

Mandarinfish

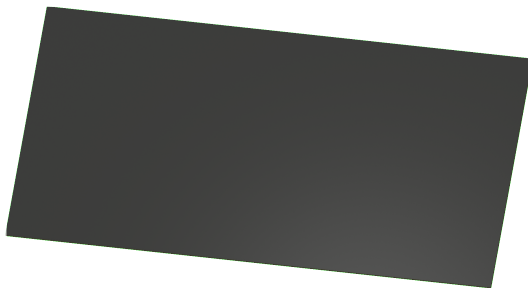
Variant: DRAFT

2025-12-14

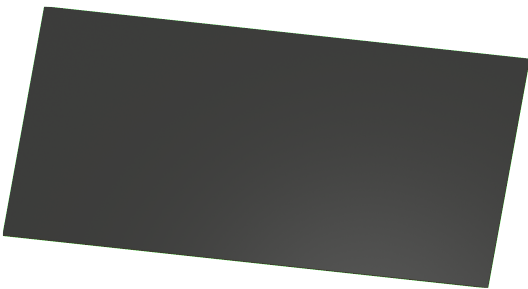
Rev + (Unreleased)

Page	Index	Page	Index	Page	Index	Page	Index
1	Cover Page	11		21		31	
2	Block Diagram	12		22		32	
3	Project Architecture	13		23		33	
4	MCU	14		24		34	
5	POWER	15		25		35	
6	IMU	16		26		36	
7	Screen	17		27		37	
8	Revision History	18		28		38	
9	Power - Sequencing	19		29		39	
10		20		30		40	

TOP VIEW



BOTTOM VIEW



NOTES

Comment

Not fitted components are marked as **X**

DRAFT - Very early stage of schematic, ignore details.

PRELIMINARY - Close to final schematic.

CHECKED - There shouldn't be any mistakes. Contact the engineer if you find any.

RELEASED - A board with this schematic has been sent to production.

Date: 14-Dec-2025

DESIGN CONSIDERATIONS

DESIGN NOTE:
Example text for informational design notes.

DESIGN NOTE:
Example text for debug notes.

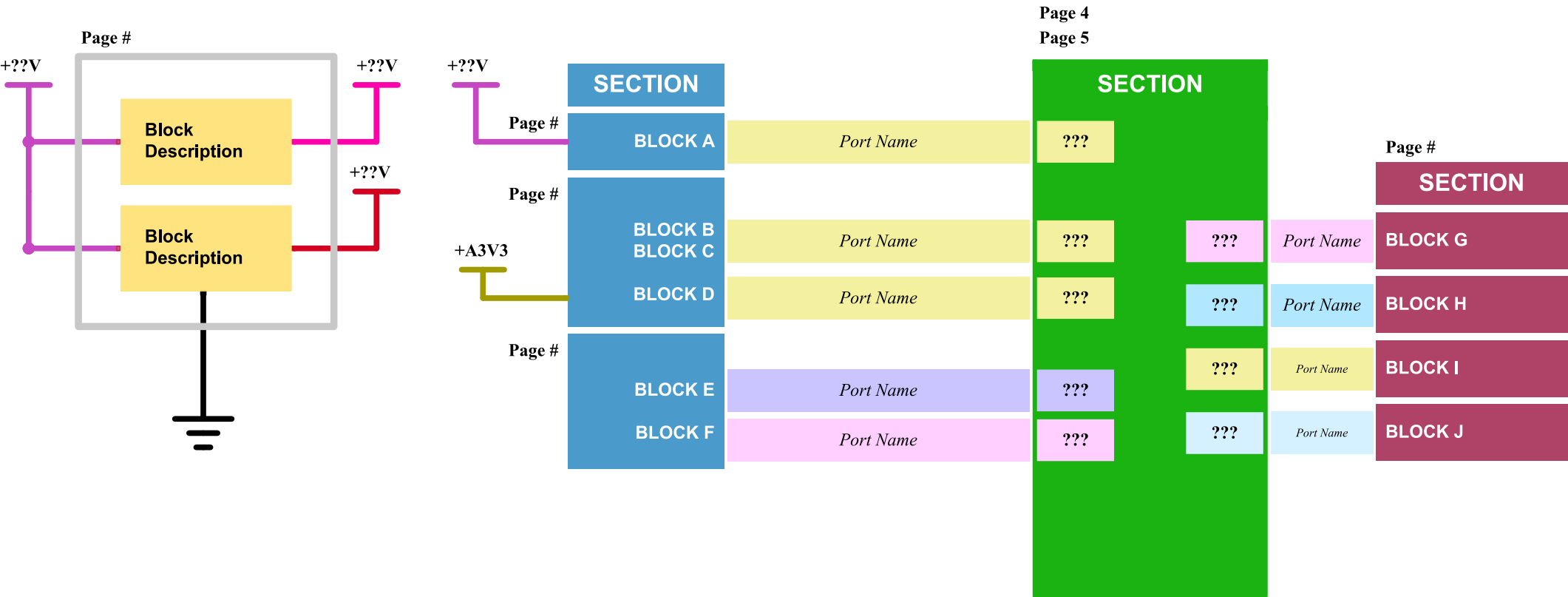
DESIGN NOTE:
Example text for cautionary design notes.

