

**STATE OF FLORIDA
DEPARTMENT OF ENVIRONMENTAL PROTECTION**

DUMP THE PUMPS, INC., ET AL.,)	
)	
Petitioners,)	OGC CASE NOS. 14-0228
)	14-0243
vs.)	14-0246
)	14-0263
FLORIDA KEYS AQUEDUCT AUTHORITY)	DOAH CASE NOS. 14-2415
AND DEPARTMENT OF ENVIRONMENTAL)	14-2416
PROTECTION,)	14-2417
)	14-2420
Respondents.)	
_____)	

FINAL ORDER

An Administrative Law Judge (“ALJ”) with the Division of Administrative Hearings (“DOAH”) on February 3, 2015, submitted a Recommended Order (“RO”) to the Department of Environmental Protection (“DEP” or “Department”) in the above captioned administrative proceedings. A copy of the RO is attached hereto as Exhibit A. On February 18, 2015, counsel for the Petitioners, Dump the Pumps, Inc., (“DTP”), Theresa Raven, Daniel Fitch, Jim Skura, Margaret Schwing, Gail Kulikowsky, and Deborah Curlee (“individual Petitioners”), filed a Motion for Extension of Time to File Exceptions. The Motion was denied by Order dated February 19, 2015, and the Petitioners were ordered to file their exceptions by 5:00 p.m. on February 20, 2015.

On February 20, 2015, pursuant to Florida Administrative Code Rule 28-106.105(3), counsel for the Petitioners filed a Motion and Notice of Withdrawal as Counsel to the Petitioner DTP. The Motion to Withdraw was served on the President of DTP. The Motion to Withdraw is hereby granted for good cause shown.

The Petitioner DTP timely filed its written Exceptions on February 20, 2015. The individual Petitioners did not file any Exceptions. The Respondents, DEP and Florida Keys Aqueduct Authority (“FKAA”), filed responses on February 26 and 27, 2015, respectively. This matter is now on administrative review before the Secretary of the Department for final agency action.

BACKGROUND

In 2010, the Florida Legislature enacted section 403.086(10) of the Florida Statutes (“F.S.”). In that statute, the Legislature found that the discharge of inadequately treated and managed domestic wastewater from small wastewater facilities and septic tanks and other onsite systems in the Florida Keys compromises the coastal environment, including the nearshore and offshore waters, and threatens the quality of life and local economies that depend on these resources. The statute further found that the only practical and cost-effective way to improve wastewater management in the Florida Keys is for the local governments in Monroe County - which includes FKAA - to timely complete the wastewater and sewage treatment and disposal facilities pursuant to the June 2000 Monroe County Sanitary Master Wastewater Plan (“Master Plan”). To that end, the statute mandates completion by December 31, 2015, of certain wastewater facilities identified in the Master Plan, including those at issue in these proceedings.

To implement the Master Plan and this legislative mandate, Monroe County and FKAA entered into an interlocal agreement, which established FKAA's responsibilities to design, construct, operate, and maintain the central wastewater collection and treatment system. The Cudjoe Regional Wastewater System (“CRWS”) is a component of this

central wastewater collection and treatment system. It will serve the Cudjoe Regional Wastewater Service Area, which covers portions of Lower Sugarloaf Key, Upper Sugarloaf Key, Cudjoe Key, Summerland Key, Ramrod Key, Little Torch Key, and Big Pine Key. The CRWS consists of three elements: a collection system, which collects wastewater from serviced properties; a transmission system, which transmits wastewater from the collection system to the treatment plant; and a wastewater treatment plant. These proceedings only involve challenges to certain components of the wastewater collection system.

On various dates, FCAA applied to DEP for permits to authorize construction of portions of the CRWS, which includes the Permits at Issue. On various dates, DEP issued notices of intent to issue permits to FCAA, including the four permits at issue in these proceedings ("Permits at Issue").¹ The Petitioners timely challenged the proposed agency actions to grant the Permits at Issue, as well as other permits no longer at issue in these proceedings. The final hearing was held on September 29 and 30, and October 1, 2014, in Key West, Florida. The five-volume Transcript was filed on November 13, 2014, and the parties were given ten days, until November 24, 2014, to file their proposed recommended orders. The proposed recommended orders were timely filed and the ALJ subsequently issued the RO on February 3, 2015.

¹ The four Permits at Issue authorize the dryline construction of portions of the subject wastewater collection system: (1) Permit 19 for Upper Sugarloaf Key, (2) Permit 25 for Cudjoe Key, (3) Permit 18 for Big Pine Key North, and (4) Permit 27 for Big Pine Key South. (RO ¶¶ 29-39).

SUMMARY OF THE RECOMMENDED ORDER

In the RO, the ALJ recommended that the Department enter a final order approving issuance of the Permits at Issue. (RO at pages 89-90). The ALJ concluded that FKAA satisfied its burden to establish prima facie entitlement to the Permits at Issue. (RO ¶¶ 86, 95, 101, 110, 119, 125, 135, 140, 154, 165, 168, 191, 207, 246, 247, 251). The ALJ further concluded that the Petitioners alleged numerous grounds for denial of the Permits at Issue, but did not prove that the proposed wastewater collections systems, as designed, fail to comply with or violate applicable DEP rules and technical manuals and other applicable standards. (RO ¶¶ 85, 94, 100, 109, 118, 124, 134, 139, 153, 164, 169, 174, 180, 183, 190, 208, 210, 249). Thus, the ALJ ultimately concluded that FKAA provided reasonable assurances that the wastewater collections systems met all applicable permitting standards and requirements. (RO ¶ 250).

Standing

The ALJ found that the individual Petitioners demonstrated standing to initiate and participate as parties to these proceedings. (RO ¶ 217). They presented evidence aimed at showing that the grinder pumps and other features of the wastewater collection systems were inadequately or incorrectly designed and inappropriate for use in the Florida Keys, and that, as a result, the pumps and other system components would malfunction or fail, releasing wastewater, causing environmental harm and property damage. (RO ¶ 217). The ALJ concluded that although the Petitioners did not prove these allegations, they presented evidence at the hearing showing that they have a substantial interest in the use and enjoyment of the nearshore environment in the Florida Keys and in their own property, and that they would suffer significant injury to

these interests if they were correct regarding the alleged wastewater collection systems design flaws, failure, and noncompliance with DEP rules. (RO ¶¶ 201-206, 217).

The ALJ concluded that DTP met the test for associational standing. (RO ¶¶ 219-222). The ALJ found that the evidence established that a substantial number of DTP's members reside on or near property that may be serviced by a grinder pump, and a substantial number of DTP's members use and enjoy the nearshore waters and environment of the Florida Keys. (RO ¶¶ 195-197, 219). The ALJ found that DTP was organized for the specific purpose of opposing the use of grinder pumps as part of the CRWS wastewater collection systems, and these proceedings were brought to oppose issuance of DEP permits authorizing the construction of wastewater collection systems that include grinder pumps as a component. Thus, the subject matter of these proceedings is within DTP's general scope and purpose. (RO ¶¶ 194, 220). The ALJ further found that DTP's request that the Permits at Issue be denied is the type of relief appropriate for DTP to receive on behalf of its members. (RO ¶ 221).

STANDARDS OF REVIEW OF DOAH RECOMMENDED ORDERS

Section 120.57(1)(l), Florida Statutes, prescribes that an agency reviewing a recommended order may not reject or modify the findings of fact of the ALJ "unless the agency first determines from a review of the entire record, and states with particularity in the order, that the findings of fact were not based on competent substantial evidence." § 120.57(1)(l), Fla. Stat. (2014); *Charlotte Cty. v. IMC Phosphates Co.*, 18 So. 3d 1089 (Fla. 2d DCA 2009); *Wills v. Fla. Elections Comm'n*, 955 So. 2d 61 (Fla. 1st DCA 2007). The term "competent substantial evidence" does not relate to the quality, character, convincing power, probative value or weight of the evidence. Rather, "competent

substantial evidence” refers to the existence of some evidence (quantity) as to each essential element and as to its admissibility under legal rules of evidence. See e.g., *Scholastic Book Fairs, Inc. v. Unemployment Appeals Comm’n*, 671 So. 2d 287, 289 n.3 (Fla. 5th DCA 1996); *Nunez v. Nunez*, 29 So. 3d 1191, 1192 (Fla. 5th DCA 2010).

A reviewing agency may not reweigh the evidence presented at a DOAH final hearing, attempt to resolve conflicts therein, or judge the credibility of witnesses. See, e.g., *Rogers v. Dep’t of Health*, 920 So. 2d 27, 30 (Fla. 1st DCA 2005); *Belleau v. Dep’t of Env’tl. Prot.*, 695 So. 2d 1305, 1307 (Fla. 1st DCA 1997); *Dunham v. Highlands Cty. Sch. Bd.*, 652 So. 2d 894 (Fla. 2d DCA 1995). If there is competent substantial evidence to support an ALJ’s findings of fact, it is irrelevant that there may also be competent substantial evidence supporting a contrary finding. See, e.g., *Arand Construction Co. v. Dyer*, 592 So. 2d 276, 280 (Fla. 1st DCA 1991); *Conshor, Inc. v. Roberts*, 498 So. 2d 622 (Fla. 1st DCA 1986).

The ALJ’s decision to accept the testimony of one expert witness over that of another expert is an evidentiary ruling that cannot be altered by a reviewing agency, absent a complete lack of any competent substantial evidence of record supporting this decision. See, e.g., *Peace River/Manasota Regional Water Supply Authority v. IMC Phosphates Co.*, 18 So. 3d 1079, 1088 (Fla. 2d DCA 2009); *Collier Med. Ctr. V. State, Dep’t of HRS*, 462 So. 2d 83, 85 (Fla. 1st DCA 1985); *Fla. Chapter of Sierra Club v. Orlando Utils. Comm’n*, 436 So. 2d 383, 389 (Fla. 5th DCA 1983). In addition, an agency has no authority to make independent or supplemental findings of fact. See, e.g., *North Port, Fla. v. Consol. Minerals*, 645 So. 2d 485, 487 (Fla. 2d DCA 1994).

Section 120.57(1)(l), Florida Statutes, authorizes an agency to reject or modify an ALJ's conclusions of law and interpretations of administrative rules "over which it has substantive jurisdiction." See *Barfield v. Dep't of Health*, 805 So. 2d 1008 (Fla. 1st DCA 2001); *L.B. Bryan & Co. v. Sch. Bd. of Broward Cty.*, 746 So. 2d 1194 (Fla. 1st DCA 1999); *Deep Lagoon Boat Club, Ltd. v. Sheridan*, 784 So. 2d 1140 (Fla. 2d DCA 2001). Considerable deference should be accorded to these agency interpretations of statutes and rules within their regulatory jurisdiction, and such agency interpretations should not be overturned unless "clearly erroneous." See, e.g., *Falk v. Beard*, 614 So. 2d 1086, 1089 (Fla. 1993); *Dep't of Env'tl. Regulation v. Goldring*, 477 So. 2d 532, 534 (Fla. 1985). Furthermore, agency interpretations of statutes and rules within their regulatory jurisdiction do not have to be the only reasonable interpretations. It is enough if such agency interpretations are "permissible" ones. See, e.g., *Suddath Van Lines, Inc. v. Dep't of Env'tl. Prot.*, 668 So. 2d 209, 212 (Fla. 1st DCA 1996).

Agencies do not have jurisdiction, however, to modify or reject rulings on the admissibility of evidence. Evidentiary rulings of the ALJ that deal with "factual issues susceptible to ordinary methods of proof that are not infused with [agency] policy considerations," are not matters over which the agency has "substantive jurisdiction." See *Martuccio v. Dep't of Prof'l Regulation*, 622 So. 2d 607, 609 (Fla. 1st DCA 1993); *Heifetz v. Dep't of Bus. Regulation*, 475 So. 2d 1277, 1281 (Fla. 1st DCA 1985); *Fla. Power & Light Co. v. Fla. Siting Bd.*, 693 So. 2d 1025, 1028 (Fla. 1st DCA 1997). Evidentiary rulings are matters within the ALJ's sound "prerogative . . . as the finder of fact" and may not be reversed on agency review. See *Martuccio*, 622 So. 2d at 609.

RULINGS ON EXCEPTIONS

A party that files no exceptions to certain findings of fact “has thereby expressed its agreement with, or at least waived any objection to, those findings of fact.” *Envtl. Coalition of Fla., Inc. v. Broward Cty.*, 586 So. 2d 1212, 1213 (Fla. 1st DCA 1991); see also *Colonnade Medical Ctr., Inc. v. State of Fla., Agency for Health Care Admin.*, 847 So. 2d 540, 542 (Fla. 4th DCA 2003). However, an agency head reviewing a recommended order is free to modify or reject any erroneous conclusions of law over which the agency has substantive jurisdiction, even when exceptions are not filed. See § 120.57(1)(l), Fla. Stat. (2014); *Barfield v. Dep’t of Health*, 805 So. 2d 1008 (Fla. 1st DCA 2001); *Fla. Public Employee Council, 79 v. Daniels*, 646 So. 2d 813, 816 (Fla. 1st DCA 1994).

General Exceptions

DTP’s Exceptions contain general statements (paragraphs 1 through 4) directed to the RO. These general statements do not comply with the requirements of Section 120.57(1)(k), Florida Statutes. Under Section 120.57(1)(k), an “agency need not rule on an exception that does not clearly identify the disputed portion of the recommended order by page number or paragraph, that does not identify the legal basis for the exception, or that does not include appropriate and specific citations to the record.” § 120.57(1)(k), Fla. Stat. (2014).

Therefore, to the extent that DTP’s general statements can be considered as “exceptions,” they are denied.

FKAA's Request to Strike/Deny Exceptions

FKAA's response to DTP's written exceptions requests that the Department strike or deny the exceptions on the ground that the exceptions are a nullity because DTP is no longer represented by an attorney. As authority, FKAA cites case law that states a corporation, unlike a natural person, cannot represent itself and appear in a court of law without an attorney. See *Sztienbaum v. Kaes Inversiones y Valores, C.A.*, 476 So. 2d 247, 248 (Fla. 3d DCA 1985). FKAA also argues that, although serving as DTP's president, Mr. Banks Prevatt (who signed and filed DTP's written exceptions), is not an attorney and is not authorized as DTP's qualified representative. See § 120.57(1)(b), Fla. Stat. (2014); Fla. Admin. Code R. 28-106.106.

Contrary to FKAA's argument and as noted in footnote 10 of the *Sztienbaum* case, a corporation can represent itself in administrative proceedings under Chapter 120 of the Florida Statutes. See *Sztienbaum*, 476 So. 2d at 252, n. 10; see also *Magnolias Nursing and Convalescent Center v. Dep't of Health and Rehabilitative Services*, 428 So. 2d 256, 257 (Fla. 1st DCA 1982)(reflecting that self-presentation by corporations is permissible in administrative proceedings).

Therefore, FKAA's request to strike or deny DTP's written exceptions, signed and filed by DTP's president, is denied.

PETITIONER DTP'S EXCEPTIONS

Scouring Velocity

DTP takes exception to paragraphs 71-83 and 86, where the ALJ ultimately found that FKAA proved that the wastewater collection systems, as designed, will not experience wastewater backups or releases into the environment as a result of

inadequate scouring velocity. (RO ¶ 86). DTP essentially objects to the ALJ's resolution of conflicting expert testimony and judgments regarding witness credibility. DTP also seeks to have the Department make new or additional factual findings that were not made by the ALJ. As outlined in the standard of review, the Department may not reweigh the evidence presented at a DOAH final hearing, attempt to resolve conflicts therein, or judge the credibility of witnesses. *See, e.g., Rogers v. Dep't of Health*, 920 So. 2d 27, 30 (Fla. 1st DCA 2005). The ALJ's decision to accept the testimony of one expert witness over that of another expert is an evidentiary ruling that cannot be altered by the Department, absent a complete lack of any competent substantial evidence of record supporting the decision. *See, e.g., Peace River/Manasota Regional Water Supply Authority v. IMC Phosphates Co.*, 18 So. 3d 1079, 1088 (Fla. 2d DCA 2009).

The rulings below show that the ALJ's findings in paragraphs 71-83 and 86 are supported by competent substantial record evidence.

Exception to paragraph 71 - DTP agrees with the ALJ's findings in paragraph 71. Accordingly, this exception is denied.

Exception to paragraph 72 – DTP argues that paragraph 72 is “partially correct.” In paragraph 72, the ALJ summarized the testimony of Mr. Maynard (one of the Petitioners' experts) in order to explain the basis for the Petitioners' allegation that the system will not achieve sufficient scouring velocity to prevent accumulation of solids in the pipes. Paragraph 72 is supported by competent substantial record evidence, including the testimony of Mr. Maynard (Joint Ex. 65, Bates 02341-02351, Maynard). Accordingly, this exception is denied.

Exception to paragraph 73 – DTP argues that paragraph 73 is an “[i]ncorrect interpretation.” In essence, DTP takes exception to the ALJ’s finding and conclusion that under applicable Department rules, the Ten States Standards manual requirement of 2 feet-per-second (“fps”) minimum flow, does not mandatorily apply to the CRWS because the system is an “alternative collection/transmission system.” (RO ¶ 73). DTP did not take exception to other important findings and conclusions made by the ALJ regarding the same determination as paragraph 73.² (RO ¶¶ 25, 28, 237, 238, 239).³

Competent substantial record evidence supports paragraph 73. (McLaurin, Tr. Vol. II, pp. 339-340; Mathews, Tr. Vol. IV, pp. 557-561 and 617-618). Accordingly, this exception is denied.

Exception to paragraph 74 – DTP argues that paragraph 74 is “[p]artially correct.” DTP essentially objects to the ALJ’s reliance on the testimony of FKAA’s expert witness – Rene Mathews. The ALJ’s findings are supported by competent substantial record evidence in the form of the expert’s testimony. (Mathews, Tr. Vol. IV, pp. 558, 617). The ALJ’s decision to accept the testimony of one expert witness over that of another expert is an evidentiary ruling that cannot be altered by a reviewing agency, absent a complete lack of any competent substantial evidence of record

² A party that files no exceptions to certain findings of fact “has thereby expressed its agreement with, or at least waived any objection to, those findings of fact.” *Env’tl. Coalition of Fla., Inc. v. Broward Cty.*, 586 So. 2d 1212, 1213 (Fla. 1st DCA 1991); see also *Colonnade Medical Ctr., Inc. v. State of Fla., Agency for Health Care Admin.*, 847 So. 2d 540, 542 (Fla. 4th DCA 2003).

³ DTP’s general statement in paragraph 2 of its Exceptions regarding the RO paragraphs to which it did not take exception “due to time constraints,” does not comply with section 120.57(1)(k) regarding written exceptions. See § 120.57(1)(k), Fla. Stat. (2014).

supporting the decision. See, e.g., *Peace River/Manasota Regional Water Supply Authority v. IMC Phosphates Co.*, 18 So. 3d 1079, 1088 (Fla. 2d DCA 2009).

Accordingly, this exception is denied.

