



# North Carolina

DEPARTMENT OF TRANSPORTATION

Eastern Infrastructure Improvement Studies:  
A Report to the North Carolina Assembly on SB 402 Section 34.23

## Findings for Discussion

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Joint Legislative Transportation Oversight Committee  
January 27, 2015



## SB 402



Evaluate infrastructure improvements which promote job creation and economic development of the Global TransPark as an inland terminal, including, at a minimum, specialized transloading equipment, refrigerated and dry storage facilities.

Assess highway and rail infrastructure improvements or service scenarios that improve access and throughput to the Global TransPark and North Carolina State Port Authority Morehead City Terminal.

Perform a financial feasibility analysis of the Wallace to Castle Hayne and Wilmington track restoration project.

# Eastern North Carolina



- Agriculture, military and tourism are dominant industries
- Skilled and eager workforce for manufacturing and aviation industries
- Low business costs are a competitive advantage
- Staff leaving military service are potential local civilian workforce





# Data Analysis & Market Outreach



## Extensive data analysis was supplemented by expert market outreach

### Analysis:

- In-depth analysis of cost/benefit was conducted on W2CH
- Multiple scenarios were comprehensively investigated for GTP and MHC

### Outreach:

- Major manufacturers and NC Chamber of Commerce
- Military
- Local communities
- Economic development and rural planning/MPOs
- Growers associations and agriculture processors
- Port, Class I railroads and GTP representatives
- Site selection specialists
- Experts at other NC institutions (NCSU, First Flight Venture Center)



# Restoring Track between Wallace and Castle Hayne (W2CH)



## Context

- Line restoration of W2CH has significant strategic value to military and agricultural interests – would also open Pender County to opportunities for new rail-served shippers.
- Connections to/from W2CH line would be to CSXT network. Line restoration alone would not provide a second rail carrier, or dual access.
- Traffic could be unit trains from the Port to shippers in Pender County, or points north.
- Department of Defense (DoD) identifies W2CH restoration as a high priority to insure redundancy, but has not identified federal funding to date.
- No rail-dependent shippers are currently stranded without a rail connection, however, select shippers may benefit from more direct routing if the line were restored.



# Restoring Track between Wallace and Castle Hayne (W2CH)



## Findings

- Strategic value to the military and agriculture interests must be considered in the investment decision process.
- The Department of Defense identifies as a high priority to insure redundancy of rail service to facilities in eastern North Carolina, but has not offered funding support.
- Existing and near-term market conditions, and CSXT network routing do not currently support the significant \$150M+ investment.



# Restoring Track between Wallace and Castle Hayne



## Strategies and Next Steps

- Seek federal funding for the DoD-supported restoration of the rail line.
- As the market dictates in Pender County (such as a new agri-business facility), extend the existing CSXT rail line southward from Wallace to serve new industry, should it develop. The cost-per-mile for this extension is approximately \$3.5M without crossings or structures.
- Continue to preserve right-of-way and future options.

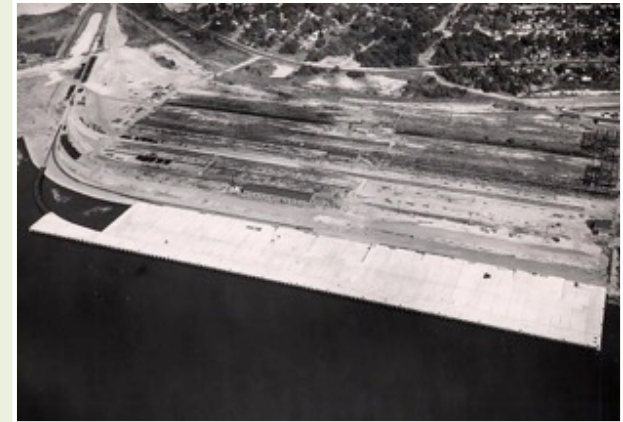


# Restoring Track between Wallace and Castle Hayne



## Strategies and Next Steps – Port of Wilmington

- Continue efforts to work with CSXT to identify actions leading to regular intermodal (rail) service to the port. The goal is to increase container traffic through the Port.
- Pursue rail crossing consolidation and safety upgrades to improve safety and efficiency of rail and vehicular flow into port.
- Pursue planning for a highway-railroad grade separated access bridge at the North Gate of the port – would improve safety and capacity for trains and vehicles.
- Investigate the feasibility of a high-lift rail bridge across the Cape Fear River to connect west to rail lines in Brunswick County, removing port rail traffic from Wilmington proper.