DESIGN NOTE:
Example text for critical design notes.

LAYOUT NOTE:
Example text for critical layout guidelines.

	Comments:	Company: Company Name		Variant: DRAFT	Git Hash: 231f62d
	Sheet Title:	Board Name: Mandarinfish		Project Name: OpenTamagochi	
	Sheet Path: /	File Name: OpenTamagochiHardware.kicad_sch	Designer: Enrique Ramirez	Date: 2025-01-12	Revision: + (Unreleased)
			Reviewer:	Size: A3	Sheet: 1 of 9

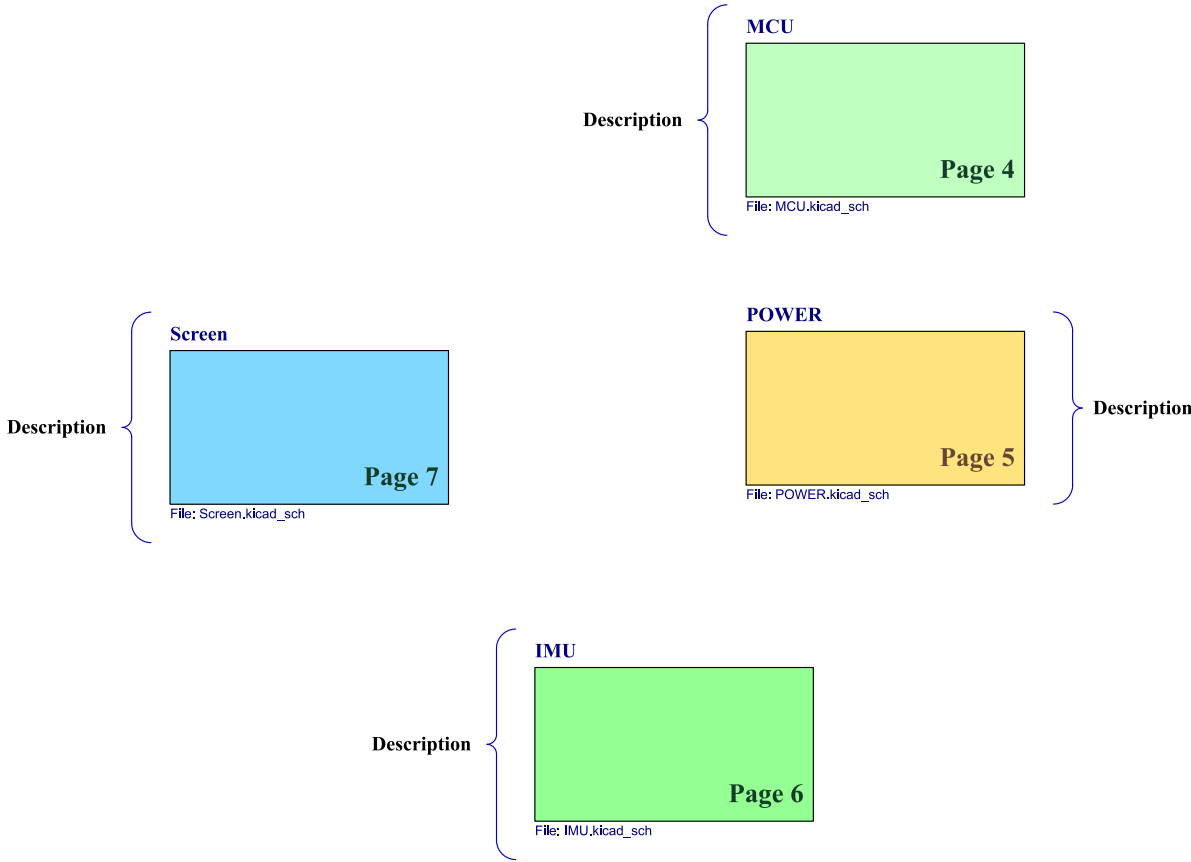
[2] Block Diagram



Target specifications:	
Input voltage:	?? - ?? V
Spec 2	??
Spec 3	??
Spec 4	??

