

Item 5: Isolated Wetland Application

CRAA: Intermodal Campus South

Antidegradation Analysis

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Section 1: Antidegradation Analysis

1.1 Project Description:

1.1.1 Project History

As one of the world's only cargo-dedicated airports, Rickenbacker International Airport offers an uncongested option to move air cargo to, from and within the United States. The airport is a critical logistics component of Rickenbacker Inland Port and offers the following benefits:

- Over 200,000 square feet (18,581 square meters) of air cargo facility space
- 130 acres (52 hectares) of uncongested cargo ramp with a hydrant fueling system
- Two parallel 12,000-foot (3,660 meters) runways
- Category II Instrument Landing System for all-weather landing capabilities
- FedEx Air, FedEx Ground and UPS regional hubs located on-site
- International freighter service is provided by Cargolux, Kalitta, Atlas, Cathay Pacific, Emirates SkyCargo, and others
- Extensive end-of-runway development opportunities
- U.S. Customs and Border Protection on-site
- Access to the Norfolk-Southern Intermodal Terminal
- Open every day, all day

As one of the world's few cargo-dedicated airports, Rickenbacker International Airport offers a faster, more reliable option to move air cargo to, from and within the United States. With regularly scheduled international service, businesses enjoy access to the airlines' worldwide networks directly through hubs in Asia, Europe and the Middle East. The airport is a critical logistics component of Rickenbacker Inland Port, which also includes an intermodal terminal, industrial development, Foreign-Trade Zone #138 and much more. The inland port is recognized for its strategic location, which is within a 10-hour truck drive to 47 percent of the U.S. population, 44 percent of the manufacturing capacity and 48 percent of U.S. headquarter operations. Commercial development on and around the former airbase was anticipated in the 1995 Final Environmental Impact Statement (FEIS) for transfer of the base from the military to the Rickenbacker Port Authority (which later merged with the Columbus Municipal Airport Authority to form the Columbus Regional Airport Authority). This development was expected, is consistent with regional economic goals and is necessary for the continued operations and financial health of the Rickenbacker International Airport.

The need for the development of Intermodal Campus South is to accommodate the demand for commercial/industrial facilities that is currently being turned away within the Columbus Region due to the lack of available property with Intermodal Terminal access. Intermodal transport is one of the fastest growing methods of transporting freight in the United States. It consists of the movement of entire truck trailers and shipping containers by both highway and rail, taking advantage of the economic and environmental efficiencies

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of trains for long haul movement combined with the speed and reach of trucks for local pickup and delivery. Access to intermodal facilities that can facilitate the transfer of containers between rail and truck is a benefit to commercial/industrial development.

The proposed development of the Intermodal Campus South adjacent to the Norfolk Southern Intermodal Terminal is expected to provide new capacity for receiving, distributing, and organization of freight today and into the future. The Norfolk Southern Rickenbacker Intermodal Terminal, which is capable of handling more than 400,000 containers annually, is located in the heart of the Rickenbacker Inland Port. Norfolk Southern operates the most extensive intermodal network in the eastern United States and is also a major transporter of coal and industrial products. Covering approximately 21,000 route miles in 22 states and the District of Columbia, Norfolk Southern serves every major container port in the eastern United States and provides efficient connections to other rail carriers.

The Intermodal Campus South site is located on property owned by the Columbus Regional Airport Authority immediately to the east and north of the Norfolk Southern Rickenbacker Intermodal Terminal. The Intermodal Campus South site is located on the south end of Rickenbacker Parkway, which provides roadway access to the campus from the Intermodal Terminal and other nearby facilities. Development of the Intermodal Campus South near the Rickenbacker International Airport, as proposed, will allow continued and unique economic growth in the area, provide employment, and provide an economic benefit to the region.

1.1.2 Project Description

The Intermodal Campus South is located south of the Rickenbacker International Airport in Harrison and Madison Townships, Pickaway County, Ohio. The campus is situated in two areas: the proposed development will occur directly east of the Norfolk Southern Intermodal Facility while the area north of the Intermodal Facility will be preserved, see Item 6: Figure 9. The project consists of constructing bulk distribution warehouses and the necessary infrastructure and parking. This will be accomplished by constructing bulk distribution warehouses ranging in size from approximately 365,000 to 1,100,000 square feet, for a total of approximately 3,859,882 square feet, that will contain areas for management, organization, shipping and receiving freight. The proposed project will accommodate the demand for economic development in the area. Due to the location of the proposed construction of the Intermodal Campus South, there are few options in terms of avoiding the potential wetland impacts that meet the need for bulk distribution warehouse space and the necessary infrastructure with direct access to the Intermodal Terminal.

A total of eleven isolated wetlands and one pond occur on the Intermodal Campus South property. Within the portion of the Intermodal Campus South that is east of the Intermodal Facility, 9 wetlands and one pond will be impacted all or in part. Two wetlands are located

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in the triangular shaped area north of the Norfolk Southern Intermodal Terminal; however, no impacts will occur to wetlands E and G, see Item 6: Figure 4.

The following is a discussion of the feasible alternatives considered for the proposed project as they relate to the Individual Isolated Wetland Permit Application. The alternatives identified and described below have been considered during the project design phases. Previous and ongoing coordination has been conducted with the Ohio Environmental Protection Agency (Division of Surface Water), the Ohio Department of Natural Resources (Division of Wildlife and Division of Natural Areas and Preserves), U.S. Fish and Wildlife Service, Natural Resources Conservation Service (Pickaway County), and the U.S. Army Corps of Engineers. Letters from agencies that responded are included, see Item 4: Agency Coordination. The comments provided by the agencies, as well as a combination of issues including the project's purpose and need, proximity to the Norfolk Southern Intermodal Terminal, cost, and social constraints were considered in choosing the Preferred Alternative.

