

## Team Update 13

### General

#### Changes to G419

Based on observations from Week Zero scrimmages and input from referees and key volunteers in the community we've made changes to the wording of G419. Our goal is to reduce the number of accidental penalties incurred by ROBOTS driving in the BARGE ZONE and attempting to climb while still disallowing contact with the ANCHOR to ease the climbing challenge.

The removal of MOMENTARY from the exception is intended to allow additional exceptions to this rule for actions that were seen during Week Zero that were inconsequential but longer than MOMENTARY. The added blue box is intended to define which actions we consider consequential and inconsequential. Teams should continue to design their ROBOT in ways that do not utilize the ANCHOR during their climbs as intentional contact will likely be a violation of this rule.

#### VH-109 Radio Firmware Update

Vivid-Hosting has released a [critical firmware update](#) for the VH-109 radio and recommends that all teams update to version 1.3.0 as soon as possible. Radios must be updated to at least 1.3.0 for use at official 2025 FIRST Robotics Competition events.

#### FIELD Drawings

The [Field Drawings](#) have been updated to indicate the correct color of REEF Scoring Pipe: RAL-4008.

### Game Manual

#### 6.5.2 ROBOT Scoring Criteria

To qualify for CAGE points, a ROBOT must be contacting one and only one **of their ALLIANCE'S CAGES** (and not touching any ANCHOR), not contacting the carpet, and may additionally contact only the following elements:

- A. SCORING ELEMENTS,
- B. another ROBOT qualified for CAGE points,
- C. a partner ROBOT contacted by an opponent in violation of [G428](#), and
- D. an opponent ROBOT.

#### 6.6 Violations

~~Upon any instance of a rule violation, unless otherwise noted, 1 or more of the penalties listed in Table 6-3 are assessed.~~ **all violations are assigned for each instance of a rule violation. A description of the penalties are listed in Table 6-3.** All rules throughout the Game Rules section are called as perceived by a REFEREE.

#### 6.8 Other Logistics

Once the MATCH is over and the Head REFEREE determines that the FIELD is safe for FIELD STAFF and DRIVE TEAMS, they or their designee change the FIELD lights to green and DRIVE TEAMS may retrieve their ROBOT. **Some MATCHES may include a short period afterward for the REFEREES and official scorers to confirm SCORING ELEMENT counts prior to finalizing the score. This period is indicated with purple lights on the team signs and the word "count" displayed. TEAMS are not allowed on the field during this time.**

## 7.2 Conduct

### G210 \*Don't expect to gain by doing others harm.

- C. forcing an opponent ROBOT to CONTROL more than 1 of either each SCORING ELEMENT and violate G409.

## 7.4.1 AUTO

**G401 \*Behind the lines.** In AUTO, a each DRIVE TEAM member must remain in their staged areas. A DRIVE TEAM member staged behind a HUMAN STARTING LINE may not contact anything in front of that HUMAN STARTING LINE, unless for personal or equipment safety, to press the E-Stop or A-Stop, or granted permission by a Head REFEREE or FTA.

*Violation: MINOR FOUL regardless of the number of items contacted.*

## 7.4.2 SCORING ELEMENTS

**G405 No opponents CAGES in AUTO.** In AUTO, a ROBOT may not contact an the opposing ALLIANCE's CAGES.

*Violation: MAJOR FOUL.*

**G406 \*ROBOTS: use SCORING ELEMENTS as directed.**

Examples include, but are not limited to:

- A. launching SCORING ELEMENTS at ROBOTS,
- B. using SCORING ELEMENTS to elevate ROBOTS in an attempt to get on a CAGE, and
- C. positioning SCORING ELEMENTS to impede opponent access to their PROCESSOR,
- D. Placing a CORAL into the PROCESSOR, and
- E. Using CORAL to dislodge ALGAE from the REEF

**G407 \*Keep SCORING ELEMENTS in bounds.** A ROBOT may not intentionally eject a SCORING ELEMENT from the FIELD (either directly or by bouncing off a FIELD element or other ROBOT) other than ALGAE through a PROCESSOR.

## 7.4.3 ROBOT

**G419 ANCHORS are off-limits.** A ROBOT may not contact the ANCHORS. Exceptions are granted for actions that are ~~MOMENTARY~~ and inconsequential.

*Violation: MAJOR FOUL and the ROBOT is ineligible for CAGE points.*

The intent of this rule is to disallow the use of the ANCHOR to ease the climbing challenge.

Examples of contact with the ANCHOR that are considered inconsequential include, but are not limited to:

- A. bumping into the ANCHOR during an attempt to climb
- B. inadvertent contact while attempting to PARK
- C. inadvertent contact while driving through the BARGE ZONE

Examples of contact with the ANCHOR that are considered consequential include, but are not limited to:

- D. Reacting against the ANCHOR to lift off the floor
- E. Reacting against the ANCHOR to stabilize the ROBOT (It is possible that certain interactions with the ANCHOR that absorb ROBOT energy may still be considered inconsequential.)
- F. Overtly contacting the ANCHOR to stop the movement of the CAGE (It is possible that certain interactions with the ANCHOR that absorb ROBOT energy may be still be considered inconsequential.)

#### 7.4.4 Opponent Interaction

**G427 ZONE protection.** A ROBOT may not contact, directly or transitively through a SCORING ELEMENT, an opponent ROBOT partially or fully inside the opponent's BARGE ZONE or REEF ZONE regardless of who initiates contact.

#### 8.9 OPERATOR CONSOLE

**R904 \*OPERATOR CONSOLE physical requirements.**

- C. extend more than 6 ft. 6 in. (~198 cm) above the floor while on the DRIVER STATION support shelf,  
or