Exception to paragraph 75 – DTP argues that paragraph 75 is “[p]artially correct.” DTP essentially objects to the ALJ’s reliance on the testimony of DEP’s expert witness – Al McLaurin. The ALJ’s findings are supported by competent substantial record evidence including the expert’s testimony. (McLaurin, Tr. Vol. II, pp. 222-223, 341-342; Joint Ex. 2, Bates 101, 113-114). The ALJ’s decision to accept the testimony of one expert witness over that of another expert is an evidentiary ruling that cannot be altered by a reviewing agency, absent a complete lack of any competent substantial evidence of record supporting the decision. *Id.* Accordingly, this exception is denied.

Exception to paragraph 76 - DTP argues that paragraph 76 is “[p]artially correct.” DTP essentially objects to the ALJ’s reliance on the testimony of FKAA’s expert witness – Oscar Bello. The ALJ’s findings are supported by competent substantial record evidence including the expert’s testimony. (Bello, Tr. Vol. V, p. 693). The ALJ’s decision to accept the testimony of one expert witness over that of another expert is an evidentiary ruling that cannot be altered by a reviewing agency, absent a complete lack of any competent substantial evidence of record supporting the decision. *Id.* Accordingly, this exception is denied.

Exception to paragraph 77 - DTP essentially objects to the ALJ’s reliance on the testimony of DEP’s expert witness – Gary Maier. The ALJ’s findings are supported by competent substantial record evidence including the expert’s testimony. (Maier, Tr. Vol. V, pp. 806-808). The ALJ’s decision to accept the testimony of one expert witness

over that of another expert is an evidentiary ruling that cannot be altered by a reviewing agency, absent a complete lack of any competent substantial evidence of record supporting the decision. *Id.* Accordingly, this exception is denied.

Exception to paragraph 78 - Competent substantial record evidence supports this finding of fact. (Mathews, Tr. Vol. IV, pp. 515-521; Joint Ex. 35, Bates 1410). Accordingly, DTP's exception to paragraph 78 is denied.

Exception to paragraph 79 - Competent substantial record evidence supports this finding of fact. (McLaurin, Tr. Vol. II, pp. 202-226; Joint Ex. 9). Accordingly, DTP's exception to paragraph 79 is denied.

Exception to paragraph 80 – Competent substantial record evidence supports this finding of fact. (Bello, Tr. Vol. V, pp. 690-693). Accordingly, DTP's exception to paragraph 80 is denied.

Exception to paragraph 81 – Competent substantial record evidence supports this finding of fact. (Maier, Tr. Vol. V, pp. 804-806; Joint Ex. 12). Accordingly, DTP's exception to paragraph 81 is denied.

Exception to paragraph 82 - DTP takes exception to the ALJ's description of Mr. Maynard's background and lack of experience and level of familiarity with the projects at issue in these proceedings. The ALJ's findings are supported by competent substantial record evidence. (Joint Ex. 65, Bates 02235-02236, 02238-02244, 02248-02252 and 02331-02352, Maynard). Notably, DTP did not take exception to paragraph 84,⁴ where the ALJ ultimately found that Mr. Maynard's testimony was unpersuasive

⁴ A party that files no exceptions to certain findings of fact "has thereby expressed its agreement with, or at least waived any objection to, those findings of fact." *Envtl. Coalition of Fla., Inc. v. Broward Cty.*, 586 So. 2d 1212, 1213 (Fla. 1st DCA 1991); see

based on the underlying findings in paragraph 82. The ALJ's decision to accept the testimony of one expert witness over that of another expert is an evidentiary ruling that cannot be altered by a reviewing agency, absent a complete lack of any competent substantial evidence of record supporting the decision. *See, e.g., Peace River/Manasota Regional Water Supply Authority v. IMC Phosphates Co.*, 18 So. 3d 1079, 1088 (Fla. 2d DCA 2009). Accordingly, this exception is denied.

Exception to paragraph 83 – DTP takes exception to paragraph 83, where the ALJ found:

83. The undersigned finds persuasive the testimony of Mathews, McLaurin, Bello, and Maier that the 2 fps flow rate is not a mandatory standard applicable to the projects authorized by the Permits at Issue, and that in areas of the system in which a 2 fps flow rate will not be achieved, requiring more frequent cleaning to ensure that the pipes do not become plugged is adequate to meet DEP's rule requirements.

However, the rulings on the Exceptions to paragraphs 72-82, above, show that the ALJ's findings are supported by competent substantial record evidence. The specified rulings are incorporated herein, and accordingly this exception is denied.

Exception to paragraph 86 – DTP takes exception to paragraph 86, where the ALJ ultimately determined that:

86. FKAA demonstrated, by a preponderance of the competent substantial evidence, that the systems, as designed, will not experience wastewater backups or releases into the environment as a result of inadequate scouring velocity. FKAA has demonstrated that the systems, in compliance with DEP rules and applicable technical manual standards and requirements, will have wastewater flow of sufficient velocity to scour and prevent sedimentation

also Colonnade Medical Ctr., Inc. v. State of Fla., Agency for Health Care Admin., 847 So. 2d 540, 542 (Fla. 4th DCA 2003).

in the piping, and that in the few remote areas where the velocity may be lower than recommended, more frequent cleaning of the piping will prevent sedimentation.

However, the rulings on the Exceptions to paragraphs 72-82, above, show that the ALJ's findings and ultimate determinations are supported by competent substantial record evidence. The specified rulings are incorporated herein, and accordingly this exception is denied.

Explosion Potential of Pumps

DTP takes exception to paragraphs 128-135, where the ALJ ultimately found that FKAA proved that using E/One grinder pumps in the wastewater collections systems did not present a substantial fire or explosion risk and complies with the DEP's rules and applicable technical manuals. (RO ¶ 135). DTP essentially objects to the ALJ's judgments regarding witness credibility and persuasive testimony. DTP also seeks to have the Department make new or additional factual findings that were not made by the ALJ. The ALJ's findings must be reviewed based on the standards of review discussed above. The rulings below show that the findings in paragraphs 128-135 are supported by competent substantial record evidence.

Exception to paragraph 128 – DTP's exception states that paragraph 128 is a "[c]orrect statement," regarding the testimony of DTP's expert witness – Mr. Boismenu. The exception then seems to criticize a portion of Mr. Boismenu's testimony as described by the ALJ in paragraph 128. Either way, paragraph 128 is supported by competent substantial record evidence. (Joint Ex. 67, Bates at 02551 and 02569-02570, Boismenu). Therefore, this exception is denied.

Exceptions to paragraphs 129 and 130 - DTP argues that paragraphs 129 and 130 are “[p]artially correct.” DTP essentially objects to the ALJ’s reliance on the testimony of FKAA’s expert witness – Rene Mathews. The ALJ’s findings are supported by competent substantial record evidence including the expert’s testimony. (Mathews, Tr. Vol. IV, pp. 523-532; Joint Exs. 25, 33, and 34). The ALJ’s decision to accept the testimony of one expert witness over that of another expert is an evidentiary ruling that cannot be altered by a reviewing agency, absent a complete lack of any competent substantial evidence of record supporting the decision. *See, e.g., Peace River/Manasota Regional Water Supply Authority v. IMC Phosphates Co.*, 18 So. 3d 1079, 1088 (Fla. 2d DCA 2009). Therefore, these exceptions are denied.

Exception to paragraph 131 - DTP takes exception to the ALJ’s description of Mr. Boismenu’s lack of familiarity with the type of wastewater projects at issue in these proceedings. The ALJ’s findings are supported by competent substantial record evidence. (Joint Ex. 67, Bates 02545, 02592-02593, 02551-02558, and 02561-02582, Boismenu). The ALJ’s decision to accept the testimony of one expert witness over that of another expert is an evidentiary ruling that cannot be altered by a reviewing agency, absent a complete lack of any competent substantial evidence of record supporting the decision. *See, e.g., Peace River/Manasota Regional Water Supply Authority v. IMC Phosphates Co.*, 18 So. 3d 1079, 1088 (Fla. 2d DCA 2009). Accordingly, this exception is denied.

Exception to paragraph 132 - DTP again objects to the ALJ’s reliance on the testimony of FKAA’s expert witness – Rene Mathews. The ALJ’s findings are supported by competent substantial record evidence including the expert’s testimony. (Mathews,

Tr. Vol. IV, pp. 523-532; Joint Exs. 25, 33, and 34). The ALJ's decision to accept the testimony of one expert witness over that of another expert is an evidentiary ruling that cannot be altered by a reviewing agency, absent a complete lack of any competent substantial evidence of record supporting the decision. *Id.* Therefore, this exception is denied.

Exception to paragraph 133 – DTP again objects to the ALJ's conclusion that the Ten States Standards do not mandatorily apply to this alternative system. The rulings on the Exception to paragraph 73 above is incorporated herein. Competent substantial record evidence supports the ALJ's findings in paragraph 133. (McLaurin, Tr. Vol. II, pp. 264-268, 339-340; Mathews, Tr. Vol. IV, p. 618; Bello, Tr. Vol. V, pp. 736-738). Therefore, this exception is denied.

Exception to paragraph 134 – DTP takes exception to paragraph 134, where the ALJ determined that the "Petitioners did not demonstrate that the residential and neighborhood/area lift station grinder pumps violate DEP rules and applicable technical manuals, the NEC, [National Electrical Code] or the NFPA Standards [National Fire Protection Association] regarding potential for fire and explosion." The ALJ's determination as to whether a party met its burden of proof is a factual finding based on the record evidence. See § 120.569(2)(p) and 120.57(1)(j), Fla. Stat. (2014). The rulings on the Exceptions to paragraphs 128-131 above are incorporated herein and show that the ALJ's finding is supported by competent substantial evidence. Therefore, this exception is denied.

Exception to paragraph 135 - DTP takes exception to paragraph 135, where the ALJ ultimately determined that:

135. FCAA demonstrated, by a preponderance of the competent substantial evidence, that using E/One grinder pumps in the wastewater collection systems does not present a substantial fire or explosion risk and does not violate DEP rules or applicable technical manual standards and requirements.

However, the rulings on the Exceptions to paragraphs 128-134, above, show that the ALJ's findings and ultimate determinations are supported by competent substantial record evidence. The specified rulings are incorporated herein and therefore, this exception is denied.

System Pressure Capacity

DTP takes exception to paragraphs 141-151 and 153-154, where the ALJ ultimately found that FCAA proved that the E/One grinder pumps used in the systems design will function as anticipated, will not exert pressures that exceed the systems' piping capacity, and will not cause system piping to burst or fail. (RO ¶ 154). DTP essentially objects to the ALJ's resolution of conflicting expert testimony and judgments regarding witness credibility. DTP also seeks to have the Department make new or additional factual findings that were not made by the ALJ. The ALJ's findings must be reviewed based on the standards of review discussed above. The rulings below show that the findings in paragraphs 141-151 and 153-154 are supported by competent substantial record evidence.

Exceptions to paragraphs 141, 142, and 143 – DTP agrees with the ALJ's findings in paragraphs 141, 142, and 143. Accordingly, these exceptions are denied.

Exceptions to paragraphs 144, 145, and 146 – DTP takes exception to paragraphs 144, 145, and 146, on the basis that the findings are “[i]ncorrect conclusions” based on “incorrect testimony” and “hearsay.” DTP essentially objects to

the ALJ's reliance on the testimony of FKAA's expert witnesses. The ALJ's findings in paragraphs 144, 145, and 146, are supported by competent substantial record evidence. (Mathews, Tr. Vol. IV, pp. 540-550; Fernandez, Tr. Vol. V, pp. 758-761).

DTP argues that Mr. Fernandez' testimony regarding how power restoration is handled after a massive power outage, is hearsay. However, the record does not show that any hearsay objection was made and ruled on at the hearing. (Fernandez, Tr. Vol. V, pp. 758-761). The ALJ's decision to accept the testimony of one expert witness over that of another expert is an evidentiary ruling that cannot be altered by a reviewing agency, absent a complete lack of any competent substantial evidence of record supporting the decision. *See, e.g., Peace River/Manasota Regional Water Supply Authority v. IMC Phosphates Co.*, 18 So. 3d 1079, 1088 (Fla. 2d DCA 2009). Therefore, these exceptions are denied.

Exception to paragraph 147 – DTP takes exception to paragraph 147, where the ALJ ultimately found that “it is highly unlikely, under any reasonable circumstances, that pressure generated by the grinder pumps would cause the system piping to burst.” DTP argues that the ALJ's finding is an “[i]ncorrect conclusion based on misinformation.” DTP essentially objects to the ALJ's reliance on the testimony of FKAA's expert witnesses. The ALJ's ultimate finding in paragraph 147 is supported by competent substantial record evidence. (Mathews, Tr. Vol. IV, pp. 540-550; Fernandez, Tr. Vol. V, pp. 758-761). Therefore, this exception is denied.

Exception to paragraph 148 – DTP takes exception to paragraph 148, where the ALJ describes the Petitioners' assertion regarding inadequate pressure testing of the piping that comprises the collection system. (RO ¶ 148). The ALJ's description is

supported by competent substantial record evidence. (See, e.g., First Amended Petition in DOAH Case No. 14-2415 at ¶¶ 44; Joint Ex. 65, Bates 02301-02304, Maynard). Accordingly, this exception is denied.

Exception to paragraph 149 – DTP takes exception to paragraph 149, where the ALJ found that pressure testing of pipes take place after construction is complete for the purpose of detecting leaks - not to determine the failure pressure of the pipes. (RO ¶ 149). DTP objects to the ALJ's reliance on the testimony of FKAA's expert witnesses. The ALJ's findings in paragraph 149 are supported by competent substantial record evidence. (Mathews, Tr. Vol. IV, pp. 540-550; McLaurin, Tr. Vol. II, pp. 308-310). Therefore, this exception is denied.

Exception to paragraph 150 - DTP takes exception to the ALJ's description of Dr. Hovstadius' lack of experience familiarity with certain details and design features of the CRWS. The ALJ's findings are supported by competent substantial record evidence. (Joint Ex. 66, Bates 2444-2456 and 02492, Hovstadius). Notably, DTP did not take exception to paragraph 152,⁵ where the ALJ ultimately found that Dr. Hovstadius' and Mr. Maynard's testimony was unpersuasive on the issue of system pressure capacity. The ALJ's decision to accept the testimony of one expert witness over that of another expert is an evidentiary ruling that cannot be altered by a reviewing agency, absent a complete lack of any competent substantial evidence of record supporting the decision. See, e.g., *Peace River/Manasota Regional Water Supply*

⁵ A party that files no exceptions to certain findings of fact "has thereby expressed its agreement with, or at least waived any objection to, those findings of fact." *Env'tl. Coalition of Fla., Inc. v. Broward Cty.*, 586 So. 2d 1212, 1213 (Fla. 1st DCA 1991); see also *Colonnade Medical Ctr., Inc. v. State of Fla., Agency for Health Care Admin.*, 847 So. 2d 540, 542 (Fla. 4th DCA 2003).

Authority v. IMC Phosphates Co., 18 So. 3d 1079, 1088 (Fla. 2d DCA 2009). Therefore, this exception is denied.

Exception to paragraph 151 – DTP takes exception to paragraph 151, where the ALJ summarizes the background and experience of Rene Mathews and Al McLaurin. Competent substantial record evidence supports the ALJ’s findings. (McLaurin, Tr. Vol. II, pp. 202-212; Mathews, Tr. Vol. IV, pp. 514-520). Accordingly, this exception is denied.

Exception to paragraphs 153 and 154 – DTP takes exception to paragraph 153, where the ALJ ultimately found that the “Petitioners failed to demonstrate that the E/One grinder pumps will exert pressures exceeding the systems’ piping pressure capacity, causing system piping bursting or failure.” DTP also takes exception to paragraph 154, where the ALJ ultimately found that FKAA proved that the E/One grinder pumps “will function as anticipated, will not exert pressures that exceed the systems’ piping capacity, and will not cause system piping to burst or fail.”

Paragraphs 153 and 154 are supported by competent substantial record evidence. (McLaurin, Tr. Vol. II, pp. 308-310; Mathews, Tr. Vol. IV, pp. 540-550; Fernandez, Tr. Vol. V, pp. Fernandez; Joint Ex. 65, Bates 02301-02304, Maynard). Accordingly, these exceptions are denied.

Wastewater Service during Power Outage

DTP takes exception to paragraphs 155-165, where the ALJ ultimately found that FKAA proved that uninterrupted sewer service will be provided, including during extended power outages and other emergency circumstances, as required by DEP rules. (RO ¶ 165). DTP essentially objects to the ALJ’s resolution of conflicting expert

testimony and judgments regarding witness credibility. DTP also seeks to have the Department make new or additional factual findings that were not made by the ALJ. The ALJ's findings must be reviewed based on the standards of review discussed above. The rulings below show that the findings in paragraphs 155-165 are supported by competent substantial record evidence.

Exception to paragraph 155 - DTP agrees with the ALJ's findings in paragraph 155. Accordingly, this exception is denied.

Exception to paragraph 156 – DTP takes exception to paragraph 156, where the ALJ found that the “CRWS design and operating protocol contain measures specifically directed to [power outage] issues.” Competent substantial record evidence supports the ALJ's finding. (Walker, Tr. Vol. V, pp. 785-789; McLaurin, Tr. Vol. II, pp. 218-220; Mathews, Tr. Vol. IV, pp. 603-604, 620-636; Fernandez, Tr. Vol. V, pp. 759-765; Maier, Tr. Vol. V, pp. 798-802 , 806-807; Joint Ex. 29). Therefore, this exception is denied.

Exception to paragraph 157 – DTP takes exception to paragraph 157, where the ALJ found that “the neighborhood/area lift station design includes a quick connect riser pipe that will be used to periodically flush the systems and can be used in emergencies to pump water out of the lift stations into the force mains and to the treatment plant, thus preventing lift station overflow.” Competent substantial record evidence supports the ALJ's findings. (McLaurin, Tr. Vol. II, pp. 272-275, 344-345; Mathews, Tr. Vol. IV, pp. 535-540, 631-632; Joint Exhibit 29). Therefore, this exception is denied.

Exception to paragraph 158 – DTP takes exception to paragraph 158, where the ALJ found that “during a power outage, FKAA can pump out residential grinder pump wet wells using mobile generators, pump trucks, or vacuum trucks.” Competent substantial record evidence supports paragraph 158. (Walker, Tr. Vol. I, pp. 138-139, 155-156, 171-173 and Tr. Vol. V, pp. 786-788; McLaurin, Tr. Vol. II, pp. 273-276 and 310-319; Mathews, Tr. Vol. IV, p. 595; Fernandez, Tr. Vol. V, pp. 759-760 and 777-778). Accordingly, this exception is denied.

Exceptions to paragraphs 159, 160, and 161 – DTP takes exception to paragraphs 159, 160, and 161, where the ALJ made findings regarding FKAA’s operating contingencies to address power outages during emergency situations. Competent substantial record evidence supports these findings of fact. (Walker, Tr. Vol. I, pp. 138-139, 155-156, 171-173 and Tr. Vol. V, pp. 786-788; McLaurin, Tr. Vol. II, pp. 273-276 and 310-319; Mathews, Tr. Vol. IV, p. 595; Fernandez, Tr. Vol. V, pp. 759-760 and 777-778). Accordingly, these exceptions are denied.

