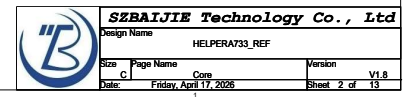
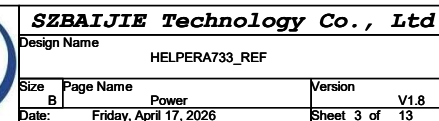
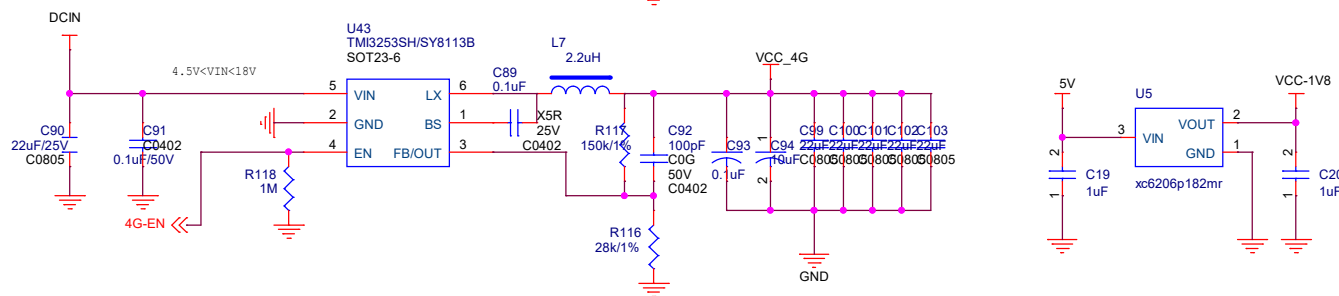
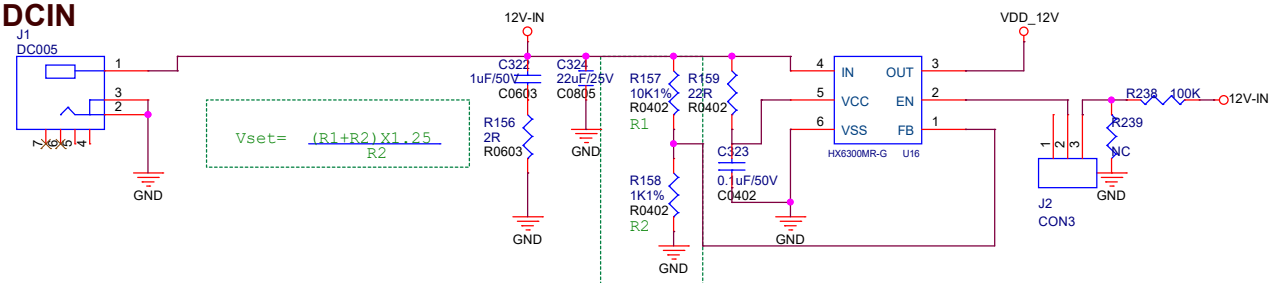


修改日志 (Change Logs)	
V1.3	首次对外发布版本 (First release)
V1.6	1 新增PCIE接口 (Newly added PCIE interface) 2 新增EDP接口 (Add a new EDP interface) 3 USB接口更改为2.0接口 (Change the USB interface to 2.0 interface.)
V1.7	1 修改电源过压保护电路 (Modify the overvoltage protection circuit of the power supply.) (02) 2 PCIE电路修改 (PCIE circuit modification) (07)
V1.8	1 PCIE电路修改 (PCIE circuit modification) (07)

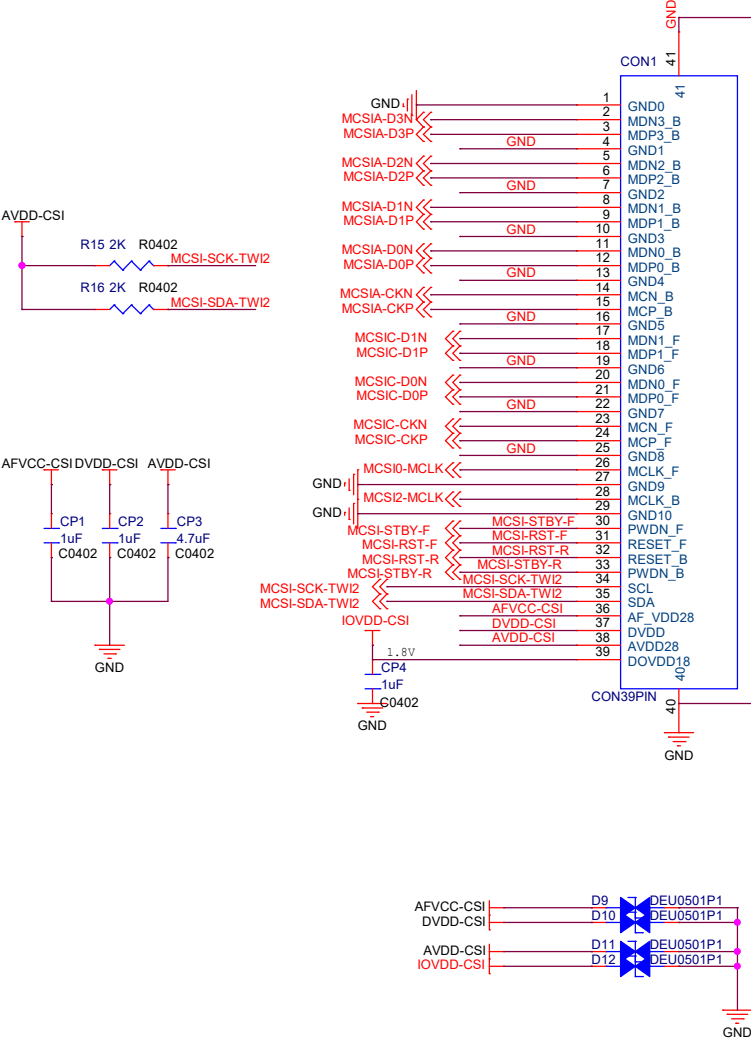


SZBAIJIE Technology Co., Ltd		
Design Name		
HELPERA733_REF		
Size	Page Name	Version
A	Revision History	V1.8
Date:	Friday, April 17, 2026	Sheet 1 of 13



