ORDINANCE NO. 1648

AN ORDINANCE OF THE CITY OF PANAMA CITY BEACH AMENDING ORDINANCE 1688, KNOWN AS THE "2021 AMENDED AND RESTATED PANAMA CITY BEACH COMPREHENSIVE GROWTH DEVELOPMENT PLAN"; AMENDING SECTION 7 THE SANITARY SEWER ELEMENT TO INCLUDE CONSIDERATION OF SEPTIC TANK CONVERSIONS AND SANITARY SEWER AVAILABILITY; REPEALING ALL ORDINANCES OR PARTS OF ORDINANCES IN CONFLICT HEREWITH; PROVIDING FOR SEVERABILITY; SCRIVENER'S ERRORS; LIBERAL INTERPRETATION; MODIFICATIONS; CODIFICATION; AND PROVIDING THAT THIS ORDINANCE SHALL TAKE EFFECT AS PROVIDED BY LAW.

WHEREAS, the City of Panama City Beach City Council adopted the "2021 Amended and Restated Panama City Beach Comprehensive Growth and Development Plan" (the Comprehensive Plan) on November 10, 2021, by Ordinance 1688; and

WHEREAS, Chapter 2023-169, Laws of Florida requires that the City amend Section 7 of the Comprehensive Plan entitled "Sanitary Sewer, Solid Waste, Stormwater Drainage, Potable Water, and Aquifer Recharge" (the Sanitary Sewer Element) to consider the feasibility of septic tank conversions and the availability of sanitary sewer services; and

WHEREAS, the Panama City Beach Planning Board reviewed the amended Sanitary Sewer Element at its June 12, 2024, meeting and recommended approval; and

WHEREAS the Panama City Beach City Council held a public hearing on June 27, 2024, to consider first reading of the updated Comprehensive Plan and its transmittal to the State.

NOW THEREFORE, BE IT ORDAINED BY THE CITY COUNCIL OF THE CITY OF PANAMA CITY BEACH, FLORIDA, AS FOLLOWS:

SECTION 1. The **attached** Section 7 of the Comprehensive Plan entitled "Sanitary Sewer, Solid Waste, Stormwater Drainage, Potable Water, and Aquifer Recharge" as amended (new text underlined) is hereby adopted.

SEE ATTACHED **EXHIBIT A** SETTING FORTH AMENDED SECTION 7 TO THE COMPREHENSIVE PLAN.

SECTION 2. CONFLICT WITH OTHER ORDINANCES OR CODES. All Ordinances or parts of Ordinances of the Code of Ordinances of Panama City Beach, Florida, in conflict with the provisions of this Ordinance are hereby repealed to the extent of such conflict.

SECTION 3. SEVERABILITY. If any provision of this Ordinance is held to be illegal, invalid, or unconstitutional by a court of competent jurisdiction, the other provisions of this ordinance shall remain in full force and effect.

SECTION 4. SCRIVENER'S ERRORS. It is the intention of the City, and it is hereby provided that the provisions of this ordinance shall become and be made a part of the Code of Ordinances of Panama City Beach, Florida, and to that end, the sections of this ordinance may be renumbered or re-lettered and the word "ordinance" may be changed to "section" or "article" or other appropriate designation. Additionally, corrections of typographical errors which do not affect the intent of this Ordinance may be authorized by the City Attorney without public hearing, by filing a corrected or recodified copy with the City Clerk.

SECTION 5. ORDINANCE TO BE LIBERALLY CONSTRUED. This ordinance shall be liberally construed to effectively carry out the purposes hereof which are deemed not to adversely affect public health, safety, or welfare.

SECTION 6. MODIFICATIONS. It is the intent of the City that the provisions of this ordinance may be modified because of considerations that may arise during a public hearing. Such modifications shall be incorporated into the final version of the ordinance adopted by the City.

SECTION 7. CODIFICATION. The appropriate officers and agents of the City are authorized and directed to codify, include, and publish in electronic format the provisions of this Ordinance within the Panama City Beach Code of Ordinances, and unless a contrary ordinance is adopted within ninety (90) days following such publication, the codification of this Ordinance shall become the final and official record of the matters herein ordained. Section numbers may be assigned and changed whenever necessary or convenient.

SECTION 8. EFFECTIVE DATE. This Ordinance shall take effect as provided by law.

PASSED, APPROVED, AND ADOPTED at the regular meeting of the City Council of the City of Panama City Beach, Florida, this 12th day of September 2024.

