	Maximum Supply Current, mA @ 3.3V	Notes
STM32H7 CPU	220	Run mode: all peripherals enabled, 400MHz CPU clock; (with accordance to the STM32H75xB Datasheet)
	2.4	Stop mode: power domains D1, D2 in Standby, D3 Stop. Flash Off, no IWDT. Peripheral with wakeup from Stop mode capabilities (UART, SPI, I2C, LPTIM) are operational.
512Mbit QSPI NOR Flash	28	Fast read quad IO Dual Transfer Mode @80MHz (with accordance to the Micron MT25QL512ABB Datasheet)
	0.1	Standby
2 x 32MB SDRAM	120	Burst read/write at 143MHz (with accordance to the Alliance SDRAM AS4C32M16SA datasheet)
	4	Self Refresh
512Kbit I^{2}C EEPROM (optional)	2	Read/Write @ 1MHz (with accordance to the STM M24512-A125 Datasheet)
	0.003	Standby

Total Maximum Current Consumption, mA:	Run Mode	370
	Low Power Mode	6.5