# U.S. DEPARTMENT OF HOMELAND SECURITY

Federal Emergency Management Agency National Flood Insurance Program

OMB No. 1660-0008

Expiration Date: November 30, 2022

# **ELEVATION CERTIFICATE**

Important: Follow the instructions on pages 1-9.

Copy all pages of this Elevation Certificate and all attachments for (1) community official, (2) insurance agent/company, and (3) building owner.

SEC	TION A - PROPERTY	INFOR	MATION		FOR INSUR	ANCE COMPANY USE		
A1. Building Owner's Name						oer:		
Mike and Karen Leone								
A2. Building Street Address (in Box No. 592 Ranger Lane	ncluding Apt., Unit, Suit	e, and/o	Bldg. No.) or	P.O. Route and	Company N	AIC Number:		
City			State		ZIP Code			
Longboat Key			Florida		34228			
	A3. Property Description (Lot and Block Numbers, Tax Parcel Number, Legal Description, etc.) Lot 6, Block C, Country Club Shores, Unit 4							
A4. Building Use (e.g., Reside	ntial, Non-Residential,	Addition,	Accessory, e	etc.) Residentia	ıl			
A5. Latitude/Longitude: Lat.	27°20'48" N	Long. 82	2°35'57" W	Horizontal	Datum: NAD 1	927 × NAD 1983		
A6. Attach at least 2 photogra	phs of the building if the	e Certific	ate is being u	sed to obtain floor	d insurance.			
A7. Building Diagram Number	1B							
A8. For a building with a craw	space or enclosure(s):							
a) Square footage of crav	/Ispace or enclosure(s)			0.00 sq ft				
b) Number of permanent t	lood openings in the cr	awlspace	e or enclosure	e(s) within 1.0 foot	above adjacent gra	ide 0		
c) Total net area of flood	ppenings in A8.b		0.00 sq in	R	ECEIV	ED		
d) Engineered flood open	ings? Yes 🗵 N	10		a v				
AQ For a building with an attac	hed darage.				OCT 14 202	21		
	A9. For a building with an attached garage:  a) Square footage of attached garage							
b) Number of permanent i					lanning, Zoning & B	uliding		
1002		lacried g			scent grade 5			
c) Total net area of flood of	A STATE OF THE STA		660.00 sq	ın				
d) Engineered flood openi	ngs? ⊠ Yes □ N	10						
S	ECTION B - FLOOD	NSURA	NCE RATE	MAP (FIRM) INF	ORMATION			
B1. NFIP Community Name &	B1. NFIP Community Name & Community Number B2. County Name B3. State							
Sarasota County 125126			Sarasota			Florida		
B4. Map/Panel B5. Suffix Number	B6. FIRM Index Date	Effe	RM Panel ective/ vised Date	B8. Flood Zone(s)	B9. Base Flood E (Zone AO, use	levation(s) e Base Flood Depth)		
12115C0126 F	11-04-2016	11-04-2		AE	10			
B10. Indicate the source of the Base Flood Elevation (BFE) data or base flood depth entered in Item B9:								
☐ FIS Profile ☑ FIRM ☐ Community Determined ☐ Other/Source:								
B11. Indicate elevation datum used for BFE in Item B9: NGVD 1929 NAVD 1988 Other/Source:								
B12. Is the building located in a Coastal Barrier Resources System (CBRS) area or Otherwise Protected Area (OPA)?   Yes   No								
Designation Date:	Designation Date: CBRS OPA							
L								