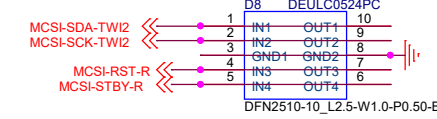
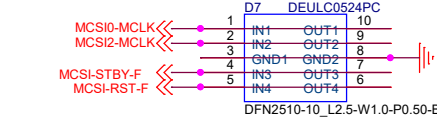
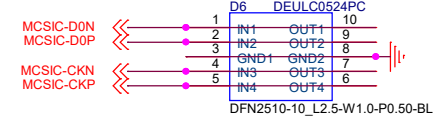
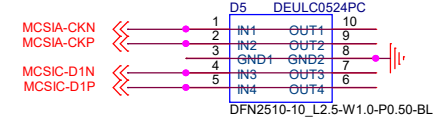
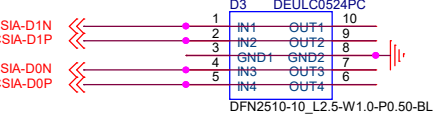
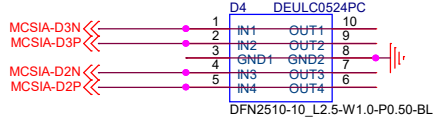


Camera

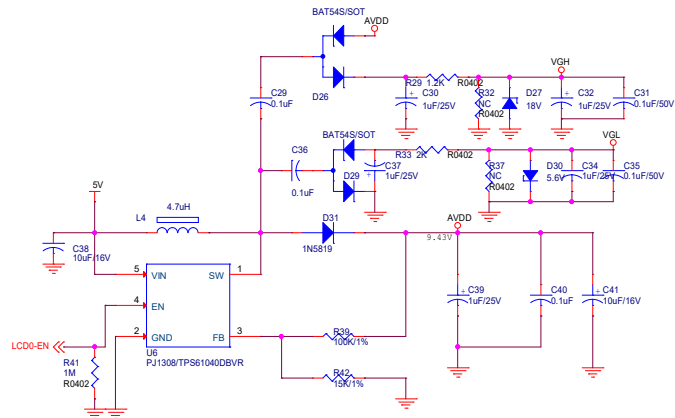
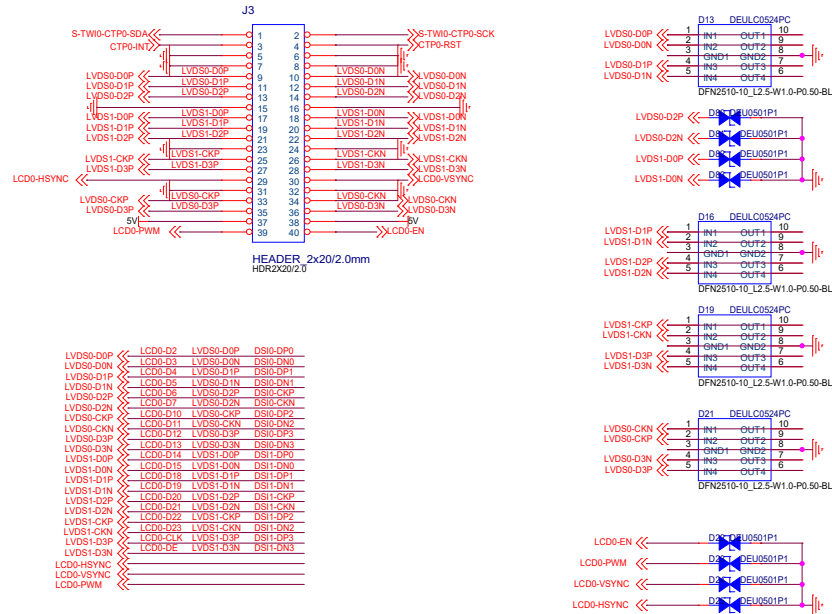


注意：
MCSIA和MCSIB、MCSIC和MCSID才能组合成4line使用，MCSIA和MCSIB用作4line时，需使用MCSIA的CLK，MCSIB的CLK可以悬空，也可以用作普通IO，其中MCSIA0、MCSIA1、MCSIB0、MCSIB1依次对应MCSIO1/2/3；MCSIC和MCSID用作4line时，需使用MCSIC的CLK，MCSID的CLK可以悬空，也可以用作普通IO，其中MCSIC0、MCSIC1、MCSID0、MCSID1依次对应MCSIO1/2/3
Attention:

