



PORT HOUSTON<sup>SM</sup>

# Sustainability

## at Port Houston

*March 2022*





**“We know that today’s work must be done sustainably for future generations. We also know we cannot do it alone. Collaboration and partnership will be keys to our success.”**

**Roger Guenther**  
*Executive Director*



## Top 3 things to know about sustainability at Port Houston

- Port Houston has reduced its carbon footprint by 55% since 2016
- In addition to 72 ongoing initiatives, Port Houston has identified 27 new environmental, social, safety, and governance (ES<sup>2</sup>G) initiatives on which to lead, partner, or support
- Port Houston has set a goal to be carbon neutral by 2050

Port Houston owns and operates the eight public terminals along the Houston Ship Channel and is the advocate and a strategic leader for the Channel.

[www.porthouston.com](http://www.porthouston.com)

## The Houston Ship Channel – the nation’s busiest waterway.

### Port Houston

- 8 public facilities all cargos
- 44.5M tons in 2021
- 3.5M TEU in 2021
- 6000 Trucks / Day
- Houston Ship Channel “Project 11”

### Houston Ship Channel

- 200 private facilities
- Nation’s largest petrochemical complex
- Energy & chemicals capital
- 500M BBL storage
- Over 1200 pipelines all products

## Together...



**>275M  
TONS/YR**

nation’s largest  
port by tonnage



**\$3.2M**  
jobs annually  
nationwide



**10,000 VESSELS  
&  
200,000 BARGE**  
transits annually



**\$802B**  
annual economic impact  
across the U.S.





REDUCED CARBON  
FOOTPRINT BY  
**55%**  
SINCE 2016

Measuring what we manage  
Through 2021



**WORLD'S 1ST  
PUBLICLY-OWNED  
PORT TO BE CERTIFIED**  
to rigorous ISO14001  
environmental management  
system standard



Recycled more than  
**94,000  
TONS**  
of material like aluminum,  
paper, scrap metal, and  
concrete in 2021

# ADDITIONAL ACHIEVEMENTS

in Environment, Social,  
Safety, and Governance

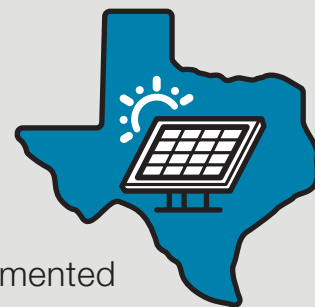
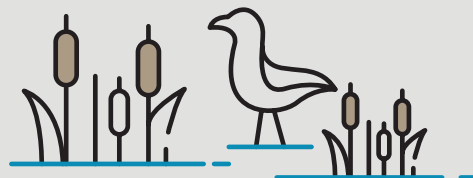
- 31 of Port Houston's 116 rubber tire gantry (RTG) cranes are hybrid-electric and all ship-to-shore (STS) cranes are fully electric
- Port Houston has helped plant more than 3,000 trees on our property and plan to plant 10,000 by 2040
- Annual blood donations from Port Houston employees equate to roughly 250 lives saved every year
- Port Houston is investing \$2M to repair and develop park projects in East Harris County and to fund City of Houston projects through the 50/50 Parks Program
- Through the Harbor Street Partnership, Port Houston is donating a 22-acre parcel of land to support community recreation, resilience, and economic development as well as Port accessibility
- Port Houston maintains ISO 28000 Security Management System standards
- Since 2002 Port Houston has awarded more than \$612M in contracts to small businesses
- In July 2021 Port Houston launched a new minority and woman-owned business program



Invested  
**\$5M**  
in Maritime  
Education  
since 2010

CREATED  
**3,300  
ACRES**

of marshes and bird islands providing  
habitat, water quality and carbon  
capture benefits. (Another 800  
planned with Project 11)



Implemented  
**100%**  
**ASSET-BACKED  
RENEWABLE ELECTRICITY**  
saving 25,000 tons of CO<sub>2</sub>  
emissions annually



Reduced 7 criteria  
air pollutants  
**15-93%**  
between 2013-2019

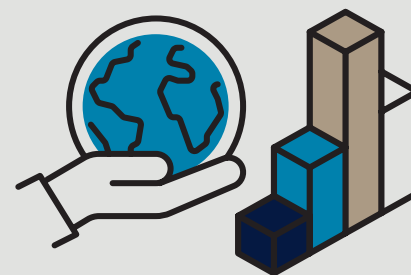


Received the Government Finance Officers  
Association Certificate of Achievement for  
Excellence in Financial Reporting for

