Application Brief

AM62L Maximum Current Ratings

This document summarizes the maximum current ratings at the AM62L power terminals. Table 1 serves as a guide for designing power supplies. The current ratings in the table are worst-case estimates for each power supply group, and actual power supply currents for specific applications are typically lower. Actual power consumption must be verified in the real system. Maximum current ratings are preliminary and subject to change.

Table 1. Maximum Current Ratings at Power Terminals

POWER SUPPLY GROUP	SUPPLY NAME	CONDITION			MAX	UNIT
		VDD_CORE Voltage	Operating Junction Temperature Range	Arm® Cortex® -A53 # of cores and Performance		
CORE	VDD_CORE	0.75V	Extended industrial	Dual, 1250MHz	2000	mA
	VDDA_DDR_PLL0					
	VDDA_CORE_USB					
	VDDA_CORE_DSI_CLK					
	VDDA_CORE_DSI					
RTC Core	VDD_RTC (1)				10	mA
DDR	VDDS_DDR				200	mA
1.8V Digital	VDDS_OSC0				10	mA
1.8V Analog	VDDA_PLL0				100	mA
	VDDA_PLL1					
	VDDA_1P8_DSITX					
	VDDA_1P8_USB					
	VDDA_TEMP					
	VDDA_ADC					
WKUP IO	VDDS_WKUP				10	mA
RTC IO	VDDS_RCT				10	mA
1.8V IO	VDDS0				100	mA
	VDDS1					
1.8V/3.3V IO	VDDSHV0				150	mA
	VDDSHV1					
	VDDSHV2					
	VDDSHV3					
	VDDSHV4					
3.3V Supply	VDDA_3P3_SDIO				50	mA
	VDDA_3P3_USB					
eFuse	VPP				400	mA

(1) VDD_RTC shall be combined with the VDD_CORE power supply group and VDDS_RTC shall be combined with the I/O Power Supply group when not using "RTC only" and "RTC+IO+DDR" low power mode.

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