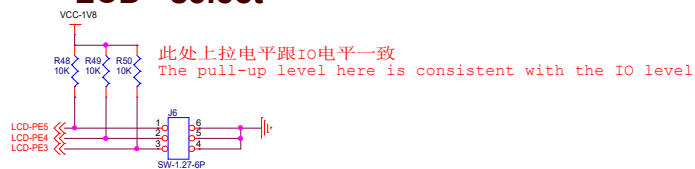
MCSIA和MCSIB、MCSIC和MCSID可以组合成4line使用，当MCSIA和MCSIB用作4line时，需使用MCSIA的CLK，MCSIB的CLK可以悬空，也可以用作普通IO，其中MCSIA0、MCSIA1、MCSIB0、MCSIB1依次对应MCSIO1/2/3；MCSIC和MCSID用作4line时，需使用MCSIC的CLK，MCSID的CLK可以悬空，也可以用作普通IO，其中MCSIC0、MCSIC1、MCSID0、MCSID1依次对应MCSIO1/2/3
The CLK of MCSIB can be suspended or used as normal IO, where MCSIA0, MCSIA1, MCSIB0, and MCSIB1 are displayed corresponding to MCSIO1/2/3;
MCSIC and MCSID are used as 4lines, the CLK of MCSIC and CLK of MCSID are required. Can be suspended, can also be used as ordinary IO, where MCSIC0, MCSIC1, MCSID0, and MCSID1 correspond in sequence MCSIO1/2/3



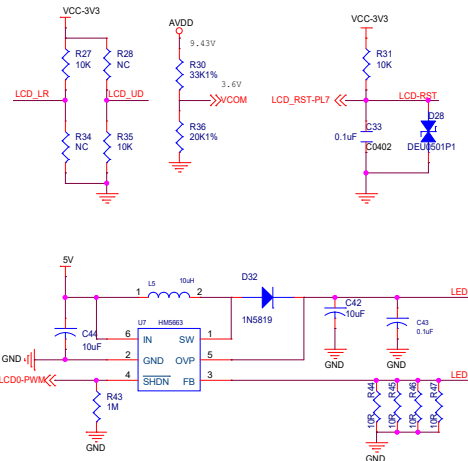
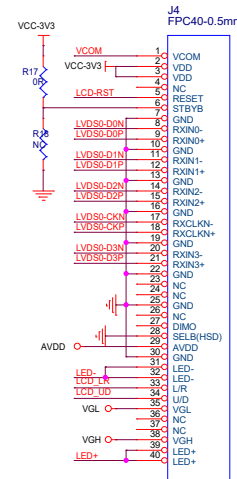
LCD



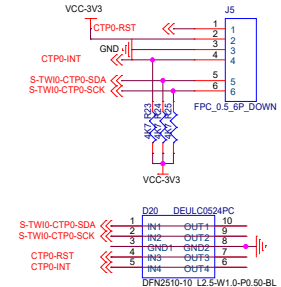
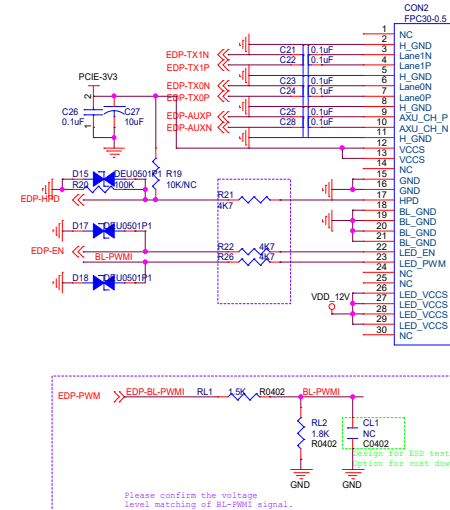
LCD select

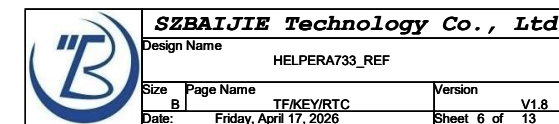
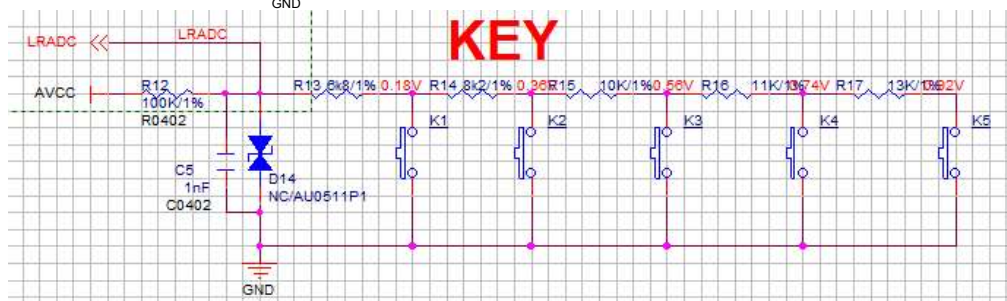
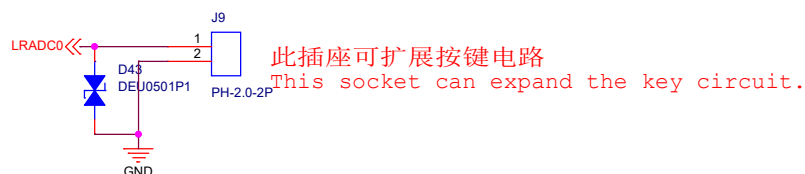
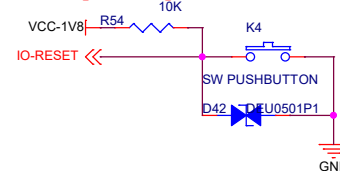
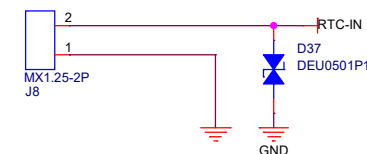
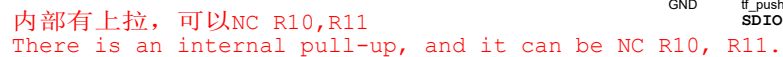