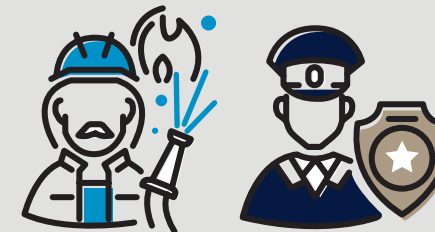
**47** CONSECUTIVE YEARS

AWARDED  
**\$550,000**

in Community Grants since 2020-2021



INVESTED  
**\$320M**  
in sustainability projects  
since 2004



DEDICATED  
**127**  
emergency personnel like  
police, fire, and security to  
keep the Channel safe

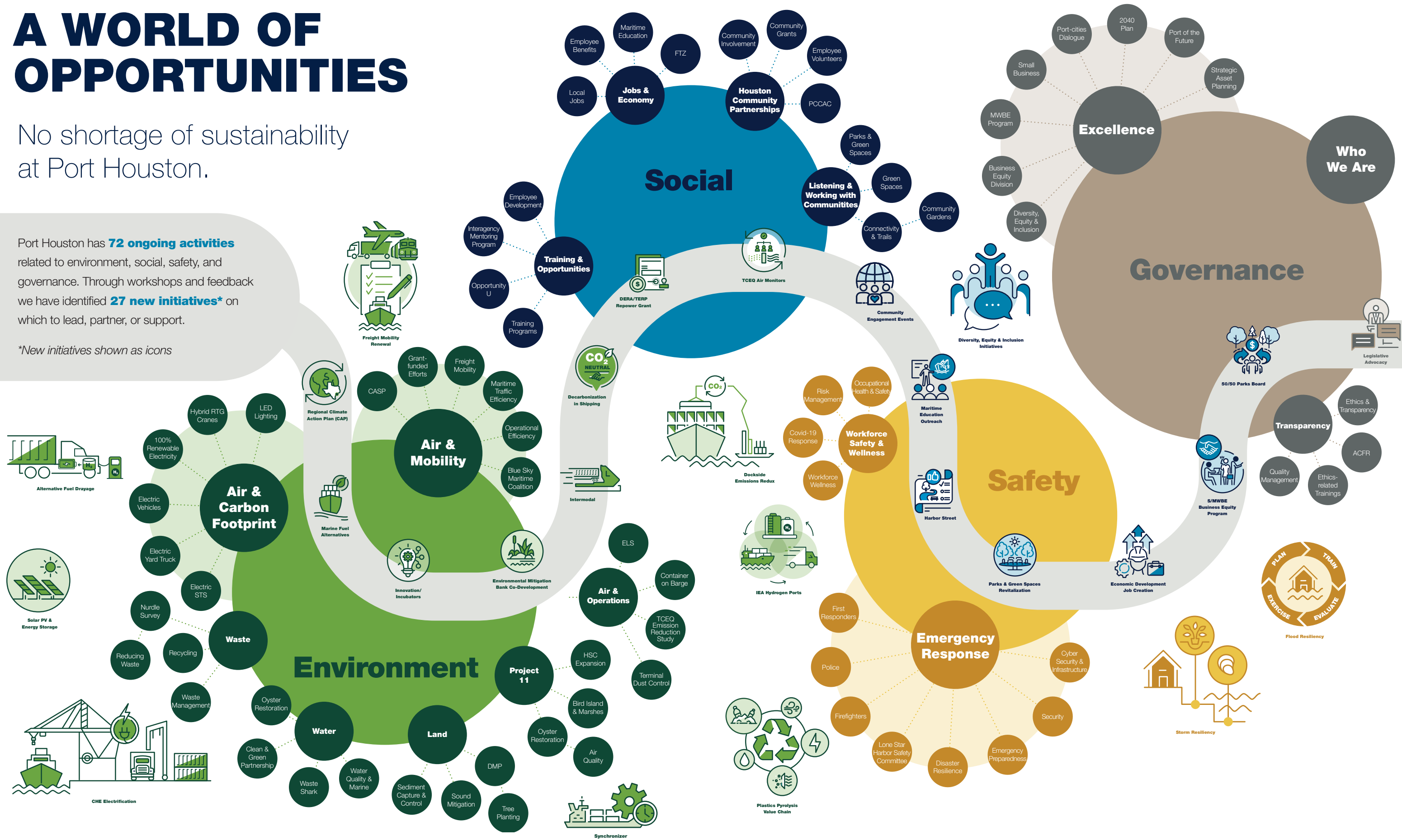
Additional programs and more detail at:  
[www.porthouston.com/ESG](http://www.porthouston.com/ESG)

# A WORLD OF OPPORTUNITIES

No shortage of sustainability at Port Houston.