The purpose of the proposed project is to provide needed bulk distribution warehouse space in the Columbus area with direct and convenient access to the existing Intermodal Terminal. Such development would help achieve the economic goals of the region by providing jobs and tax revenue. The location takes advantage of the proximity to the Intermodal Terminal, Rickenbacker International Airport, and other infrastructure investments that have been funded through state and local government. The development is intended to attract tenants with these specific site location requirements. Such a development would be expected to create approximately 1,700 to 2,000 jobs. The proposed development would meet the economic development needs by attracting users with these unique site characteristics. Because there is no other site in the Columbus region with direct access to an Intermodal Terminal and a large cargo airport, potential development opportunities would be lost without the proposed project.

Construction has begun on the BASF distribution warehouse, located on the northwest corner of the portion of the site directly east of the Norfolk Southern Intermodal Terminal. This area is devoid of any aquatic resources and precautions have been put in place to prevent disturbance of the remainder of the site by construction activities; specifically orange construction fencing has been installed demarking wetlands near the construction area.

1.1.3 Existing Conditions

The Norfolk Southern Intermodal Terminal (NSIT) is located directly east of the project development area and Thoroughbred Drive. The NSIT utilizes a combination of transportation modes (rail and truck) in the transfer of truck trailers and shipping containers. The NSIT facilitates the movement of entire truck trailers and shipping containers by both highway and rail, taking advantage of the economic and environmental efficiencies of trains for long haul movement, and the speed and reach of trucks for local pick-up and delivery. The intermodal facility reduces long-haul truck trips across Ohio's highways and allows area companies

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and consumers to benefit directly from intermodal transportation. In effect, the intermodal facility along with the Intermodal Campus South will reduce highway congestion and extend the useful life of Ohio's roadways. An added benefit of the intermodal project will be the conversion of underutilized land with little or no development potential into property that will generate jobs, taxes and revenues.

The 341 acre Intermodal Campus South project area is comprised of approximately 230 acres of active agriculture that has been planted in soybeans this year. The remainder of the site is comprised of 11 wetlands ranging in size from 0.01 to 8.23 acres; totaling 17.37 acres. Approximately 15.76 acres of these wetlands are wooded and 1.61 acres are located in the agricultural areas. Additionally, approximately, 84 acres of forested habitat and 27 acres of uplands exist in the project area. The forested habitats are primarily located within the wetlands boundaries and along the fence rows; see Item 6: Figure 8- Wooded Areas.

The USACE issued a Jurisdictional Determination (June 2007) and the Ohio EPA issued a Section 401 Water Quality Certification and an Ohio Isolated Wetland Permit (June 12, 2007 No. 062618). In the 9 years since those permits were issued, clearing and grubbing activities took place associated with the permits; the existing wetlands have expanded in size; and the vegetation, especially the trees, have become re-established. The wetland descriptions including the vegetation, soils and hydrological regime are detailed in the Wetland Delineation Report, see Item 3: Wetland Delineation Report for the CRAA Intermodal Campus South (TranSystems, 2015). On November 20, 2015 the USACE issued a new Jurisdictional Determination based on the field review of September 22, 2015.

As mentioned earlier, construction has begun on the BASF Building in areas which are not wetlands, a 421,702 square foot bulk distribution warehouse, located on the northwest corner of the portion of the site directly east of the Norfolk Southern Intermodal Terminal. This construction area is devoid of any aquatic resources and precautions have been put in place to limit access to the remainder of the site by construction activities; specifically orange construction fencing has been installed demarking the construction area. No wetlands, other aquatic resources or trees have been or will be impacted by the construction of this BASF Building.

1.1.4 Preferred Alternative (PA)

The PA consists of constructing a total of five bulk distribution warehouses (not including the BASF distribution warehouse) and the necessary infrastructure to support these warehouses within the Intermodal Campus South project area that provides direct and convenient access to the Intermodal Terminal. Construction of the bulk distribution warehouses will consist of buildings that are approximately 365,000 to 1,100,000 square feet in size for a total of approximately 3,438,180 square feet. Each building will have approximately 36 feet in clear height to maximize the ability of racking for the products that will be moving in and out of the warehouses. The buildings will be approximately 450 feet to 520 feet deep and contain docks on two sides of the building. Shipping will likely

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occur on one side of the building and receiving will occur on the other. Each warehouse will contain an office area that will be located at one end of the building and will be approximately 5,000 to 25,000 square feet in size. The parking of trailers at the Intermodal Campus South will occur at the rate of 1/2 space to 1 space per 1,000 square feet. The infrastructure needed to support the bulk distribution warehouses will include storm drainage, sanitary sewers, and points of access from the road to the warehouses.

The PA will preserve Wetlands E and G, totaling 3.90 acres. The PA will impact 9 wetlands comprising approximately 13.48 acres (2-ORAM Category 2 wetlands totaling 11.68 acres & 7 ORAM Category 1 wetlands totaling 1.75 acres) and one pond (0.19 acres). These impacts will occur through clearing and grubbing the area along with placing approximately 8,000 cubic yards of clean earthen fill within the wetlands and pond. See Item 6: Figure 5 - Preferred Alternative which shows the Preferred Alternative and wetland names. Impact amounts are located in Table 1.

Table 1. Preferred Alternative; Summary of Wetlands and Wetlands/Ponds within the Study Area

Wetland Identifier	ORAM Score	Anti-degradation Category	Size (acres)	Survey Date	Wetland Photo Log Number	Preferred Alternative Impacts
Wetland H	26	1	0.13	8/3/15	7	0.13
Wetland K	45	2	8.23	8/3/15	9	8.23
Wetland I	42.5	2	3.46	8/3/15	3	3.46
Wetland J	26	1	0.05	8/3/15	4	0.05
Wetland E	39	2	3.39	8/3/15	10, 11	None
Wetland G	29	1	0.50	8/3/15	12, 13	None
Wetland CV	11	Provisional 1	0.01	8/3/15	8	0.01
Wetland CW	22	Provisional 1	0.42	8/3/15	6	0.42
Wetland CX	16	Provisional 1	0.57	8/3/15	1	0.57
Wetland CY	16	Provisional 1	0.57	8/3/15	2	0.57
Wetland CZ	16	Provisional 1	0.04	8/3/15	5	0.04
Pond 1	NA	NA	0.19	8/3/15	15	0.19
Total Impacts:				Wetlands = 13.48 acres Pond = 0.19 acres		

Provisional wetlands have not been verified by the Ohio EPA

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The proposed project will accommodate business that is currently being turned away due to lack of available facilities. The proposed project will meet the purpose and need of providing bulk distribution warehouse space for tenants seeking facilities in close proximity to the Intermodal Terminal, which will in turn help meet the economic and job creation goals of the Columbus region. The close proximity to the Intermodal Terminal is essential to the success of the development because it provides tenants with efficient access to the rail system. This in turn increases efficiency, reduces costs, and reduces trips by delivery trucks. This efficiency and cost and time savings are essential to the success of the business plans of prospective tenants.