MIPI/LVDS

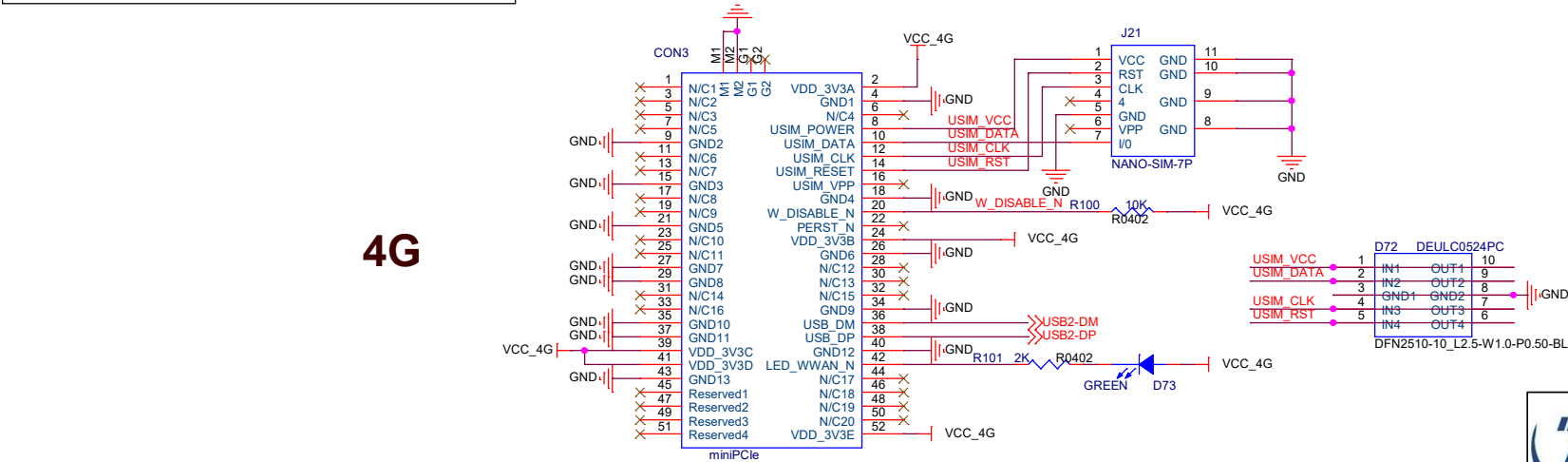
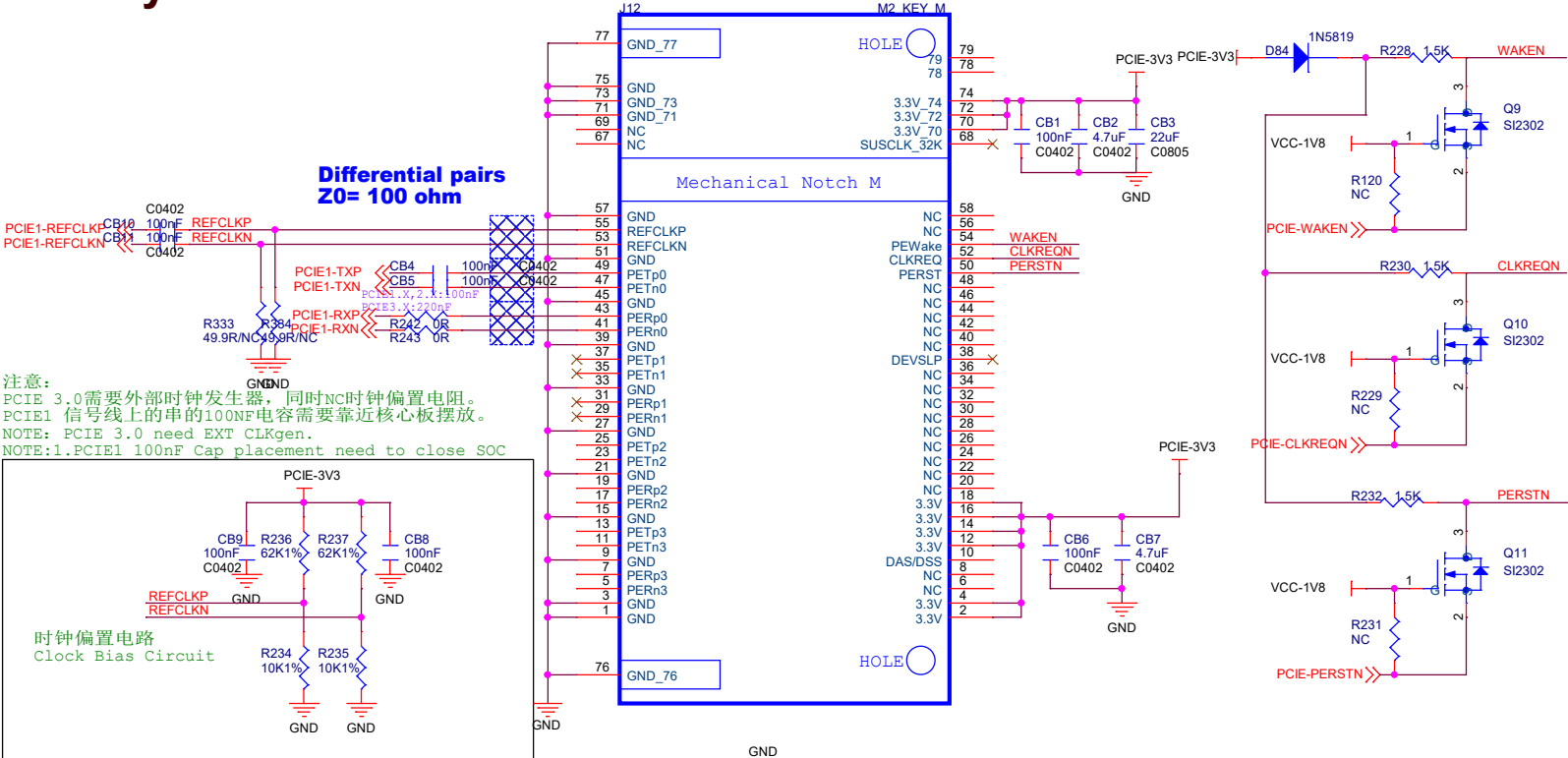