CITY OF PANAMA CITY BEACH

By: _____
Stuart Tettemer, Mayor

ATTEST:

Lynne Fasone
Lynne Fasone, City Clerk

EXAMINED AND APPROVED by me this 12th day of September 2024.

Stuart Tettemer, Mayor

Posted on pcbfl.gov on the 5th day of July, 2024.

Posted on publicnoticesbaycountyfl.gov on the 21st day of Aug., 2024.

SECTION 7

SANITARY SEWER, SOLID WASTE, STORMWATER DRAINAGE, POTABLE WATER AND AQUIFER RECHARGE

1. PURPOSE.

The purpose of this section is to analyze and review present facilities providing services for sanitary sewer, solid waste, stormwater drainage and potable water in order to plan for projected growth. The existing sewer system is shown on Exhibit 6; and Exhibit 7 shows the existing water system.

2. UTILITIES SUB-ELEMENTS.

A. Sanitary Sewer Sub-Element

Current and Future Conditions

Panama City Beach sanitary sewer facilities are comprised of three components performing basic functions of collection, treatment, and disposal of sewage. As shown in Exhibit 6, the collection system is composed of a network of collection lines, pumping stations and transmission mains which transport wastewater to the treatment facility.

The treatment plant is the component of the sanitary sewer facility (Wastewater Treatment Plant 1) whose function is to remove solid and organic materials from the wastewater prior to disposal. Treated wastewater or reclaimed water is reused in either of two means. One method is pumping into the City's reclaimed water system where it is used for irrigation of larger public properties, common landscaped areas along rights of way and commercial and residential lawns. The second means of reusing reclaimed water is rehydration of wetlands within the City's 2,900-acre Conservation Park. Residuals or biosolids resulting from the treatment process are further treated and disposed of by land application on approved sites for soil enhancement. Although previously there were a few other private wastewater treatment facilities within the City's franchised service area, they have since been decommissioned and all their tributary wastewater redirected to Wastewater Treatment Plant 1.

Wastewater Treatment Plant 1 (WWTP 1) has a rated capacity of 14 million gallons per day (MGD) maximum three-month average basis and 10 MGD on an annual average basis. Given the seasonal nature of the City's sanitary sewer customer base, the three-month moving maximum average daily flow criteria is the most critical capacity parameter.

Historic growth rates for the City's service area have averaged around three percent but this rate

has increased in recent years. For projection purposes, a four (4) percent annual average rate of growth in wastewater generation within the City's service area (from the Hathaway Bridge to the West Bay Bridge to the Phillips Inlet Bridge). Accordingly, the City is in the planning phase for either expanding WWTP 1 or development of a second wastewater treatment plant and has acquired the site for this facility. Treatment capacity for this new facility will be developed in phases to coincide with growth. Should development of a second facility be selected, both treatment facilities will be interconnected to allow for load sharing and system redundancy.

Septic tanks were once a widely used method of wastewater disposal within the City limits. Six large subdivisions El Centro, Gulf Highlands I, Gulf Highlands II, Bid-A-Wee, Bahama Beach and Open Sands were all originally developed using septic systems. All these subdivisions have since been retrofitted by the City with gravity sanitary sewer and reclaimed water systems. These improvements were funded by a grant from the State of Florida.

The City has the operational responsibility for the collection, treatment and disposal of wastewater generated within the City limits. The geographic service area of the City wastewater treatment system serves areas predominantly populated with residential and commercial establishments. The predominant commercial uses are motels, restaurants, nightclubs and amusements. Light industrial use is small but growing at this time. There is no heavy industry use.

TABLE 1
HISTORICAL WASTEWATER TREATMENT SYSTEM
MAXIMUM MONTH AVERAGE DAILY USE

YEAR	MGD
2012	8.20
2013	11.57*
2014	8.63
2015	8.60
2016	8.89
2017	10.32
2018	9.13
2019	9.35
2020	10.28
2021	10.95
2022	11.24
2023	10.94

*Un-named heavy rainfall event July 2nd through 5th

SOURCE: Panama City Beach Utility Department

TABLE 2
PROJECTED MAXIMUM MONTH AVERAGE DAILY WASTEWATER PRODUCTION

	2025	2040	2050	
Permanent Residents:	21,000	28,000	34,000	
Other Service Area Residents:	34,500	46,000	56,000	
Tourist Population (daily avg):	52,000	64,000	72,000	
Total Population:	107,500	138,000	162,000	
Population Usage (MGD):	7.50	9.67	11.34	
Non-Residential Usage (MGD):	2.01	2.48	2.79	
Total Usage (MGD):	9.51	12.15	25.95	
Remaining Capacity	4.49	1.85	13.0	*

Source: 2023 Updated Capacity Analysis Report for City of Panama City Beach Wastewater Treatment Facility #1, Infrastructure Solution Services, Inc., June 2023, and the City of Panama City Beach Planning Division.