1.1.5 Minimal Degradation Alternative (MDA)

The MDA consists of constructing five bulk distribution warehouses and the necessary infrastructure to support these warehouses within the Intermodal Campus South project area. Construction of the bulk distribution warehouses will consist of buildings that are 365,000 to 1,100,000 square feet in size for a total of approximately 3,161,160 square feet, see Item 6: Figure 6. Each building will have approximately 36 feet in clear height to maximize the ability of racking for the products that will be moving in and out of the warehouses. The buildings will be approximately 450 feet to 520 feet deep and contain docks on two sides of the building. Shipping will likely occur on one side of the building and receiving will occur on the other. Each warehouse will contain an office area that will be located at one end of the building and will be approximately 5,000 to 25,000 square feet in size. The parking of trailers at the Intermodal Campus South will occur at the rate of 1/2 space to 1 space per 1,000 square feet. The infrastructure needed to support the bulk distribution warehouses will include storm drainage, sanitary sewers, and points of access from the road to the warehouses. Property to the west of Ashville Pike was excluded from consideration because it does not provide enough room between Ashville Pike and the Intermodal Terminal for the required building sizes.

The MDA differs from the PA by reducing the size of the easternmost proposed distribution warehouse, thus minimizing impacts to wetlands. The MDA was identified to reduce impacts to wetlands by reducing the overall footprint of the development as compared to the Preferred Alternative. For the MDA, the development was modified by reducing the size of the proposed building in the southeast corner of the Intermodal Campus, which is the site farthest from the Intermodal Terminal and contains two wetland areas.

Future Building #1,108 will be redesigned and reduced in size by 277,020 square feet. Under this alternative, this building would be re-designated Building #831. Additionally the surrounding infrastructure supporting Building #831, specifically the parking lots, drives, truck unloading bays, utilities and the stormwater detention ponds, will be reconfigured. The redesign of Building #831 will allow the avoidance of impacts to Wetlands I and Wetland J.

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Wetland I, a 3.455 acre ORAM Category 2 forested wetland, is located in the south eastern part of the project area. As described in the Wetland Delineation Report (Transystems, August 2015) the dominant vegetation of Wetland I is green ash (*Fraxinus pennsylvanica*-FACW). This wetland has a probable hydrologic regime of seasonally inundated or saturated (>12.5% - 25% of the growing season) (Environmental Laboratories, 1987). The *Soil Survey of Pickaway County* maps the soils within this area as Celina silt loam (ClB), which is listed as non-hydric with hydric inclusions; and Crosby silt loam (CrA), which is listed as non-hydric with hydric inclusions (Soil Conservation Service, 1980b and 1990).

Wetland J, is 0.047 acre, ORAM Category 1 forested wetland, located in the south eastern part of the project area. The dominant vegetation in Wetland J is box elder (*Acer negundo* - FAC+). Wetland J has a probable hydrologic regime of seasonally inundated or saturated (>12.5% - 25% of the growing season) (Environmental Laboratories, 1987). The Soil Survey of Pickaway County maps the soil within this area as Celina silt loam (ClB), which is listed as non-hydric with hydric inclusions (Soil Conservation Service, 1980b and 1990)

Table 2. Minimal Degradation Alternative; Summary of Wetlands and Wetlands/Ponds within the Study Area

Wetland Identifier	ORAM Score	Antidegradation Category	Size (acres)	Survey Date	Wetland Photo Log Number	NDA Alternative Impacts
Wetland H	26	1	0.13	8/3/15	7	0.13
Wetland K	45	2	8.23	8/3/15	9	8.23
Wetland I	42.5	2	3.46	8/3/15	3	0
Wetland J	26	1	0.05	8/3/15	4	0
Wetland E	39	2	3.39	8/3/15	10, 11	0
Wetland G	29	1	0.50	8/3/15	12, 13	0
Wetland CV	11	Provisional 1	0.01	8/3/15	8	0.01
Wetland CW	22	Provisional 1	0.42	8/3/15	6	0.42
Wetland CX	16	Provisional 1	0.57	8/3/15	1	0.57
Wetland CY	16	Provisional 1	0.57	8/3/15	2	0.57
Wetland CZ	16	Provisional 1	0.04	8/3/15	5	0.04
Pond 1	NA	NA	0.19	8/3/15	15	0.19
Total Impacts:			Wetlands = 9.97 acres Pond = 0.19 acres			

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Due to the reduced size of warehouse capacity the Minimal Degradation Alternative will accommodate less business opportunity and economic development potential than the PA. It is estimated that the reduction in size of the development would result in approximately 130 to 150 less jobs created as compared to the PA. Additionally, the MDA would not take full advantage of the investments made in the Intermodal Terminal and other infrastructure and facilities surrounding the Intermodal Campus South site. The site is accessible from I-270, I-71, I-70, US 23 and US 33 and roadway connections have been expanded in this area, including Rickenbacker Parkway, which was widened to provide four vehicle lanes with access to I-270 via the four-lane Alum Creek Drive.

1.1.6 Non-Degradation Alternative (NDA)

Construction has begun on the BASF distribution warehouse, located on the northwest corner of the portion of the site directly east of the Norfolk Southern Intermodal Terminal. This area is devoid of any aquatic resources and precautions have been put in place to prevent disturbance of the remainder of the site by construction activities; specifically orange construction fencing has been installed demarking wetlands near the construction area.