# **ELEVATION CERTIFICATE**

OMB No. 1660-0008 Expiration Date: November 30, 2022

	g information from Sec	uon A.	FOR IN	NOUKANU	E COMPANY USE
Building Street Address (including Apt., Unit, Suite, and/o 592 Ranger Lane	r Bldg. No.) or P.O. Rou	te and Box No.	Policy	Number:	
City Sta	ate ZIP (	Code	Compa	ny NAIC N	Number
	orida 3422	Management of the second of th			
SECTION C – BUILDING EL	EVATION INFORMAT	ION (SURVEY RE	EQUIRE	:D)	
C1. Building elevations are based on: Constructi *A new Elevation Certificate will be required when or	• _	ding Under Constru	iction*		ned Construction
C2. Elevations – Zones A1–A30, AE, AH, A (with BFE), Complete Items C2.a–h below according to the buil	lding diagram specified i	n Item A7. In Puerto			
Benchmark Utilized: A-715	Vertical Datum:				
Indicate elevation datum used for the elevations in NGVD 1929   NAVD 1988   Other/		<b>V</b> .			
Datum used for building elevations must be the san		FE.			
The state of the s		1 <del></del>			asurement used.
a) Top of bottom floor (including basement, crawls	pace, or enclosure floor)		11.5	⊠ feet	meters
b) Top of the next higher floor			25.0	⊠ feet	meters
c) Bottom of the lowest horizontal structural memb	er (V Zones only)		N/A	⊠ feet	meters
d) Attached garage (top of slab)			7.4		meters
<ul> <li>e) Lowest elevation of machinery or equipment ser (Describe type of equipment and location in Cor</li> </ul>	rvicing the building nments)		11.3		meters
f) Lowest adjacent (finished) grade next to building	g (LAG)	****	6.7	✓ feet	meters meters
g) Highest adjacent (finished) grade next to buildin	g (HAG)		7.2	feet	meters
<ul> <li>h) Lowest adjacent grade at lowest elevation of de structural support</li> </ul>	ck or stairs, including		6.1	✓ feet	☐ meters
SECTION D - SURVEYOR	, ENGINEER, OR ARC	HITECT CERTIFI	CATIO	N	
SECTION D – SURVEYOR  This certification is to be signed and sealed by a land su I certify that the information on this Certificate represent statement may be punishable by fine or imprisonment up	rveyor, engineer, or arch s mv best efforts to inten	nitect authorized by	law to c	ertify elev	ation information. hat any false
This certification is to be signed and sealed by a land sull certify that the information on this Certificate represent.	urveyor, engineer, or arch s my best efforts to inter ander 18 U.S. Code, Sect	nitect authorized by	law to o	certify eleving derstand to	ation information. hat any false e if attachments.
This certification is to be signed and sealed by a land sull certify that the information on this Certificate represent statement may be punishable by fine or imprisonment us.  Were latitude and longitude in Section A provided by a life Certifier's Name	irveyor, engineer, or arch s my best efforts to inter- nder 18 U.S. Code, Secti icensed land surveyor? License Number	nitect authorized by oret the data availa ion_1001	law to o	certify eleving derstand to	hat any false
This certification is to be signed and sealed by a land su I certify that the information on this Certificate represent statement may be punishable by fine or imprisonment ut.  Were latitude and longitude in Section A provided by a li  Certifier's Name  James B. Burchett	inveyor, engineer, or arch s my best efforts to inter- inder 18 U.S. Code, Sect icensed land surveyor?	nitect authorized by oret the data availa ion_1001	law to o	certify elevaterstand to	e if attachments.
This certification is to be signed and sealed by a land sull certify that the information on this Certificate represent statement may be punishable by fine or imprisonment us.  Were latitude and longitude in Section A provided by a life Certifier's Name	irveyor, engineer, or arch s my best efforts to inter- nder 18 U.S. Code, Secti icensed land surveyor? License Number	nitect authorized by oret the data availa ion_1001	law to o	certify elevaterstand to	hat any false
This certification is to be signed and sealed by a land sull certify that the information on this Certificate represents statement may be punishable by fine or imprisonment use. Were latitude and longitude in Section A provided by a life Certifier's Name James B. Burchett  Title President  Company Name	irveyor, engineer, or arch s my best efforts to inter- nder 18 U.S. Code, Secti icensed land surveyor? License Number	nitect authorized by oret the data availa ion_1001	law to coble. I un	certify elevanderstand to	e if attachments.
This certification is to be signed and sealed by a land sull certify that the information on this Certificate represents statement may be punishable by fine or imprisonment us.  Were latitude and longitude in Section A provided by a life Certifier's Name James B. Burchett  Title  President	irveyor, engineer, or arch s my best efforts to inter- nder 18 U.S. Code, Secti icensed land surveyor? License Number	nitect authorized by oret the data availa ion_1001	law to coble. I un	Check here	e if attachments.
This certification is to be signed and sealed by a land sull certify that the information on this Certificate represents statement may be punishable by fine or imprisonment use. Were latitude and longitude in Section A provided by a life Certifier's Name James B. Burchett  Title President  Company Name	irveyor, engineer, or arch s my best efforts to inter- nder 18 U.S. Code, Secti icensed land surveyor? License Number	nitect authorized by oret the data availa ion_1001	law to coble. I un	Check here	e if attachments.
This certification is to be signed and sealed by a land sull certify that the information on this Certificate represent statement may be punishable by fine or imprisonment use.  Were latitude and longitude in Section A provided by a life Certifier's Name James B. Burchett  Title  President  Company Name Sampey, Burchett and Knight, Inc.  Address  1570 Global Court  City	irveyor, engineer, or arch s my best efforts to inter- nder 18 U.S. Code, Sect icensed land surveyor? License Number LS5701	nitect authorized by pret the data availation 1001.  Yes No	law to coble. I un	Check here	e if attachments.  Fica