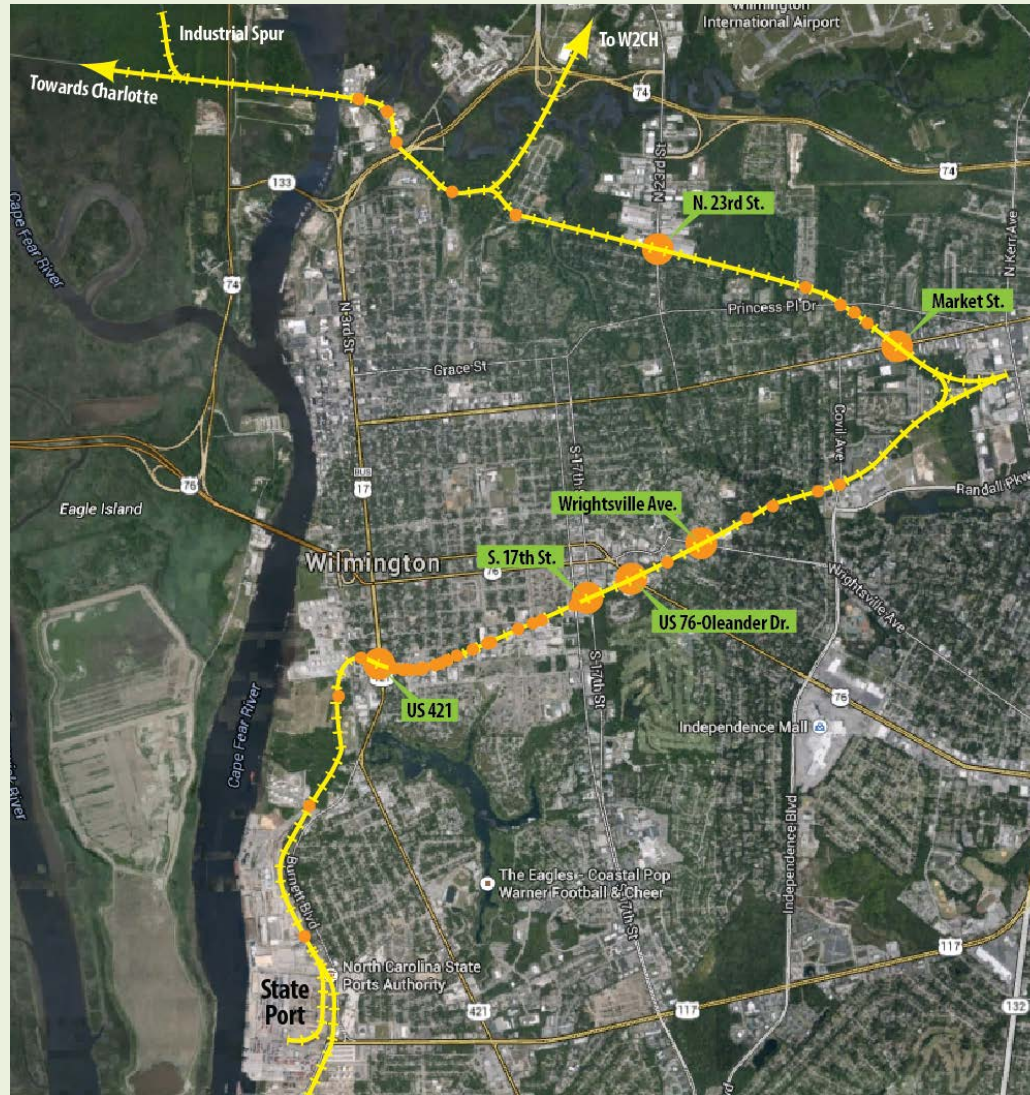
*Port of Wilmington, 1951*



# Restoring Track between Wallace and Castle Hayne



## Wilmington



# Inland Bulk Terminal at GTP



## Context

- The initial concept for Global TransPark (GTP) was as a highly efficient air cargo hub that attracts industry to Eastern NC.
- GTP's greatest successes to date have been aviation-related.
- GTP's master plan noted similar facilities experience slow growth in first 8 to 10 years, but experience faster growth in years 12 to 25. GTP's experience roughly matches that expectation.
- GTP total investment as envisioned was \$733 million, to date an estimated \$350 million has been invested. Rail spur to GTP connected in 2012; highway access improvements still ongoing in 2015.