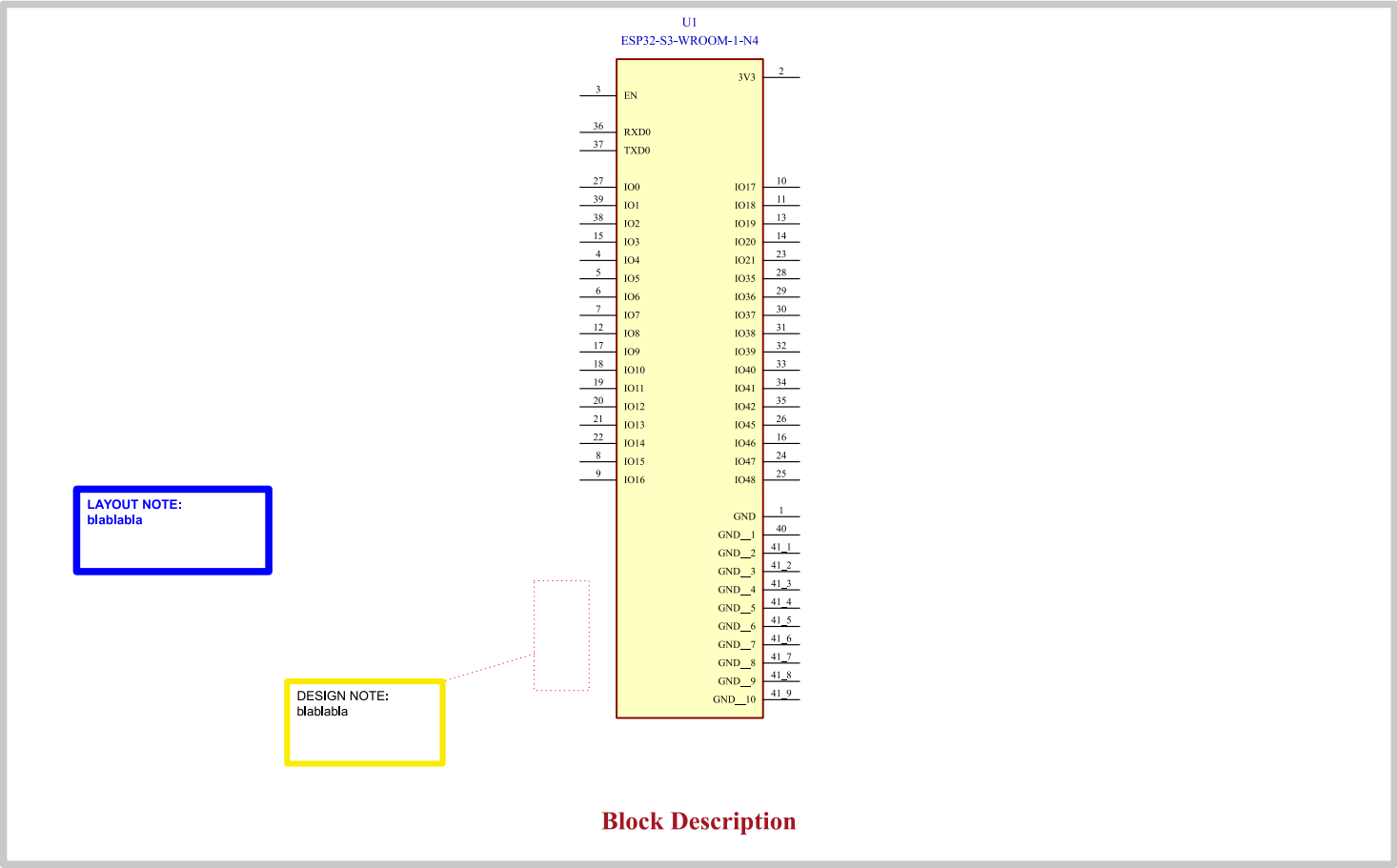
	Comments:	Company: Company Name		Variant: DRAFT	Git Hash: 231f62d
		Board Name: Mandarinfish		Project Name: OpenTamagochi	
	Sheet Title: Block Diagram	File Name: Block Diagram.kicad_sch	Designer: Enrique Ramirez	Date: 2025-01-12	Revision: + (Unreleased)
Sheet Path: /Block Diagram/			Reviewer:	Size: A3	Sheet: 2 of 9