**Scenario of Re-rating WWTP 1 to 15 MGD and development of WWTP 2 rated at 12 MGD*

Existing Facility Conditions

The general performance of the existing wastewater treatment system is good. Collection system maintenance remains relatively low given the age of the collection lines. The City continues to refurbish pump stations based upon age and condition in accordance with a prioritized capital improvement program. Impact on Natural Resources

Presently, the City's permit limits allow discharge of up to 14 MGD of reclaimed water to the receiving wetlands at the Conservation Park on an annual average basis. In addition, the approved City reuse franchise area provides for up to 10 MGD of reclaimed water to be reused for irrigation. Application of reclaimed water to the Conservation Park wetlands provides for rehydration and re-establishment of the original hydroperiod of the wetlands prior to alteration for silviculture. Uplands within the Conservation Park are being managed through selective thinning, planting and prescribed burns programs to reestablish the original long leaf pine habitat. This 2900-acre Conservation Park is set aside for preservation, recreation and public education. Discussions are ongoing regarding the City assuming ownership of a neighboring 700-acre parcel to increase Conservation Park and ideally adding reuse capacity.

The City's reuse utility provides an alternate water supply for irrigation uses saving potable water resources and reducing demands on supply. Materials screened from the wastewater (i.e. rags, etc.) are dewatered and disposed of in a properly permitted landfill. Similarly, biosolids/residuals from the treatment process are further treated and applied to agricultural lands in accordance with the applicable regulations as a soil amendment.

A recently completed study determined that with minor improvements, WWTP 1 can be re-rated from 14 to 15 MGD. Capacity gained through this program will provide time for development of a second expansion of WWTP 1 up to 8 MGD to 23 MGD or development of the first two of three treatment trains at WWTP 2 with a rated capacity of 8 MGD. In the second scenario, WWTP 2 would be developed at a site located in the northern portion of the City's Commerce Park. Effluent and residuals are to be disposed of in the same fashion as currently practiced for WWTP 1. A conceptual schedule for these programs is as follows:

	Start Date	End
Design 1 MGD rerate expansion from 14 to 15 MGD	Summer 2024	Fall 2026
Advertise & Award	Fall 2026	Winter 2026
Construction & Startup	Winter 2026	Fall 2029
Design of 8 MGD expansion from 15 MGD to 23 MGD	Summer 2026	Fall 2028
Advertise & Award	Fall 2028	Winter 2028
Construction & Startup	Winter 2028	Fall 2031

Septic Tanks

Rule 64E-6, F.A.C., presently regulates the installation and use of septic tanks in the Panama City Beach area. This Rule outlines the suitability of soils and use of septic tanks. Using these criteria, the area contains soils which are suitable and unsuitable for septic tank systems. The General Soils Map Number 6 describes the soil types and characteristics. The Beach Service Area is composed of soil type 1 (Kureb, Resota, Mandarin), type 4 (Hurricane, Chipley, Albany), type 5 (Pottsburg, Leon, Rutlege), type 8 (Rutlege, Allanton, Pickney), and type 9 (Bayvi, Diregó). All five soil types are identified as being primarily unsuitable for septic tank systems. Properties and features that affect the absorption of the effluent are permeability, depth to seasonal highwater table, susceptibility to flooding and depth to hardpan. Also, excessive slope or gravel may not adequately filter the effluent. Failure of some septic systems were formerly reported in the Gulf Highlands I and II subdivisions which are located on the eastern and western sides of State Road 79 and north of Panama City Beach Parkway. These subdivisions have since been retrofitted with sanitary sewer and reuse. There are other planned system expansions to eliminate septic tanks in the South Lagoon and Laguna Beach areas in the unincorporated portions of the utility service area.

In reviewing soil suitability standards, it is advisable that alternatives to septic tank installation and use should be investigated in all areas of the beach service area.