# Inland Bulk Terminal at GTP



## Findings

- Bulk cargos are low margin commodities and highly sensitive to changes in transportation costs. The short travel distance from GTP to Port of MHC is not further optimized by a bulk facility.
- Refrigerated cargoes would likely be frozen poultry and pork; transport is pork, evolving to refrigerated containers, shipped for export as a Wilmington opportunity or domestic distribution.
- A bulk or refrigerated transload facility is not recommended at GTP under these existing conditions.



## Strategies

- Monitor the market for changes but pursue other initiatives to support commerce at GTP in the short run.

# Other GTP Initiatives



## Context

- Proximity and potential to support State's military installations.
- Longest runway east of the Mississippi. Accommodates heavy loads. Uncongested airspace.
- Businesses at the GTP pay no City or County taxes.
- Local/area labor force was cited as an important factor for employers.
- The lack of local amenities were cited as a potential factor impacting the ability to recruit new industry to the GTP.
- Improved highway access would benefit the GTP, but it is not identified as a present constraint to development. Improved highway access would reduce travel times to and from the GTP, and an interstate quality highway would make the facility more attractive for industries potentially siting in North Carolina.
- Increased volumes and market changes would assist in lowering rail shipping rates.
- Based on location & distance, trucking is the more efficient transportation alternative from the GTP to Morehead City.



# Other GTP Initiatives



## Findings

Pursue incremental approach to growing business at GTP through short-term initiatives and a longer-term effort to build market share.

## Recommended Actions

### ***Short-term Strategies***

- Aggressively market the GTP facility and property on a national and international basis.
- Align incentives of development organizations so that a business locating to GTP is a win for the region as a whole.
- Secure lease for operation of GTP rail spur.
- Continue to compete for a military fueling contract to yield additional revenues.
- Optimize leverage for state and federal grant funds through PPPs.
- GTP is functionally in a state of good repair. However, investment is needed to increase attractiveness for potential development opportunities.

# Other GTP Initiatives



## *Longer-term Strategies*

- Incrementally upgrade US 70 to interstate standards as proposed in Governor McCrory's 25-Year Vision. This would make the GTP more attractive to industries looking to locate in North Carolina.
- Continue to market GTP for long-term opportunities using existing facility: aircraft refurbishment; additional aircraft manufacturing; advanced manufacturing; and agricultural research.
- Initiate planning for a CSXT spur from the GTP. Advance ROW acquisition would enable track to be installed quickly once a user was identified.
- Initiate an environmental/planning/design for Section C of the Harvey Parkway from NC 58 to NC 11.



# Rail and Highway – Port of Morehead City



## Context

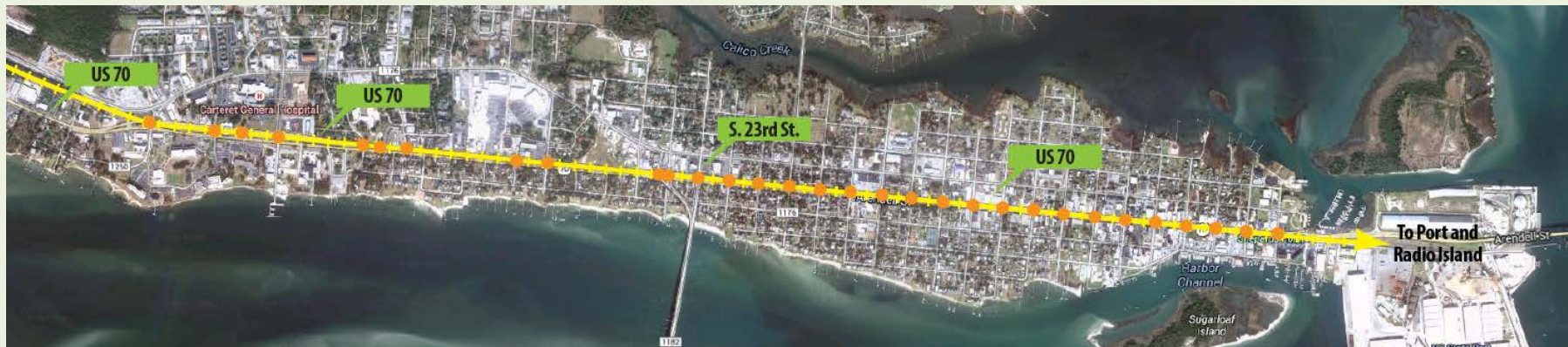
- Natural deep water terminal, located four miles from the Atlantic shipping channel.
- Norfolk Southern has exclusive lease of entire NCRR track, which does not allow for other operators to serve the port.
- Has been designated as strategic military installation.
- Focuses on breakbulk and project cargo, and some bulk cargo by barge.
- Infrastructure efficiently serves the needs of current volumes, yet expanded rail and highway capacity will be required to accommodate significant growth.
- Recent experience with new business opportunities like the wood pellet distribution facility highlighted the limitations of current rail capacity.
- North Carolina Railroad completed clearance evaluation in 2010-2011.

