



ROY COOPER
Governor

MICHAEL S. REGAN
Secretary

STEPHEN W. MURPHEY
Director

SH-3-2019

PROCLAMATION

RE: SHRIMP TRAWL BYCATCH REDUCTION DEVICE REQUIREMENTS – PAMLICO SOUND AND PORTIONS OF THE PAMLICO, BAY, AND NEUSE RIVERS

This proclamation supersedes proclamation SH-1-2019 (REVISED) dated April 23, 2019. It clarifies the mesh size requirements for the trawl body and tail bag/cod end and continues specific bycatch reduction device requirements for taking shrimp with trawls (except as described in Section IV.) in Pamlico Sound and the Pamlico, Bay, and Neuse rivers where up to 220 feet of combined headrope is allowed.

Stephen W. Murphey, Director, Division of Marine Fisheries, hereby announces that effective at 12:01 A.M. Monday, July 1, 2019 the following restrictions apply to shrimp trawls (skimmer trawls are exempt):

I. **SUSPENSION OF A PORTION OF N.C. MARINE FISHERIES COMMISSION RULE 15A NCAC 03L .0103**

The following portion of North Carolina Marine Fisheries Commission Rule 15A NCAC 03L .0103 is suspended effective at 12:01 A.M., Monday July 1, 2019:

Section (a)(1), which reads:

- (a) It is unlawful to take shrimp with nets with mesh lengths less than the following:
(1) Trawl net – one and one-half inches;

II. **AREA DESCRIPTIONS:**

It is unlawful to take shrimp with trawls, except as described in Sections III and IV, in the areas listed below:

- (1) Pamlico Sound south of the 35° 46.3000' N latitude line and north of a line beginning at a point 34° 59.7942' N - 76° 14.6514' W on Camp Point; running easterly to a point 34° 58.7853' N - 76° 09.8922' W on Core Banks;
- (2) Pamlico River downstream of a line from a point 35° 18.5882' N - 76° 28.9625' W at Pamlico Point; running northerly to a point 35° 22.3741' N - 76° 28.6905' W at Willow Point;
- (3) Bay River downstream of a line from a point 35° 11.0858' N - 76° 31.6155' W at Bay Point; running southerly to a point 35° 09.0214' N - 76° 32.2593' W at Maw Point; and
- (4) Neuse River northeast of a line from a point 34° 58.2000' N - 76° 40.5167' W at Winthrop Point on the eastern shore of the entrance to Adams Creek; running northerly to a point 35° 01.0744' N - 76° 42.1550' W at Windmill Point at the entrance of Greens Creek at Oriental. See Map 1.

III. **GEAR RESTRICTIONS:**

In the areas described in Section II, it is unlawful to take shrimp with trawls with mesh lengths less than one and one-half inches in the body of the net, mesh lengths less than one and three-quarter inches in the tail bag/cod end of the net, and without authorized North Carolina Division of Marine Fisheries

(NCDMF) Bycatch Reduction Devices (BRD) properly installed and operational in the tail bag/cod end of EACH net as described below (Figure 1):

A. Double Federal Fisheye (Figure 1, Table 1):

1. Description: The Double Federal Fisheye BRD is two Federal Fisheye BRDs placed inline as described below. The Fisheye BRD is a pyramid-shaped rigid frame constructed from aluminum or steel rod of at least $\frac{1}{4}$ inch (6.35 mm) diameter, which is inserted into the tail bag/cod end to form an escape opening. Minimum construction and installation requirements stated below.
2. The Federal Fisheye is a four-sided pyramid and has a minimum escape opening dimension of 6 inches (15.2 cm), minimum leg length of 12 inches (30.4 cm), and a minimum total escape opening area of 36 in² (91.4 cm²) [inside dimensions, not bar lengths] (Figure 1).
3. The Federal Fisheye shall be installed on the outside of the trawl. The webbing of the trawl attached to the Fisheye cannot cover more than 50% of the Federal Fisheye.
4. When the Federal Fisheye BRD is installed, no part of the lazy line attachment system (i.e., any mechanism, such as elephant ears or choker straps, used to attach the lazy line to the tail bag/cod end) may overlap the Federal Fisheye escape opening when the Federal Fisheye is installed aft of the attachment point of the tail bag/cod end retrieval system. The escapement opening shall remain unobstructed at all times.
5. The aft Federal Fisheye BRD must be installed at the top center of the tail bag/cod end of the trawl to create an escape opening in the trawl facing the direction of the mouth of the trawl no further forward than 65% of the functional tail bag/cod end length measured from the tail bag/cod end tie-off rings (Table 1).
6. Placement of the apex (narrow end) of the Federal Fisheye shall be toward the headrope of the trawl (forward).
7. The second Federal Fisheye BRD can be installed no further forward than 5 meshes from the apex of the primary Federal Fisheye BRD with the apex of the second Federal Fisheye BRD facing the headrope of the trawl.