[3] Project Architecture



	Comments:	Company:		Variant:		Git Hash:	
		Company Name		DRAFT		231f62d	
		Board Name:			Project Name:		
		Mandarinfish			OpenTamagochi		
	Sheet Title:	File Name:		Designer:	Date:	Revision:	
Project Architecture	Project Architecture.kicad_sch		Enrique Ramirez	2025-01-12	+ (Unreleased)		
Sheet Path:			Reviewer:	Size:	Sheet:		
/Project Architecture/				A3	3 of 9		

[4] MCU



	Comments: AN5346 STM32G474 Datasheet p.81 J. Pieper ADC investigation		Company: Company Name		Variant: DRAFT	Git Hash: 231f62d
			Board Name: Mandarinfish		Project Name: OpenTamagochi	
	Sheet Title: MCU		File Name: MCU.kicad_sch	Designer: Enrique Ramirez	Date: 2025-01-12	Revision: + (Unreleased)
	Sheet Path: /Project Architecture/MCU/		Reviewer:		Size: A4	Sheet: 4 of 9

[5] Power										
<div></div> <div>DESIGN NOTE: blabla</div> <div>DESIGN NOTE: blabla</div> <div>LAYOUT NOTE: blabla</div> <div>Block Description</div>			<div>Block Description</div>				<div></div>			
			<div>Block Description</div>							
			<div>Block Description</div>							
			<div>Block Description</div>							
			<div>Block Description</div>							
<div>Block Description</div>			<div>Block Description</div>				<div>Block Description</div>			
<div>Block Description</div>			<div>Block Description</div>				<div>Block Description</div>			
<div>Block Description</div>			<div>Block Description</div>				<div>Block Description</div>			
					Comments:		Company:		Variant:	Git Hash:
					References:		Company Name		DRAFT	231f62d
					Flexible I/O worked examples		Board Name:		Project Name:	
					Flexible I/O source configuration		Mandarinfish		OpenTamagochi	
Sheet Title:		File Name:	Designer:	Date:	Revision:					
Power		POWER.kicad_sch	Enrique Ramirez	2025-01-12	+ (Unreleased)					
Sheet Path:			Reviewer:		Size:	Sheet:				
/Project Architecture/POWER/					A3	5 of 9				

[6] screen					
<div><div>LAYOUT NOTE: blablabla</div><div>DESIGN NOTE: blablabla</div></div> <div>Block Description</div>					
			Comments: AN5346 STM32G474 Datasheet p.81 J. Pieper ADC investigation	Company: Company Name	Variant: DRAFT
			Sheet Title: screen	Board Name: Mandarinfish	Git Hash: 231f62d
			Sheet Path: /Project Architecture/IMU/	File Name: IMU.kicad_sch	Project Name: OpenTamagochi
				Designer: Enrique Ramirez	Date: 2025-01-12
				Reviewer:	Revision: + (Unreleased)
				Size: A4	Sheet: 6 of 9