Port Houston has **72 ongoing activities** related to environment, social, safety, and governance. Through workshops and feedback we have identified **27 new initiatives\*** on which to lead, partner, or support.

*\*New initiatives shown as icons*



# ACTION PLAN

## Leading Opportunities

Equipment Electrification

Community Engagement

Road & Rail Network Efficiencies

Parks & Green Spaces Revitalization

Diversity, Equity & Inclusion Initiatives

Maritime Education Outreach

Economic Development Job Creation

S/MWBE Business Equity Program

**Lead:**  
Port Houston takes the lead where we have the authority, resources, and control of the scope.

**Partner:**  
As partner on an activity or initiative, we coordinate with other entities to deliver success.

**Support:**  
We support activities and initiatives that align with our values when they are led by others. We lend expertise and resources as a participant and connector in coalitions and working groups.

## Partnering Opportunities

Alternative Fuel Drayage

DERA/TERP Repower Grants

Legislative Advocacy

Solar Energy Storage

Plastics Recycling

Environmental Mitigation Bank Co-Development

Marine Fuel Alternatives

Harbor Street

Dockside Emissions Reduction

Parks and Green Spaces

## Supporting Opportunities

Blue Sky Maritime Coalition for Decarbonizing Shipping

Intermodal

Regional Climate Action Plan

IEA Hydrogen Ports Coalition

TCEQ Monitors

Flood Resiliency

Innovation/Incubators

Synchronizer

Storm Resiliency

# ROAD AHEAD

Port Houston is committed to a net-zero GHG footprint by 2050 by working on direct and supporting related sources

## Resiliency

Resiliency complements sustainability by providing capacity to recover quickly from difficulties such as weather events and economic disruptions. Port Houston’s operations, infrastructure and positive labor relations keep people working and critical goods flowing. Over 75% of the 3.2M American jobs supported by the Houston Ship Channel are located in communities with a poverty rate higher than the national average, providing a ladder of opportunity for millions of Americans. In addition to investments in infrastructure and the Channel, Port Houston provides board-level support on the Gulf Coast Protection District and multi-party working groups focused on flood control, infrastructure needs and policy. Community resiliency is supported by wide-ranging programs such as food and water distribution relief, neighborhood parks and safe trails, workforce development and education, community grants, and business equity programs. Environmental resiliency is added through marsh, wetlands and habitat creation, tree planting, and implementing clean air and water quality strategies.