Currently, there are 1,630 single family lots located in developed areas of the Panama City Beach City Limits that do not have active sewer accounts. Assuming a standard flow rate of 300 gpd per lot, the additional sewer demand for these lots would be 0.49 MGD. This is within the current capacity for the Panama City Beach WWTF #1 and would not require any additional treatment capacity. Currently, 120 lots are unsewered and have no transmission lines available. These lots would require approximately 3,000 LF of sewer extension. There are 60 lots adjacent to gravity sewer mains that would require lateral service line construction to be served.

GOALS, OBJECTIVES AND POLICIES

GOAL: Provide adequate facilities required to meet wastewater needs in the Panama City Beach service area.

OBJECTIVE 1: City shall achieve and maintain the adopted level of service standards for sanitary sewer facilities.

POLICY 1.1: Panama City Beach hereby adopts 80 gallons per capita per day as a level of service standard that will be maintained for sanitary sewer facilities for permanent residents and 60 gallons per capita per day for seasonal visitors.

POLICY 1.2: When actual plus committed flow is 90% of the average annual daily flow permit and design capacity for the existing wastewater facility for Panama City Beach, the City will develop and implement an expansion program that will result in expansion of plant facilities or reconstruction to accommodate projected needs prior to the time the design capacity is reached.

POLICY 1.3: The City will track existing and committed capacities to ensure that capacity is available in the future at the level of service standard.

OBJECTIVE 2: The City will continue to address correcting any existing facility deficiencies.

POLICY 2.1: The City will address any existing facility deficiencies by investigating possible inflow and infiltration problems and refurbishing pump stations as needed in the existing wastewater collection lines.

OBJECTIVE 3: The City will address coordinating the extension of, or increase in, the capacity of facilities to meet future needs.

POLICY 3.1: The City will evaluate the sewer system on an annual basis and shall upgrade, expand, or replace its sewage facilities as determined by such evaluation to accommodate population demand and ensure operational efficiency.

OBJECTIVE 4: Upon adoption of this Plan, consider developing additional procedures for providing sewage capacity as a means of discouraging urban sprawl and promoting "in-fill" of vacant urban areas.

POLICY 4.1: The City shall provide sewage capacity as applicable to promote the redevelopment objectives of the Housing section and shall consider provision of sewer in these areas to be a priority activity.

OBJECTIVE 5: Maintain and operate the sewage system in an efficient and cost-effective manner.

POLICY 5.1: Through Land Development Regulations, the City shall require that developers provide sewage collection lines constructed to City standards as a part of proposed new developments and that such lines be connected to the Panama City Beach wastewater treatment system.

POLICY 5.2: Priorities for replacement, correction, or expansion of the facilities shall be as follows:

A. Correction of identified existing deficiencies.

B. Replacement of facilities to allow for continued operation or design efficiency.

C. Expansion of facilities.

OBJECTIVE 6: Upon adoption of this Plan, the City will coordinate the extension or increase in capacity of the facilities to meet future needs.

POLICY 6.1: All extensions of the sewer system shall be constructed in conformance with Chapter 17-6, F.A.C., as it may be revised and any applicable standards for facilities which are to be operated and maintained by the City.

POLICY 6.2: Average peak flow design capacity for the City collection system shall be as specified in Chapter 62 -6, FAC, as amended or any applicable standards for facilities which are to be operated and maintained by the City.

POLICY 6.3: Average flow design capacity for the wastewater treatment system shall be as specified in the operating permit issued by the Florida Department of Environmental Regulation.

POLICY 6.4: Improvements to the wastewater treatment facilities will be funded through a combination of user fees, impact fees, bonds, state revolving funds, and grants.

OBJECTIVE 7: The City will continue to reduce the number of septic tanks currently in the city limits and limit the number of future septic tanks.

POLICY 7.1: Use of a septic system must discontinue pursuant to S. 381.0065, F.S., once a sanitary sewer system becomes available.

POLICY 7.2: The term available@ shall be that as defined in S. 381.0065, F.S.

POLICY 7.3: The extension of reuse lines and sanitary sewer lines into unsewered subdivisions will be funded by a combination of user fees, impact fees, bonds, state revolving loans, and grants.

POLICY 7.4: The City's reuse system will continue to be expanded as such projects become financially feasible to further the City's potable water conservation efforts.

OBJECTIVE 8: The City will plan and prepare to provide sanitary sewer services for expected and future new construction and connection of onsite sewage treatment and disposal systems to sanitary sewer.

POLICY 8.1: The City will continue to maintain the current capacity for the City's Wastewater Treatment Facility #1 and will continue to plan for expansions to meet the future needs of residential development.