# Rail and Highway – Port of Morehead City



## Findings

- Infrastructure challenge is primarily due to rail and road traffic conflicts through the town.
- Constraints on business development include train velocity, efficient handling of unit trains and on-port storage/ facility tracks.
- There are rail vertical and horizontal clearance issues identified between the GTP and the Port. Since 2001, NCRR has improved the rail line and removed a number of horizontal and vertical obstructions.





# Rail and Highway – Port of Morehead City



## Recommended Actions

- Short term, pursue an advanced and coordinated traffic plan to reduce rail and truck Port traffic conflicts with vehicle and pedestrian traffic on US-70 through MHC.
- Consult with NCRR on ongoing engineering horizontal and vertical clearance review for the rail line between the GTP and Port of MHC. Identify and remove existing constriction to allow for movement of oversized loads.
- Implement on-Port loop track to build/break unit trains.

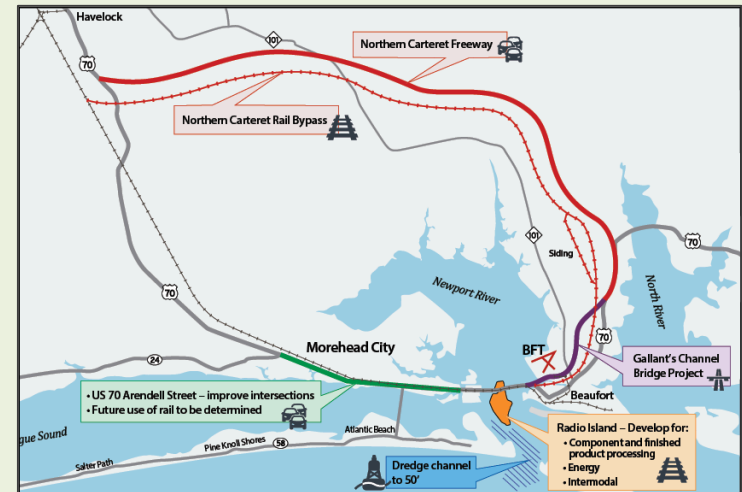


# Rail and Highway – Port of Morehead City

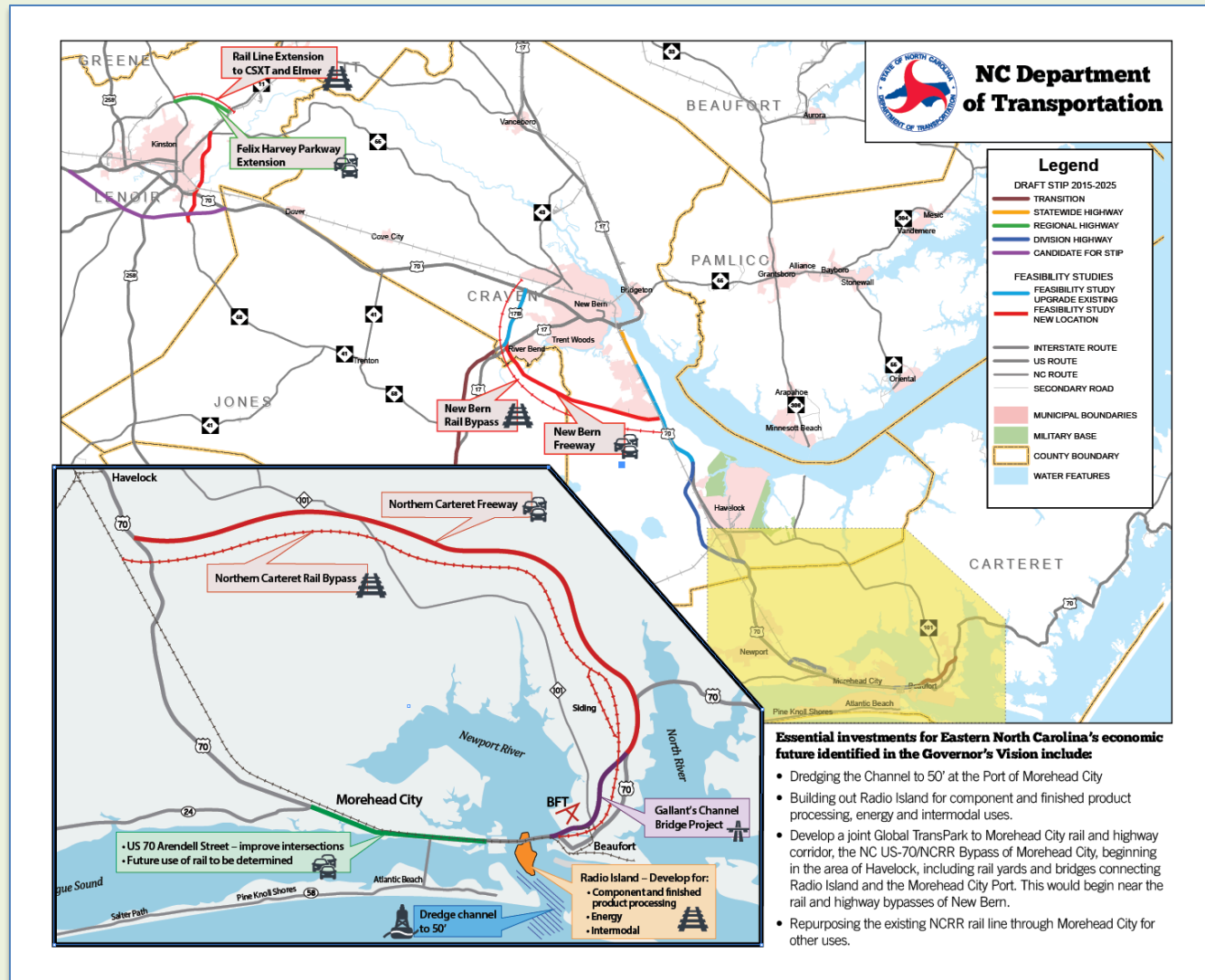


## Recommended Actions continued...

- Evaluate Radio Island future development including environmental challenges. Potential PPP concept economic opportunities include:
  - Component or finished product processing
  - Container terminal
  - Staging for energy projects
  - Any opportunity would have to be in tandem with dredging the channel
- Continue to evaluate a potential Northern Carteret Rail and Highway Bypass concept, and assess possible environmental challenges.
  - Better landside access to future expanding Port volumes
  - Improved highway and rail velocity through the area
- Increase sharing of information about Port operations and benefits with public and business communities.



# Rail and Highway – Morehead City Area



# Action Items

## Restoring Track Between Wallace and Castle Hayne

- Seek federal funding for the DoD-supported restoration of the rail line.