Exception to paragraph 162 – DTP takes exception to paragraph 162, where the ALJ found that Grinder Pump Guardian monitoring system “will enable pump malfunctions to be immediately detected and rapidly addressed by maintenance personnel, significantly decreasing the likelihood of wastewater spill or release into homes or the environment.” Competent substantial record evidence supports the ALJ’s findings in paragraph 162. (Wallace, Tr. Vol. I, p. 172; McLaurin, Tr. Vol. II, pp. 270, 300-301; Mathews, Tr. Vol. IV, pp. 556 and 604-605. Accordingly, this exception is denied.

Exceptions to paragraph 163 – DTP takes exception to paragraph 163, where the ALJ found that FKAA had already started to establish specific procedures and protocol for addressing collections systems operation, though not required to do so until it seeks certification from DEP to place the CRWS into operation. Competent substantial record evidence supports the ALJ’s findings in paragraph 163. (Walker, Tr. Vol. I, pp. 138-139, 155-156, 171-173 and Tr. Vol. V, pp. 786-788; McLaurin, Tr. Vol. II, pp. 273-276 and 310-319; Mathews, Tr. Vol. IV, p. 595; Fernandez, Tr. Vol. V, pp. 759-760 and 777-778). Therefore, this exception is denied.

Exceptions to paragraphs 164 and 165 – DTP takes exception to paragraph 164, where the ALJ ultimately found that the “Petitioners did not demonstrate that sewer service will be interrupted in violation of DEP rules.” DTP also takes exception to paragraph 165, where the ALJ ultimately concluded that FKAA proved “that uninterrupted sewer service will be provided, including during extended power outages and other emergency circumstances, as required by DEP rules.”

Competent substantial record evidence supports these ultimate findings of the ALJ. (Walker, Tr. Vol. I, pp. 138-139, 155-156, 171-173 and Tr. Vol. V, pp. 786-788; McLaurin, Tr. Vol. II, pp. 273-276 and 310-319; Mathews, Tr. Vol. IV, p. 595; Fernandez, Tr. Vol. V, pp. 759-760 and 777-778). Accordingly, these exceptions are denied.

CONCLUSION

Having reviewed the matters of record and being otherwise duly advised,

It is therefore ORDERED that:

- A. The Recommended Order (Exhibit A) is adopted in its entirety and is incorporated by reference herein.
- B. Permit No. 295404-018-DWC/CM (Permit 18), is APPROVED;
- C. Permit No. 295404-019-DWC/CM (Permit 19), is APPROVED;
- D. Permit No. 295404-027-DWC/CM (Permit 27), is APPROVED;
- E. Permit No. 295404-025-DWC/CM (Permit 25), is APPROVED.


JUDICIAL REVIEW

Any party to this proceeding has the right to seek judicial review of the Final Order pursuant to Section 120.68, Florida Statutes, by filing a Notice of Appeal pursuant to Rules 9.110 and 9.190, Florida Rules of Appellate Procedure, with the clerk of the Department in the Office of General Counsel, 3900 Commonwealth Boulevard, M.S. 35, Tallahassee, Florida 32399-3000; and by filing a copy of the Notice of Appeal accompanied by the applicable filing fees with the appropriate District Court of Appeal.

The Notice of Appeal must be filed within 30 days from the date this Final Order is filed with the clerk of the Department.

DONE AND ORDERED this 16th day of March, 2015, in Tallahassee, Florida.

STATE OF FLORIDA DEPARTMENT
OF ENVIRONMENTAL PROTECTION



JONATHAN P. STEVERSON
Secretary

Marjory Stoneman Douglas Building
3900 Commonwealth Boulevard
Tallahassee, Florida 32399-3000

FILED ON THIS DATE PURSUANT TO § 120.52,
FLORIDA STATUTES, WITH THE DESIGNATED
DEPARTMENT CLERK, RECEIPT OF WHICH IS
HEREBY ACKNOWLEDGED.



CLERK

DATE 3/16/15

CERTIFICATE OF SERVICE

I CERTIFY that a copy of the foregoing Final Order was sent by electronic mail

to:

Robert N. Hartsell, Esquire
Sarah M. Hayter, Esquire
1600 S. Federal Highway, Suite 921
Pompano Beach, FL 33062
robert@hartsell-law.com
sarah@hartsell-law.com

Lee R. Rohe, Esquire
Lee Robert Rohe, P.A.
25000 Overseas Highway, Suite 2
Summerland Key, FL 33042
lrrlaw@bellsouth.net

Division of Administrative Hearings
The DeSoto Building
1230 Apalachee Parkway
Tallahassee, FL 32399-1550

by U.S. Postal Service to:

Jamie Colee
Little Palm Island Associates, Ltd.
600 6th Street South
Kirkland, WA 98033-6716

this 16th day of March, 2015.

Fred Springer, Esquire
Michael L. Elkins, Esquire
Bryant Miller Olive, P.A.
SunTrust International Center
One S.E. 3rd Ave., Suite 2200
Miami, FL 33131
fspringer@bmolaw.com
melkins@bmolaw.com

Robert T. Feldman, Esquire
Office of General Counsel
Florida Keys Aqueduct Authority
1100 Kennedy Drive
Key West, FL 33040-4021
rfeldman@fkaa.com

Sidney Bigham, III, Esquire
Dept. of Environmental Protection
3900 Commonwealth Blvd., MS 35
Tallahassee, FL 32399-3000
sidney.bigham@dep.state.fl.us

STATE OF FLORIDA DEPARTMENT
OF ENVIRONMENTAL PROTECTION



FRANCINE M. FFOLKES
Administrative Law Counsel

3900 Commonwealth Blvd., M.S. 35
Tallahassee, FL 32399-3000
Telephone 850/245-2242

STATE OF FLORIDA
DIVISION OF ADMINISTRATIVE HEARINGS

DUMP THE PUMPS, INC., ET AL.,

Petitioners,

vs.

Case Nos. 14-2415

14-2416

FLORIDA KEYS AQUEDUCT AUTHORITY
AND DEPARTMENT OF ENVIRONMENTAL
PROTECTION,

14-2417

14-2420

Respondents.

_____ /

RECOMMENDED ORDER

Pursuant to notice, a hearing was conducted in these consolidated cases pursuant to sections 120.569 and 120.57(1), Florida Statutes (2014), before Cathy M. Sellers, an Administrative Law Judge of the Division of Administrative Hearings ("DOAH"), on September 29 and 30, and October 1, 2014, in Key West, Florida.

APPEARANCES

For Petitioners: Robert N. Hartsell, Esquire
Sarah M. Hayter, Esquire
Law Office of Robert N. Hartsell, P.A.
1600 South Federal Highway, Suite 921
Pompano Beach, Florida 33062

For Respondent Florida Keys Aqueduct Authority:

Frederick J. Springer, Esquire
Bryant Miller Olive, P.A.
101 North Monroe Street, Suite 900
Tallahassee, Florida 32301

Michael L. Elkins, Esquire
Bryant Miller Olive, P.A.
One Southeast Third Avenue, Suite 2200
Miami, Florida 33131

For Respondent Department of Environmental Protection:

Sidney C. Bigham, Esquire
Julia E. Gilcher, Esquire
W. Douglas Beason, Esquire
Department of Environmental Protection
3900 Commonwealth Boulevard, Mail Stop 35
Tallahassee, Florida 32399-3000

STATEMENT OF THE ISSUE

The issue in these consolidated cases is whether Respondent Florida Keys Aqueduct Authority ("FKAA") is entitled to issuance, by Respondent Department of Environmental Protection ("DEP"), of permit numbers 295404-018-DWC/CM ("Permit 18"), 295404-019-DWC/CM ("Permit 19"), 295404-025-DWC/CM ("Permit 25"), and 295404-027-DWC/CM ("Permit 27") (hereafter "Permits at Issue") authorizing the dryline construction of domestic wastewater collection and transmission systems in the lower Florida Keys.^{1/}

PRELIMINARY STATEMENT

On various dates, FKAA applied to DEP for permits to authorize construction of portions of the Cudjoe Regional Wastewater System ("CRWS"), which includes the Permits at Issue. On various dates, DEP issued notices of intent to issue permits, including the Permits at Issue, to FKAA. Petitioners, consisting of Dump the Pumps, Inc. ("DTP") and specified individuals, timely challenged the proposed agency actions to grant the Permits at

Issue, as well as other permits no longer at issue in this proceeding.^{2/}

On May 20, 2014, the cases were referred to DOAH for assignment of an administrative law judge to conduct an administrative hearing under sections 120.569 and 120.57(1). By Order dated June 3, 2014, the cases were consolidated for final hearing. The final hearing initially was scheduled for August 4 through 8, 2014, in Marathon, Florida, but was continued and rescheduled for September 29 through October 3, 2014, in Key West, Florida.

The parties filed a Joint Prehearing Stipulation setting forth the stipulated facts and issues of law, and also filed a Standing Facts Stipulation stating the agreed facts regarding Petitioners' standing in these proceedings.

On September 23, 2014, FKAA filed motions to exclude, pursuant to section 90.702, Florida Statutes, the testimony of two witnesses, Dr. Gunnar Hovstadius and Mr. Donald Maynard, whose deposition testimony was anticipated to be offered by Petitioners for admission into evidence in lieu of presenting in-person testimony at the final hearing. Petitioners filed a response in opposition on September 29, 2014, the first day of the final hearing.

The final hearing was held on September 29 and 30, and October 1, 2014, in Key West, Florida. Respondents presented the

following witnesses to establish FKAA's prima facie entitlement to the permits at issue: Kirk Zuelch, executive director of FKAA; Tom Walker, P.E., deputy executive director of FKAA; Stephen Wallace, managing director of Pressure Systems Solutions, who appeared by video deposition; and Al McLaurin, assistant director of DEP's South District. Petitioners presented the testimony of Banks Prevatt, a resident of Little Torch Key and president of DTP; Deborah Curlee, a resident of Cudjoe Key and DTP member; Michael Boismenu, whose deposition testimony was provided in lieu of in-person testimony at the hearing; Gunnar Hovstadius, Ph.D., whose deposition testimony was provided in lieu of in-person testimony at the hearing; and Donald Maynard, P.E., an owner of property on Big Pine Key and consulting engineer whose deposition testimony was provided in lieu of in-person testimony at the hearing. In rebuttal, Respondents presented the testimony of Rene Mathews, P.E., president of Mathews Consulting, Inc.; Wesley Self, P.E., vice president of Layne Heavy Civil, Inc.; Oscar Bello, P.E., of Layne Heavy Civil and formerly of Chen Moore and Associates, Inc.; Rudolfo Fernandez, P.E., a consulting engineer; Tom Walker; and Gary Maier, P.E., a professional engineer supervisor in DEP's South District.

Joint Exhibits 1 through 65 and 68 were offered and admitted into evidence without objection. Consistent with FKAA's

previously filed motions, Respondents objected to the admission into evidence of Exhibits 66 and 67, the deposition transcripts of Hovstadius and Maynard. The undersigned accepted the deposition transcripts but reserved ruling on their admissibility, to be addressed in the Recommended Order.^{3/}

The five-volume Transcript was filed on November 13, 2014, and the parties were given ten days, until November 24, 2014, to file their proposed recommended orders. The Proposed Recommended Orders were timely filed and duly considered in preparing this Recommended Order.

FINDINGS OF FACT

I. The Parties

Petitioners

1. Petitioner Dump the Pumps, Inc. ("DTP") is a not-for-profit corporation incorporated under the laws of the state of Florida.

2. DTP challenged the issuance of each of the Permits at Issue. Therefore, DTP is a Petitioner in each case in these consolidated proceedings.

3. Petitioner Theresa Raven is a member of DTP and an individual petitioner in DOAH Case No. 14-2415, challenging the issuance of Permit 18.

4. Petitioner Daniel Fitch is a member of DTP and an individual petitioner in DOAH Case No. 14-2415, challenging the issuance of Permit 18.

5. Petitioner Jim Skura is a member of DTP and an individual petitioner in DOAH Case No. 14-2416, challenging the issuance of Permit 19.

6. Petitioner Margaret Schwing is a member of DTP and an individual petitioner in DOAH Case No. 14-2417, challenging the issuance of Permit 27.

7. Petitioner Gail Kulikowsky is a member of DTP and an individual petitioner in DOAH Case No. 14-2417, challenging the issuance of Permit 27.

8. Petitioner Deborah Curlee is a member of DTP and an individual petitioner in DOAH Case No. 14-2420, challenging the issuance of Permit 25.

Respondent Florida Keys Aqueduct Authority

9. Respondent FKAA is a special district created by special act of the Florida Legislature. FKAA is charged with, among other things, providing wastewater service to the Florida Keys.^{4/} Ch. 98-519, Laws of Florida.

10. Pursuant to this authority, FKAA is responsible for the design, construction, operation, and maintenance of the CRWS. FKAA is the applicant for the Permits at Issue being sought to implement the CRWS.

Respondent Department of Environmental Protection

11. Respondent DEP is the state agency charged with administering the domestic wastewater program in Florida pursuant to chapter 403, Florida Statutes, Florida Administrative Code Chapters 62-4, 62-604, and 62-555, and various industry standards manuals incorporated by reference into DEP rules.

12. DEP's proposed agency actions to grant the Permits at Issue are the subject of these proceedings.

II. The Projects

Background and Overview

13. The projects at issue are proposed to be located in the Florida Keys, in Monroe County, Florida.

14. In recognition of, and to protect, the Florida Keys' unique, sensitive ecology, Congress enacted the Florida Keys National Marine Sanctuary and Protection Act, designating the Florida Keys, including the submerged lands and waters and living marine resources within those lands and waters, a National Marine Sanctuary.

15. To further protect the Keys' unique habitat and environmental resources, Congress also enacted the National Key Deer Refuge, designating much of Big Pine Key and other areas within the lower Florida Keys as a refuge for the conservation and management of the Key Deer and other wildlife. 16 U.S.C. § 696.

16. The State of Florida also has recognized the need to protect the Florida Keys' unique, sensitive environmental resources. To that end, portions of the Florida Keys are designated by DEP rule as Outstanding Florida Waters. Fla. Admin. Code R. 62-302.700(9).

17. Additionally, the Florida Legislature has designated the Florida Keys an Area of Critical State Concern ("ACSC"). § 380.0552, Fla Stat. A stated purpose of the ACSC designation is to protect and improve the Florida Keys nearshore water quality through construction and operation of wastewater management facilities that meet the requirements of section 403.086(10), Florida Statutes. § 380.0552(2)(i), Fla. Stat.

18. The June 2000 Monroe County Sanitary Master Wastewater Plan ("Master Plan"), which was prepared as directed in the Monroe County Comprehensive Plan, addressed elevated nutrient levels in Monroe County nearshore waters resulting from discharges of raw sewage and inadequately treated wastewater. A primary purpose of the Master Plan was to plan for a central wastewater collection and treatment system to serve portions of Monroe County. The Master Plan considered the potential use of a number of different types of wastewater systems, including gravity systems, vacuum systems, and low pressure systems.

19. In 2003, Monroe County adopted Ordinance No. 027-2003, authorizing assessment of an annual wastewater fee on properties

to be served by the wastewater facilities being installed to implement the Master Plan.

20. In 2010, the Florida Legislature enacted section 403.086(10). In that statute, the Legislature found that the discharge of inadequately treated and managed domestic wastewater from small wastewater facilities and septic tanks and other onsite systems in the Florida Keys compromises the coastal environment, including the nearshore and offshore waters, and threatens the quality of life and local economies that depend on these resources. The statute further finds that the only practical and cost-effective way to improve wastewater management in the Florida Keys is for the local governments in Monroe County—which includes FKAA—to timely complete the wastewater and sewage treatment and disposal facilities pursuant to the Master Plan. To that end, the statute mandates that certain wastewater facilities identified in the Master Plan, including those at issue in these proceedings, be completed by December 31, 2015.

21. To implement the Master Plan and this legislative mandate, Monroe County and FKAA entered into an interlocal agreement, which establishes and specifies FKAA's responsibilities to design, construct, operate, and maintain the central wastewater collection and treatment system.

22. The CRWS is a component of this central wastewater collection and treatment system. It will serve the Cudjoe

Regional Wastewater Service Area, which covers portions of Lower Sugarloaf Key, Upper Sugarloaf Key, Cudjoe Key, Summerland Key, Ramrod Key, Little Torch Key, and Big Pine Key.

23. The CRWS consists of three elements: a collection system, which collects wastewater from serviced properties; a transmission system, which transmits wastewater from the collection system to the treatment plant; and a wastewater treatment plant.

24. These proceedings only involve challenges to certain components of the wastewater collection system. The transmission system permit previously was challenged, but that case was dismissed before the final hearing.^{5/} The wastewater treatment plant is not at issue in these proceedings.

Project Planning and Design

25. In furtherance of its responsibilities under the Monroe County interlocal agreement and the 2010 legislation, FKAA engaged Mathews Consulting, Inc. ("Mathews") to undertake planning, design analysis, and preliminary design for the CRWS wastewater collection systems. Mathews prepared the Central Cudjoe Regional Wastewater Collection System Analysis of Alternative Wastewater Collection Systems, dated February 2009 ("Mathews Report"), setting forth the planning and design analysis for implementing the wastewater collection systems portion of the CRWS. A key aim of this analysis was to identify a cost-effective wastewater

collection system design, considering project magnitude, physical features of the islands being served, system reliability, operational costs, and socioeconomic factors.^{6/}

26. In arriving at the proposed design for the CRWS wastewater collection system, Mathews engaged in an exhaustive analysis of the reliability, functional feasibility, physical features and impacts, and affordability of various types of collection systems, including gravity systems, vacuum systems, low pressure systems, septic tank effluent pump systems, and onsite nutrient reduction systems.^{7/}

27. System reliability, which encompasses environmental considerations, was a fundamental threshold consideration in Mathews' analysis. As part of its analysis of various types of wastewater collection systems, Mathews concluded that low pressure systems are reliable.

28. Based on the Mathews Report, FKAA concluded that, given system reliability, a hybrid system constituted the best alternative for the CRWS. A hybrid system was the most cost-effective system over the 20-year planning horizon and fit within Monroe County's budget of approximately \$150 million allocated for the project.^{8/}

Facilities Authorized by the Permits at Issue

29. The CRWS wastewater collection system is a hybrid system because it does not consist of only one type of wastewater system,

but instead consists of a combination of types of systems. Specifically, the CRWS consists both of a gravity system, which is being implemented in more densely populated service areas, and a low pressure system, which is being implemented in remote, less populated service areas.

30. These proceedings involve challenges to certain components of the low pressure system portion of the wastewater collection system.

31. The low pressure system at issue in these proceedings consists of multiple components: a residential grinder pump and wet well located on each serviced property; a service pipe lateral from each residential grinder pump wet well to a local force main, which runs beneath the public right of way and conveys the wastewater to the neighborhood lift station; neighborhood/area lift stations containing additional grinder pumps to pump wastewater from the serviced neighborhoods or areas; and transmission mains to convey wastewater from the neighborhood or area lift stations to the wastewater treatment plant. Of these components, all but the transmission mains have been challenged by Petitioners as not meeting the applicable permitting requirements and standards.