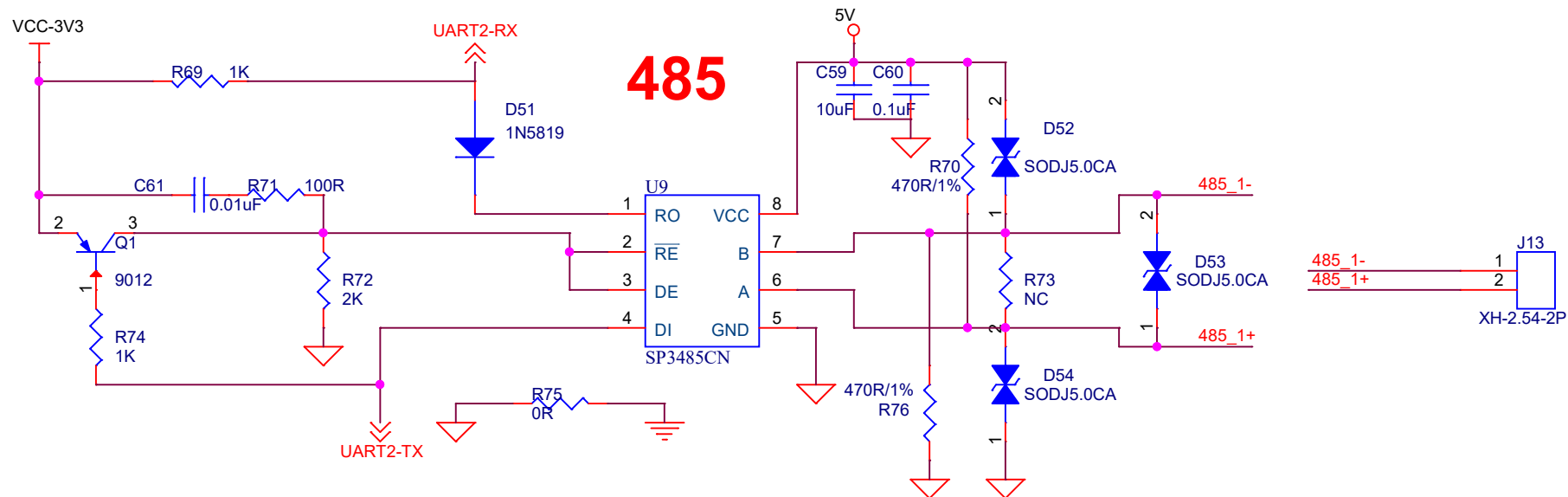
EDP



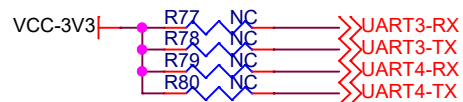
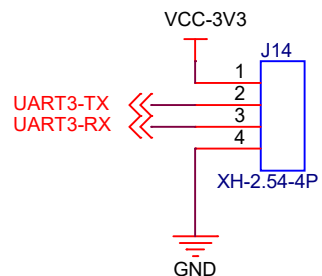


M.2 key M Slot

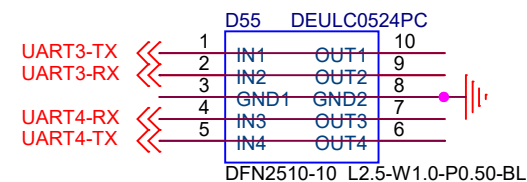
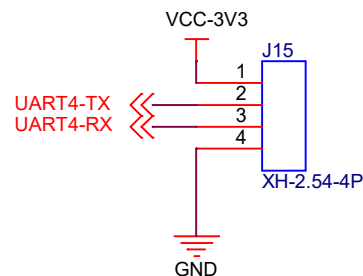




