



Environmental Advisory Committee

4:00pm, Thursday, January 8, 2026

City Hall

Council Chambers

1207 Palm Boulevard, Isle of Palms, SC

Public Comment:

All citizens who wish to speak during the meeting must email their first and last name, address, and topic to Nicole DeNeane at nicoled@iop.net no later than **3:00 p.m. the business day before the meeting**. Citizens may also provide public comment here:

<https://www.iop.net/public-comment-form>

Agenda

- 1. Call to Order** and acknowledgement that the press and public were duly notified of the meeting in accordance with the Freedom of Information Act.
- 2. Election of Chair and Vice Chair**
- 3. Approval of previous meeting's minutes – December 11, 2025**
- 4. Citizen's Comments**
- 5. Presentation – none**
- 6. Old Business**
 - a. Review of Water Quality Testing Results wrap-up**
 - b. Discussion of implementation of SC Aquarium projects**
- 7. New Business**
 - a. Organization of EAC-related matrix activities**
 - b. Discussion of trip to the new water & sewer plant**
 - c. Discussion of EAC 2025 Accomplishments**
- 8. Miscellaneous**
- Next meeting: Thursday, February 12, 2026, 4:00pm
- 9. Adjournment**



ENVIRONMENTAL ADVISORY COMMITTEE

4:00pm, Thursday, December 11, 2025

1207 Palm Boulevard, Isle of Palms, SC

and broadcasted live on YouTube: <https://www.youtube.com/user/cityofisleofpalms>

MINUTES

1. Call to order

Present: Laura Lovins, Mary Pringle, Cindy Marrs (via Zoom), Sean Popson, Todd Murphy, Eric Cicora

Staff Present: Administrator Kerr, Deputy Admin. Kuester, Asst. Director Asero, Council Member Miars (via Zoom)

2. Approval of previous meeting's minutes

MOTION: Ms. Pringle made a motion to approve the minutes of the October 9 meeting, and Ms. Popson seconded the motion. The motion passed unanimously.

3. Citizen's Comments -- none

4. Presentation – SC Aquarium Sea Rise and Red Line projects

Sara McDonald and Aubrey Anthony of the South Carolina Aquarium shared information about two citizen science projects related to flooding and erosion. They shared signage developed to promote awareness about possible flooding. Data collected by citizens is used to refine flood models. Committee members requested links to their data.

5. Old Business

A. Discussion and consideration of changes to proposed lighting ordinance

Mr. Murphy explained that he and Administrator Kerr worked on a new draft of the lighting ordinance that excludes dock lighting. Administrator Kerr reported that the Planning Commission has some technical recommendations to offer for a complimenting best practices document.

Mr. Murphy and Administrator Kerr will work on a final product to share with the Committee next month.

B. Discussion of Water Quality Testing Results

Ms. Lovins shared that the second round of water quality testing also revealed only dog bacteria in the water.

Administrator Kerr said the results need to be documented to include what was done and why as well as suggested next steps and the frequency of future testing. Recommendations should include how to deal with the issue of dog bacteria in the water tests.

Ms. Lovins will prepare a synopsis to share at the January meeting.

Administrator Kerr suggested that the water quality testing results could be used to determine the effectiveness of a potential contract with Doody Calls.

MOTION: Ms. Popson made a motion to reorder the agenda to allow for the discussion about the Fisher Glass contract next. Mr. Murphy seconded the motion. The motion passed unanimously.

C. Discussion of contract and costs with Fisher Glass Recycling

Committee members discussed whether or not the difference in the rate of contaminated glass recycled by the County (27%) versus Fisher Glass (15%) is worth the price of the contract. The Fishers will give information to Administrator Kerr for a contact at Sebelco to verify how much of their glass is being recycled.

Discussion ensued as to how long to continue the contract until the information can be verified and the contract further discussed. Committee members also discussed the change needed for bin placement for pickup should the County takeover the island's glass recycling.

MOTION: Ms. Lovins made a motion to extend the contract with Fisher Recycling through March 2026. Mr. Murphy seconded the motion. The motion passed unanimously.

Staff and committee members will continue to research Charleston County's capability to recycle glass and the involved costs.

D. Discussion of contract with Doody Calls

Asst. Director Asero said the cost for maintaining 10 waste stations on Waterway Boulevard is \$5200/year. The cost to purchase 10 waste stations is \$3,150. Administrator Kerr noted that the Committee is over budget for FY26 and this could be considered for FY27. Or they could ask City Council to consider an unbudgeted expense. Asst. Director Asero said he may have some money in the landscaping budget he could use for this expenditure. Administrator Kerr said staff will review the budget to see where the expense could be placed.