32. Permit 19 authorizes the dryline construction of the Upper Sugarloaf Key wastewater collection system. The project

consists of 9,300 linear feet ("LF") of eight-inch polyvinylchloride ("PVC") SDR 26 gravity sanitary sewer; 31 sanitary manholes; two neighborhood grinder pump stations; 121 E/One simplex grinder pump stations and 13 E/One duplex grinder pump stations; 27,253 LF of two-inch force main; 1,837 LF of three-inch force main; and 4,737 LF of four-inch force main.

33. Permit 19 constitutes a modification of a previously issued permit, Permit 6, which originally permitted the wastewater collection system for Upper Sugarloaf Key.^{9/} Permit 19 was sought because after Permit 6 was issued, Monroe County opted to fund additional gravity components of the Upper Sugarloaf Key wastewater collection system. Accordingly, Permit 19 has the effect of increasing the number of gravity sanitary sewer components (which are not at issue in these proceedings) and decreasing the number of low pressure system components of the Upper Sugarloaf Key wastewater collection system.

34. Permit No. 25 authorizes the dryline construction of a wastewater collection system on Cudjoe Key. The project consists of 58,825 LF of eight-inch PVC gravity sanitary sewer; 222 sanitary manholes; 20 neighborhood grinder pump stations; 63 residential E/One low pressure simplex grinder pump stations and 11 E/One duplex grinder pump stations for commercial areas; 28,815 LF of two-inch HDPE SDR 11 force main; 8,615 LF of three-inch HDPE SDR 11 force main; 1,488 LF of four-inch HDPE SDR 11

force main; 1,298 LF of six-inch HDPE SDR 11 force main; and 2,316 LF of eight-inch HDPE SDR 11 force main.

35. Permit 25 constitutes a modification of a previously issued permit, Permit 8, which originally permitted the wastewater collection system for Cudjoe Key.^{10/} Permit 25 has the effect of increasing the number of gravity sanitary sewer components (which are not at issue) and decreasing the number of low pressure system components of the Cudjoe Key wastewater collection system.

36. Permits 19 and 25 collectively comprise the "inner islands" portion of the CRWS.

37. Permit 18 authorizes the dryline construction of the Big Pine Key North wastewater collection system, to be located in north Big Pine Key. The project consists of 28,375 LF of eight-inch PVC gravity sanitary sewer; 108 sanitary manholes; six neighborhood grinder pump stations; 1,053 residential E/One low pressure simplex grinder pump stations; 11 commercial low pressure lateral connections; 5,267 LF of two-inch HDPE SDR 11 force main; 3,942 LF of three-inch HDPE SDR 11 force main; 11,918 LF of four-inch HDPE SDR 11 force main; 1,588 LF of six-inch HDPE SDR 11 force main; 236 LF of eight-inch HDPE SDR 11 force main; 69,403 LF of two-inch low pressure HDPE SDR 11 force main; 31,065 LF of three-inch HD3PE SDR 11 force main; 5,228 LF of four-inch HDPE SDR 11 force main; and 3,977 LF of six-inch HDPE SDR 11 force main.^{11/}

38. Permit 27 authorizes the dryline construction of the Big Pine Key South wastewater collection system, to be located on south Big Pine Key.^{12/} The project consists of 59,651 LF of eight-inch PVC gravity sanitary sewer; 222 sanitary manholes; 15 neighborhood grinder pump stations; 355 residential E/One low pressure simplex grinder pump stations; 101 commercial low pressure lateral connections; 10,521 LF of two-inch HDPE SDR 11 force main; 14,155 LF of three-inch HDPE SDR 11 force main; 14,207 LF of four-inch HDPE SDR 11 force main; 5,339 LF of six-inch HDPE SDR 11 force main; 43,771 LF of two-inch low pressure HDPE SDR 11 force main; 13,481 LF of 3-inch HDPE SDR 11 force main; and 317 LF of four-inch SDR 11 force main.

39. Permits 18 and 27 collectively comprise the "outer islands" portion of the CRWS.

III. The Permitting Process

40. The Notification/Application for Constructing a Domestic Wastewater Collection/Transmission System, which has been adopted by DEP rule,^{13/} is the application form that must be completed and submitted to DEP to receive authorization to construct a domestic wastewater collection and transmission system.

41. The overarching purpose of the dryline construction permitting process is to ensure that the collection/transmission system is designed in accordance with applicable DEP rule standards, which incorporate reasonable industry standards, so

that once the system becomes operational, it functions as intended and does not harm the environment.

42. The application form includes a list of 84 requirements, some—but not necessarily all—of which apply to a specific project.

43. The form requires the applicant's certifying engineer to initial the space next to each applicable requirement, signifying that the requirement is met.

44. The application form also requires the engineer responsible for preparing the engineering documents to sign and seal the application, signifying that the engineer is in responsible charge of the preparation and production of the engineering documents for the project; that the plans and specifications for the project have been completed; that the engineer has expertise in the design of wastewater collection/transmission systems; and that to the best of the engineer's knowledge and belief, the engineering design complies with the requirements of chapter 62-604.^{14/}

45. Once the application form is submitted, DEP permitting staff reviews the application and determines whether items on the application form and any materials submitted to support those items are incomplete or need clarification. In that event, staff sends the applicant a request for additional information ("RAI"),

requesting the applicant to provide additional information to address incomplete or unclear aspects of the application.

46. Once the applicant has provided information sufficient to enable DEP to determine whether to issue or deny the permit, DEP determines the application complete and reviews the project for substantive compliance with all applicable statutory and rule permitting requirements.

47. DEP is authorized to issue the permit, with such conditions as the Department may direct, only if the applicant affirmatively provides reasonable assurance, based on the information provided in the application, that the construction, expansion, modification, operation, or activity of the installation will not discharge, emit, or cause pollution in contravention of Department standards or rules proposed in the application. Fla. Admin. Code R. 62-4.070(1). If the applicant fails to provide such reasonable assurance, the permit must be denied. Conversely, if the applicant provides such reasonable assurance, it is legally entitled to the permit and DEP must issue the permit.

48. Once the dryline collection/transmission system has been constructed, the permittee must obtain certification from DEP to operate the system as a wetline that pumps wastewater to the treatment plant. To obtain certification, the permittee must provide DEP with an operation and maintenance ("O & M") manual

establishing the operation and maintenance protocol for use of the system.

IV. Proposed Wastewater Collections Systems

49. FKAA, as the applicant for the Permits at Issue, retained Mathews to design the wastewater collection systems for the "inner islands" and to prepare and submit the applications for these systems to DEP on FKAA's behalf.^{15/}

50. In preparing the applications for these wastewater collection systems, David Mathews, a licensed professional engineer in Florida employed with Mathews Consulting, completed the application forms for each system. In doing so, Mathews initialed the application checklist, indicating that all applicable requirements were met; signed and sealed the application documents where and as required; and signed and sealed the certification that he is the engineer in responsible charge of the preparation and production of the engineering documents for the project. Initialing the checklist also indicates that the plans and specifications for the project were complete; that Mathews has expertise in the design of wastewater collection/transmission systems; and that to the best of Mathews' knowledge and belief, the engineering design for the application complies with the requirements of chapter 62-604.

51. Mathews submitted the application for the Upper Sugarloaf wastewater collection system^{16/} to DEP on March 13, 2014,

and submitted the application for the Cudjoe Key wastewater collection system^{17/} to DEP on April 3, 2014.

52. FKAA retained Chen Moore and Associates ("Chen Moore") as the design engineer and Layne Heavy Civil as the contractor for the wastewater collection systems for the "outer islands." On behalf of FKAA as the applicant, Chen Moore prepared and submitted the applications for these systems.^{18/}

53. Oscar Bello, a licensed professional engineer in Florida, previously employed by Chen Moore,^{19/} prepared and completed the application forms for each wastewater collection system for the outer islands. In doing so, Bello initialed the application checklist, indicating that all applicable requirements were met; signed and sealed the application documents where and as required; and signed and sealed the certification that he is the engineer in responsible charge of the preparation and production of the engineering documents for the project. Initialing the checklist also indicated that the plans and specifications for the project were complete; that Bello has expertise in the design of wastewater collection/transmission systems; and that to the best of Bello's knowledge and belief, the engineering design for the application complies with the requirements of chapter 62-604.

54. Chen Moore submitted the application for the north Big Pine Key wastewater collection system^{20/} to DEP on February 12,

2014, and submitted the application for the south Big Pine Key wastewater collection system on April 21, 2014.^{21/}

55. Each wastewater collection system proposed in the applications is comprised of a gravity system and a low pressure system. As previously noted, the gravity systems are proposed for use in the more densely populated portions of the areas to be serviced by the systems, and the low pressure systems are proposed for use in the less densely populated areas to be serviced by the system.

56. The low pressure systems are comprised in part of progressive cavity pumps manufactured by Environment One Corporation referred to as "E/One" grinder pumps. Each residence served by a low pressure system will be served by an E/One grinder pump and wet well housing the grinder pump located on the serviced property.^{22/}

57. The grinder pump and wet well are buried, with the top portion positioned slightly above ground to vent gases and prevent surface water flow into the wet well. The grinder pump contained within the wet well is continuously submerged. The pump is connected to an electrical panel inside or outside of the residence, so that the residence provides the electricity to power the pump. Wastewater from the residence flows through a service line into the wet well housing the grinder pump. Once the wastewater reaches a certain level in the wet well, the pump turns

on and pumps the wastewater out of the wet well into the force main located under the neighborhood street.

58. E/One grinder pumps are used in wastewater collection systems throughout the United States, including low pressure systems located in other parts of the Florida Keys. They are recognized in the Alternative Wastewater Collection Systems manual, a 1991 publication of the United States Environmental Protection Agency, as appropriate for use in low pressure wastewater collection systems.

59. To prevent wastewater backflow into the residential wet wells, check or safety valves are located in the lines conveying the wastewater from the wet wells and at the street right-of-way where the service lines connect to the neighborhood force main.

60. The low pressure systems also contain piping components consisting of service laterals, local force mains, and transmission mains, of various diameters comprised of extruded high density polyethylene ("HDPE"). HDPE pipes are flexible and are pieced together by welding section ends together. They do not have joints with rubber gaskets, which may shrink, deteriorate, or leak over time. Due to their flexibility, HPDE pipes can be horizontally drilled under roadways and wetlands, eliminating the need to disturb the surface and to dewater in order to lay the pipes. As such, these pipes are particularly suitable for projects in which the pipes will be placed in areas having

roadways or surface development, or in areas that are environmentally sensitive or have a high water table, such as the Florida Keys.

61. The low pressure systems also feature neighborhood/area lift stations. The residential grinder pumps generate sufficient force to pump the wastewater collected in the neighborhood force mains to neighborhood/area lift stations.^{23/} Each lift station contains a series of submersible grinder pumps that activate based on wastewater level in the lift station. The lift stations are designed and located to pump wastewater from the serviced neighborhoods or areas to transmission mains that ultimately convey the wastewater to the treatment plant.

62. For each of the proposed wastewater collection systems, the system capacity exceeds 100 gallons per day per capita. Exceeding the 100 gallons per day flow quantity is permissible, per the application form, if the applicant is able to better estimate the flow using water use data or other justification. Here, FKAA estimated the stated system capacity for each application based on historic actual water use data, which provides a more accurate estimate of wastewater system capacity; accordingly, the proposed systems are not limited to a design capacity of 100 gallons per day per capita.

V. Review and Proposed Issuance of the Permits at Issue

63. Upon receiving the applications from Mathews Consulting and Chen Moore, DEP staff reviewed them for compliance with all applicable statutory and rule requirements and standards. DEP's review included a substantive design accuracy review by two licensed professional engineers in Florida, each having extensive wastewater systems design permitting experience.

64. Ultimately, DEP determined that FKAA provided reasonable assurance that each wastewater collection system for which FKAA submitted an application met the applicable statutory and rule requirements and standards. Accordingly, DEP issued a Notice of Intent to Issue for each of Permits 18, 19, 25, and 27.

65. At the final hearing, DEP's assistant director for the Southern District and a wastewater systems design expert, Al McLaurin, opined that FKAA had provided reasonable assurance to support the issuance of Permits 18, 19, 25, and 27.

66. Mr. McLaurin persuasively testified that, based on results of the Little Venice Water Quality Monitoring Report showing a substantial improvement in water quality in canals of a subdivision as a result of installation of a central wastewater system, implementing the CRWS should result in a substantial improvement in water quality in the nearshore waters of the Florida Keys.

VI. Establishment of Prima Facie Entitlement to Permits at Issue

67. The relevant portions of each of the permit files, including the permit application, supporting information, and Notice of Intent to Issue for each of the Permits at Issue were admitted into evidence at the final hearing.

68. With the admission of these documents into evidence, FKAA established its prima facie case demonstrating entitlement to each of the Permits at Issue. See § 120.569(2)(p), Fla. Stat.

VII. The Challenges to the Permits at Issue

69. Once FKAA demonstrated prima facie entitlement to the Permits at Issue, the burden shifted to Petitioners to present evidence proving their case in opposition to the Permits at Issue.^{24/} See id. To prevail in these proceedings, Petitioners bear the ultimate burden of persuasion to prove their case by a preponderance of the competent substantial evidence. They have raised numerous bases that they contend mandate denial of the Permits at Issue.

70. As an overarching matter, Petitioners argue that DEP's review of the applications for the Permits at Issue was not sufficiently rigorous, and that as a result, DEP did not accurately review the applications, did not catch errors or require the projects to adhere to the appropriate permitting standards and requirements, and incorrectly determined that FKAA provided reasonable assurance for issuance of the Permits at

Issue. Petitioners base their argument in part on McLaurin's testimony that DEP's review is "cursory." However, following this characterization, McLaurin went on to describe the nature and depth of agency review to which the applications were subjected. DEP review staff reviewed the applications to ensure that the projects were accurately designed and will function without causing adverse environmental impact as required by the applicable permitting rules.^{25/} DEP's review process does not entail re-designing or re-engineering the project, or questioning the design engineer's judgment on design matters, as long as the projects are accurately designed and functional in accordance with the applicable permitting requirements and standards. When inaccuracies or incomplete items are discovered in the review process, they are addressed with the applicant through the RAI process.^{26/} If the deficiencies are not addressed in a manner sufficient to meet the applicable permitting requirements and standards, the permit is denied. As a matter of practice, DEP relies, to a large extent, on the design engineer's certification that the system is accurately designed according to the permitting standards and requirements—as is authorized and appropriate pursuant to the certification provisions on the application form, rules 62-604.300 and 62-4.050(3), chapter 471, and Florida Board of Engineering rules. Accordingly, the undersigned rejects the

contention that DEP's review of the applications for the permits at issue was insufficient.

Scouring Velocity

71. Petitioners allege that the system, as designed, will not achieve a two-feet-per-second ("2 fps") minimum wastewater flow rate, such that it will experience insufficient velocity to scour and prevent accumulation of solids in the pipes.

72. In support, Petitioners presented the testimony of Donald Maynard, who relied on the application form, Force Mains section, item no. 78, which references the Recommended Standards for Wastewater Facilities, dated 1997—the so-called "Ten States Standards." Maynard testified that portions of the proposed systems do not meet the Ten States Standards, which establishes a 2 fps minimum flow rate, the minimum he claimed is necessary to prevent sedimentation and plugging of the systems piping. On this basis, Petitioners contend that the systems do not meet the mandatory regulatory requirements regarding minimum flow rate.

73. However, pursuant to DEP rules, the Ten States Standards manual does not mandatorily apply to this project. As previously noted, the CRWS is an "alternative collection/transmission system" under DEP rules because it is "not comprised of strictly conventional gravity sewers, pump stations, and force mains." Fla. Admin. Code R. 62-604.200(1). Rule 62-604.400(4) states: "[t]he manuals referenced in rule 62-604.300(5)(b), (c), and (j),

F.A.C., shall be used in the evaluation of the design and construction of alternative collection/transmission systems in Florida." The Ten States Standards manual is not among the list of technical manuals that mandatorily apply to alternative systems, so the standards established in those manuals are not mandatory regulatory standards, but may be used as guidance. Thus, the 2 fps minimum flow standard established in the Ten States Standards is not a requirement applicable to the Permits at Issue. As such, item no. 78 on the application form, requiring a 2 fps flow rate based on the Ten States Standards, is inapplicable to these systems.

74. Rene Mathews, president of Mathews Consulting, acknowledged that in some extreme street ends and cul-de-sacs, the systems will not meet the 2 fps flow rate. However, she credibly testified that this rate is not a requirement but may be used as guidance—and, in fact, was used as guidance in designing the wastewater collection system. She explained that in areas where 2 fps velocity cannot be achieved, FKAA will be required to clean more frequently.

75. Mathews' testimony is consistent with that of Al McLaurin, who also stated that the 2 fps flow rate is not a mandatory regulatory standard and that DEP's rules afford discretion to allow it to permit systems having lower flow rates where, as here, the permittee provides reasonable assurance that

it will clean and maintain the system's pipes with sufficient frequency to prevent them from becoming plugged.

76. Oscar Bello, formerly of Chen Moore and the responsible engineer for the applications for the outer islands wastewater collection systems for which Permits 18 and 27 are proposed to be issued, concurred with Ms. Mathews' testimony regarding the inapplicability of the 2 fps standard. He also concurred in the need for additional cleaning in areas where the 2 fps flow rate will not be achieved.

77. Mr. Gary Maier, a professional engineer supervisor with DEP's South District who manages wastewater permitting groups and reviews wastewater systems permit applications, also confirmed that the 2 fps flow rate is not a mandatory DEP regulatory requirement on which permit denial can be based.

78. Ms. Mathews is a licensed professional engineer in Florida and has been practicing as a civil engineer for over 14 years. Her firm has handled over 150 wastewater projects, including the wastewater collection systems for the inner islands at issue in these proceedings. Over the course of her career, she has designed between 30 and 40 wastewater pump stations. Although she is not the engineer whose seal and certification appear on the applications for the inner islands wastewater collection systems, her firm designed, prepared, and submitted the applications for

these systems, and she worked on these projects. She is knowledgeable about and understands the systems at issue.

79. Mr. McLaurin is a licensed professional engineer in Florida with many years of engineering and engineering-related experience that includes wastewater systems design in the private and public sectors and wastewater systems applications review with DEP. Through his experience, he has gained extensive understanding of the statutes and DEP rules applicable to wastewater permitting. Although McLaurin was not directly involved in DEP's review of the applications for the Permits at Issue, he is thoroughly familiar with, and possesses complete understanding of, the permit applications and supporting documentation.

80. Mr. Bello is a licensed professional engineer in Florida. He has approximately ten years of experience in infrastructure permitting in the public and private sectors. Bello is the design engineer responsible for designing the outer islands wastewater collection systems and preparing and submitting the applications to DEP on FKAA's behalf. As such, he possesses extensive, in-depth understanding of the systems' design and functionality.

81. Mr. Maier is a licensed professional engineer in Florida with over 20 years of environmental regulatory experience, including extensive experience in interpreting and applying DEP's

wastewater rules and reviewing wastewater systems permit applications.