- Identify actions with CSXT that will lead to regular intermodal (rail) service to the Port of Wilmington.
- Pursue implementation of recommendations from the ongoing Wilmington Traffic Separation Study.
- Investigate the feasibility of a high-lift rail bridge across the Cape Fear River.

## GTP Initiatives

- Lease the GTP spur (owned by NCDOT) to a private rail operator.
- Aggressively market the GTP on a national and international basis.
- Initiate an environmental/planning/design for Section C of the Harvey Parkway from NC 58 to NC 11.
- Conduct the analysis for a CSXT spur from the GTP to railroad point “Elmer” in Kinston.



# Action Items

## **Rail and Highway Improvements that Benefit the Port of Morehead City**

- Pursue “Super Street”-style advanced/coordinated traffic plan on US-70 Arendell Street.
- Evaluate PPP opportunities for Radio Island for future development opportunities including component or finished product processing, container terminal and/or staging for energy projects.
- Evaluate a potential Northern Carteret Rail and Highway Bypass.
- Share Ports benefits with public.

## **Statewide Coordination of Economic Development Pursuits**

- Create the Secretary of Transportation’s Freight Intermodal Advisory Council

# Statewide Coordination of Economic Development Pursuits



## Context

- Development of this study identified an ongoing need to plan and interact across multiple agencies and stakeholders.

## Recommended Actions

- Create the **Secretary of Transportation's Freight Intermodal Advisory Council**
  - Include representatives from Transportation, Agriculture, Commerce, GTP, State Ports Authority.
  - Private entities with State interest will be invited to join the Council, such as the North Carolina Railroad Company.
- Support the Governor's 25-Year Vision to leverage strategic infrastructure investments to foster regional and state economic growth and create jobs.
- **Continued dialogue between state partners Agriculture and Consumer Service, Commerce and NCDOT, Ports and NCRR increases opportunities for job creation and product export.**





Thank You