B. Virgil Potter BRD and one Florida Fish Excluder (Figures 2, 3 and 4, Table 1):

1. Virgil Potter BRD

Description: The Virgil Potter BRD is a radial escape section constructed of large mesh webbing hung on the square. Minimum construction and installation requirements stated below.

- a. The radial escape section shall be constructed of a minimum of 8 $\frac{1}{2}$ inch stretch mesh that is five meshes long installed between the TED extension and the cod-end, and includes a funnel constructed of 1 $\frac{1}{2}$ inch stretch mesh (Figure 2, 3).

2. Florida Fish Excluder (FFE) (Figure 4 and Table 1):

Description: pyramid-shaped rigid frame constructed from aluminum, steel, or stainless-steel round bar or tubing which is inserted into the tail bag/cod end to form an escape opening. Minimum construction and installation requirements stated below.

- a. The FFE shall be installed on the outside of the trawl. The webbing of the trawl attached to the FFE cannot cover more than 50% of the FFE.
- b. The escapement opening of the FFE shall be diamond in shape and shall remain unobstructed at all times. Diamond shaped FFE shall measure at least 5 $\frac{1}{2}$ inches x 6 $\frac{1}{2}$ inches or 6 inches x 6 inches, inside diameter (see Figure 4).
- c. Placement of the apex (narrow end) of the FFE shall be toward the headrope of the trawl (forward).
- d. A FFE shall have at least three (3) legs and no more than four (4) legs and measure at least 12 inches in length (see Figure 4).

- e. The opening of the FFE shall be installed on the outside of the tail bag/cod end of the trawl no further forward than 65% of the functional tail bag/cod end length measured from the tail bag/cod end tie-off rings (Table 1).
- f. The center of the FFE escapement opening shall be installed no more than 19 meshes from the top centerline of the tail bag/cod end.
- g. A FFE shall be constructed from aluminum, steel, or stainless-steel round bar or tubing.
- h. When the FFE BRD is installed, no part of the lazy line attachment system (i.e., any mechanism, such as elephant ears or choker straps, used to attach the lazy line to the tail bag/cod end) may overlap the FFE escape opening when the FFE is installed aft of the attachment point of the tail bag/cod end retrieval system.

IV. **GEAR EXEMPTIONS:**

The gear restrictions in Section III do not apply to the following:


- A. Skimmer trawls; or
- B. A single test trawl net (try net) with a headrope length of 12 feet or less with a mesh size of one and one-half inches or greater, if it is operated under the following conditions:
 - 1. net is either pulled immediately in front of another net or is not connected to another net in any way;
 - 2. no more than one net is used at a time; and
 - 3. net is not towed as a primary net.

V. **DEFINITIONS:** For the purposes of this proclamation, the following terms are hereby defined:

- A. Bycatch reduction device (BRD) - any gear or trawl modification (including modifications to a TED that would enhance finfish exclusion) designed to allow finfish to escape from a shrimp trawl. BRD is defined based on its ability to facilitate the escape of finfish from a shrimp trawl.
- B. Turtle excluder device (TED) - An inclined grid or netting panel that prevents the passage of large animals such as sea turtles and large fish into the tail bag/cod end and guides them through an escape opening located in the tail bag/cod end. TED is defined based on its ability to exclude sea turtles from a shrimp trawl.
- C. Tail bag/cod end - That portion of the trawl net at which the trawl body's taper ends and the straight extension begins, extending to the terminal end of the trawl.
- D. Functional tail bag/cod end length - That length of the tail bag/cod end of a trawl beginning at the tail bag/cod end tie-off rings and extending forward for a maximum of 105 meshes or to the point where the straight extension ends and the trawl body taper begins, whichever is less. Trawls utilizing short tail bag/cod ends may include those meshes of the TED extension that are behind the TED grid and are in-line with the center of the FFE escape opening.
- E. Centerline - The line running from the center point of the headrope to the top center of the end of the tail bag/cod end.
- F. Radial escape section – This BRD features a guiding funnel to concentrate all animals into the middle of the tail bag/cod end and a panel of large square-meshes that extend radially around the tail bag/cod end that allows for fish escapement.
- G. Skimmer trawl – a trawl that is fished along the side of the vessel and is held open by a rigid frame and a lead weight. On its outboard side, the trawl is held open by one side of the frame extending downward and, on its inboard side, by a lead weight attached by cable or rope to the bow of the vessel.
- H. Try net – A net pulled for brief periods of time just before, or during, deployment of the primary net(s) in order to test for shrimp concentrations or determine fishing conditions (e.g. presence or absence of bottom debris, jellyfish, bycatch, seagrasses, etc.).