82. Mr. Maynard is a professional engineer licensed in Maine and Vermont, and has many years of engineering experience. Although he is experienced in a wide range of engineering-related fields, his experience appears primarily concentrated in hydrogeologic design, environmental site assessment, and contaminated sites assessment and remediation. He has some experience with septic system design and indirect discharge experience; however, that experience appears to be largely limited to on-site septic systems. He lacks experience in designing or implementing low pressure wastewater collection systems like those at issue in these proceedings. Maynard has no significant understanding of, and lacks experience in, interpreting or implementing Florida's wastewater statutes and rules. He was contacted to testify approximately two weeks before his deposition. He acknowledged that he spent only a few days reviewing pertinent documents and that he had not reviewed all of the information prior to being deposed. His testimony evidences that while he has extensive knowledge of engineering principles regarding fluids, piping, and pumps, he is only superficially familiar with the projects at issue and possesses very little understanding of the wastewater permitting rules applicable to these projects.

83. The undersigned finds persuasive the testimony of Mathews, McLaurin, Bello, and Maier that the 2 fps flow rate is not a mandatory standard applicable to the projects authorized by the Permits at Issue, and that in areas of the systems in which a 2 fps flow rate will not be achieved, requiring more frequent cleaning to ensure that the pipes do not become plugged is adequate to meet DEP's rule requirements.

84. The undersigned finds Maynard's testimony on this issue unpersuasive due to his lack of experience with projects similar to the CRWS wastewater collection systems, his lack of knowledge of and experience with DEP's wastewater permitting rules and requirements, and his lack of anything more than superficial familiarity with the projects at issue.

85. Petitioners did not show that the Permits at Issue should be denied due to inadequate scouring velocity in violation of DEP rules and applicable technical manual standards and requirements.

86. FKAA demonstrated, by a preponderance of the competent substantial evidence, that the systems, as designed, will not experience wastewater backups or releases into the environment as a result of inadequate scouring velocity. FKAA has demonstrated that the systems, in compliance with DEP rules and applicable technical manual standards and requirements, will have wastewater flow of sufficient velocity to scour and prevent sedimentation in

the piping, and that in the few remote areas where the velocity may be lower than recommended, more frequent cleaning of the piping will prevent sedimentation.

Pipe Separation

87. Petitioners allege that the Permits at Issue violate rule 62-604.400(2)(g), which requires a minimum ten-foot horizontal separation distance between wastewater collection/transmission pipes and public water system pipes.^{27/}

88. Petitioners presented the testimony of Donald Maynard to support their position. Maynard identified several locations in the Upper Sugarloaf and north Big Pine Key wastewater collection systems where the rule's horizontal separation distances between the wastewater lines and public water system lines are not met. In Petitioners' view, this constitutes a fatal flaw warranting permit denial.

89. In rebuttal, Mr. Maier testified that a six-foot horizontal separation between the wastewater and public water systems pipes meets DEP's wastewater permitting rules. This is because the ten-foot separation distance established in rule 62-604.400(2)(g) applies "[e]xcept as provided in subsection 62-604.400(3)." Rule 62-604.400(3) provides, in pertinent part, that if there are conflicts in the separation requirements between wastewater collection systems and drinking water facilities established in rule 62-604.400(2) and those established in Florida

Administrative Code Rule chapter 62-555, the requirements in chapter 62-555 apply. Rule 62-555.314(1)(g) states that new or relocated underground water mains shall be laid to provide a horizontal distance of at least six feet, and preferably ten feet, between the outside of the water main and the outside of any existing or proposed wastewater force main. DEP interprets these rules as establishing a minimum six-foot separation distance between public water system lines and wastewater lines, regardless of whether a new water line is being laid in proximity to an existing wastewater line, or vice versa.

90. Maier explained that the purpose of requiring minimum separation distances between water and wastewater lines is to separate the lines a safe distance from each other to enable work on one line to be done without inadvertently damaging the other line. In recognition that construction practices have improved over the years, so there is less chance for such damage than when the rule initially was adopted, DEP amended the separation distance in the public water systems rule to six feet, but inadvertently failed to amend the wastewater collection system rule to reflect the same distance. In an effort to clarify that the six-foot minimum is the standard applicable to construction of wastewater lines as well as drinking water lines, DEP amended rule 62-604.400 to add subsection (3), which states that in the event of a conflict between the rules, the drinking water rule

provisions (which establish the six-foot separation minimum) control.

91. Petitioners contend that this interpretation is incorrect because rule 62-604.400(2)(g) does not conflict with rule 62-555. Petitioners assert that there is a logical basis for interpreting these rules as establishing different, non-conflicting standards: specifically, that the construction of new sewer lines near old, potentially leaking drinking water lines raises the potential for sewage to contaminate drinking water, whereas installing new water lines near old, leaking sewage lines raises the potential for drinking water to infiltrate sewage lines.

92. Maier disagreed, persuasively testifying that there is no rational basis for the different separation standards in the rules; thus, DEP treats them as conflicting and the six-foot separation standard in rule 62-655 controls. Maier testified, credibly, that under any circumstances, both the new and old water lines are pressurized so any leakage will force water out of the lines rather than allowing sewage to infiltrate the lines. Per the explanation provided by Mr. Maier, DEP's interpretation of its own rules is reasonable and therefore is accepted.^{28/}

93. Mr. Maynard's testimony is not afforded weight due to his lack of experience with and understanding of DEP's wastewater collection/transmission systems permitting rules. Conversely,

based on his experience with DEP wastewater regulation over many years, Mr. Maier's testimony is deemed persuasive on the pipe separation distance issue.

94. Petitioners failed to show that the Permits at Issue should be denied for noncompliance with applicable pipe separation requirements.

95. FKAA demonstrated, by a preponderance of the competent substantial evidence, that the wastewater collection systems proposed to be authorized by the Permits at Issue meet the applicable wastewater line and drinking water line horizontal distance requirements in DEP's wastewater collection system rules.

Friction Coefficient Standard

96. Petitioners allege that the friction coefficient of 140, also called the "C Factor,"^{29/} submitted as part of the wastewater systems design exceeds the maximum value of 120 established in the Ten States Standards, and, therefore, does not meet DEP's rule standard for this value. Petitioners assert that as a result of using too large a C Factor in the system design, head loss that occurs as the wastewater flows through the system pipes is underestimated, so the systems will not function as anticipated.

97. As previously discussed, because the wastewater collection systems at issue in these proceedings are alternative systems, the Ten States Standards do not mandatorily apply.

Accordingly, the C Factor of 120 in the Ten States Standards is inapplicable to the systems.

98. The C Factor used in designing the systems was chosen based on the material that comprises the piping—here, HDPE, which has an industry standard C Factor of between 140 and 150. The systems were designed using the more conservative value in the allowed C Factor range for HDPE piping.

99. Under any circumstances, the difference in system performance of using a 140 C Factor instead of a 120 C Factor in designing the system is negligible. Using HDPE piping for low pressure systems is standard, and the use of the 140 C Factor in the system design complies with the industry standard for such piping.

100. Petitioners did not demonstrate that the use of a C Factor of 140 in the wastewater collection systems design violates DEP's applicable requirements and standards, or that the systems will malfunction due to underestimated head loss, causing environmental harm or property damage.

101. FKAA demonstrated, by a preponderance of the competent substantial evidence, that using the 140 C Factor in the wastewater collection systems design complies with DEP rules and applicable technical manuals, and adequately addresses head loss due to friction. Thus, it is not anticipated that the systems

will malfunction due to head loss and release sewage, causing environmental harm or property damage.

System Design Capacity

102. Petitioners allege that the wastewater collection systems, as designed, will have insufficient capacity to handle the volume of wastewater put into the system.

103. The application form, item 1, requires the system to be designed based on an average daily flow of 100 gallons per capita plus wastewater flow for other specified uses, unless water use data or other justification is used to better estimate the flow.

104. Rather than designing the system based on an assumed average daily flow of 100 gallons per capita, design engineers Chen Moore and Mathews Consulting instead used actual water consumption data from FKAA's historic water consumption records for the past four years on a bimonthly basis for each parcel that will be served by the systems. Overall calculations of daily flow were based on the assumption that every dwelling unit contributed to the flow. Water consumption was converted to gallons per day per equivalent dwelling unit ("EDU"), each house connected to the system was identified, and the average EDU per house was determined. Chen Moore and Mathews took a localized approach in determining flow rate per area contributing to the wastewater collection systems. Homes using water to irrigate landscaping were identified through aerial photographs and by on-the-ground

surveys. The estimated amount of flow into the systems was reduced to address irrigation water consumption for landscaping that would not be returned to the wastewater flow from the dwelling unit.

105. Petitioners' witness Donald Maynard testified that Census Bureau information provides a more accurate estimate of the actual population for purposes of system design capacity than relying on historic water use data. He opined that using historic water consumption data underestimates the amount of flow into the system because the data are based on historic population figures that are lower than the current population of the lower Keys. He also testified that considering landscape irrigation in estimating wastewater flow artificially reduced the estimate of wastewater volume that will flow into the systems. He concluded that these flow estimation methods were unreliable and resulted in undersized collection systems.

106. Maynard acknowledged that he does not have any experience in designing low pressure sewer systems, that he did not perform any independent system design flow estimate calculations, that he did not independently research or investigate information relevant to determining system capacity, that he relied on information provided by others regarding Keys population trends, and that he had assumed, without verifying, that the Keys population has increased.

107. In fact, the credible evidence showed that Monroe County's population, including certain areas of the lower Keys, decreased between 2000 and 2010.

108. Rather than relying on general information, such as census data, to estimate system capacity, the CRWS system design engineers used years of parcel-specific data regarding actual water consumption to determine system capacity. This is a more precise and accurate method of determining system capacity than that suggested by Mr. Maynard.

109. Petitioners have not shown that the systems' design capacity is insufficient to handle the volume of wastewater that will flow into them, in violation of DEP rules and applicable technical manual standards and requirements.

110. FKAA demonstrated, by a preponderance of the competent substantial evidence, that the systems, as designed, have sufficient capacity to accommodate the amount of wastewater that will flow into and be conveyed by the systems, and therefore meet DEP rules and all applicable technical manual standards and requirements.

Peaking Factor

111. Petitioners also allege that the wastewater collection systems, as designed, are based on an incorrect peaking factor of 4.0, and, thus, are undersized to handle peak flow that occurs at certain times, such as seasonally when the Keys occupancy rate is

greater than average or immediately following power outages. As a result, Petitioners contend, wastewater will back up into homes, onto the ground, and into groundwater, and will flow into surface and nearshore waters, causing environmental harm and endangering human health.

112. Petitioners offered the testimony of Donald Maynard to support their position. Maynard testified that, based on a preliminary design study performed by Brown and Caldwell in 2008, the correct peaking factor for the collection systems is 4.5, rather than 4.0, as proposed.

113. Oscar Bello, design engineer for the outer islands wastewater collection systems, explained that the 4.5 peaking factor recommended in the Brown and Caldwell study related to the capacity of the wastewater treatment plant,^{30/} not the collection systems. Bello testified, credibly, that using a peaking factor of 4.0 to design the wastewater collections systems is sufficient to address peak usage conditions and will not undermine the systems' performance under those conditions.^{31/}

114. Mr. Bello's testimony was buttressed by testimony by Tom Walker, assistant executive director for FKAA. Walker explained that it is prudent to build in a larger safety margin for treatment plant capacity. This is to ensure that under extreme conditions, if all systems components are working at—or,

in some places over—capacity, the flow into the plant does not exceed its capacity.

115. As previously discussed, Mr. Bello has extensive experience in infrastructure permitting in the public and private sectors. As the design engineer responsible for the outer islands wastewater collection systems, he possesses great understanding of the design and function of these particular systems.

116. Mr. Walker is a licensed professional engineer in Florida. He has been a practicing engineer since 1976 and has extensive experience with municipal wastewater systems in Florida, as well as in Texas and overseas. He has been employed by FCAA since 2006, and has been deeply involved in the design and implementation of the CRWS.

117. The testimony of Bello and Walker was credible and persuasive regarding the adequacy of the peaking factor proposed for the systems. By contrast, Maynard is only superficially familiar with the systems at issue and lacks substantial experience with, and understanding of, the rules applicable to the systems. As such, his testimony on this issue was not persuasive.

118. Petitioners failed to demonstrate that the peaking factor of 4.0 proposed for the wastewater collections systems at issue does not comply with any applicable regulatory standards or will result in undersized systems that will not function properly

and will result in discharge of wastewater into homes and the environment.

119. FKAA demonstrated, by a preponderance of the competent substantial evidence, that the systems are designed to accommodate peak wastewater flows without malfunctioning, and that the peaking factor to which the systems have been designed meets DEP rules and all applicable standards and requirements.

Quick Connect for Emergency Pump Out

120. Petitioners allege that the system, as designed, violates DEP rules because it does not provide rapid pump out connection for the individual residential "pump stations" to enable them to be quickly accessed and pumped out in emergency circumstances. Petitioners posit that each individual residential single grinder pump and wet well constitutes a "pump station" and that DEP rules require every "pump station" to have emergency pumping capability.

121. The term "pump station" as used in DEP's wastewater rules means a station consisting of two or more pumps, not an individual residential pump and wet well. This is apparent from the context in which the term is used in the Notification/Application Domestic Wastewater Collection/Transmission form section titled "Pump Stations" and in the rules and technical manuals applicable to alternative collection systems. Mr. McLaurin confirmed that DEP rules do not require

individual residential grinder pumps and wet wells to have emergency pumping capability.

122. The lift stations serving the neighborhoods and other areas contain two or more pumps and thus are "pump stations" subject to the emergency pumping capability requirement.

123. Ms. Mathews credibly testified, and other credible evidence in the record shows, that each lift station is equipped with a system that allows a pump to be dropped into the lift station, where a hose is extended and the pump is connected to the pump quick connect, enabling the wastewater to be pumped out of the station through the system pipes. A hatch must be opened in order to access the lift station to use the quick connect pump out system, but there is no credible evidence showing that this constitutes an impediment to rapidly engaging the pump out system.

124. Petitioners have not demonstrated that the pump stations lack emergency pumping capability in violation of applicable DEP rules.

125. FKAA demonstrated, by a preponderance of the evidence, that the neighborhood/area lift stations meet the DEP rule requirement to have emergency pump out capability.

Explosion Potential of Pumps

126. Petitioners allege that the residential grinder pumps and the neighborhood/area lift station grinder pumps are unsuitable for the conditions to which they will be exposed

because they are not explosion-proof, and that including them in the systems design violates DEP rules, the Ten States Standards, the National Electrical Code ("NEC"), and the National Fire Protection Association ("NFPA") Standards.

127. Specifically, Petitioners assert that methane will accumulate in the residential grinder pump wet wells and in the lift stations, and, as such, these areas are considered "Classified Hazardous Area, Class I, Division 2, Group 2" under NFPA Standards. Petitioners contend that the mechanics of the grinder pumps make them susceptible to explosion under such conditions, so they are not suitable for use as proposed in the systems.

128. In support, Petitioners presented the testimony of Michael Boismenu, who opined that use of grinder pumps in this type of environment constitutes a violation of NEC section 501.125 for motors and generators. Boismenu testified that the grinder pumps have the potential to ignite if they are exposed to a hazardous environment, which includes areas in which combustible gases, such as methane, accumulate. As such, Boismenu opined that grinder pumps should be classified as "Class I, Division 1" under the NEC and NFPA Standards. Under this classification, grinder pump use in an environment in which combustible gases accumulate would violate the NEC.

129. Contrary to Mr. Boismenu's position, the credible evidence, consisting of the testimony of Rene Mathews and supporting documentation, shows that the residential grinder pumps are "unclassified," per NEC section 820-11, table 4.2. This means that the risk of fire and explosion is so low that there is no requirement for any particular fire protection measures to be implemented in using the individual residential grinder pumps.

130. Also contrary to Boismenu's position, Ms. Mathews' testimony and the supporting documents show that the neighborhood/area lift station grinder pumps and wet wells are classified as "Class I, Division 2" under the NEC and NFPA Standards. Under this classification, there is a potential for fire and explosion under abnormal circumstances, such as if the pumps were not operating properly.^{32/} To address this potential—which is remote—the lift station grinder pumps' electrical components were specifically designed to meet the Class I, Division 2 standard and also will be continuously submerged, mitigating the risk of fire or explosion.^{33/}

131. Mr. Boismenu is an engineer and previously was a licensed professional engineer in New York. He has extensive experience in the energy production field, but never has worked on a wastewater project similar to the CRWS and has no experience applying the NEC or NFPA standards to wastewater projects. He first received specific information from Petitioners on the

projects at issue on or around September 9, 2014, so his familiarity with the projects is based on two weeks of review in preparation for his deposition. His testimony revealed that he lacks specific knowledge about, or understanding of, the electrical features of the individual residential or neighborhood/area lift station grinder pumps or their classifications under the NEC and NFPA Standards.

132. By contrast, Ms. Mathews' testimony was specific, detailed, and accurate, and was buttressed by documentation addressing the NEC and NFPA Standards applicable to residential and neighborhood/area lift station grinder pumps. This evidence, which was credible and persuasive, demonstrates that the residential and neighborhood/area lift station grinder pumps do not pose a significant threat of fire or explosion, and, thus, meet DEP's rules and the NEC and NFPA Standards.

133. As previously discussed, the Ten States Standards manual—which Petitioners contend imposes an "explosion proof" standard—does not mandatorily apply to these systems. DEP rules and technical manuals applicable to these systems do not impose such a standard. Accordingly, the fact that the grinder pumps are not completely "explosion-proof" is not a cognizable ground for denying the Permits at Issue.

134. Petitioners did not demonstrate that the residential and neighborhood/area lift station grinder pumps violate DEP rules

and applicable technical manuals, the NEC, or the NFPA Standards regarding potential for fire and explosion.

135. FKAA demonstrated, by a preponderance of the competent substantial evidence, that using E/One grinder pumps in the wastewater collection systems does not present a substantial fire or explosion risk and does not violate DEP rules or applicable technical manual standards and requirements.

Air Release Valves

136. Petitioners allege that the wastewater collection systems, as designed, inadequately provide for the release of combustible gases from the collection lines. As a result, Petitioners contend, gases may become trapped in the lines, obstruct wastewater flow, create an explosion risk, and endanger the public health and safety.

137. Petitioners presented Mr. Maynard's testimony to support this contention. Maynard testified that methane and hydrogen sulfide would be generated by the wastewater and would accumulate in pockets in the wastewater lines. According to Maynard, this is mostly a problem at high points in the lines, particularly if there is not enough velocity to purge the gas from the line. He stated that "normally, you would put in vents to allow that gas to escape."

138. The evidence shows that wastewater collection systems design does, in fact, include measures for releasing air and gases

from the system. Specifically, in compliance with DEP's Design and Specification Guidelines for Low Pressure Sewer Systems, the design provides for air release valves to be located at the high points in the lines and at dead ends in the system lines. It is standard practice to add air release valves to pipes as necessary during pipe installation because the best locations for the valves are more accurately determined during the installation process. FKAA provided specific protocol for ensuring the correct operation of these valves and will submit as-built drawings showing location and proper placement of air release valves when it requests certification to operate the CRWS.

139. Petitioners did not prove that the wastewater collection systems, as designed, fail to adequately provide for the release of air and gases, in violation of DEP rules and applicable technical manuals.