Due to the location and configuration of the wetlands and the design criteria for the Intermodal Campus South, which would require direct access to the Norfolk Southern Intermodal Terminal, the proposed project cannot be completed without impacts to the wetlands and pond. The proposed warehouses must be sized to accommodate the operational needs of the tenants and must have ample surrounding pavement to allow truck access. As a result of these size and space requirements, the development cannot be reconfigured to avoid all wetlands. A review of available property shows that there are no other sites with direct access to the Intermodal Terminal that can accommodate the demand for warehousing facilities within a campus-like development with shared infrastructure. Therefore, the "No-Build" alternative is presented as the Non-Degradation Alternative. As the name implies, this alternative involves not constructing the five remaining distribution warehouses at the proposed Intermodal Campus South. While no impacts to the aquatic resources would occur, the "No-Build" alternative does not meet the project purpose and need.

1.2 Avoidance

1.2.1 Preferred Alternative (PA)

Due to the location of the Norfolk Southern Intermodal Terminal, the proposed construction of the Preferred Alternative for the Intermodal Campus South is limited and has few options in terms of avoiding the proposed isolated wetland impacts that will meet the purpose and need. The location of the Intermodal Campus South provides ready access to Rickenbacker Airport, generally and specifically to the existing Intermodal

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Terminal. This provides potential tenants with access to multiple transportation options, including direct access to rail transit which increases efficiency, reduces costs, and reduces truck trips and delivery times. The project purpose and need consists of constructing bulk distribution warehouses and the necessary infrastructure with direct access to the Norfolk Southern Intermodal Terminal thus providing economic development to the area. This will be accomplished by constructing five bulk distribution warehouses ranging in size from approximately 365,000 to 1,100,000 square feet that will contain areas for management, organization, shipping and receiving freight. As seen in Item 6: Figure 5, the spatial requirements of the proposed warehouses and surrounding pavement are expansive and cover nearly the entire site. Due to the needs of tenants, the buildings must be designed for efficient shipping and receiving, with truck access on both sides of each building. The proposed project will accommodate business that is currently being turned away or would be turned away due to lack of available capacity.

Wetland impacts will occur within the portion of the Intermodal Campus South that is east of the Intermodal Facility and south of Rickenbacker Parkway East; however, no impacts will occur in the portion north of the Intermodal Facility (Wetlands E and G), see Item 6: Figure 5.

1.2.2 Minimal Degradation Alternative (MDA)

Logistical considerations of the MDA make the avoidance of impacts to all the aquatic resources existing on the site impossible. The location of the Intermodal Campus South provides ready access to Rickenbacker International Airport and the existing Norfolk Southern Intermodal Terminal. This increases efficiency for tenants with specific transit needs and reduces overall costs and delivery times. The project purpose and need consists of providing bulk distribution warehouses with direct access to the Intermodal Terminal and the necessary infrastructure to meet the demand for economic development to the area. This will be accomplished by constructing five bulk distribution warehouses ranging in size from approximately 365,000 to 1,100,000 square feet that will contain areas for management, organization, shipping and receiving freight.

The primary difference between the PA and the MDA is the avoidance of impacts to Wetlands I and J through the redesign of Future Proposed Building #831 and the surrounding, supporting infrastructure. This reconfiguration of Building #831 will avoid impacts to Wetlands I and J, a total of 3.51 acres.

1.2.3 Non-Degradation Alternative (NDA)

Construction has begun on the BASF distribution warehouse, located on the northwest corner of the portion of the site directly east of the Norfolk Southern Intermodal Terminal. This area is devoid of any aquatic resources and precautions have been put in place to prevent disturbance of the remainder of the site by construction activities; specifically orange construction fencing has been installed demarking wetlands near the construction area.

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Due to the location and configuration of the isolated wetlands and the design criteria for the Intermodal Campus South, the proposed project cannot be completed by avoiding impacts to the existing wetlands and pond. Therefore, the "No-Build" alternative is presented as the Non-Degradation Alternative. As the name implies, this alternative involves not constructing the five remaining distribution warehouses at the proposed Intermodal Campus South that will impact aquatic resources, see Item 6: Figures 5 and 6. While no impacts to the aquatic resources would occur, the "No-Build" alternative does not meet the project purpose and need.

1.3 Minimization

1.3.1 Preferred Alternative (PA)

To provide adequate infrastructure and warehouse space to accommodate the existing and future demand for distribution warehouse facilities with airport and intermodal access, the Intermodal Campus South site is being developed to maximize the utility of this intermodal shipping hub and provide economic development to the region. To provide the necessary warehouse space and the ancillary infrastructure, a total of six distribution warehouses, including the BASF distribution warehouse presently under construction, will be developed.

Minimization of impacts to aquatic resources will consist of minimizing impacts to wetlands through the avoidance of impacts to wetlands E and G; impacts to the remainder of the wetlands and the pond located on the Intermodal Campus South site cannot be avoided and compensatory mitigation will be provided.

1.3.2 Minimal Degradation Alternative (MDA)

To further minimize impacts to wetlands, as opposed to the PA, on the Intermodal Campus South site the MDA proposes to reduce the footprint of Future Building #831, the most eastern warehouse, by 277,020 square feet. Additionally, the supporting infrastructure surrounding Building #831 will be reconfigured to minimize overall wetland impacts by 3.502 acres, when compared to the PA.

1.3.3 Non-Degradation Alternative (NDA)

Construction has begun on the BASF distribution warehouse, located on the northwest corner of the portion of the site directly east of the Norfolk Southern Intermodal Terminal. This area is devoid of any aquatic resources and precautions have been put in place to prevent disturbance of the remainder of the site by construction activities; specifically orange construction fencing has been installed demarking wetlands near the construction area.

Due to the location and configuration of the wetlands and the design criteria for the Intermodal Campus South, the proposed project cannot be completed by avoiding impacts to the existing wetlands and pond. Therefore, the "No-Build" alternative is presented as

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the Non-Degradation Alternative. As the name implies, this alternative involves not constructing the five remaining distribution warehouses at the proposed Intermodal Campus South that will impact aquatic resources, see Item 6: Figures 5 and 6. While no impacts to the resources would occur, the "No-Build" alternative does not meet the project purpose and need.