This certification is to be signed and sealed by a land sure a certify that the information on this Certificate represents that the information on this Certificate represents the statement may be punishable by fine or imprisonment of the Were latitude and longitude in Section A provided by a life Certifier's Name James B. Burchett  Title President  Company Name Sampey, Burchett and Knight, Inc.  Address 1570 Global Court  City Sarasota	irveyor, engineer, or arch s my best efforts to inter- nder 18 U.S. Code, Sect icensed land surveyor? License Number LS5701	intect authorized by pret the data availation 1001.  Yes No	law to coble. I un	Check here	e if attachments.  Fica
This certification is to be signed and sealed by a land sure of the information on this Certificate represents statement may be punishable by fine or imprisonment use. Were latitude and longitude in Section A provided by a life Certifier's Name James B. Burchett  Title President  Company Name Sampey, Burchett and Knight, Inc.  Address 1570 Global Court  City Sarasota  Signature	state Florida  Date 07-22-2021	ZIP Code 34240 Telephone (941) 342-0349	law to coble. I un	Check here  Check here  B  No.  STA	BURC Burchet 5701 TE OF 22-21 RIDA R
This certification is to be signed and sealed by a land sure a certify that the information on this Certificate represents that the information on this Certificate represents the statement may be punishable by fine or imprisonment of the Were latitude and longitude in Section A provided by a life Certifier's Name James B. Burchett  Title President  Company Name Sampey, Burchett and Knight, Inc.  Address 1570 Global Court  City Sarasota	state Florida  Date 07-22-2021	ZIP Code 34240 Telephone (941) 342-0349	law to coble. I un	Check here  Check here  B  No.  STA	BURC Burchet 5701 TE OF 22-21 RIDA R
This certification is to be signed and sealed by a land sure of the information on this Certificate represents statement may be punishable by fine or imprisonment use. Were latitude and longitude in Section A provided by a life Certifier's Name James B. Burchett  Title President  Company Name Sampey, Burchett and Knight, Inc.  Address 1570 Global Court  City Sarasota  Signature	striveyor, engineer, or arch is my best efforts to interprete to interpr	ZIP Code 34240 Telephone (941) 342-0349	law to coble. I un	Check here  Check here  B  No.  STA	BURC Burchet 5701 TE OF 22-21 RIDA R
This certification is to be signed and sealed by a land sure of the information on this Certificate represents that the information on this Certificate represents that the information on this Certificate represents that the information on this Certificate represents the information of the provided by a life of the certifier's Name  James B. Burchett  Title  President  Company Name  Sampey, Burchett and Knight, Inc.  Address 1570 Global Court  City  Sarasota  Signature  Copy all pages of this Elevation Certificate and all attachmed the comments (including type of equipment and location, per	streepor, engineer, or arches my best efforts to interpoder 18 U.S. Code, Secticensed land surveyor?  License Number LS5701  State Florida  Date 07-22-2021  ents for (1) community offer C2(e), if applicable)	ZIP Code 34240 Telephone (941) 342-0349 ficial, (2) insurance a	Ext.	Check here  Check here  B  No.  STA	BURC Burchet 5701 TE OF 22-21 RIDA R
This certification is to be signed and sealed by a land sure of the certification on this Certificate represents that the information on this Certificate represents that the information on this Certificate represents the certificate and longitude in Section A provided by a limit of Certifier's Name  James B. Burchett  Title  President  Company Name  Sampey, Burchett and Knight, Inc.  Address 1570 Global Court  City  Sarasota  Signature  Copy all pages of this Elevation Certificate and all attachments (including type of equipment and location, personnel in the certificate and all attachments (including type of equipment and location, personnel in the certificate and all attachments (including type of equipment and location, personnel in the certificate and all attachments (including type of equipment and location, personnel in the certificate and all attachments (including type of equipment and location, personnel in the certificate and all attachments (including type of equipment and location, personnel in the certificate and all attachments (including type of equipment and location, personnel in the certificate and all attachments (including type of equipment and location, personnel in the certificate and all attachments (including type of equipment and location, personnel in the certificate and all attachments (including type of equipment and location).	streepor, engineer, or arches my best efforts to interpoder 18 U.S. Code, Secticensed land surveyor?  License Number LS5701  State Florida  Date 07-22-2021  ents for (1) community offer C2(e), if applicable)	ZIP Code 34240 Telephone (941) 342-0349 ficial, (2) insurance a	Ext.	Check here  Check here  B  No.  STA	BURC Burchet 5701 TE OF 22-21 RIDA R
This certification is to be signed and sealed by a land sure of the information on this Certificate represents that the information on this Certificate represents that the information on this Certificate represents that the information on this Certificate represents the information of the provided by a life of the certifier's Name  James B. Burchett  Title  President  Company Name  Sampey, Burchett and Knight, Inc.  Address 1570 Global Court  City  Sarasota  Signature  Copy all pages of this Elevation Certificate and all attachmed the comments (including type of equipment and location, per	streepor, engineer, or arches my best efforts to interpoder 18 U.S. Code, Secticensed land surveyor?  License Number LS5701  State Florida  Date 07-22-2021  ents for (1) community offer C2(e), if applicable)	ZIP Code 34240 Telephone (941) 342-0349 ficial, (2) insurance a	Ext.	Check here  Check here  B  No.  STA	BURC Burchet 5701 TE OF 22-21 RIDA R