140. FKAA demonstrated, by a preponderance of the competent substantial evidence, that the systems, as designed, will include air release valves in compliance with DEP rules and applicable technical manuals. As such, gases will not accumulate and obstruct wastewater flow or explode.

System Pressure Capacity

141. Petitioners allege that E/One grinder pumps create pressure that exceeds the pressure capacity of the force main

pipes, so that the pipes will burst and release sewage into the environment and onto property served by the pumps.

142. In support, Petitioners presented the testimony of Donald Maynard and of Dr. Gunnar Hovstadius, both of whom testified that an E/One grinder pump^{34/} can generate pressures as high as 180 to 200 pounds per square inch ("psi"). According to both witnesses, if many grinder pumps are running simultaneously—which they allege could occur as power is restored following a power outage—the pressure generated by the pumps could exceed the pressure capacity of the pipes, causing them to burst.

143. Dr. Hovstadius relied on his experience with grinder pumps in Westport, Connecticut, following Hurricane Irene. There, sewage backed up into a home served by a grinder pump after power was restored following a lengthy outage. According to Hovstadius, numerous grinder pumps started up and simultaneously exerted substantial pressure on the wastewater system piping and other components, causing failure of the residence's grinder pump connection with the lateral pipe and allowing sewage accumulated in the force main to back up into the home.

144. In rebuttal, Rene Mathews credibly testified that the normal operating pressure range for the E/One grinder pump is zero to 80 psi. Beyond 80 psi, the pump's performance falls into a non-typical operating range and the pump begins to heat up, causing thermal switches in the pump to shut the motor down at 100

to 120 psi. Thus, while it is remotely possible that the E/One grinder pumps could generate pressures in the range of 180 to 200 psi before failing, as a practical matter, operation of the pumps' thermal switches render this scenario highly unlikely. The system piping is certified for a working pressure of 160 psi, which exceeds the maximum 100 to 120 psi that may occur before pump shutdown; moreover, the piping must meet the American Water Works Association ("AWWA") standards C-901 and C-906, which means that the piping has a much higher pressure capacity—as high as 240 to 400 psi—specifically to withstand certain surge conditions.

145. Additionally, even if many grinder pumps were simultaneously running when power is restored following an outage, the pumps would not exert a sudden maximum pressure surge on the system piping. This is because as each pump restarts and begins to run, the pressure in the pump gradually builds; if a pump reaches the 100 to 120 psi range—which, as previously noted, is outside the normal operating range—the thermal switch causes it to shut down.

146. Also, as a practical matter, after a massive outage, power typically is restored to one neighborhood or area at a time rather than simultaneously to the entire power grid. Thus, any scenario involving all pumps simultaneously running at maximum pressure is highly unlikely.

147. For these reasons, it is highly unlikely, under any reasonable circumstances, that pressure generated by the grinder pumps would cause the system piping to burst.

148. Petitioners further assert that since the HDPE piping comprising the collection systems is only being tested to 150 psi, rather than to failure pressure of between 250 and 500 psi, it is not being adequately tested to ensure it can withstand higher pressure levels that may occur under extreme operating circumstances.

149. Rene Mathews explained, and Al McLaurin confirmed, that pressure testing of the pipes, which takes place after construction is complete and before the systems are certified as operable by DEP, is performed to detect leaks that may have been created during the construction process—not to determine the failure pressure of the piping. The piping being used in the system is certified for a working pressure of 160 psi and meets the AWWA pressure capacity standards of 240 to 400 psi. Testing system pipes to failure pressure is neither necessary nor required under DEP rules or the applicable technical manuals, and is not desirable because it would damage or destroy system piping, unnecessarily adding to system cost.

150. Dr. Hovstadius is a recognized expert in pumping systems, with worldwide experience in wastewater pump technology. He is knowledgeable about E/One grinder pumps and has experience

with their use in one wastewater system in the northeastern U.S., where one grinder pump failed and flooded a home with sewage. However, he is not familiar with the specific details of the CRWS, having spent only a small amount of time before his deposition familiarizing himself with some of the documentation and information regarding the projects. He did not perform an independent engineering analysis of, or calculations regarding, the wastewater collection systems, and he was not aware of certain design features of the CRWS, such as check valves and the High Tide Technologies around-the-clock monitoring system,^{35/} which reduce the risk of a scenario as described in his testimony.

151. By contrast, Ms. Mathews has extensive wastewater engineering experience, and the firm with which she is employed is the design engineer for the inner islands systems. She has previous experience designing systems with grinder pumps and possesses extensive knowledge and in-depth understanding of the CRWS and details specific to the wastewater collection systems. Mr. McLaurin has years of experience in wastewater systems engineering and extensive experience in regulatory review of wastewater water systems, so is very knowledgeable about DEP rule requirements and their application to wastewater systems.

152. For these reasons, the testimony of Mathews and McLaurin is deemed more persuasive than that of Maynard and Hovstadius on the issue of system pressure capacity.

153. Petitioners failed to demonstrate that the E/One grinder pumps will exert pressures exceeding the systems' piping pressure capacity, causing system piping bursting or failure.

154. FKAA demonstrated, by a preponderance of the competent substantial evidence, that the E/One grinder pumps used in the systems design will function as anticipated, will not exert pressures that exceed the systems' piping capacity, and will not cause system piping to burst or fail.

Wastewater Service During Power Outage

155. Petitioners allege that because E/One grinder pumps require electric power to operate, they are inappropriate for use in the Florida Keys, due to the likelihood of power outages during significant weather events such as hurricanes. Petitioners allege that during power outages, sewer service to homes served by grinder pumps will be interrupted, in violation of DEP rules and technical manuals, including the Ten States Standards and the Design and Specification Guidelines for Low Pressure Sewer Systems. They further allege that continued use of residential wastewater systems during power outages will result in the release of sewage from grinder pumps wet wells into the environment and onto properties served by the pumps.

156. The CRWS design and operating protocol contain measures specifically directed to these issues.

157. Specifically, the neighborhood/area lift station design includes a quick connect riser pipe that will be used to periodically flush the systems and can be used in emergencies to pump water out of the lift stations into the force mains and to the treatment plant, thus preventing lift station overflow.

158. Additionally, each residential grinder pump includes an outlet connection for a mobile generator. During a power outage, FKAA can pump out residential grinder pump wet wells using mobile generators, pump trucks, or vacuum trucks. As a practical matter, residential grinder pump wet wells can contain wastewater volumes of two days' normal use without pump out and, with conservative use, can go for longer periods without being pumped out before overflowing. If pump out becomes necessary, the pump design and FKAA's operating protocol provides for such service.^{36/}

159. FKAA has over 150 trucks it can deploy to pump out residential pump wet wells and lift stations, and will purchase an adequate number (estimated at 30 to 40) of 10,000 kilowatt generators for emergency use. FKAA has determined that it will need thirty utility personnel crews working in two shifts to maintain the CRWS system, and has undertaken the planning and budgeting necessary to ensure adequate personnel availability during emergencies. Additionally, FKAA anticipates having volunteer assistance in such situations.

160. In the event FKAA requires further assistance in addressing widespread pump out issues during emergencies, Layne Heavy Civil and Gianetti Contracting^{37/} are obligated by contract to provide generators to FKAA for use to pump out residential wet wells and lift stations.

161. FKAA also is a member of FlaWARN, Florida's network for wastewater emergency response, through which wastewater utilities provide mutual assistance during emergencies. Through this membership, FKAA is ensured that it will receive assistance from other utilities as needed to address pump out and other wastewater related issues during emergencies.

162. The wastewater collection systems also incorporate the Grinder Pump Guardian monitoring system by High Tide Technologies for each residential grinder pump and each neighborhood/area lift station. Under this monitoring system, each pump is continuously (24 hours a day, 7 days a week) wirelessly monitored. If a pump malfunctions, such as when wastewater inflow exceeds wet well capacity while the pump is running, alarm data is transmitted by satellite to a computer central server, which automatically notifies utility personnel of the specific type of malfunction by high water alarm, communication alarm indicating power failure, or alarm indicating excessive runtime or starts and stops. Notifications will include the street address location of the pump for which the alarm was sent, as well as the type of event

triggering the alarm. This monitoring system will enable pump malfunctions to be immediately detected and rapidly addressed by maintenance personnel, significantly decreasing the likelihood of wastewater spill or release into homes or the environment.

163. FKAA has undertaken extensive planning and activity to establish specific procedures and protocol for addressing collections systems operation, even though it is not required under DEP rules to provide this information until it submits a request to DEP for certification to place the CRWS into operation. By that time, FKAA will have fully prepared its operations and maintenance procedures and protocol addressing all aspects of CRWS operation, including operation during emergency circumstances. This information is required by DEP rule to be kept in a manual that is available for use by operation and maintenance personnel and for inspection by DEP personnel. See Fla. Admin. Code R. 62-604.500.

164. Petitioners did not demonstrate that sewer service will be interrupted in violation of DEP rules.

165. FKAA demonstrated, by a preponderance of the competent substantial evidence, that uninterrupted sewer service will be provided, including during extended power outages and other emergency circumstances, as required by DEP rules.^{38/}

Shutoff Valves and Backflow Prevention Devices

166. Petitioners allege that the systems design does not include backflow prevention devices, so that if lines become plugged, sewage will back up into residences and may, under certain circumstances, cause residential wastewater lines to burst. They presented Donald Maynard's testimony in support of this position.

167. Maynard's testimony was contradicted by Mr. McLaurin's persuasive testimony and other credible evidence showing that the system design does contain backflow and shutoff valves to prevent wastewater from backing up from the force mains into the residential wet wells and into the residences served by the grinder pumps.

168. FKAA demonstrated, by a preponderance of the competent substantial evidence that, in compliance with DEP rules and applicable technical manual requirements and standards, the systems design incorporates safety valves to prevent the backflow of wastewater into residences and spillage and release into the environment.

169. Petitioners did not demonstrate that the systems, as designed, do not contain backflow and shutoff valves to prevent backflow of wastewater into residences, in violation of DEP rules and applicable technical manuals.

Shaft Seal Leakage

170. Petitioners allege that the grinder pumps' design violates DEP rules because the pumps do not contain shaft seal leakage device detectors.

171. Petitioners' only evidence presented to substantiate this allegation is Hovstadius' testimony that he heard of an incident in which flushing dental floss into a sewage system resulted in the floss wrapping around the pump shaft, opening the seal, and allowing the pump motor to be flooded. However, Petitioners did not present any competent substantial evidence showing that not including shaft seal leakage devices on grinder pumps violates any applicable permitting requirements and standards.

172. The competent, credible evidence establishes that shaft seal leakage devices are not required for the grinder pumps proposed to be used in the proposed collection systems, for two reasons: first, shaft seal leakage devices are not required for alternative wastewater collection systems; and second, the E/One grinder pumps that will be used in the systems are smaller than the five and ten horsepower pumps for which shaft seal leakage devices typically are required.

173. Rather than including shaft seal leak detection devices, the systems instead incorporate the Grinder Pump Guardian monitoring system by High Tide Technologies for each residential

grinder pump and each neighborhood/area lift station. As previously discussed, this monitoring system immediately notifies utility personnel of pump malfunction issues so that they can be rapidly addressed.

174. Petitioners did not demonstrate that the lack of shaft seal detectors on the grinder pumps being used in the systems violates applicable DEP rules or requirements in the technical manuals applicable to alternative wastewater collection systems.

Other System Design and Function Issues

175. Petitioners allege other collection systems design flaws that they assert will cause system components to malfunction, resulting in environmental harm and property damage in violation of DEP rules.

176. Dr. Hovstadius strongly criticized the use of E/One grinder pumps in wastewater collection systems to be located in the Florida Keys, due to the potential for flooding during storm surges. He contended that the pumps are not submersible for extended periods, so will leak and malfunction if submerged for long periods. Hovstadius opined that under such conditions, the pumps may short out and cease to function, causing sewage to back up onto the properties served by the pumps.

177. In rebuttal, FKAA's witness Rudy Fernandez credibly testified that the E/One grinder pumps are submersible and will function properly while fully and continuously submerged.

178. Mr. Fernandez is a licensed professional engineer in thirteen states, including Florida. He has approximately 40 years of public and private sector engineering experience in wastewater systems design, operation, and compliance. He is a member of the Water Environment Federation, having served on its technical practice committee at the time the committee published a revised version of the Manual of Practice No. FD-12, Alternative Sewer Systems (1986),^{39/} which applies to alternative collection/transmissions systems pursuant to rule 62-604.400(4). As such, he is very knowledgeable about alternative wastewater collection systems, including the use of E/One grinder pumps in such systems.

179. Although Dr. Hovstadius is an expert in pumping systems, his experience with E/One grinder pumps is relatively limited, particularly when compared to that of Mr. Fernandez. Further, Fernandez is very knowledgeable about the specific components of the CRWS, including the design and operation of the grinder pumps. By contrast, Hovstadius had only general knowledge about the CRWS, and was unaware of key details, such as the inclusion of safety check valves, to prevent sewage backflow into homes served by grinder pumps. Accordingly, Fernandez's testimony is deemed more persuasive than that of Hovstadius regarding E/One grinder pump submersibility.

180. Petitioners have not shown that the E/One grinder pumps will malfunction as a result of being continuously submerged, thus releasing sewage into the environment and cause property damage.

181. Petitioners also assert, through Hovstadius' testimony, that E/One grinder pumps are prone to malfunction from flushing common items such as baby wipes, dental floss, and tampons, or rinsing cooking grease down the kitchen drain.

182. Rene Mathews credibly testified that such items are a problem for all types of wastewater system, not just low pressure systems or systems using E/One grinder pumps. To reduce the likelihood that such items are deposited into the wastewater collection system, FKAA will distribute flyers and host public education events to educate residents and the transient population regarding proper use of the wastewater collection systems. The O & M manual, which has been provided in draft form, includes a list of items that should not be introduced into any sewer system, and this list will be distributed to all properties served by the collection systems.

183. Petitioners have not shown that E/One grinder pumps are any more susceptible to malfunction than other wastewater system components as a result of items being flushed or washed down drains. Additionally, FKAA has established that its systems operation protocol will include measures to reduce the likelihood of malfunction due to items being deposited in the systems.

184. Petitioners also allege that E/One grinder pumps are inappropriate for use in the neighborhood/area lift stations. In support, they presented the testimony of Donald Maynard, who testified that having multiple grinder pumps in lift stations may be problematic during low occupancy periods in the Keys. The grinder pumps in each lift station function as a series, with a lead pump being activated at a particular wastewater level and each successive grinder pump thereafter activated by increasing wastewater levels in the lift station. Maynard contended that during low occupancy periods, the wastewater levels in the lift stations will be too low to activate the grinder pumps in the stations, causing sediments to accumulate and pipes to plug.

185. Rene Mathews countered Maynard's position with credible testimony that grinder pumps are commonly used in designing lift stations in low pressure wastewater collection systems. She explained that the neighborhood/area lift stations have been designed so that the grinder pumps will be continuously submerged as required to meet the Class I, Division 2 NEC and NFPA Standards. Shop drawings submitted during construction will depict neighborhood/area lift station water levels sufficient to fully submerge the grinder pumps, in compliance with the lift stations' design.

186. As additional support for their position that grinder pumps are inappropriate for use in the neighborhood/area lift

stations, Petitioners cite a provision in the O & M manual stating that "grinder pumps are not designed to be small lift stations."

187. This statement must be considered in context. The statement appears in the E/One grinder pump "Product Introduction" chapter in the Service Manual for the pumps, which is part of the O & M manual. The full discussion in which this statement appears reads: "Environment One Grinder Pumps are designed to grind and pump domestic sewage. The grinder pumps are not designed to be small lift stations. They are not capable of handling waters with high concentrations of mud, sand, silt, chemicals, abrasives, or machine waste." In context, it is apparent that this statement is directed at informing the user regarding the types of materials that should not be disposed of in a system using E/One grinder pumps; it does not state that E/One grinder pumps are inappropriate for use in lift stations. As previously discussed, FKAA's O & M manual contemplates public education and outreach efforts to help assure that materials and items that would damage the pumps, as well as other wastewater system components, are not discarded in the systems.

188. To verify that the wastewater collections systems have been correctly designed for their intended use and will not cause environmental or property damage, FKAA retained Stephen Wallace to perform an independent analysis and evaluation of every aspect of the proposed systems. Mr. Wallace is a wastewater systems

engineer having over 30 years of experience in hydraulic systems design. Over his career, Wallace has designed and constructed over 140 low pressure systems, including more than 100 systems using E/One grinder pumps. Although Wallace has not previously been involved with projects in the Florida Keys, while visiting the Keys, he personally observed physical and environmental conditions, such as high ground water levels, sandy soils, flat topography with threat of flooding, sensitive flora and fauna, and seasonal population fluctuations, that are comparable to those attendant to projects on which he has worked in Australia. Under Wallace's direction, a professional team consisting of engineering specialists in pumps and pump stations, low pressure wastewater systems design, and hydraulic modeling, and a mathematician independently analyzed and evaluated the CRWS low pressure systems design to determine whether they would provide long-term satisfactory performance. The team selected two representative project areas in Upper Sugarloaf Key and Ramrod Key and independently performed a hydraulic engineering analysis using a model specifically developed for modeling the performance of low pressure systems, then compared their results to the designs by FKAA's design engineers, Mathews Consulting and Chen Moore. Their results validated the designs prepared by Mathews and Chen Moore. Based on his team's analysis and evaluation, Wallace credibly and persuasively opined that the CRWS, as designed, will be

successfully implemented and will not cause environmental pollution.

189. FKAA witness Rudy Fernandez also testified, credibly, that the wastewater collection systems have been correctly designed and adequately cover all concerns that Petitioners have raised. Fernandez verified that the systems design includes safety valves to prevent backflow from the system into homes served by the systems. He concurred with Mathews and McLaurin that testing the transmission piping to 150 psi is sufficient to determine whether leakage points were created during construction, and confirmed that it is inappropriate to pressure test the pipes to failure because, as a practical matter, the system will not experience pressures high enough to cause pipe bursting or other failure. He agreed with Mathews' and Chen Moore's system design 4.0 peaking factor, and disagreed with Petitioners' witnesses' testimony that the pumps will exert pressure sufficient to cause system pipes to burst upon power restoration following an outage. Fernandez opined that there is a substantial likelihood that the systems, as designed, will function successfully, and that it is unforeseeable that the collections systems, as designed, will cause pollution.

190. Petitioners failed to prove that including E/One grinder pumps in the wastewater collection systems is inappropriate and will result in systems' malfunction and

consequent spillage and release of wastewater into the environment and onto the properties served by the systems.

191. FKAA demonstrated, by a preponderance of the competent substantial evidence, that the E/One grinder pumps will function normally when fully submerged and are appropriate for use in lift stations. Accordingly, including them in the systems' design will not cause the systems to malfunction and release wastewater into the environment and onto the properties served by the pumps, in violation of DEP rules.

VIII. Petitioners' Standing

192. Respondents challenge the standing of DTP^{40/} and the individual petitioners in these proceedings.

193. DTP is a not-for-profit corporation incorporated under the laws of the state of Florida. Its mailing address is Post Office Box 1956, Big Pine Key, Florida 33043.