1.4 Magnitude of the Lowering of Water Quality

1.4.1 Preferred Alternative (PA)

This project impacts acreage located within two 12 digit Hydrologic Unit Codes (HUC); Big Run/Walnut Creek (050600011805) and Mud Run/Walnut Creek (050600011806), both within the Scioto River Watershed. The PA will require work throughout the area of the site east of the Norfolk Southern Intermodal Terminal. A total of nine wetlands, consisting of 13.48 acres (two are ORAM Category 2 wetlands and seven are ORAM Category 1 wetlands) would be impacted by the proposed development of a total of five distribution warehouses and the adjacent infrastructure, see Item 6: Figure 5.

Potential impacts from erosion and sedimentation will be minor in comparison to the proposed development; however, the use of best management practices (BMPs) will be utilized in accordance with the Ohio EPA General Permit Authorization for Storm Water Discharges Associated with Construction activity under the National Pollutant Discharge Elimination System.

Field investigations were completed using the 1987 Corps of Engineers Wetland Delineation Manual (Environmental Laboratory, 1987) and the Interim Regional Supplement to the Corps of Engineers Wetlands Delineation Manual: Midwest Region (USACE 2010). Wetlands were identified based on the presence of the following three criteria: occurrence of hydric soils, wetland hydrology, and greater than 50% hydrophytic vegetation. An area must meet all three criteria to be considered a wetland.

To assess the function and quality of all wetlands within the subject property, the Ohio Rapid Assessment Method for Wetlands (ORAM version 5.0) promulgated by the Ohio Environmental Protection Agency, was utilized (Mack, 2001). Ohio EPA has developed a method for the categorization of wetlands based on the quantification of certain criteria, which imposes differing levels of regulation. Those wetland categories are defined as 1, 2, and 3 and correspond to wetlands of low, medium, and high "quality" as per the ORAM version 5.0. Following Ohio EPA guidance, scoring sheets for individual wetlands within the study area were completed by detailed field observations and were used as the basis for provisional wetland categorizations.

The findings of the field review were documented in the Wetland Delineation Report for the Columbus Regional Airport Authority Intermodal Campus South (August 2015), included in Item 3.

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Each individual wetland is described in detail below according to the habitat type, including dominant species in each wetland by common name, scientific name, and indicator status (Reed, 1988) along with the probable hydrologic regime, mapped soil type, jurisdictional determination, provisional category and total wetland acreage. All identified wetlands were found to consist of one of the following wetland habitat types or a complex of one or more of the following per the classification system developed by Cowardin *et al.* (1979) for wetland categorization:

Palustrine Emergent (PEM) Wetland Habitat is characterized by erect, rooted herbaceous hydrophytes, excluding mosses and lichens and includes a vast array of grass like plants, true grasses, and broad leaved plants (Cowardin, *et al.*, 1979).

Palustrine Forested (PFO) Wetland Habitat is characterized by woody vegetation that is six meters tall or taller and normally possesses an over story of trees, an understory of young trees or shrubs, and a herbaceous layer (Cowardin, *et al.*, 1979).

Palustrine Scrub-Shrub (PSS) Wetland Habitat is characterized by woody vegetation less than six meters tall. The species composition includes true shrubs, young trees, and trees or shrubs that are small or stunted due to environmental conditions (Cowardin, *et al.* 1979).

PEM/PFO, PEM/PSS, and PSS/PFO; etc. Wetland Complexes were found to consist of an assemblage of two or more of the above-mentioned wetland habitat types.

Wetland H is a PFO wetland located between an agricultural field and an abandoned trailer park in the east central portion of the study area. The dominant vegetation of Wetland H is silver maple (*Acer saccharinum*-FACW). This wetland has a probable hydrologic regime of seasonally inundated or saturated (>12.5% - 25% of the growing season) (Environmental Laboratories, 1987). The *Soil Survey of Pickaway County* maps the soil within this area as Kokomo silty clay loam (Ko) which is listed as hydric soil (Soil Conservation Service, 1980b and 1990). According to the latest version of the ORAM, these wetlands scored a 26 due to recent disturbances (farming) and narrow buffers, which makes this a Category 1 wetland (Mack, 2001). In total extent, this wetland is 0.13 acre within the study area (Photo 7).

Wetland K is a PSS/PFO wetland complex located in a woodlot in the west central portion of the study area. The forested portion of Wetland K is dominated by box elder (*Acer negundo*-FAC) whereas the scrub-shrub portion is dominated by northern spicebush (*Lindera benzoin*-FACW). This wetland has a probable hydrologic regime of seasonally inundated or saturated (>12.5% - 25% of the growing season) (Environmental Laboratories, 1987). The *Soil Survey of Pickaway County* maps the soils within this area as Kokomo silty clay loam (Ko), which is listed as hydric; and Crosby silt loam (CrA), which is listed as non-hydric with hydric inclusions (Soil Conservation Service, 1980b and 1990). According to the latest version of the ORAM, Wetland K scored a 45 due to recent disturbances (farming) and narrow buffers, which makes this a “modified” Category 2

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wetland (Mack, 2001). In total extent, this wetland is 8.23 acres within the project area (Photo 9). This wetland coincides with the PFO wetland identified on the NWI map south of the airport runway and north of Airbase Road.

Wetland I is a PFO wetland located in a woodlot in the east central portion of the study area. The dominant vegetation of Wetland I is green ash (*Fraxinus pennsylvanica*-FACW). This wetland has a probable hydrologic regime of seasonally inundated or saturated (>12.5% - 25% of the growing season) (Environmental Laboratories, 1987). The *Soil Survey of Pickaway County* maps the soils within this area as Celina silt loam (ClB), which is listed as non-hydric with hydric inclusions; and Crosby silt loam (CrA), which is listed as non-hydric with hydric inclusions (Soil Conservation Service, 1980b and 1990). According to the latest version of the ORAM, Wetland I scored a 42.5 due to previous disturbances (filling) and narrow buffers, which makes this a “modified” Category 2 wetland (Mack, 2001). Wetland I is 3.46 acres within the project area (Photo 3).