UART3



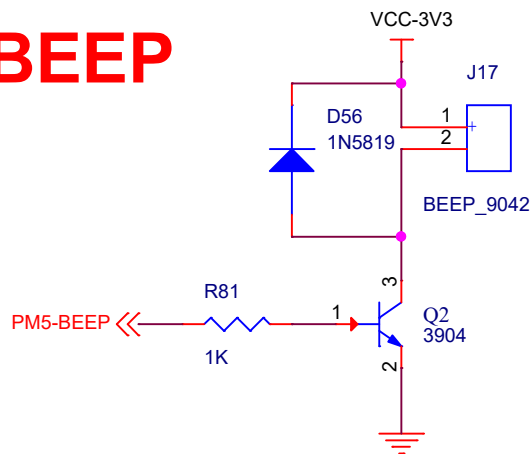
UART4



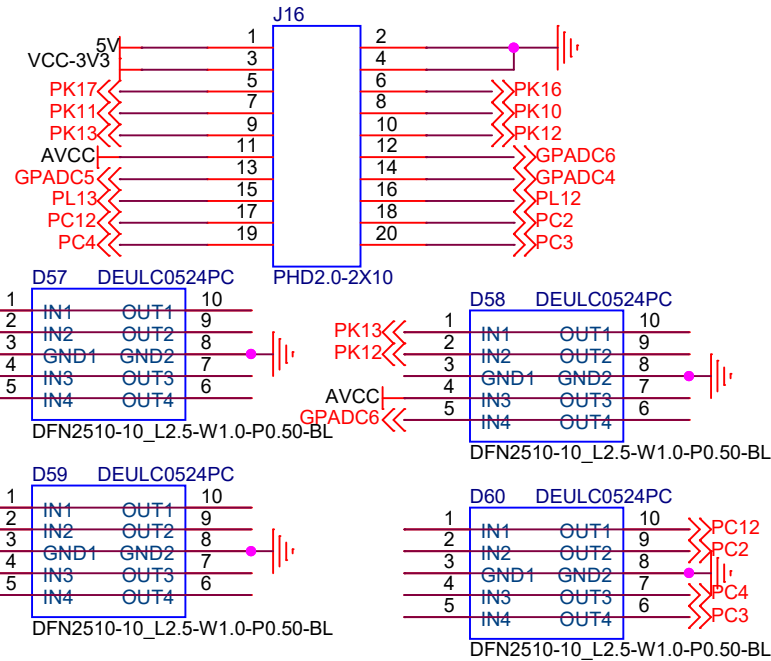
SZBAIJIE Technology Co., Ltd

Design Name		HELPERA733_REF	
Size	Page Name	Version	
A	UART/485	V1.8	
Date:	Friday, April 17, 2026	Sheet 9 of 13	

BEEP

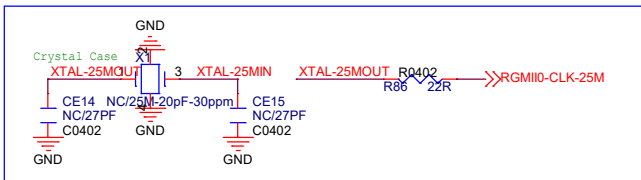
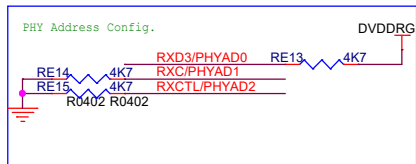
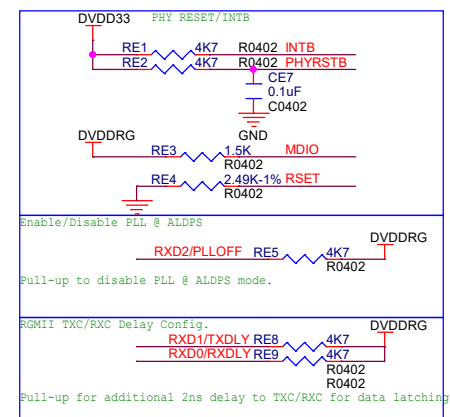
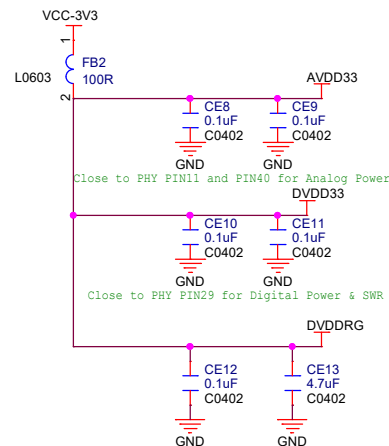
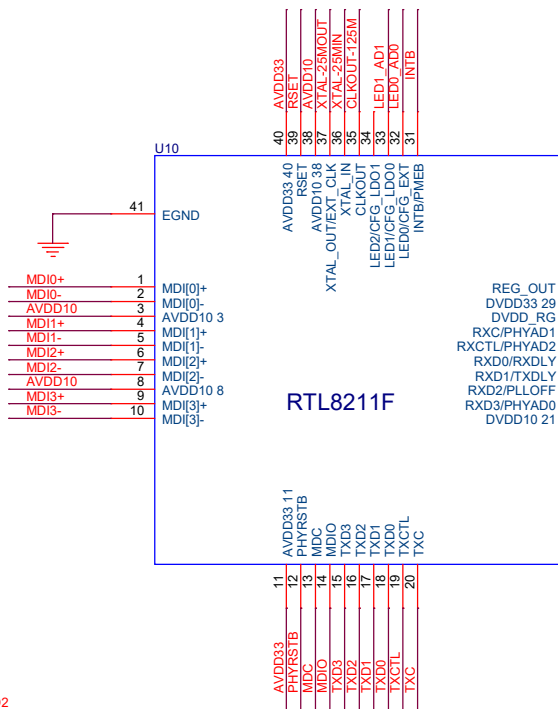
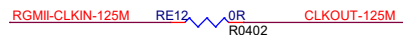
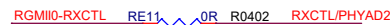
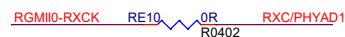
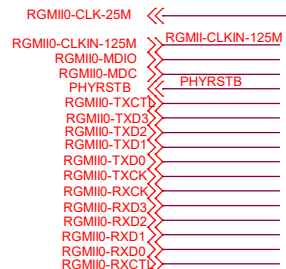
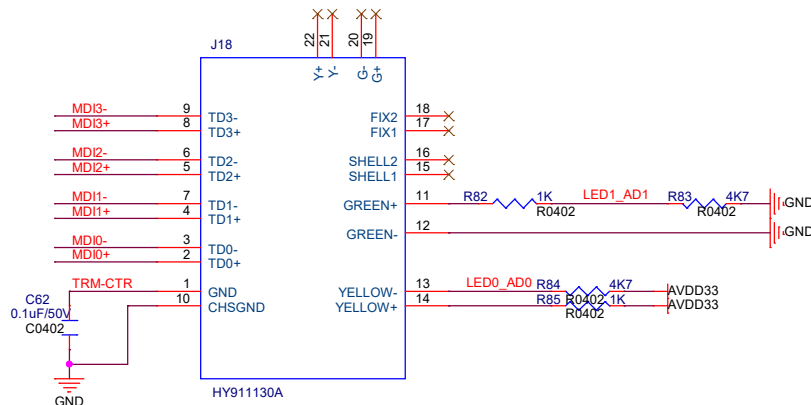
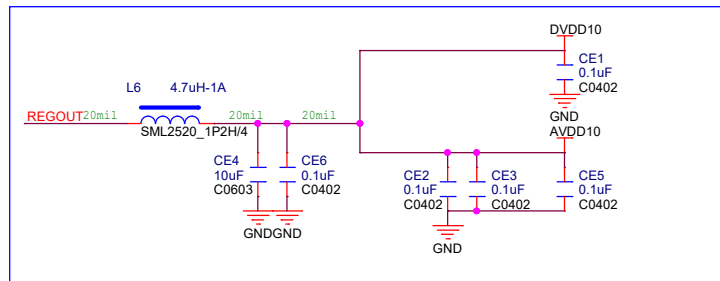