VI. **GENERAL INFORMATION:**

- A. This proclamation is issued under the authority of N.C.G.S. 113-170.4; 113-170.5; 113-182; 143B-289.52 and N.C. Marine Fisheries Commission Rule 15A NCAC 03J .0104(d).
- B. It is unlawful to violate the provisions of any proclamation issued by the Fisheries Director under his delegated authority per N.C. Marine Fisheries Commission Rule 15A NCAC 03H .0103.
- C. It is unlawful to use a shrimp trawl that does not conform with the federal requirements for Turtle Excluder Devices (TEDs) per N.C. Marine Fisheries Commission Rule 15A NCAC 03L .0103(h).
- D. **N.C. Marine Fisheries Commission Rule 15A NCAC 03L .0103(d) makes it unlawful to take shrimp with trawls with a combined headrope length greater than 220 feet in the areas described in Section II.**
- E. Channel nets, float nets, fixed nets, and butterfly nets are not required to use BRDs.
- F. The intent of this proclamation is to require the use of newly approved BRDs identified by a collaborative study that achieved at least a 40 percent finfish bycatch reduction in accordance with the N.C. Shrimp Fishery Management Plan Amendment 1.
- G. Vessels operating in coastal fishing waters outside of those areas described in Section II. or using skimmer trawls must use a minimum of two authorized NCDMF BRDs as described in Proclamation SH-4-2019.
- H. Persons wishing to test BRD designs not covered by this proclamation may submit BRD designs to the NCDMF, Morehead City office, for consideration for field-testing.
- I. This proclamation only sets the gear requirements for taking shrimp with trawls in these areas as described in Section II., area openings and closings are done through separate proclamations. Individuals should check the division website (<http://portal.ncdenr.org/web/mf/>) for proclamations opening and closing specific areas for the taking of shrimp.
- J. Contact N.C. Division of Marine Fisheries, P.O. Box 769, Morehead City, NC 28557; 252-726-7021 or 800-682-2632 for more information or visit the division website at <http://portal.ncdenr.org/web/mf/>.
- K. In accordance with N.C. General Statute 113-221.1(c) All persons who may be affected by proclamations issued by the Fisheries Director are under a duty to keep themselves informed of current proclamations.
- L. **This proclamation supersedes proclamation SH-1-2019 (REVISED) dated April 23, 2019. It clarifies the mesh size requirements for the trawl body and tail bag/cod end and continues specific bycatch reduction device requirements for taking shrimp with trawls (except as described in Section IV.) in Pamlico Sound and the Pamlico, Bay, and Neuse rivers where up to 220 feet of combined headrope is allowed.**

BY: 

Stephen W. Murphey, Director
DIVISION OF MARINE FISHERIES

May 14, 2019
10:20 A.M.

Table 1. Required placement of primary Federal Fisheye and Florida Fish Excluder.

| Functional Tail bag/cod end Length* | Maximum FFE Placement** | Functional Tail bag/cod end Length** | Maximum FFE Placement** |
|-------------------------------------|-------------------------|--------------------------------------|-------------------------|
| 105 meshes or greater | 68 meshes | 82 | 53 |
| 104 | 68 | 81 | 53 |
| 103 | 67 | 80 | 52 |
| 102 | 66 | 79 | 51 |
| 101 | 66 | 78 | 51 |
| 100 | 65 | 77 | 50 |
| 99 | 64 | 76 | 49 |
| 98 | 64 | 75 | 49 |
| 97 | 63 | 74 | 48 |
| 96 | 62 | 73 | 47 |
| 95 | 62 | 72 | 47 |
| 94 | 61 | 71 | 46 |
| 93 | 60 | 70 | 46 |
| 92 | 60 | 69 | 45 |
| 91 | 59 | 68 | 44 |
| 90 | 59 | 67 | 44 |
| 89 | 58 | 66 | 43 |
| 88 | 57 | 65 | 42 |
| 87 | 57 | 64 | 42 |
| 86 | 56 | | |
| 85 | 55 | | |
| 84 | 55 | | |
| 83 | 54 | | |