# **ELEVATION CERTIFICATE**

OMB No. 1660-0008 Expiration Date: November 30, 2022

	ORTANT: In these spaces, copy the correspond	FOR INSURANCE COMPANY USE						
	llding Street Address (including Apt., Unit, Suite, and 2 Ranger Lane	d/or Bldg. No.) or P.O	. Route and Box No.	Policy Number:				
City	V	State	ZIP Code	Company NAIC Number				
		Florida	34228					
		T RECHIRED)						
	SECTION E – BUILDING ELEVATION INFORMATION (SURVEY NOT REQUIRED) FOR ZONE AO AND ZONE A (WITHOUT BFE)							
con	<sup>r</sup> Zones AO and A (without BFE), complete Items E1 nplete Sections A, B,and C. For Items E1–E4, use r er meters.	I–E5. If the Certificate natural grade, if availa	e is intended to support able. Check the measur	a LOMA or LOMR-F request, ement used. In Puerto Rico only,				
E1.	Provide elevation information for the following and the highest adjacent grade (HAG) and the lowest a) Top of bottom floor (including basement,			er the elevation is above or below				
	crawlspace, or enclosure) is		feet  mete	ers above or below the HAG.				
	<ul> <li>Top of bottom floor (including basement, crawlspace, or enclosure) is</li> </ul>		feet  mete	ers above or below the LAG.				
E2.	For Building Diagrams 6–9 with permanent flood of the next higher floor (elevation C2.b in	penings provided in S	Section A Items 8 and/c	or 9 (see pages 1–2 of Instructions),				
	the diagrams) of the building is	***************************************	feet mete	ers above or below the HAG.				
E3.	Attached garage (top of slab) is		feet  mete	ers above or below the HAG.				
E4.	Top of platform of machinery and/or equipment servicing the building is		feet  mete	ers above or below the HAG.				
E5.	Zone AO only: If no flood depth number is available floodplain management ordinance? Yes							
	SECTION F - PROPERTY OW	NER (OR OWNER'S	REPRESENTATIVE)	ERTIFICATION				
The	e property owner or owner's authorized representati nmunity-issued BFE) or Zone AO must sign here. T	ve who completes Se he statements in Sec	ections A, B, and E for Z tions A, B, and E are co	Cone A (without a FEMA-issued or prect to the best of my knowledge.				
Pro	perty Owner or Owner's Authorized Representative	's Name						
Add	dress	City	S	state ZIP Code				
Sig	nature	Date	Т	elephone				
Cor	mments							
				Check here if attachments.				