Wetland J is a PFO wetland located in the corner of a woodlot adjacent to an agricultural field in the east central portion of the study area. The dominant vegetation of Wetland J is box elder (*Acer negundo*-FAC+). This wetland has a probable hydrologic regime of seasonally inundated or saturated (>12.5% - 25% of the growing season) (Environmental Laboratories, 1987). The *Soil Survey of Pickaway County* maps the soil within this area as Celina silt loam (ClB), which is listed as non-hydric with hydric inclusions (Soil Conservation Service, 1980b and 1990). According to the latest version of the ORAM, Wetland J scored a 26 due to its small size, high intensity of surrounding land use and narrow buffers, which makes this a Category 1 wetland (Mack, 2001). In total extent, this wetland is 0.05 acre within the study area (Photo 4).

Wetland E is a PFO wetland located in the west edge of the study area in a woodlot adjacent to Ashville Pike and the Norfolk-Southern Railroad tracks. The dominant vegetation of Wetland E is green ash (*Fraxinus pennsylvanica*-FACW). This wetland has a probable hydrologic regime of seasonally inundated or saturated (>12.5% - 25% of the growing season) (Environmental Laboratories, 1987). The *Soil Survey of Pickaway County* maps the soils within this area as Crosby silt loam (CrA) and Westland silty clay loam (Ws), which are listed as non-hydric with hydric inclusions for Pickaway County (Soil Conservation Service, 1980b and 1990). According to the latest version of the ORAM, this wetland scored a 39 due to its relative size, high intensity of surrounding land use and narrow buffers, which makes this a Category 2 wetland (Mack, 2001). This wetland was determined to be isolated as noted in the USACE jurisdictional determination letter of November 20, 2015, see Item 6: USACE Approved Jurisdictional Determination. In total extent, this wetland is 3.39 acres within the study area and will be unaffected by the proposed project development (Photos 10 and 11).

Wetland G is a PEM/PFO/PSS wetland located in the west edge of the study area adjacent to Wetland CD and to the north of Ashville Pike. The dominant vegetation of Wetland G is eastern cottonwood (*Populus deltoides*-FAC) and swamp rose (*Rosa palustris*-OBL). This

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wetland has a probable hydrologic regime of seasonally inundated or saturated (>12.5% - 25% of the growing season) (Environmental Laboratories, 1987). The Soil Survey of Pickaway County maps the soil within this area as Crosby silt loam (CrA), which is listed as non-hydric with hydric inclusions for Pickaway County (Soil Conservation Service, 1980b and 1990). According to the latest version of the ORAM, this wetland scored a 29 due to its relative size, high intensity of surrounding land use and narrow buffers, which makes this a Category 1 wetland (Mack, 2001). This wetland was determined to be isolated as noted in the USACE jurisdictional determination letter of November 20, 2015. In total extent, this wetland is 0.50 acres within the study area and will be unaffected by the proposed project development (Photos 12 and 13).

Wetland CV is a PEM/PSS wetland located in the eastern portion of the study area and to the east of the former Lockbourne Eastern Road within a wooded peninsula of the agricultural field. The dominant vegetation of Wetland CV is eastern cottonwood (*Populus deltoides*-FAC). This wetland has a probable hydrologic regime of seasonally inundated or saturated (>12.5% - 25% of the growing season) (Environmental Laboratories, 1987). The *Soil Survey of Pickaway County* maps the soil within this area as Crosby silt loam (CrA), which is listed as non-hydric with hydric inclusions (Soil Conservation Service, 1980b and 1990). According to the latest version of the ORAM, this wetland scored an 11 due to its relative size, high intensity of surrounding land use and narrow buffers, which makes this a Category 1 wetland (Mack, 2001). This wetland was determined to be isolated as noted in the USACE jurisdictional determination letter of November 20, 2015. In total extent, this wetland is 0.01 acres within the study area (Photo 8).

Wetland CW is a PEM wetland located in the eastern portion of the study area and to the east of the former Lockbourne Eastern Road within the eastern agricultural field. The dominant vegetation of Wetland CW is yellow nutsedge (*Cyperus esculentus*-FACW). This wetland has a probable hydrologic regime of seasonally inundated or saturated (>12.5% - 25% of the growing season) (Environmental Laboratories, 1987). The *Soil Survey of Pickaway County* maps the soil within this area as Kokomo silty clay loam (Ko) which is listed as hydric soil (Soil Conservation Service, 1980b and 1990). According to the latest version of the ORAM, this wetland scored a 22 due to its relative size, high intensity of surrounding land use and narrow buffers, which makes this a Category 1 wetland (Mack, 2001). This wetland was determined to be isolated as noted in the USACE jurisdictional determination letter of November 20, 2015. In total extent, this wetland is 0.42 acres within the study area (Photo 6).

Wetland CX is a PEM wetland located in the eastern portion of the study area within the eastern agricultural field along the fence row of the former golf course. The dominant vegetation of Wetland CX is yellow nutsedge (*Cyperus esculentus*-FACW). This wetland has a probable hydrologic regime of seasonally inundated or saturated (>12.5% - 25% of the growing season) (Environmental Laboratories, 1987). The *Soil Survey of Pickaway County* maps the soil within this area as Crosby silt loam (CrA), which is listed as non-hydric with hydric inclusions (Soil Conservation Service, 1980b and 1990). According to the latest

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version of the ORAM, this wetland scored a 16 due to its relative size, high intensity of surrounding land use and narrow buffers, which makes this a Category 1 wetland (Mack, 2001). In total extent, this wetland is 0.57 acres within the study area (Photo 1). This wetland coincides with the PEMA wetland identified on the NWI map south of Rickenbacker Parkway East and the western golf course property line. This wetland was determined to be isolated as noted in the USACE jurisdictional determination letter of November 20, 2015.