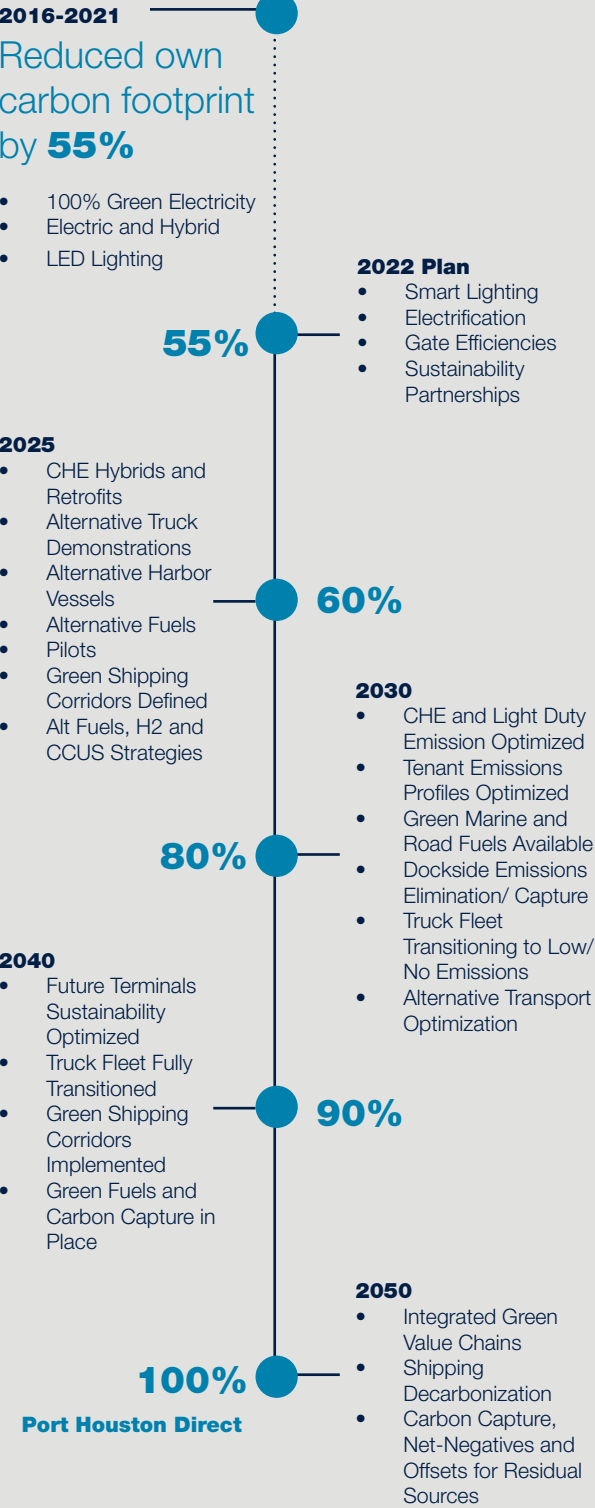
## Carbon Neutral by 2050

Port Houston recently announced its goal to be carbon neutral in the next 30 years. We plan to achieve this by upgrading technology, improving infrastructure and equipment, and using alternative fuels and clean energy sources. Port Houston reduced its carbon footprint by 55% from 2016–2021. Port Houston facilities are just part of the overall equation, though. Reductions are needed throughout the supply chain, including from ships, trucks, tenants, and other operators. Global decarbonization in shipping is also needed.

Studies showed a 21% reduction in carbon footprint from 2013–2019 from Port Houston and the varied operators who utilize the Channel. Continued collaboration with industry, community, federal, state, and local agencies will be vital for addressing upstream and underlying causal factors in air quality.

### CARBON NEUTRALITY BY 2050

Illustrative process

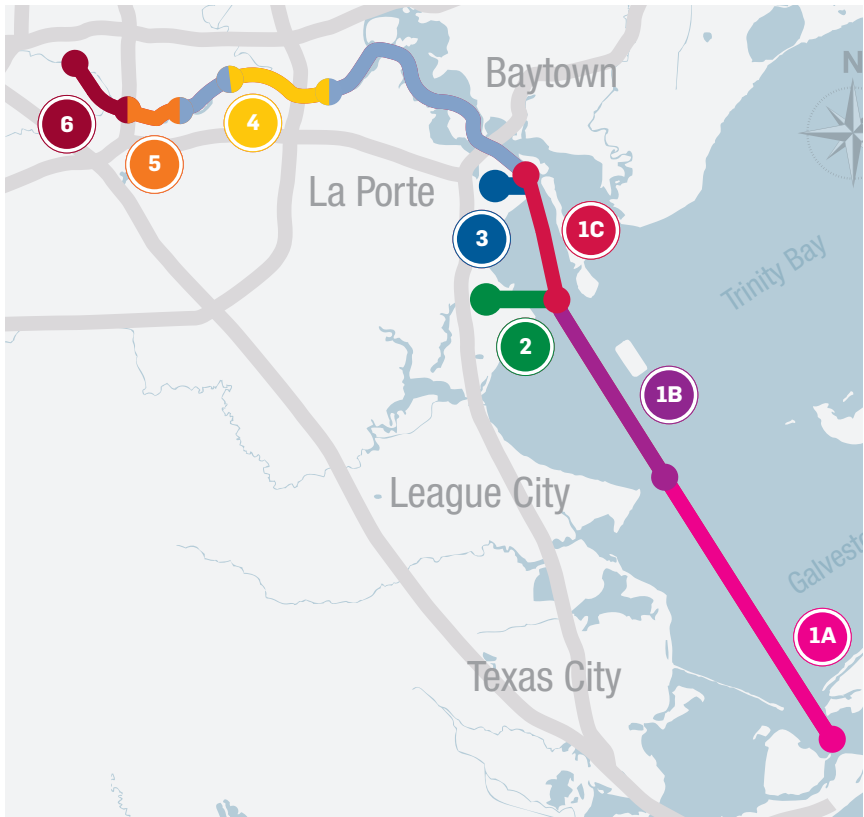




# Houston Ship Channel Expansion—Project 11

As the advocate and strategic leader of the Channel, Port Houston is working with the U.S. Army Corps of Engineers (USACE) to deepen and widen the nation’s number one waterway. Called Project 11, this expansion will widen the Channel from 530’ to 700’ and deepen some upstream segments to 46.5’. This growth will allow larger vessels to safely call Houston. The first dredge contract was awarded in October 2021 and work has commenced on Segment 1A. With this contract, Port Houston selected the approach with the most reduction in overall NOx emissions.