# **ELEVATION CERTIFICATE**

OMB No. 1660-0008 Expiration Date: November 30, 2022

IMPORTANT: In these spaces, copy the corre	FOR INSURANCE COMPANY USE		
Building Street Address (including Apt., Unit, St 592 Ranger Lane	uite, and/or Bldg. No.) or P.O. Route and	Box No.	Policy Number:
City	State ZIP Code		Company NAIC Number
Longboat Key	Florida 34228		
SECTIO	ON G - COMMUNITY INFORMATION (	OPTIONAL)	
	Certificate. Complete the applicable iter ter meters.  en from other documentation that has be	m(s) and sign een signed an	below. Check the measurement  d sealed by a licensed surveyor,
data in the Comments area below.)	ed by law to certify elevation information on E for a building located in Zone A (wi		
G2. A community official completed Section or Zone AO.	0.1 _ 1.0 2.0.1.0.1.g . 0.0.1.0.1		
G3. The following information (Items G4–	G10) is provided for community floodpla	in manageme	ent purposes.
G4. Permit Number	G5. Date Permit Issued		ate Certificate of ompliance/Occupancy Issued
G7. This permit has been issued for:	New Construction  Substantial Impl	rovement	
G8. Elevation of as-built lowest floor (including of the building:	g basement)	_ feet	meters Datum
G9. BFE or (in Zone AO) depth of flooding at t	the building site:	_ feet	meters Datum
G10. Community's design flood elevation:		_ feet	meters Datum
Local Official's Name	Title		
Community Name	Telephone	e 1100,500,500,000,000,000,000,000,000,000	
Signature	Date		
Comments (including type of equipment and loc	cation, per C2(e), if applicable)		
			Check here if attachments.

#### **BUILDING PHOTOGRAPHS**

See Instructions for Item A6.

OMB No. 1660-0008 Expiration Date: November 30, 2022

IMPORTANT: In these spaces, copy	FOR INSURANCE COMPANY USE		
Building Street Address (including Apt 592 Ranger Lane	Policy Number:		
City	State	ZIP Code	Company NAIC Number
Longboat Key	Florida	34228	1

If using the Elevation Certificate to obtain NFIP flood insurance, affix at least 2 building photographs below according to the instructions for Item A6. Identify all photographs with date taken; "Front View" and "Rear View"; and, if required, "Right Side View" and "Left Side View." When applicable, photographs must show the foundation with representative examples of the flood openings or vents, as indicated in Section A8. If submitting more photographs than will fit on this page, use the Continuation Page.



Photo One

Front View 07-22-21 Photo One Caption

**ELEVATION CERTIFICATE** 

Clear Photo One



Photo Two

Photo Two Caption Rear View 07-22-21

Clear Photo Two

### **BUILDING PHOTOGRAPHS**

# ELEVATION CERTIFICATE

Continuation Page

OMB No. 1660-0008

Expiration Date: November 30, 2022

IMPORTANT: In these spaces, cop	FOR INSURANCE COMPANY USE		
Building Street Address (including A 592 Ranger Lane	Policy Number:		
City Longboat Key	State Florida	ZIP Code 34228	Company NAIC Number

If submitting more photographs than will fit on the preceding page, affix the additional photographs below. Identify all photographs with: date taken; "Front View" and "Rear View"; and, if required, "Right Side View" and "Left Side View." When applicable, photographs must show the foundation with representative examples of the flood openings or vents, as indicated in Section A8.