Wetland CY is a PEM wetland located in the eastern portion of the study area within the eastern agricultural field along the fence row of the former golf course. The dominant vegetation of Wetland CY is yellow nutsedge (*Cyperus esculentus*-FACW). This wetland has a probable hydrologic regime of seasonally inundated or saturated (>12.5% - 25% of the growing season) (Environmental Laboratories, 1987). The *Soil Survey of Pickaway County* maps the soil within this area as Kokomo silty clay loam (Ko) which is listed as hydric soil (Soil Conservation Service, 1980b and 1990). According to the latest version of the ORAM, this wetland scored a 16 due to its relative size, high intensity of surrounding land use and narrow buffers, which makes this a Category 1 wetland (Mack, 2001). This wetland was determined to be isolated as noted in the USACE jurisdictional determination letter of November 20, 2015. In total extent, this wetland is 0.57 acres within the study area (Photo 2).

Wetland CZ is a PEM wetland located in the eastern portion of the study area within the eastern agricultural field along the fence row of the former golf course. The dominant vegetation of Wetland CZ is yellow nutsedge (*Cyperus esculentus*-FACW). This wetland has a probable hydrologic regime of seasonally inundated or saturated (>12.5% - 25% of the growing season) (Environmental Laboratories, 1987). The *Soil Survey of Pickaway County* maps the soil within this area as Kokomo silty clay loam (Ko) which is listed as hydric soil (Soil Conservation Service, 1980b and 1990). According to the latest version of the ORAM, this wetland scored a 13 due to its relative size, high intensity of surrounding land use and narrow buffers, which makes this a Category 1 wetland (Mack, 2001). This wetland was determined to be isolated as noted in the USACE jurisdictional determination letter of November 20, 2015. In total extent, this wetland is 0.04 acres within the study area (Photo 5).

In total there are 11 wetlands located on the Intermodal Campus South site. The total area of wetlands identified is 17.37 acres. The PA will impact nine wetlands H, I, J, K, CV, CW, CX, CY and CZ. Wetlands E and G will not be impacted by the proposed development.

One manmade pond (Pond 1) is located on the northwest corner of the woodlot. The pond contains approximately 8 feet of water (maximum) and is 0.19 acres. (Photo 15).

The filling of the affected wetlands will have a slight decrease of the available wetland habitat in the two watersheds (050600011806 and 050600011805). However, these impacts along with the filling of Pond 1 are not likely to have a significant impact on the overall watershed water quality or the overall water habitat availability within the

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watersheds. The impacts associated with this project have been coordinated with ODNR and the USFWS for their input. The USACE verified the non-jurisdictional wetland boundaries at the September 22, 2015 field review and provided the Approved Jurisdictional Determination on November 20, 2015. Copies of agency coordination are included in Item 4.

Wetland delineation forms and Ohio Rapid Assessment (ORAM) forms are included in the Aquatic Resource Delineation Report for the Columbus Regional Airport Authority Intermodal Campus South (TransSystems 2015) located in Item 3.

1.4.2 Minimal Degradation Alternative (MDA)

The MDA differs from the PA by reducing the size of the easternmost proposed distribution warehouse, thus minimizing impacts to wetlands. The MDA was identified to reduce impacts to wetlands by reducing the overall footprint of the development as compared to the Preferred Alternative. For the MDA, the development was modified by reducing the size of the proposed building in the southeast corner of the Intermodal Campus, which is the site farthest from the Intermodal Terminal and contains two wetland areas.

Future Building #1,108 will be redesigned and reduced in size by 277,020 square feet. Under this alternative, this building would be re-designated Building #831. Additionally the surrounding infrastructure supporting Building #831, specifically the parking lots, drives, truck unloading bays, utilities and the stormwater detention ponds, will be reconfigured. The redesign of Building #831 will allow the avoidance of impacts to Wetlands I and Wetland J.

1.4.3 Non-Degradation Alternative (NDA)

The NDA would have no biological or physical impacts to water quality related to construction activities.

1.5 Technical Feasibility and Cost Effectiveness

1.5.1 Preferred Alternative (PA)

The technology required to construct the PA is currently available and commonly used throughout the country. All structures and footprints have been developed to be technically feasible and available to construct. The PA meets the project purpose and need by proposing to construct the maximum amount of distribution warehouse space on the Intermodal Campus South site to accommodate the existing and future shipping traffic from the Norfolk Southern Intermodal Terminal. The PA is estimated to cost more than the MDA due to additional distribution warehouse and the proposed additional infrastructure. The PA proposed development of five distribution warehouses and the ancillary infrastructure is estimated at \$163,548,000, see Table 3.

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1.5.2 Minimal Degradation Alternative (MDA)

The MDA is technically feasible, available and reliable with no foreseen operational difficulties. The MDA differs from the PA by proposing to minimize impacts to Wetland I and J. The MDA, although technically feasible, will not meet the intended purpose and need to provide adequate warehouse space to accommodate the long range shipping needs of the Norfolk Southern Intermodal Terminal. The estimated cost to develop the MDA equals \$155,184,750, see table 3.

Table 3: Estimate of Each Alternative’s Cost to Build*

	Preferred Alternative	Minimal Degradation Alternative
Land Acquisition	\$31,771,500	\$31,771,500
Construction of Distribution Warehouses	\$116,820,000	\$110,850,000
Administration, Design, Marketing, and Other Associated Costs	\$8,938,500	\$7,767,800
Infrastructure	\$6,018,000	\$4,767,200
Total:	\$163,548,000	\$155,184,750

* Costs are associated with construction of 1,000,000 square feet bulk distribution warehouses.

1.5.3 Non-Degradation Alternative (NDA)

The NDA involves not constructing the five remaining distribution warehouses at the proposed Intermodal Campus South that would impact aquatic resources, see Item 6: Figures 5 and 6.

If the NDA were implemented, engineering costs already incurred on the PA and the MDA design would be lost. The NDA is not an acceptable alternative since this alternative does not meet the project purpose and need and thus, by definition, would not be cost effective.