- 1A Bolivar Roads to Redfish
- 1B Redfish to Bayport Ship Channel
- 1C Bayport Ship Channel to Barbours Cut
- 2 Bayport Ship Channel
- 3 Barbours Cut Ship Channel
- 4 Boggy Bayou (BW 8) to Sims Bayou
- 5 Sims Bayou to IH 610
- 6 IH 610 to Turning Basin



Building on our tradition of environmental stewardship and the successful program of using dredged material for beneficial uses, Port Houston is working with its partners to help ensure that this project once again provides significant environmental benefits – to wildlife, water quality, and regional air quality.



**Bird Islands and Marshes** – Portions of the dredged material from Project 11 will be used to construct four bird islands in Galveston Bay, creating up to 20 acres of new foraging and nesting habitat. Plans also include three new marshes of up to 800 acres in total size.



**Oyster Restoration** – A portion of the clay, sand, and shell produced from the project will be used to build approximately 376 acres of replacement oyster reef pads to provide growth-enabling habitat.



**Air Quality** – Project 11 is expected to improve regional air quality by increasing the efficiency of vessel movements and reducing potential congestion along the Houston Ship Channel. When complete, Project 11 is expected to reduce vessel-related emissions by between 3% and 7% annually.

Stay up to date on Project 11 at: [www.expandthehoustonshipchannel.com](http://www.expandthehoustonshipchannel.com)

# ABOUT PORT HOUSTON

At Port Houston, our vision, purpose and core values are the foundation for everything we do. How we meet our commitments and fulfill expectations will define our success.

Our organization rose from a local, state, and national vision of global commerce, and for more than a century, we have realized that vision as the head and the heart of the Houston Ship Channel. Just as vessels need the experience of expert pilots, our ship channel needs the leadership of Port Houston.

Over the years, we have constructed public terminals, forged collaborations between businesses and governments, and fueled major projects to expand the capabilities of the nation’s busiest waterway.

Today, we provide advocacy and leadership to the channel and the more than 200 facilities that conduct business along its waters. We manage eight publicly owned facilities, two of which we directly operate. And we are a model for other ports to follow, as the port’s public facilities not only lead the industry in access and competitiveness, but also include the area’s largest breakbulk facility and two of the most efficient and fastest-growing container terminals in the country.

## Financials Related to Sustainability at Port Houston

All numbers estimated as-of March 2022

Invested to date*	\$320 Million
2022 Capital Budget	\$32 Million
2022 Operating Budget	\$7 Million
Project 11 Environmental Features '21-22	\$25 Million
Project 11 Environmental Features '23-25	\$150 Million

Total: \$534 Million

\*2004-2021, direct expenses. Additional \$970M related expenses.

### Mission

To move the world and drive regional prosperity

### Vision

America’s distribution Hub for the next generation

### Values

“We are READY” encompasses our core values of Respect, Excellence, Accountability and Diligence, and the focus on “You.”

### Strategic Goals



**People:**  
Be the best place to work



**Infrastructure:**  
Optimize infrastructure and channel capacity to serve the region



**Partnerships:**  
Develop and strengthen external partnerships



**Stewardship:**  
Create greater value for the region

To view Port Houston’s 2040 Plan, Clean Air Strategy Plan, ES²G and other reports in full, visit:

[www.porthouston.com](http://www.porthouston.com)

# WE WANT TO HEAR FROM YOU!

Port Houston's team is committed to fostering sustainability, resilience, collaboration, and quality of life. Together we can create a more sustainable future for all.

We welcome feedback and dialogue. Please reach out in one of the ways below:

## Email

[questions@porthouston.com](mailto:questions@porthouston.com)

## Call our Community Information Line

713-670-1000

## Sign up

Port Report e-newsletter

## Connect with us on social media



For more information on topics covered in this report, visit us at

[www.porthouston.com](http://www.porthouston.com)