Photo Three

Photo Three Caption Flood Vent 07-22-21

Clear Photo Three



Photo Four

Photo Four Caption Flood Vent 07-22-21

Clear Photo Four



# **ICC-ES Evaluation Report**

**ESR-3560** 

Reissued September 2020

This report is subject to renewal September 2021.

www.icc-es.org | (800) 423-6587 | (562) 699-0543

A Subsidiary of the International Code Council®

**DIVISION: 08 00 00—OPENINGS** 

Section: 08 95 43-Vents/Foundation Flood Vents

REPORT HOLDER:

FLOOD FLAPS®, LLC

**EVALUATION SUBJECT:** 

FLOOD FLAPS® AUTOMATIC FLOOD VENTS: MODELS FFWF12; FFNF12; FFWF08; FFNF08; FFWF05; FFNF05

#### 1.0 EVALUATION SCOPE

Compliance with the following codes:

- 2018, 2015, 2012 and 2009 International Building Code® (IBC)
- 2018, 2015, 2012 and 2009 International Residential Code® (IRC)

#### Properties evaluated:

- Physical operation
- Water flow
- Weathering

#### 2.0 USES

Flood Flaps<sup>®</sup> automatic flood vents are used to provide for the equalization of hydrostatic flood forces on exterior walls. Certain models also allow natural ventilation.

#### 3.0 DESCRIPTION

#### 3.1 General:

Flood Flaps® automatic flood vents are engineered mechanically operated flood vents (FVs) that automatically allow flood waters to enter and exit enclosed areas. The FVs are constructed of ABS plastic which serves as the FV's housing, and a front grill that contains an anodized metal screen imbedded in polypropylene plastic. On contact with rising flood water, the grill will disengage from its secured position, allowing flood water and debris to flow through in either direction. The FVs are available in two series as described in Section 3.3.

The sealed series models contain two rubber flaps that close the FV to the passage of air when using with conditioned areas or sealed crawl spaces. In the same manner as the grill, the two rubber flaps are pushed open

by water pressure, allowing water and debris to flow through the FV in either direction. See Figure 1 for an illustration of the Flood Flaps® automatic FV.

#### 3.2 Engineered Opening:

The Flood Flaps® automatic FVs comply with the design principle noted in Sections 2.7.2.2 and 2.7.3 of ASCE/SEI 24-14 (2018 and 2015 IBC and IRC) [Section 2.6.2.2 of ASCE/SEI 24-05 (2012 and 2009 IBC and IRC)] for a rate of rise and fall of 5 feet per hour (0.423 mm/s). In order to comply with the engineered opening requirement of ASCE/SEI 24, Flood Flaps® automatic FVs must be installed in accordance with Section 4.0.

#### 3.3 Flood Vent Series Models:

Flood Flaps® automatic FVs are available in two series with multiple models and sizes as described in Table 1. The sealed series models, designated FFWF, include two rubber flaps for the prevention of air flow. The multipurpose series, designated FFNF, omits the rubber flaps.

#### 3.4 Natural Ventilation:

Flood Flaps® automatic FV models FFNF12, FFNF08, FFNF05, and FFNF02 have metal screens with 1/4 inch by 1/4 inch (6 mm by 6 mm) openings and provide 37 square inches (0.02 m2) of net free opening to supply natural ventilation for under-floor ventilation. Flood Flaps® automatic FV models FFWF12, FFWF08, and FFWF05 have not been evaluated for use as openings for under-floor ventilation.

#### 4.0 DESIGN AND INSTALLATION

Flood Flaps® automatic FVs are designed to be installed into walls of existing or new construction. Installation of the FVs must be in accordance with the manufacturer's instructions, the applicable code and this report. Flood Flaps® automatic FVs can be installed in wood, masonry and concrete walls up to a thickness of 12 inches (305 mm). In order to comply with the engineered opening design principle noted in Sections 2.7.2.2 and 2.7.3 of ASCE/SEI 24-14 (2018 and 2015 IBC and IRC) [Section 2.6.2.2 of ASCE/SEI 24-05 (2012 and 2009 IBC and IRC)], the Flood Flaps® FVs must be installed as follows:

- With a minimum of two openings on different sides of each enclosed area.
- With a minimum of one FV for every 220 square feet (20 m²) of enclosed area.