194. DTP's corporate purpose is to oppose the use of grinder pump systems proposed by FKAA and permitted by DEP as part of the implementation of the CRWS. In addition to challenging the Permits at Issue in these proceedings, DTP actively participated in hearings before the Monroe County Board of County Commissioners ("BOCC") in an effort to convince the BOCC to reduce or eliminate the use of grinder pumps as part of the CRWS.

195. DTP has approximately 265 members, a substantial number of whom own and/or reside on property that may be serviced by a grinder pump as proposed by the Permits at Issue. The evidence also establishes that a substantial number of DTP's members own or reside on property proximate to properties that may be served by grinder pumps.

196. DTP alleges that, for a variety of reasons, using grinder pumps as part of the CRWS will directly cause or indirectly result in the release of raw sewage and wastewater into the environment and onto properties served by the pumps. This, in turn, would harm groundwater, the nearshore environment, and DTP's members' properties.

197. A substantial number of DTP's members may be requested to grant an easement to FKAA for the installation and maintenance of the grinder pumps that will serve their property. These members assert they will be injured by losing their ability to control who has access to their property. They also allege they will be injured due to the potential for collection systems malfunction alarms to interfere with their enjoyment of their property.

198. As discussed above, grinder pumps require electricity to operate and therefore cannot operate during power outages unless alternative sources of electric power, such as generators, are used. Therefore, during extended periods of electrical

outages, DTP members whose property is served by the grinder pumps may be asked to conserve water usage until electric power is restored.

199. Continued use of residential systems served by grinder pumps during extended power outages, absent pump out according to operating protocol, could result in discharge of raw sewage from the wet wells. If not promptly and adequately cleaned up, this may create a human and environmental health risk and adversely affect nearshore waters.

200. A substantial number of DTP's members use and enjoy the nearshore waters of the lower Florida Keys for various water-based recreational activities including fishing, kayaking, boating, canoeing, bird watching, swimming, and lobstering.

201. Petitioner Theresa Raven is a resident and owner of property on Big Pine Key. Her address is 29462 Geraldine Street, Big Pine Key, Florida 33043. Her home is served by the CRWS. If Permit 18 is issued, Raven's property will be serviced by an E/One grinder pump. Accordingly, she will be asked to grant an easement over her property to FKAA for the installation and maintenance of the grinder pump, and during extended periods of electrical outages she may be asked to conserve water usage until electric power is restored. Raven uses and enjoys the nearshore waters of Big Pine Key for water-based recreational activities such as swimming, snorkeling, boating, and nature observation. She

asserts that using grinder pumps as part of the CRWS will directly cause or indirectly result in the release of raw sewage and wastewater into the environment and onto properties served by the pumps, causing harm to groundwater, the nearshore environment, and her property.

202. Petitioner Daniel Fitch is a member of DTP and an individual petitioner in DOAH Case No. 14-2415, challenging the issuance of Permit 18. Fitch is a resident and owner of property on Big Pine Key. His address is 29462 Geraldine Street, Big Pine Key, Florida 33043. His home is served by the CRWS. If Permit 18 is issued, Fitch's property will be serviced by an E/One grinder pump. Accordingly, he will be asked to grant an easement over his property to FCAA for the installation and maintenance of the grinder pump, and during extended periods of electrical outages he may be asked to conserve water usage until electric power is restored. Fitch uses and enjoys the nearshore waters of Big Pine Key for water-based recreational activities such as swimming, snorkeling, boating, and nature observation. He asserts that using grinder pumps as part of the CRWS will directly cause or indirectly result in the release of raw sewage and wastewater into the environment and onto properties served by the pumps, causing harm to groundwater, the nearshore environment, and his property.

203. Petitioner Jim Skura is a member of DTP and an individual petitioner in Case No. 14-2416, challenging issuance of

Permit 19. Skura is a resident and property owner on Sugarloaf Key. His address is 19860 Caloosa Street, Sugarloaf Key, Florida 33042. His home is served by the CRWS. If Permit 19 is issued, Skura's property will be serviced by an E-One grinder pump. Accordingly, he will be asked to grant an easement over his property to FKAA for the installation and maintenance of the grinder pump, and during extended periods of electrical outages he may be asked to conserve water usage until electric power is restored. Skura uses and enjoys the nearshore waters of Big Pine Key for water-based recreational activities such as swimming, snorkeling, boating, and nature observation. He asserts that using grinder pumps as part of the CRWS will directly cause or indirectly result in the release of raw sewage and wastewater into the environment and onto properties served by the pumps, causing harm to groundwater, the nearshore environment, and his property.

204. Petitioner Margaret Schwing is a member of DTP and an individual petitioner in DOAH Case No. 14-2417, challenging the issuance of Permit 27. She is a resident and property owner on Big Pine Key South. Her address is 29756 Springtime Road, Big Pine Key, Florida 33043. Her home is served by the CRWS. If Permit 27 is issued, Schwing's property will be serviced by an E/One grinder pump. Accordingly, she will be asked to grant an easement over her property to FKAA for the installation and maintenance of the grinder pump, and during extended periods of

electrical outages she may be asked to conserve water usage until electric power is restored. Schwing uses and enjoys the nearshore waters of Big Pine Key for water-based recreational activities such as swimming, snorkeling, boating, and nature observation. She asserts that using grinder pumps as part of the CRWS will directly cause or indirectly result in the release of raw sewage and wastewater into the environment and onto properties served by the pumps, causing harm to groundwater, the nearshore environment, and her property.

205. Petitioner Gail Kulikowsky is a member of DTP and an individual petitioner in DOAH Case No. 14-2417, challenging the issuance of Permit 27. She is a resident and property owner on Big Pine Key. Her address is 30788 Pinewood Lane, Big Pine Key, Florida 33043. Her home is served by the CRWS. If Permit 27 is issued, Kulikowsky's property will be serviced by an E/One grinder pump. Accordingly, she will be asked to grant an easement over her property to FKAA for the installation and maintenance of the grinder pump, and during extended periods of electrical outages she may be asked to conserve water usage until electric power is restored. Kulikowsky uses and enjoys the nearshore waters of Big Pine Key for water-based recreational activities such as swimming, snorkeling, boating, and nature observation. She asserts that using grinder pumps as part of the CRWS will directly cause or indirectly result in the release of raw sewage and wastewater into

the environment and onto properties served by the pumps, causing harm to groundwater, the nearshore environment, and her property.

206. Petitioner Deborah Curlee^{41/} is a member of DTP and an individual petitioner in Case No. 14-2420, challenging the issuance of Permit 25. She is a resident and owner of property on Cudjoe Key. Her address is 1052 Spanish Main Drive, Cudjoe Key, Florida 33042. Her property will not be served by an E/One grinder pump; however, she lives less than a quarter-mile from a proposed lift station and less than a mile from two other proposed lift stations. She is concerned that if there is a pump failure at these lift stations resulting in a sewage spill, the area in which she lives, including her property, would be negatively impacted and the sewage would flow into the groundwater and nearshore waters. She uses and enjoys the nearshore waters of Big Pine Key for water-based and other recreational activities, including fishing, boating, kayaking, snorkeling, picnicking, and engaging in nature observation and enjoyment activities as a member of entities whose purpose is to protect the environment.

IX. Entitlement to Permits at Issue

207. As discussed above, FKAA met its burden under section 120.569(2) (p) to present a prima facie case demonstrating entitlement to the Permits at Issue by entering into evidence the applications and supporting materials for the wastewater collection systems and the notices of intent for each of the

Permits at Issue. In addition, FKAA presented persuasive, competent, and substantial evidence far beyond that necessary to meet its burden under section 120.569(2)(p) to demonstrate entitlement to the Permits at Issue.

208. As discussed above, Petitioners failed to prove, by a preponderance of the competent substantial evidence, that the wastewater collection systems at issue, as designed, do not comply with DEP rules and applicable technical standards and requirements, resulting in environmental harm and property damage.

209. On rebuttal, FKAA and DEP thoroughly addressed and rebutted each of the grounds that Petitioners allege justify denial of the Permits at Issue.

210. Accordingly, Petitioners did not meet their burden of persuasion under section 120.569(2)(p) in this proceeding.

CONCLUSIONS OF LAW

211. The Division of Administrative Hearings has jurisdiction over the parties to and subject matter of this proceeding. §§ 120.569 and 120.57(1), Fla. Stat. (2014).

Petitioners' Standing

212. As persons asserting party status to challenge proposed agency action in this proceeding, the individual Petitioners have the burden to demonstrate that they have standing to initiate and maintain this proceeding. Palm Beach Cnty. Env'tl. Coal. v. Dep't of Env'tl. Prot., 14 So. 3d 1076, 1078 (Fla. 4th DCA 2009); Agrico

Chem. Co. v. Dep't of Env'tl. Reg., 406 So. 2d 478, 482 (Fla. 1st DCA 1981).

213. In Agrico, the court established a two-prong test for standing in administrative proceedings, holding:

We believe that before one can be considered to have a substantial interest in the outcome of the proceeding he must show 1) that he will suffer injury in fact which is of sufficient immediacy to entitle him to a section 120.57 hearing, and 2) that his substantial injury is of a type or nature which the proceeding is designed to protect. The first aspect of the test deals with the degree of injury. The second deals with the nature of the injury.

Id. at 482.

214. Agrico was not intended as a barrier to participation in proceedings under chapter 120 by persons who are affected by the potential and foreseeable results of agency action. Rather, "[t]he intent of Agrico was to preclude parties from intervening in a proceeding where those parties' substantial interests are totally unrelated to the issues that are to be resolved in the administrative proceeding." Mid-Chattahoochee River Users v. Dep't of Env'tl. Prot., 948 So. 2d 794, 797 (Fla. 1st DCA 2006), citing Gregory v. Indian River County, 610 So. 2d 547, 554 (Fla. 1st DCA 1992).

215. Recently, courts have refined the standard established in Agrico, clarifying that standing to initiate an administrative proceeding is not dependent on proving that the proposed agency

action would violate the law applicable to the proceeding. In other words, it is not necessary that the person prevail on the merits in an administrative proceeding under section 120.57(1) to have standing as a party to initiate and maintain that proceeding. As one court explained:

Standing is a "forward-looking concept" and "cannot disappear" based on the ultimate outcome of the proceeding When standing is challenged during an administrative hearing, the petitioner must offer proof of the elements of standing, and it is sufficient that the petitioner demonstrate by such proof that his substantial interests "could reasonably be affected by . . . [the] proposed activities."

Palm Beach Cnty. Evtl. Coal., 14 So. 3d at 1078 (citing Peace River/Manasota Reg'l Water Supply Auth. v. IMC Phosphates Co., 18 So. 3d 1079, 1084 (Fla. 2nd DCA 2009)). See St. Johns Riverkeeper, Inc. v. St. Johns River Water Mgmt. Dist., 54 So. 3d 1051 (Fla. 5th DCA 2011); see also Reily Enters., LLC v. Dep't of Evtl. Prot., 990 So. 2d 1248 (Fla. 4th DCA 2008). Thus, it is sufficient for a party challenging issuance of a permit to show that his or her substantial interests could reasonably be affected by the proposed activity. Peace River/Manasota Reg'l Water Supply Auth. at 1084. This, in turn, depends on the party offering evidence to prove that he or she could be injured. Id.; see Angelo's Aggregate Mat., Ltd. v. Dep't of Evt'l. Prot., Case

Nos. 09-1543, 09-1544, 09-1545, 09-1546 (Fla. DOAH June 28, 2013; Fla. DEP Sept. 16, 2013).

216. Here, Respondents challenge Petitioners' standing on the ground that their alleged injuries are "speculative" so do not satisfy the "injury in fact of sufficient immediacy and reality" requirement. Specifically, Respondents assert that the evidence that Respondents presented on the grinder pumps' reliability and safeguards and preventative measures being implemented in the systems rendered Petitioners' alleged injuries speculative. In essence, Respondent argues that because Petitioners did not prevail on the substantive merits of their claims, their alleged injuries are speculative. Respondents further contend that Petitioners did not prove their alleged injuries, and that, in any event, their alleged injuries are contingent on the occurrence of certain events, such as extended power outages or spilled sewage not promptly being cleaned up—again, essentially arguing that their failure to prevail on the merits deprives them of standing. The undersigned rejects this position.

217. The individual Petitioners have demonstrated standing to initiate and participate as parties to the proceedings in which they have filed petitions. They presented evidence aimed at showing that the grinder pumps and other features of the wastewater collection systems are inadequately or incorrectly designed and inappropriate for use in the Florida Keys, and that,

as a result, the pumps and other system components will malfunction or fail, releasing wastewater, causing environmental harm and property damage. Although Petitioners did not prove these allegations, they presented evidence at hearing showing that they have a substantial interest in the use and enjoyment of the nearshore environment in the Florida Keys and in their own property, and that they would suffer significant injury to these interests if they were correct regarding the alleged wastewater collection systems design flaws, failure, and noncompliance with DEP rules. Under St. Johns Riverkeeper, Palm Beach Environmental Coalition, and Peace River/Manasota Regional Water Supply Authority, this is sufficient to establish their standing.

218. For DTP to have standing to challenge the Permits at Issue on behalf of its members, it must show that it meets the associational standing test established in Florida Home Builders Association v. Department of Labor and Employment Security, 412 So. 2d 351 (Fla. 1982). That is, it must establish that a substantial number of its members' substantial interests are affected in these proceedings; that the interests DTP seeks to protect in these proceedings are within its general scope of interest and activity; and that the relief DTP requests is appropriate for it to receive on behalf of its members.

219. The evidence establishes that a substantial number of DTP's members reside on or near property that may be serviced by a

grinder pump, and a substantial number of DTP's members use and enjoy the nearshore waters and environment of the Florida Keys. Thus, a substantial number of DTP's members' substantial interests would be significantly injured if DTP were correct regarding the alleged wastewater collection systems design flaws, failure, and noncompliance with DEP rules.

220. DTP was organized for the specific purpose of opposing the use of grinder pumps as part of the CRWS wastewater collection systems. These proceedings were brought to oppose issuance of DEP permits authorizing the construction of wastewater collection systems that include grinder pumps as a component. Thus, the subject matter of these proceedings is within DTP's general scope and purpose.

221. DTP requests that the Permits at Issue be denied. This relief is appropriate for DTP to receive on behalf of its members.

222. Accordingly, DTP has standing under Florida Home Builders to participate as a party to these proceedings on behalf of its members.

Motions to Exclude Testimony

223. Upon full consideration of the motions filed by FCAA seeking to exclude the testimony of Mr. Donald Maynard and Dr. Gunnar Hovstadius from admission into evidence and Petitioners' response in opposition, the undersigned denies the motions and admits the testimony of both witnesses into evidence.

Permits at Issue in these Proceedings

224. As noted above, Permits 6 and 8 were issued in 2011 and were not timely challenged. Those permits are in effect and are not addressed in these proceedings.

225. As previously discussed, Petitioners timely challenged Permits 18, 19, 24, and 25. Subsequently, DEP issued a Notice of Intent to Issue Permit 27, which modified and superseded Permit 24.

226. For these reasons, only the wastewater collection systems proposed to be permitted by Permits 18, 19, 25, and 27 are at issue in these proceedings.

Burden and Standard of Proof

227. This is a de novo proceeding intended to formulate final agency action, not review action taken earlier and preliminarily. See Young v. Dep't of Cmty. Aff., 625 So. 2d 831, 833 (Fla. 1st DCA 1991). Therefore, new information regarding the Permits at Issue may be admitted into evidence and considered in these proceedings.

228. The Permits at Issue in these proceedings are issued under chapter 403, Florida Statutes. Accordingly, section 120.569(2) (p) governs the order of procedure and the parties' respective burdens in this case. Section 120.569(2) (p) provides in pertinent part:

(p) For any proceeding arising under chapter 373, chapter 378, or chapter 403, if a nonapplicant petitions as a third party to challenge an agency's issuance of a license, permit, or conceptual approval, the order of presentation in the proceeding is for the permit applicant to present a prima facie case demonstrating entitlement to the license, permit, or conceptual approval, followed by the agency. This demonstration may be made by entering into evidence the application and relevant material submitted to the agency in support of the application, and the agency's staff report or notice of intent to approve the permit, license, or conceptual approval. Subsequent to the presentation of the applicant's prima facie case and any direct evidence submitted by the agency, the petitioner initiating the action challenging the issuance of the license, permit, or conceptual approval has the burden of ultimate persuasion and has the burden of going forward to prove the case in opposition to the license, permit, or conceptual approval through the presentation of competent and substantial evidence. The permit applicant and agency may on rebuttal present any evidence relevant to demonstrating that the application meets the conditions for issuance.

229. Pursuant to this provision, FKAA had the initial burden of going forward to demonstrate its prima facie case. FKAA satisfied its burden to establish prima facie entitlement to the Permits at Issue by the admission into evidence of the applications for the Permits at Issue, information submitted to DEP in support of the applications, and DEP's notices of intent. As previously noted, FKAA also presented extensive, credible testimony and other persuasive evidence in support of its prima

facie case that far exceeded simply entering the applications, supporting materials, and notices of intent into evidence.

230. Under section 120.569(2)(p), the permit applications and supporting material FKAA submitted to DEP establishing reasonable assurance retained their status as satisfactory to show reasonable assurance when admitted into evidence at the final hearing; they did not lose that status absent Petitioners proving, by a preponderance of the competent substantial evidence, that specific aspects of the projects, as challenged in the petitions for hearing, do not meet the reasonable assurance standard so that FKAA is not entitled to issuance of the Permits at Issue. See Last Stand, Inc. v. Fury Mgmt. and Dep't of Env'tl. Prot., Case No. 12-2574 (Fla. DOAH Dec. 21, 2012; Fla. DEP Feb. 7, 2013).

231. Thus, once FKAA demonstrated its prima facie case entitlement to the Permits at Issue, the burden shifted to Petitioners to prove their case in opposition. Under section 120.569(2)(p), the ultimate burden of persuasion rests with Petitioners to prove their case in opposition by a preponderance of the competent substantial evidence. Speculation by Petitioners about what "might" occur is not sufficient to carry their burden to show, by a preponderance of the evidence, that FKAA did not provide reasonable assurance so that the Permits at Issue must be denied. Jacobs v. Far Niete II, LLC, Case No. 12-1056 (Fla. DOAH Apr. 26, 2013; SFWMD May 22, 2013); FINR II, Inc. v. CF Indus.,

Inc., Case No. 11-6495 (Fla. DOAH Apr. 30, 2012; DEP June 8, 2012); see also Menorah Manor, Inc. v. Ag. for Health Care Admin., 908 So. 2d 1100, 1104 (Fla. 1st DCA 2005). If Petitioners fail to meet this burden, FCAA prevails by virtue of its prima facie case. See Last Stand, Inc. v. Fury Mgmt. and Dep't of Env'tl. Prot., Case No. 12-2574 (Fla. DOAH Dec. 21, 2012; Fla. DEP Feb. 7, 2013); see Washington Cnty. v. Bay Cnty. and Northwest Water Mgmt. Dist., Case Nos. 10-2983, 10-1984 and 10-10100 (Fla. DOAH July 26, 2012; NFWWMD Sept. 27, 2012).