* Functional Tail bag/cod end Length – That length of the tail bag/cod end of a trawl beginning at the tail bag/cod end tie-off and extending forward for a maximum of 105 meshes or to the point where the straight extension ends and the trawl body taper begins, whichever is less. Trawls utilizing short tail bag/cod ends may include those meshes of the TED extension that are behind the TED grid and are in-line with the center of the FFE escape opening.

** If your tail bag/cod end is not included in this Table, you can figure the maximum placement for your net by following the formula: (mesh count multiplied by 65, divided by 100, using a 50 mesh tail bag/cod end as an example $(50 \times 65) / 100 = 32.5$).

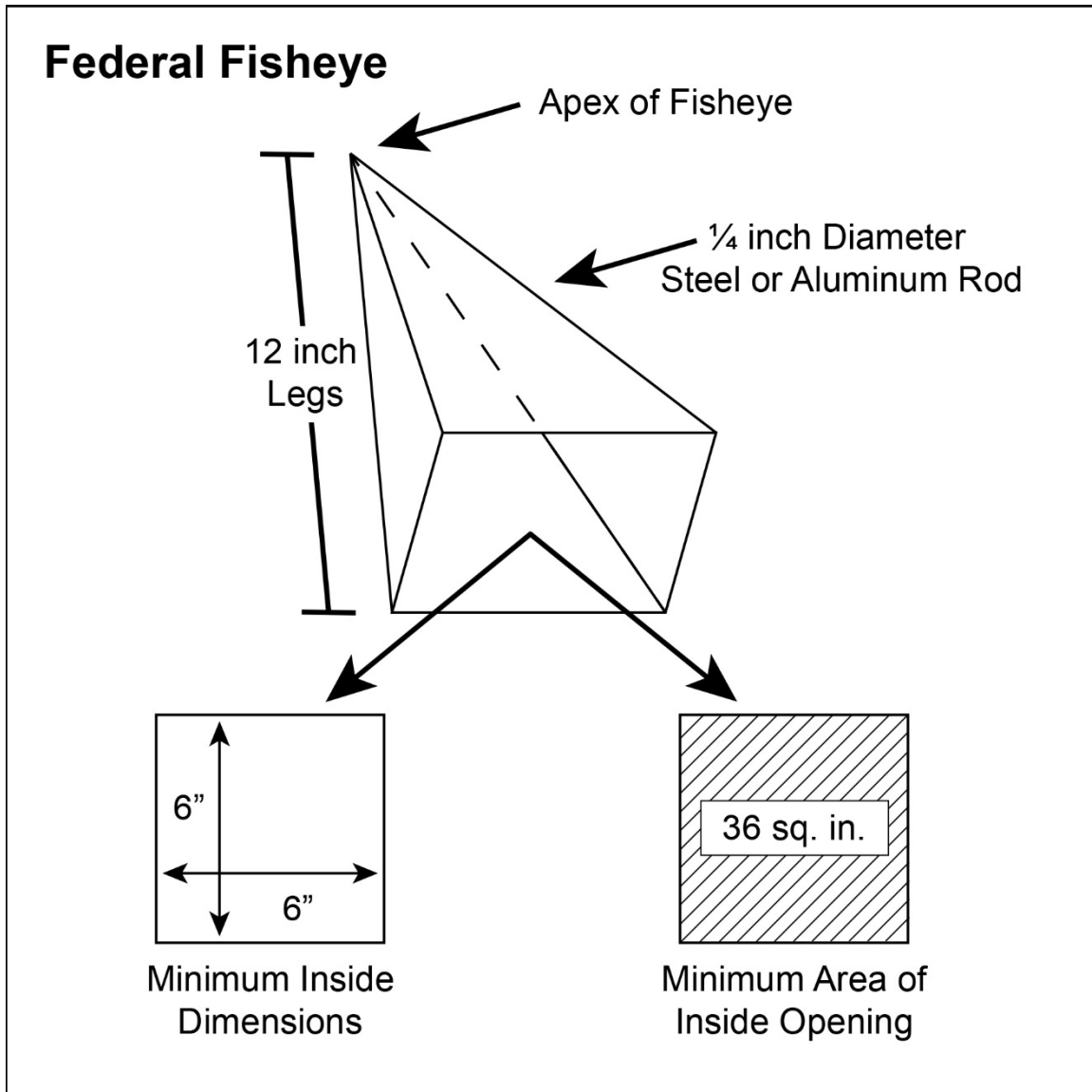


Figure 1. Minimum dimensions of the Federal Fisheye (III.A).



Figure 2. Virgil Potter BRD (III.B).

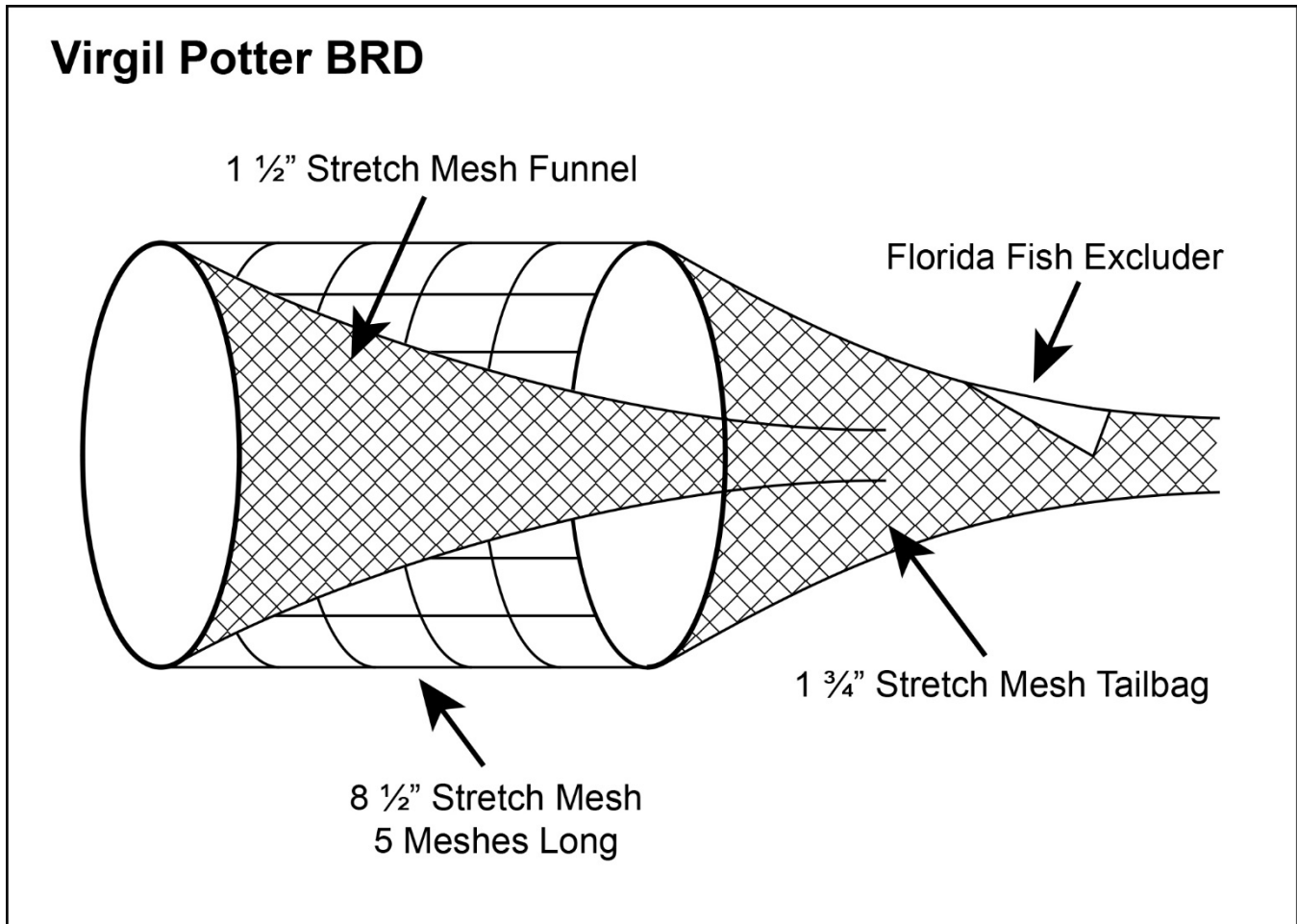


Figure 3. Specifications for the Virgil Potter BRD (III.B).