GPIO

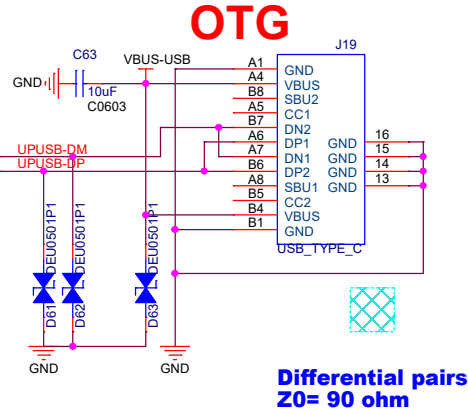
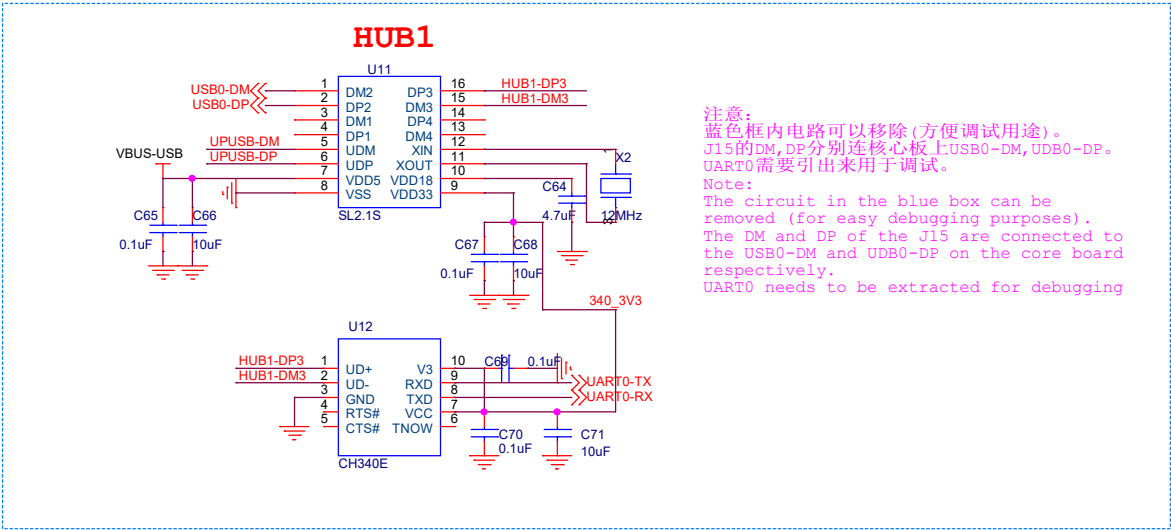


SZBAIJIE Technology Co., Ltd			
Design Name		HELPERA733_REF	
Size	Page Name	Version	
A	IO/ADC/BEEP	V1.8	
Date:	Friday, April 17, 2026	Sheet	10 of 13