Applicable Regulatory Standards

232. Chapter 403, Florida Statutes, and Florida Administrative Code Chapters 62-4, 62-604, and 62-555 govern these proceedings.

233. The permitting standards specific to domestic wastewater collection/transmission facilities are codified in chapter 62-604.

234. Rule 62-604.130(1) prohibits the release or disposal of excretia, sewage, or other wastewater or residuals without providing proper treatment approved by DEP; construction or operation of wastewater collection systems not in compliance with chapter 62-604; or any act otherwise violating chapter 62-604 or any other DEP rules.

235. Chapter 62-604 sets forth the technical requirements for construction and operation of domestic wastewater

collection/transmission systems to ensure that they do not violate the prohibitions in section 62-604.130. Rule 62-604.100(7) states that "[s]ystems shall be designed in accordance with sound engineering practice [I]t is intended that Chapter 62-604 establish a framework whereby design flexibility and sound engineering practice can be used in developing systems with which to collect and transport domestic wastewater in an environmentally sound manner."

236. The technical standards that apply to this project are codified in Rule 62-604.300, titled "General Technical Guidance, Related Rules, and Forms." This rule incorporates by reference several industry standard manuals, which "shall be applied, if applicable, in determining whether permits allowing construction or modification of collection/transmission systems shall be issued or denied." Fla. Admin. Code R. 62-604.300(1). Therefore, some, but not necessarily all, of the incorporated manuals may apply to a particular project. Rule 62-604.330 further provides that if any of the standards and criteria contained in the applicable manuals conflict with any DEP rules, the Department's rules control. Fla. Admin. Code R. 62-604.300(3).

237. As previously discussed, the CRWS is a hybrid system consisting of both traditional gravity sewers and low pressure systems. Rule 62-604.200(2) defines "collection/transmission system" to mean "sewers, pipelines, conduits, pumping stations,

force mains, and all other facilities used for collection and transmission of wastewater from individual service connections to facilities intended for the purpose of providing treatment prior to release to the environment." Fla. Admin. Code R. 62-604.200(2). Rule 62-604.200(1) defines "alternative collection/transmission systems" to mean systems referenced in rules 62-604.300(5)(b), (c) and (j), or other collection/transmission systems not comprised of strictly conventional gravity sewers, pump stations, and force mains. Pursuant to these provisions, the CRWS is considered an alternative wastewater system.

238. Pursuant to rule 62-604.400(4), three technical manuals mandatorily apply to the CRWS as alternative collection/transmission systems: Alternative Wastewater Collection Systems (1991); Manual of Practice No. FD-12 Alternative Sewer Systems (1986); and Design and Specification Guidelines for Low Pressure Systems (1981).

239. The Ten State Standards manual does not mandatorily apply to the CRWS. Fla. Admin. Code R. 62-604.300(5)(g) and 62-604.400(4).

240. Permits for dry line construction of wastewater collection/transmission systems do not authorize the permittee to operate the system. As previously discussed, once construction is completed, the permittee is required to provide construction

certifications and request approval to operate the system. Fla. Admin. Code R. 62-604.300(8)(b). Since the Permits at Issue authorize only dryline construction, the requirements associated with the Request for Approval to Operate are not at issue in these proceedings. See Fla. Admin. Code R. 62-604.300(8)(b).

241. DEP's Notification/Application for Constructing a Domestic Wastewater Collection/Transmission System, Form 62-604.300(8)(a), consists of a list of 84 engineering design requirements that embodies the requirements and standards in DEP rules and the technical manuals, to the extent the requirements apply to a particular project.

242. FCAA's design engineers completed the application forms for the Permits at Issue, certifying that all applicable engineering design standards and other requirements were satisfied, pursuant to rule 62-604.600(7)(a).

243. In reviewing the wastewater collection systems for compliance with applicable engineering design standards under chapter 62-604, DEP relied on the design engineers' certifications for compliance with engineering design standards, as it legally is authorized to do. Specifically, rule 62-4.050(3) states in pertinent part:

To ensure protection of public health, safety, and welfare, any construction, modification, or operation of an installation which may be a source of pollution, or of a public drinking water supply, shall be in accordance with

sound professional engineering practices pursuant to Chapter 471, F.S All applications for a Department permit shall be certified by a professional engineer registered in the State of Florida Where required by Chapter 471 . . . F.S., applicable portions of permit applications and supporting documents which are submitted to the Department for public record shall be signed and sealed by the professional(s) who prepared or approved them.

Additionally, the application form for domestic wastewater collection/transmission systems states that the responsible engineer's certification represents that the engineering services addressed therein, as defined in section 471.005(6), have been performed by the professional engineer; are based on the professional engineer's knowledge, information and belief; and are in accordance with commonly accepted procedures consistent with applicable standards of practice. Fla. Admin. Code R. 62-604.300(8)(a); see Fla. Admin Code R. 61G15-18.011(4). Further, section 471.025(1), Florida Statutes, requires the engineer to seal all final drawings, specifications, plans, or documents prepared or issued by that engineer that are filed for public record, and section 471.025(3) prohibits the engineer from affixing or permitting his or her seal, name, or digital signature to any plan, specification, drawing, final bid document, or other document that depicts work that he or she is not licensed to perform or that is beyond his or her profession or specialty therein. Pursuant to these provisions, DEP was legally authorized

to rely on the engineers' design certifications in its review of the applications, and it was neither required nor authorized to "re-engineer" or "re-design" the systems, as Petitioners assert should have been done. DEP complied with applicable procedures and standards in reviewing the applications to determine whether FKAA provided reasonable assurance such that the Permits at Issue must be granted.

Reasonable Assurance

244. To be entitled to issuance of the Permits at Issue, FKAA was required to provide DEP with reasonable assurance, based on the information submitted in the permit application and supporting documentation, that the wastewater collection systems will not discharge, emit, or cause pollution in contravention of DEP rules or standards. See Fla. Admin. Code R. 62-4.070(2).

245. The "reasonable assurance" standard required FKAA to demonstrate to DEP the "substantial likelihood" that the project would not discharge, emit, or cause pollution in contravention of DEP rules. Reasonable assurance does not require absolute guarantees that the project will not cause pollution under any circumstances. See Save Anna Maria, Inc. v. Dep't of Transp., 700 So. 2d 113, 117 (Fla. 2d DCA 1997); see also Metropolitan Dade Cnty. v. Coscan Florida, Inc., 609 So. 2d 644, 648 (Fla. 3d DCA 1992); McCormick v. City of Jacksonville, Case

No. 88-2283 (Fla. DOAH Oct. 16, 1989; DER Jan. 22, 1990). FKAA was not required to eliminate all contrary possibilities, however remote, or to address impacts that are only theoretical or not reasonably likely. See Crystal Springs Recreational Preserve, Inc. v. SW Fla. Water Mgmt. Dist., Case No. 99-1415 (Fla. DOAH Jan. 27, 2000; SWFWMD Feb. 29, 2000); Alafia River Basins Stewardship Council, Inc. v. SW Fla. Water Mgmt. Dist., Case Nos. 98-4925, 98-4926, 98-4930, 98-4931 (Fla. DOAH July 2, 1999; SWFWMD Aug. 2, 1999).

246. Based on the foregoing, DEP reasonably and correctly determined, based on the permit applications and supporting information, that FKAA provided reasonable assurance that the wastewater systems would meet all applicable design criteria in chapter 62-604 and applicable technical manuals, and, thus, would not cause pollution in contravention of its rules. Accordingly, DEP issued the notices of intent to issue the Permits at Issue.

247. As previously discussed, at the final hearing, FKAA, with evidentiary support from DEP, satisfied its burden under section 120.569(2)(p) to establish prima facie entitlement to the Permits at Issue.

248. The burden then shifted to Petitioners to prove their case in opposition, and to demonstrate, by a preponderance of the competent substantial evidence, that FKAA did not provide reasonable assurance that it is entitled to the Permits at Issue.

249. Petitioners alleged numerous grounds that they assert require denial of the Permits at Issue. For the reasons specifically discussed above, Petitioners did not prove, on the grounds they raised in their petitions, that the proposed wastewater collection systems, as designed, fail to comply with, or violate, applicable DEP rules and technical manuals and other applicable standards. As such, Petitioners failed to meet their burden of ultimate persuasion in these proceedings.

250. FKAA has provided reasonable assurance that the wastewater collection systems at issue in these proceedings meet all applicable permitting standards and requirements, including those established in chapters 62-4, 62-604, and 62-555, and technical manuals incorporated by reference.

251. Therefore, FKAA is entitled to issuance of Permits 18, 19, 25, and 27, authorizing the construction of the wastewater collection/transmission systems for the CRWS.

RECOMMENDATION

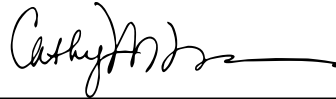
Based on the foregoing Findings of Fact and Conclusions of Law, it is RECOMMENDED that the Department of Environmental Protection enter a final order:

1. Approving the issuance of Permit No. 295404-018-DWC/CM (Permit 18), at issue in Case No. 14-2415;
2. Approving the issuance of Permit No. 295404-019-DWC/CM (Permit 19), at issue in Case No. 14-2416;

3. Approving the issuance of Permit No. 295404-027-DWC/CM (Permit 27), at issue in Case No. 14-2417; and

4. Approving the issuance of Permit No. 295404-025-DWC/CM (Permit 25), at issue in Case No. 14-2420.

DONE AND ENTERED this 3rd day of February, 2015, in Tallahassee, Leon County, Florida.



CATHY M. SELLERS
Administrative Law Judge
Division of Administrative Hearings
The DeSoto Building
1230 Apalachee Parkway
Tallahassee, Florida 32399-3060
(850) 488-9675
Fax Filing (850) 921-6847
www.doah.state.fl.us

Filed with the Clerk of the
Division of Administrative Hearings
this 3rd day of February, 2015.

ENDNOTES

^{1/} Case No. 14-2415 challenges the issuance of Permit 18, Case No. 14-2416 challenges the issuance of Permit 19, Case No. 14-2417 challenges the issuance of Permit 27, and Case No. 14-2420 challenges the issuance of Permit 25. Initially, Case No. 14-2417 involved a challenge to 295404-024-DWC/CM (Permit 24); however, on May 28, 2014, 295404-027-DWC/CM (Permit 27) was issued, superseding Permit 24. Petitioners timely challenged Permit 27, and the petition was accepted as the operative challenge document in Case No. 14-2417.

^{2/} These consolidated proceedings originally included Case No. 14-2418, challenging the issuance of Permit No. 295404-017-DWC/CM ("Permit 17"), and Case No. 14-2421, challenging the issuance of Permit No. 295404-026-DWC/CM ("Permit 26"). Those

cases were resolved before the final hearing and are not part of these proceedings.

^{3/} See paragraph 223.

^{4/} FKAA acts as a water and wastewater utility.

^{5/} Petitioners previously challenged aspects of the wastewater transmission system in Case No. 14-2421. That case was dismissed before the final hearing.

^{6/} Initial cost estimates for the CRWS approximated \$200 million. Monroe County was extremely concerned about the financial burden that cost would place on residents served by the CRWS on whom assessments would be levied to fund the system, so the County directed FKAA to develop a more cost-effective system.

^{7/} The Mathews Report consists of over 250 pages of extensive analysis of all relevant factors, including environment-related issues regarding system reliability, which is the key point of contention in this proceeding; high water table; and geologic features of the area to be served.

^{8/} After FKAA presented its original hybrid system design to Monroe County, the County decided to convert portions of the proposed low pressure systems to gravity systems. This conversion increases the cost of the system, primarily due to the greater capital and installation costs entailed in installing gravity systems.

^{9/} Permit 6 was issued in April 2011 and was not timely challenged. It is not a part of these proceedings.

^{10/} Permit 8 was issued in April 2011 and was not timely challenged. It is not a part of these proceedings.

^{11/} FKAA has applied to modify Permit 18 to, among other things, reduce the number of low pressure system components. As of the final hearing date, DEP's review of and action on the application had not been completed, so is not at issue in these proceedings.

^{12/} As stated in note 1, Permit 27 supplants Permit 24.

^{13/} The form is incorporated by reference in rule 62-604.300(8)(a).

14/ Engineers who violate these standards are subject to professional disciplinary sanction. § 471.033, Fla. Stat.; see Fla. Admin. Code R. 61G15-19.001.

15/ Permits 19 and 25 were issued based on the applications submitted by Mathews for the inner islands.

16/ This application ultimately was approved by Permit 19.

17/ This application ultimately was approved by Permit 25.

18/ Permits 18 and 27 were issued based on the applications submitted by Chen Moore.

19/ Mr. Bello currently is employed with Layne Heavy Civil, the contractor for the outer islands wastewater collection systems. While employed with Chen Moore, he was the design engineer who prepared and submitted the applications for the outer islands systems to DEP.

20/ This application ultimately was approved by Permit 18.

21/ This application ultimately was approved by Permit 27.

22/ As previously discussed, the owner of each property serviced by a grinder pump will be required to grant an easement to FKAA for installation and service of the pump.

23/ The residential grinder pumps generate pressure sufficient to overcome the back pressure in the line due to the operation of other residential pumps, as well as friction loss in the pipes.

24/ As more fully discussed below, under section 120.569(2)(p), Petitioners also bear the ultimate burden of persuasion, by a preponderance of the evidence, to demonstrate that FKAA is not entitled to issuance of the Permits at Issue.

25/ DEP's permit review staff on these projects, Mr. Oni and Dr. Ahmadi, are wastewater design engineers with almost 60 years of collective experience reviewing wastewater collection systems applications. Their experience and knowledge of wastewater systems designs enables them to discern, without independently designing or re-designing a proposed system, whether the system meets the applicable requirements and standards such that it should be permitted.

^{26/} Petitioners' assertion that DEP did not adhere to the RAI process in reviewing the applications is incorrect. On May 23, 2014, DEP requested additional information regarding the south Big Pine Key system, which ultimately was approved by Permit 27. On April 11, 2014, DEP requested additional information regarding the Cudjoe Key wastewater collection system, which ultimately was approved by Permit 25. For Permits 18 and 19, DEP determined that the applicant provided sufficient information in the application, as submitted, so that an RAI was not necessary.

^{27/} Rule 62-604.400(2)(g) also establishes a minimum vertical separation distance of 18 inches. Petitioners raised this issue in their petitions and in the Joint Prehearing Stipulation, but did not present specific evidence regarding the alleged violation of this standard.

^{28/} An agency's interpretation of its own rules is entitled to deference and should not be rejected unless it is clearly erroneous. State Contracting and Engineering Corp. v. Dep't of Transp., 709 So. 2d 607, 609 (Fla. 1st DCA 1998).

^{29/} The C Factor is a value used in the Hazen-Williams Equation, which is applied to calculate head loss due to friction.

^{30/} The 4.5 peaking factor for the wastewater treatment plant includes a margin of safety to ensure that at maximum flow, there are not wastewater overflows at the treatment plant.

^{31/} Bello consulted the Ten States Standards to select a peaking factor of 4.0 for the collection systems, even though that manual does not establish mandatory standards applicable to the projects. Maynard conceded that the Ten States Standards establish a wastewater collections system peaking factor of 4.0.

^{32/} To the extent there is potential for the grinder pumps to explode, Petitioners' witness Gunnar Hovstadius stated that the explosion would be akin to an electrical short, so would be internal to the pump and would not affect components outside of the pump.

^{33/} E/One, manufacturer of the grinder pumps being used in the wastewater collection systems, provided a letter stating that the pumps meet the NEC Class I, Division 1 standards. Class I, Division 1 is a more stringent standard, so if the pumps meet this standard, they meet the Class I, Division 2 standard.

^{34/} E-One grinder pumps are progressive cavity, or positive displacement ("PD"), pumps. These pumps have motors that generate flow.

^{35/} See paragraph 162, infra.

^{36/} FKAA's witness Stephen Wallace credibly testified that in Port St. Lucie, Florida, pump out trucks and generators were used following a hurricane to pump out residential systems, and were effective in keeping the central wastewater system functional during the power outage following the storm.

^{37/} Layne Heavy Civil is the construction contractor for the outer islands systems and Gianetti Construction is the contractor for the inner islands systems.

^{38/} The credible evidence further shows that during major storm events, which would be the type of event likely to cause extended power outage, residents typically are ordered to evacuate the Keys, so that multi-day use of residential grinder pumps during a power outage by many lower Keys residents is relatively unlikely.

^{39/} Mr. Fernandez was on the technical practices committee during the revision and publication of a more recent version of this manual, which has not, to date, been incorporated by reference into DEP rules.

^{40/} DTP is a party to each petition filed in these proceedings, and alleges these injuries in these petitions. Its president, Banks Prevatt, testified at the final hearing regarding DTP's concerns and alleged injuries.

^{41/} Of the individual Petitioners in these consolidated proceedings, only Ms. Curlee testified at the final hearing. The parties stipulated to certain impacts to individual Petitioners, including Ms. Curlee. Banks Prevatt was a Petitioner in Case Nos. 14-2415, 14-2417, and 14-2420, but withdrew his challenges to the Permits at Issue following his testimony at the final hearing and before issuance of this Recommended Order.

COPIES FURNISHED:

Robert N. Hartsell, Esquire
Robert N. Hartsell, P.A.
1600 South Federal Highway, Suite 921
Pompano Beach, Florida 33062
(eServed)

Robert T. Feldman, Esquire
Florida Keys Aqueduct Authority
1100 Kennedy Drive
Post Office Box 1239
Key West, Florida 33041-1239
(eServed)

Lee R. Rohe, Esquire
Lee Robert Rohe, P.A.
25000 Overseas Highway, Suite 2
Summerland Key, Florida 33042
(eServed)

Frederick John Springer, Esquire
Bryant Miller Olive, P.A.
101 North Monroe Street, Suite 900
Tallahassee, Florida 32301
(eServed)

Jamie Colee
Little Palm Island Associates, Ltd.
600 6th Street South
Kirkland, Washington 98033-6716

Michael L. Elkins, Esquire
Bryant Miller Olive, P.A.
One Southeast 3rd Avenue, Suite 2200
Miami, Florida 33131
(eServed)

Sidney Conwell Bigham, III, Esquire
Florida Department of Environmental Protection
3900 Commonwealth Boulevard, Mail Stop 35
Tallahassee, Florida 32399-3000
(eServed)

Lea Crandall, Agency Clerk
Department of Environmental Protection
Douglas Building, Mail Station 35
3900 Commonwealth Boulevard
Tallahassee, Florida 32399-3000
(eServed)

Matthew Z. Leopold, General Counsel
Department of Environmental Protection
Douglas Building, Mail Station 35
3900 Commonwealth Boulevard
Tallahassee, Florida 32399-3000
(eServed)

Jonathan P. Steverson, Secretary
Department of Environmental Protection
3900 Commonwealth Boulevard, Douglas Building
Tallahassee, Florida 32399-3000
(eServed)

NOTICE OF RIGHT TO SUBMIT EXCEPTIONS

All parties have the right to submit written exceptions within 15 days from the date of this Recommended Order. Any exceptions to this Recommended Order should be filed with the agency that will issue the Final Order in this case.