



2026 MATE ROV Competition
Pushing Performance: Science, Technology, & Discovery in Harsh Environments
Non-ROV Device Safety Inspection Sheet
NAVIGATOR

Company Number:	Class: NAVIGATOR
Company Name:	Judge Name:

NAVIGATOR CLASS Non-ROV Device Power Specifications and Independent Sensors SAFETY CHECK LIST.
Companies must bring this check list with them to their safety inspection.

In 2026, only the vertical profiling float qualifies as a non-ROV device. Companies could possibly have an independent sensor or sensors as well.

Non-ROV device	
	ELEC-NRD-001: Non-ROV devices may be powered from the surface or from onboard batteries. Power is limited to 12 VDC maximum and 5 amps maximum.
	Companies powering their float from the surface are required to plug into the MATE power supply using red/black Anderson powerpole connectors.
	All power for the float must go through a single fuse.
	ELEC-NRD-002: The device may not utilize cameras. Thrusters are allowed.
	ELEC-NRD-003: Onboard power is allowed for non-ROV devices. If onboard batteries are being used, the following specifications must be met:
	• AAA, AA, C, D or 9V NiMH or AGM batteries are allowed. Alkaline batteries are NOT allowed.
	• Batteries are mounted in a manner that they are not loose inside the container.
	• A single fuse that will shut down all power sources if blown is included.
	• A fuse (5 amps max) must be installed within 5 cm of the battery positive terminal.
	• All fuses must be able to be visually inspected through a clear housing or upon opening the float.
	• Batteries must use a cartridge, ATO or Mini type blade fuse. All fuses must adhere to the standard color codes.

	• Battery Type Limitations NiMH AA battery packs are limited to 2A NiMH C or D battery packs are limited to 5A NiMH 9V battery packs are limited to 200mA Larger NiMH 12-volt batteries (not battery packs) are limited to 5A
	• Full load amp value was calculated and used to select the proper fuse size.

If using onboard batteries	
	• The enclosure housing must be designed so that it will open if the pressure inside the housing is greater than the outside pressure
	• Any pressure relief plug MUST be at least 2.5 cm in diameter.
	• The enclosure housing must be designed so that it will release pressure if pressure inside the housing is greater than the outside pressure. Under no condition should the housing be built with fasteners to hold the device together if there is no pressure release valve.