- Below the base flood elevation.
- With the bottom of the FV located a maximum of 12 inches (305 mm) above grade.

#### 5.0 CONDITIONS OF USE

The Flood Flaps® automatic flood vents described in this report comply with, or are suitable alternatives to what is specified in, those codes listed in Section 1.0 of this report, subject to the following conditions:

- 5.1 The Flood Flaps® automatic FVs must be installed in accordance with this report, the applicable code and the manufacturer's installation instructions. In the event of a conflict, the instructions in this report govern.
- **5.2** The Flood Flaps<sup>®</sup> automatic FVs must not be used in place of "breakaway walls" in coastal high hazard areas, but are permitted for use in conjunction with breakaway walls in other areas.

#### 6.0 EVIDENCE SUBMITTED

Data in accordance with the ICC-ES Acceptance Criteria for Mechanically Operated Flood Vents (AC364), dated August 2015 (editorially revised October 2017).

#### 7.0 IDENTIFICATION

- 7.1 The Flood Flaps® models recognized in this report are identified by a label bearing the manufacturer's name, the model number, and the evaluation report number (ESR-3560).
- 7.2 The report holder's contact information is the following:

FLOOD FLAPS®, LLC
POST OFFICE BOX 1003
ISLE OF PALMS, SOUTH CAROLINA 29451
(843) 881-0190
www.floodflaps.com
info@floodflaps.com

#### TABLE 1-FLOOD FLAP AUTOMATIC FLOOD VENT MODEL SIZES

MODEL NUMBER	MODEL DESIGNATION	ROUGH OPENING (Width X Height) (inches)	VENT SIZE (W X H X D) (inches)	ENCLOSED AREA COVERAGE (ft²)	NET FREE AREA OPENING <sup>1</sup> (in <sup>2</sup> )
FFWF12	Sealed Series	16 x 8	15 <sup>5</sup> / <sub>8</sub> X 7 <sup>3</sup> / <sub>4</sub> X 12	220	NA
FFNF12	Multi-Purpose	16 x 8	15 <sup>5</sup> / <sub>8</sub> X 7 <sup>3</sup> / <sub>4</sub> X 12	220	37
FFWF08	Sealed Series	16 x 8	$15^5/_8 \times 7^3/_4 \times 8$	220	NA
FFNF08	Multi-Purpose	16 x 8	15 <sup>5</sup> / <sub>8</sub> x 7 <sup>3</sup> / <sub>4</sub> x 8	220	37
FFWF05	Sealed Series	16 x 8	15 <sup>5</sup> / <sub>8</sub> x 7 <sup>3</sup> / <sub>4</sub> x 5	220	NA
FFNF05	Multi-Purpose	16 x 8	15 <sup>5</sup> / <sub>8</sub> x 7 <sup>3</sup> / <sub>4</sub> x 5	220	37

For SI: 1 inch = 25.4 mm; 1  $f^{12}$  = 0.093  $m^2$ 

<sup>&</sup>lt;sup>1</sup>For under-floor ventilation only.

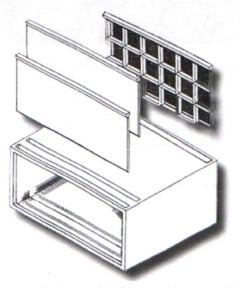
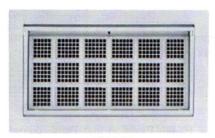
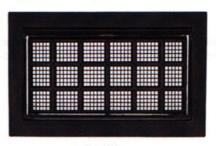
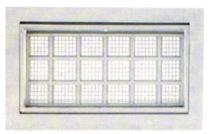


FIGURE 1—FLOOD FLAPS® AUTOMATIC FLOOD VENT







FFWF12

FFNF08

FFNF05

FIGURE 2—FLOOD FLAPS® AUTOMATIC FLOOD VENT SERIES MODELS







8" DEPTH



5" DEPTH

FIGURE 3—FLOOD FLAPS® AUTOMATIC FLOOD VENTS MULTIPLE DEPTH OFFERINGS



# **ICC-ES Evaluation Report**

# ESR-3560 CBC and CRC Supplement

Issued September 2020

This report is subject to renewal September 2021.