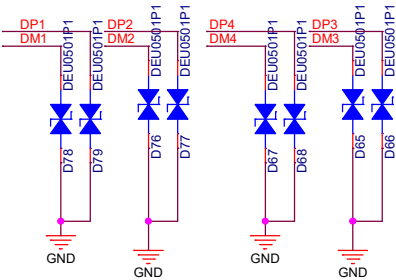
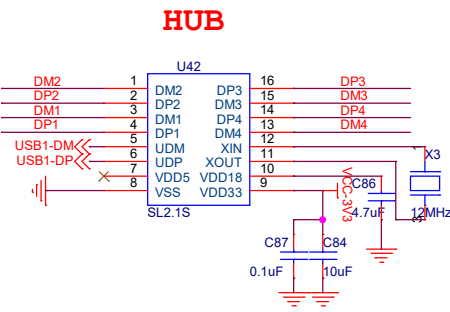
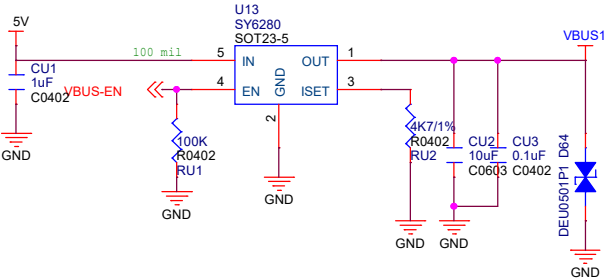
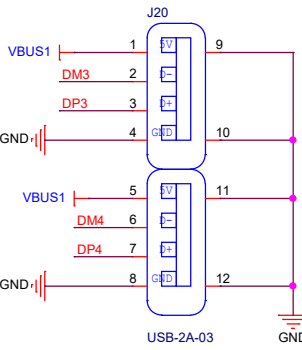
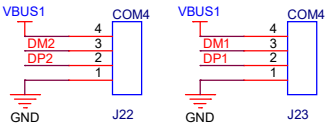
ETH



TYPEC

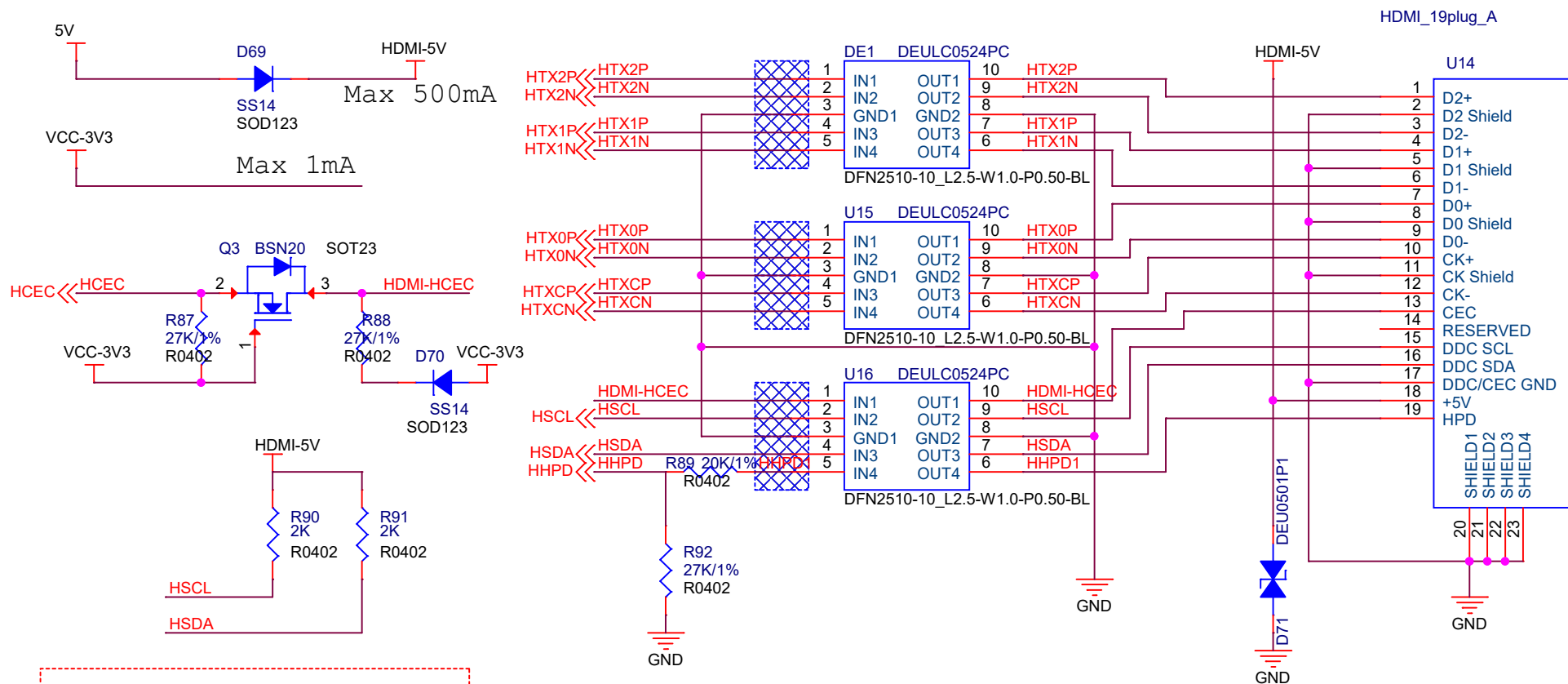


USB2.0



HDMI

Differential pairs
Z0= 100 ohm



修复HCEC与HDMI-HCEC连接
Fix HCEC connection error with HDMI-HCEC

注意，此处信号为TypeA排列，
和TypeB,C座子信号排列不同



SZBAIJIE Technology Co., Ltd

Design Name		HELPERA733_REF	
Size	Page Name	Version	V1.8
A	HDMI		
Date:	Friday, April 17, 2026	Sheet	13 of 13