MOTION: Mr. Murphy made a motion to recommend to City Council the purchase of 10 waste stations to be placed on Waterway Boulevard at a cost of \$3,150 plus \$5,200 for a one-year contract with Doody Calls. Ms. Popson seconded the motion. The motion passed unanimously.

6. New Business -- none

7. Miscellaneous Business

Administrator Kerr thanked Ms. Pringle for her years of service to the Environmental Advisory Committee. Ms. Pringle said she would continue to maintain the native plant garden.

The next meeting of the Environmental Advisory Committee is scheduled for Thursday, January 8, 2026 at 4pm.

8. Adjournment

The meeting was adjourned at 5:36pm.

Respectfully submitted,

Nicole DeNeane
City Clerk

HISTORICAL OVER-VIEW OF WATER QUALITY TESTING ON IOP – 2022 TO 2025

HOW THINGS BEGAN

On Tuesday, April 25, 2000, IOP City Council approved an application for a grant to SC DHEC for a federal water quality testing grant. This came about due to public and Council push-back on an ordinance to regulate septic tanks on IOP that was supposed to go into effect in March of 2000. A 60-day moratorium was placed on the ordinance in March, and in April, Council approved moving forward with the water quality testing grant. DHEC had confirmed fecal coliform levels in IOP drainage ditches that were “too high to be dumped in an area near Wando Crossing Shopping Center in Mount Pleasant in the Fall of 1999, many in the City, including council members, were not convinced it was human E.Coli – they had seen residents dispose of dog waste in the ditches. And without definitive DNA confirmation on the type of E. Coli present, they were not willing to move forward with the septic tank ordinance.

The Phase I water quality test that DHEC performed started January 23, 2002, and concluded on Jan 7, 2023. A combination of outfall and open water areas across the island, for a total of 15 areas were selected for assessment for Phase I.

Each sample collected during Phase I was analyzed for fecal coliform. In addition, three (3) of the open water locations and two (2) inland outfall locations were analyzed for ammonia, total Kjeldahl nitrogen, nitrate/nitrite, and total phosphorus.

The Phase II monitoring program expanded the information gathered during the 1st phase. Areas of high fecal coliform contamination were further examined to narrow the source to as small an area as possible – and the other pollutants were not examined.

There were two (2) sampling events for Phase II – the first from December 2002 to February 2003, and the final sampling was done Julye 2003 to September 2003. DNA profiles from the fecal coliform isolates obtained from the water samples were compared to a library of known DNA profiles to determine if the contamination was emanating from human and/or animal sources. Scat samples were also collected during January and February 2003 from known domestic and wild animal populations on IOP. The DAN profiles obtained from the scat samples were compared to DAN profiles obtained from the water samples to determine the specific animal populations that contributed to the fecal coliform contamination.

The final results of this extensive sampling study showed that the majority of the fecal coliform being discharged emanating from a human source was located around the Forest Trail outfall area. However, the findings showed that the human source represented only 20% of the total fecal coliform from that area of the island. Additionally, less than 10% of the samples collected from the open water sampling locations indicated fecal coliform from a human source. The major contribution to the fecal coliform contamination (70%) appeared to be a combination of domestic and wild animals.

FAST FORWARD, 20+ YEARS LATER

After more than 20 years, questions about fecal coliform in IOP drainage ditches, and in standing water on IOP still remained – and with many more homes with septic systems built on the island of that time, and increased storms and even “sunny day” rain events, the Environmental Advisory Committee set a goal to re-visit water quality testing.

In 2024, Doug Hatler, EAC committee member, proposed that a new, baseline water quality monitoring plan be initiated. The immediate water quality goal was to conduct a water quality audit of water supply, storm-water run-off, and wastewater discharges. The plan was to retain a contractor to collect grab samples from 8 outfalls located over the island during a rain event; analyze each sample for specified contaminants; only analyze up to five (5) stormwater outfall samples for PFAs; prioritize locations to dense septic and commercial areas.

The parameters to be tested were: Total coliforms; fecal coliforms; Total Nitrogen (N); Total Phosphorus (P); Oil & Grease; pH; Total suspended solids; PFAS. GEL Labs was contracted to do the sampling, and in the Fall of 2024, after a rain event, water sample grabs were taken at the eight (8) outfall locations across IOP. In March of 2025, the EAC received a report detailing the water test results by outfall location, ranked by “concern”*. #1 was the outfall at 25th Ave. , which showed extremely high nitrate and total nitrogen, far exceeding healthy levels, indicating likely runoff pollution (fertilizer or waste). Risks of algal blooms/eutrophication elevated. #2 was Waterway and 36th Ave. near Forest Trail (also noted in the DHEC analysis back in 2002-2003) Concerns were very high total Kjeldahl nitrogen (TKN – found in ammonia) and phosphorus, suggesting organic waste or sewage contamination . Total nitrogen was also well above safe criteria, and elevated TSS (total suspended solids) indicated sediment run-off above normal levels. #3 was the outfall behind Harris Teeter, which showed oil & grease significantly elevated, and TSS (total suspended solids) exceeded the DHEC benchmarks, indicating heavy sediment runoff, perhaps from roads & construction. #4 was Myrtle Ave, which had high total phosphorus above the DHEC guideline; total nitrogen was also above normal and elevated TSS (total suspended solids) The remaining four (4) outfalls had lower levels of concern, or had parameters within acceptable ranges – with the outfall at Waterway and 30th Ave. the baseline best.