www.icc-es.org | (800) 423-6587 | (562) 699-0543

A Subsidiary of the International Code Council®

**DIVISION: 08 00 88—OPENINGS** 

Section: 08 95 43-Vents/Foundation Flood Vents

REPORT HOLDER:

FLOOD FLAPS®, LLC

**EVALUATION SUBJECT:** 

FLOOD FLAPS® AUTOMATIC FLOOD VENTS: MODELS FFWF12; FFNF12; FFWF08; FFNF08; FFWF05; FFNF05

#### 1.0 REPORT PURPOSE AND SCOPE

#### Purpose:

The purpose of this evaluation report supplement is to indicate that Flood Flaps® automatic flood vents, described in ICC-ES evaluation report ESR-3560, has also been evaluated for compliance with the code(s) noted below.

#### Applicable code edition(s):

- 2019 California Building Code (CBC)
- 2019 California Residential Code (CRC)

For evaluation of applicable chapters adopted by the California Office of Statewide Health Planning and Development (OSHPD) and Division of State Architect (DSA), see Sections 2.1.1 and 2.1.2 below.

#### 2.0 CONCLUSIONS

#### 2.1 CBC:

The Flood Flaps® automatic flood vents, described in Sections 2.0 through 7.0 of the evaluation report ESR-3560, comply with CBC Chapter 12, provided the design and installation are in accordance with the 2018 International Building Code® (IBC) provisions noted in the evaluation report and the additional requirements of CBC Chapters 12 and 16, as applicable.

- 2.1.1 OSHPD: The applicable OSHPD Sections of the CBC are beyond the scope of this supplement.
- **2.1.2 DSA:** The applicable DSA Sections of the CBC are beyond the scope of this supplement.

#### 2.2 CRC:

The Flood Flaps® automatic flood vents, described in Sections 2.0 through 7.0 of the evaluation report ESR-3560, comply with 2019 CRC, provided the design and installation are in accordance with the 2018 International Residential Code® (IRC) provisions noted in the evaluation report.

This supplement expires concurrently with the evaluation report reissued September 2020.





# **ICC-ES Evaluation Report**

# ESR-3560 FBC Supplement

Reissued September 2020

This report is subject to renewal September 2021.

www.icc-es.org | (800) 423-6587 | (562) 699-0543

A Subsidiary of the International Code Council®

DIVISION: 08 00 00-OPENINGS

Section: 08 95 43-Vents/Foundation Flood Vents

REPORT HOLDER:

FLOOD FLAPS®, LLC

**EVALUATION SUBJECT:** 

FLOOD FLAPS® AUTOMATIC FLOOD VENTS: MODELS FFWF12; FFNF12; FFWF08; FFNF08; FFWF05; FFNF05

#### 1.0 REPORT PURPOSE AND SCOPE

#### Purpose:

The purpose of this evaluation report supplement is to indicate that Flood Flaps® automatic flood vents, described in ICC-ES evaluation report ESR-3560, have also been evaluated for compliance with the codes noted below.

#### Applicable code editions:

- 2017 Florida Building Code—Building
- 2017 Florida Building Code—Residential

#### 2.0 CONCLUSIONS

The Flood Flaps flood vents, described in Sections 2.0 through 7.0 of the evaluation report ESR-3560, comply with the Florida Building Code—Building and the Florida Building Code—Residential, provided the design and installation are in accordance with the 2015 International Building Code® provisions noted in the evaluation report.

Use of the Flood Flaps flood vents has also been found to be in compliance with the High-Velocity Hurricane Zone provisions of the Florida Building Code—Building and the Florida Building Code—Residential.

For products falling under Florida Rule 9N-3, verification that the report holder's quality-assurance program is audited by a quality-assurance entity approved by the Florida Building Commission for the type of inspections being conducted is the responsibility of an approved validation entity (or the code official, when the report holder does not possess an approval by the Commission).

This supplement expires concurrently with the evaluation report, reissued September 2020.