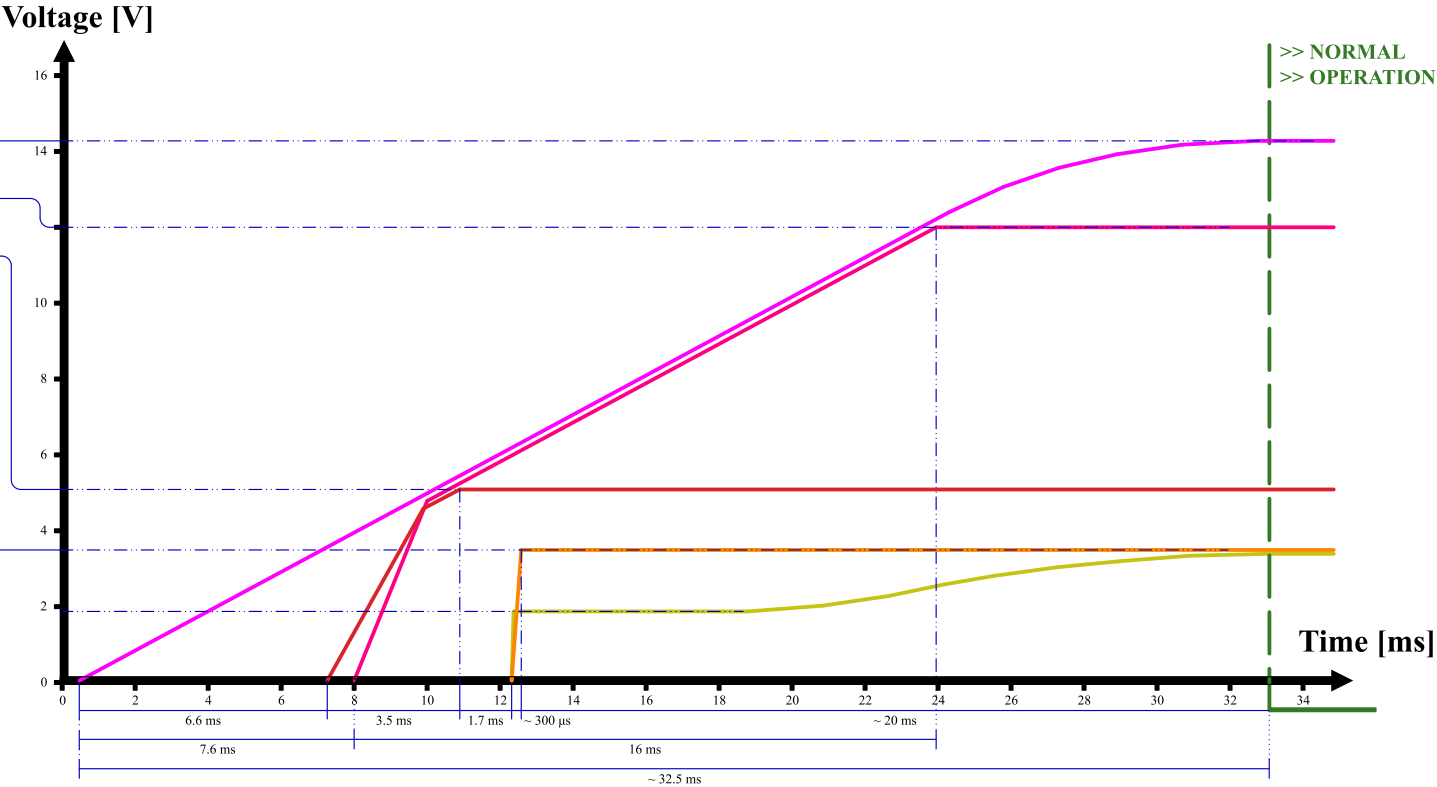
[7] screen											
<div><div>LAYOUT NOTE: blablabla</div><div>DESIGN NOTE: blablabla</div></div> <div>Block Description</div>											
		Comments: AN5346 STM32G474 Datasheet p.81 J. Pieper ADC investigation		Company: Company Name		Variant: DRAFT		Git Hash: 231f62d			
				Board Name: Mandarinfish		Project Name: OpenTamagochi					
		Sheet Title: screen		File Name: Screen.kicad_sch		Designer: Enrique Ramirez		Date: 2025-01-12		Revision: + (Unreleased)	
		Sheet Path: /Project Architecture/Screen/				Reviewer:		Size: A4		Sheet: 7 of 9	

[8] Revision History

	Comments:	Company: Company Name		Variant: DRAFT	Git Hash: 231f62d
		Board Name: Mandarinfish		Project Name: OpenTamagochi	
	Sheet Title: Revision History	File Name: Revision History.kicad_sch	Designer: Enrique Ramirez	Date: 2025-01-12	Revision: + (Unreleased)
	Sheet Path: /Revision History/		Reviewer:	Size: A4	Sheet: 8 of 9

[9] Power - Sequencing

NAME	SOURCE	LEVEL
+V??	??	? - ? ± ??%
+V??	??	? - ? ± ??%
+V??	??	? - ? ± ??%
+V??	??	? - ? ± ??%
+V??	??	? - ? ± ??%



	Comments:	Company:		Variant:	Git Hash:
		Company Name		DRAFT	231f62d
		Board Name:		Project Name:	
		Mandarinfish		OpenTamagochi	
	Sheet Title:	File Name:	Designer:	Date:	Revision:
	Power - Sequencing	Power - Sequencing.kicad_sch	Enrique Ramirez	2025-01-12	+ (Unreleased)
	Sheet Path:		Reviewer:	Size:	Sheet:
	/Power - Sequencing/			A4	9 of 9