Now that there was a new baseline study, the next step was to target the three (3) “highest level of concern” outfall locations in the residential areas and do additional sampling specifically for DNA testing to determine if the locations were contributing excessive amounts of human E. Coli, or if it was, again, coming from domestic and wild animals.

In July of 2025, Woolpert, a 3rd party water quality testing lab, was contracted to re-sample and pre-screen the top three (3) residential “areas of concern” identified by GEL Labs: 25th Ave; 36th Ave (near Forest Trail) and Myrtle Ave.

*“Concern” being higher than appropriate levels of contaminants found at the site

New and faster testing technology was now available, and the Woolpert plan was to have a local Woolpert team member come out to IOP and collect one manual water sample grab at each of the three (3) locations for assessment of E. Coli. The samples were to be collected on the same day/trip during a period of dry weather and at low tide to attempt to capture discharges from the island rather than backwater from the intracoastal waterway.

The initial water sample grabs were to be put into Fluidion bacteria analyzer test tubes,(a total of 6 test tubes were provided for this test) which contained enterococcus reagents. Within 24 hours, the reagents in the tubes would show whether there were high enough levels of bacteria concentrations (E. Coli) to warrant moving to the next step – DNA analysis of the E. Coli, which would be done at another lab, LuminUltra. If the measured bacteria concentrations were low, and did not justify doing the DNA analysis, the City could go back within 90 days and do another round of samples at the three (3) outfalls with the remaining three (3) Fluidion test tubes.

On 9/10/25, Woolpert came out to IOP and did the water sample grabs at 25th Ave, 36th Ave (near Forest Trail) and Myrtle Ave. with location help from Laura Lovins, EAC chair. Within 24 hours, Woolpert confirmed that the E. Coli levels found at 25th and 36th Ave. warranted moving forward with the LuminUltra lab to do the DNA testing. The EAC had chosen three (3) species to be tested for DNA – humans, dogs, and deer. On 9/29/25 LuminUltra provided the DNA test results which showed only dog fecal coliform present.

Since there were still three (3) Fluidion test tubes left with bacteria analyzer antigents, the EAC decided to do one more outfall test during a rain event. The 25th Ave outfall location was chosen, and only human E. Coli was chosen for the DNA test, if the bacterial levels were high enough. On 10/27/25, IOP had a significant rain event, with .84 inches of rain in a 24 hour period. Woolpert came out at 6am on the 28th , which was low tide, and pulled the water sample at the 25th Ave outfall. On the 29th, the Fluidion test showed high enough levels of E. Coli to move forward with the DNA test at LuminUltra-only checking for human E. Coli. On 11/18/25, LuminUltra provided their DNA results – no human E.Coli was found.

These two separate water quality tests done over 20 years apart have shown that, while there does not appear to be a human waste issue on our island and in our water, there is a real issue with animal waste, specifically with dogs, that is being caused by our human residents not being conscientious about picking up after their dogs on our streets and in our yards. And this contamination can have very negative impacts on our adjacent marshes when it washes into them. This contamination can cause Spartina grasses to die at their roots, which can cause our marshes to decline and put them in a vulnerable state, along with the fish and shellfish that live among those roots.

The IOP Environmental Advisory Committee has decided to re-test outfall areas across the island in another two (2) years to see if there are any changes to the E. Coli picture after a pet clean-up project call “Doody Calls” is implemented in 2026. In the meantime, a closer look at the health of our marshes is warranted.

**"Concern" being higher than appropriate levels of contaminants found at the site

UPDATE ON INTERPRETIVE SIGN PROJECT FOR IOP DOCK/PIER 1.6.26

On Tuesday, 12/16/25, Susan Hill Smith and Laura Lovins met with Kaitlyn Hackathorn, the graphic designer/illustrator for the interpretive sign project to finalize all of the graphics, illustrations, and copy for the 14 signs for the project.

Kaitlyn sent off the sign designs to Envirosigns, and the week of 12/29/25, Kaitlyn shared that Lauren with Envirosigns confirmed they have all of the files they need and are working on proofing the designs. We hope to have the final proofs by the middle of January, along with final invoicing.

Details on the actual installation should be coming by the end of January – 1st week in February.