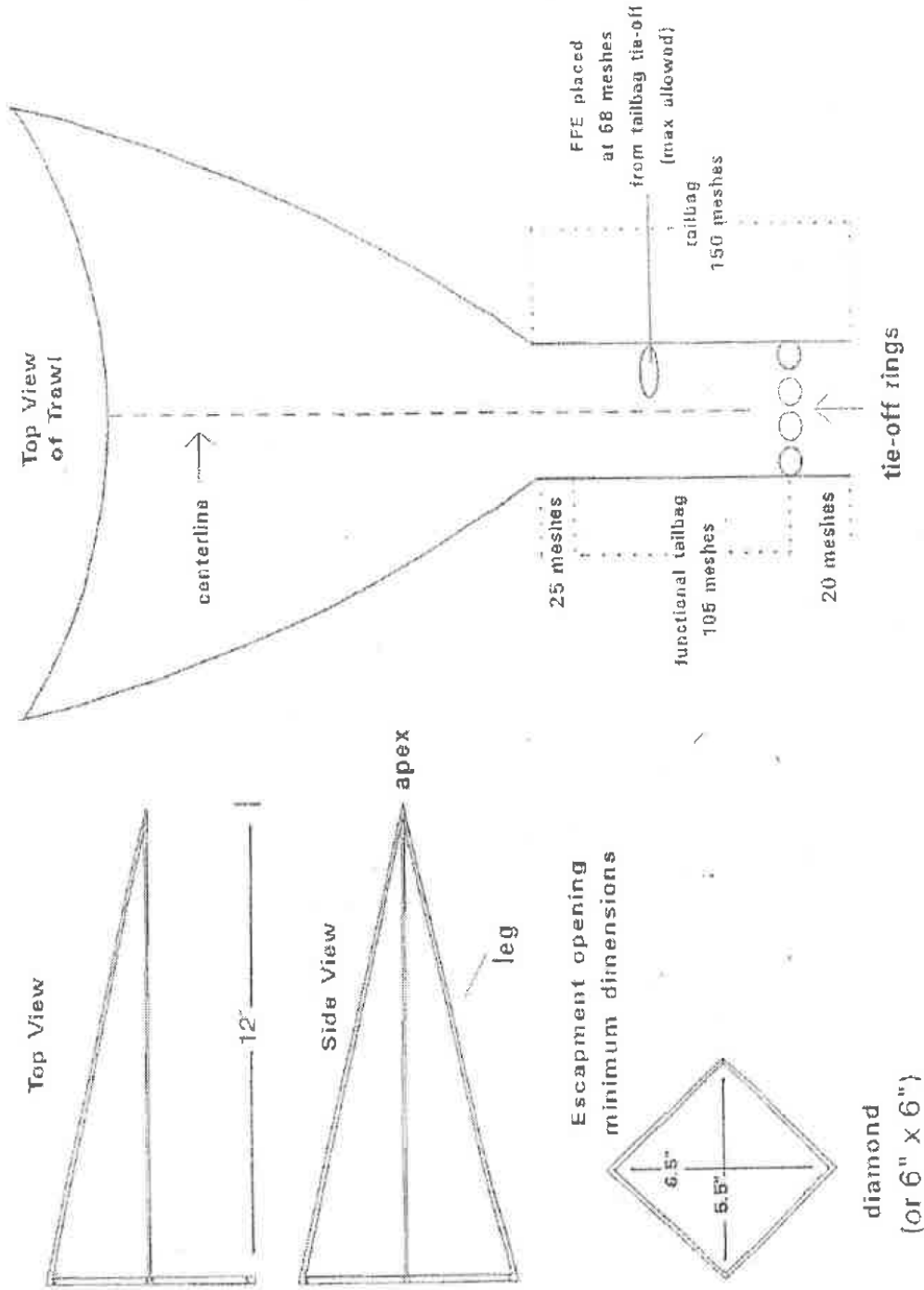


Figure 4. Diagram of Florida Fish Eye (FFE) (III.B).