1.6 Economic Considerations

The following information is a brief description of the local economy of Pickaway County and was obtained from the U.S. Census Bureau (U.S. Census Bureau, 2015). In 2014, Pickaway County had a total population of 56,876 people comprised of Caucasian (94%), African American (4%), Asian (0.4%), Hispanics (1%), and both Native Americans and some other races (less than 1%). The median household income for Pickaway County was \$54,003 per year with a per capita income of \$23,851 in 2013 and an annual average unemployment rate of 6.9 percent (Pickaway County; <http://www.countyoffice.org/oh-pickaway-county>). The percent of persons within Pickaway County living in poverty was at 9.5 % which is below the state of Ohio average of 10.6 % (Pickaway County 2014).

The need for the development of Intermodal Campus South is to accommodate the demand for commercial/industrial facilities that is currently being turned away within the

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Columbus Region due to the lack of available property with Intermodal Terminal access. Intermodal transport is one of the fastest growing methods of transporting freight in the United States. It consists of the movement of entire truck trailers and shipping containers by both highway and rail, taking advantage of the economic and environmental efficiencies of trains for long haul movement combined with the speed and reach of trucks for local pickup and delivery. Access to intermodal facilities that can facilitate the transfer of containers between rail and truck is a benefit to commercial/industrial development.

Any social and economic benefits realized by this proposed project would be the same for both Build Alternatives. The purpose of the Intermodal Campus South is to construct five bulk distribution warehouses adjacent to the Intermodal Facility where goods can be distributed to and from the Norfolk southern Intermodal Facility as well as the Rickenbacker International Airport. Direct and indirect jobs created by construction and operation of the Intermodal Campus South are estimated at approximately 1 job for every 2,000 square feet of development. The Intermodal Campus South would support between 1,700 to 2,000 jobs through direct and indirect development. Surrounding development is expected to occur as industrial and warehousing.

The area contains few residential communities thus promoting good conditions for industrial development adjacent to the airport with low community impacts. Several thousand acres of land are suitable for economic development immediately surrounding the airport with 1,760 acres within the airport boundary.

Rickenbacker International Airport is an important asset to the economic vitality of Central Ohio. The proposed project has already increased property values in areas surrounding the airport and to the south in Pickaway County. Because of the anticipation of the Intermodal Campus South development, coupled with enhanced water, sewer and roadway infrastructure being planned for the area, rural farm property values in the area are in the process of increasing dramatically.

No businesses are expected to be negatively impacted by the proposed project. Future land use and development surrounding the project area should not be negatively affected by the proposed project. Direct farming uses and jobs in the area will be decreased and/or converted to industrial uses and jobs. No jobs are expected to be lost (directly or indirectly) for either the PA or the MDA. Existing jobs in the area will be enhanced and new jobs will be created. Direct farming uses and jobs in the area will be decreased and/or converted to industrial uses and jobs.

The construction of the Intermodal Campus South will temporarily create negative aesthetics on the local landscape until the project is complete.

The PA and the MDA of the proposed Intermodal Campus South will primarily have an impact on active agricultural habitat, portions of deciduous oak-maple upland forest with patches of isolated forested wetlands.

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1.6.1 Preferred Alternative (PA)

Economic development is the primary objective of the Intermodal Campus South project; construction of the PA would have a positive economic benefit to Pickaway County by providing much needed construction and other jobs in the region. There should be no job or economic losses as a result of the project.

The proposed development would help achieve the economic goals of the region by providing jobs and tax revenue. The site location takes advantage of the proximity to the Intermodal Terminal, Rickenbacker International Airport, and other infrastructure investments that have been funded through state and local government. The development is intended to attract tenants with these specific site location requirements. Such a development would be expected to create approximately 1,700 to 2,000 jobs. The proposed development would meet the economic development needs by attracting users with these unique site characteristics. Because there is no other site in the Columbus region with direct access to an Intermodal Terminal and a large cargo airport, potential development opportunities would be lost without the proposed project.

As proposed the MDA will provide a total of five distribution warehouses, totaling approximately 3,438,180 square feet of distribution warehouse space.

1.6.2 Minimal Degradation Alternative (MDA):

Like the PA the MDA is primarily an economic development project. Compared to the PA the MDA will have reduced job opportunity due to the reduced size of the distribution warehouse space available. Due to there not being designated tenants for each of the proposed distribution warehouses it is difficult to quantify the amount of job reduction.

As proposed the MDA will provide a total of six distribution warehouses, totaling approximately 3,161,160 square feet of distribution warehouse space.

1.6.3 Non-Degradation Alternative (NDA)

The NDA proposes to construct no new warehouses but does include the currently under construction BASF distribution warehouse (421,702 square feet). No aquatic resources have been impacted by the construction of the BASF warehouse.

1.7 Cumulative Impacts

1.71. Development Background

Rickenbacker International Airport is considered one of the best examples of conversion efforts in the United States of a military air base to a public airport. Today the airport serves as a dedicated cargo airport, a multimodal logistics hub, a charter passenger terminal, and a U.S. foreign-trade zone. (ACRP, 2001)

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In 2003 the Rickenbacker Port Authority merged with the Columbus Municipal Airport Authority to form the Columbus Regional Airport Authority (CRAA). The CRAA initiated a number of land development strategies, including:

- Acquire additional lands adjacent to the airport for development and/or resale, and
- Engage in public-private partnerships where CRAA can provide raw land, improved land, or actually construct a building for sale or lease (ACRP, 2011).

In 2005, The CRAA formed a partnership with Capitol Square, LTD. and Duke Realty to develop the Rickenbacker Global Logistics Park. The Rickenbacker Global Logistics Park will provide up to 28 million square feet of additional development space to complement the 60 million square feet of existing space, see Figure A, (RGLP, 2015).

Benefits of the Logistics Park include:

- Five campuses provide tenants access to three major transportation options – road, rail and air.
- The ability to obtain Foreign-Trade Zone status.
- Proximity to major interstates providing access to more than 50% of the U.S. and Canadian populations within a one-day drive.
- Development opportunities accommodating up to 30 buildings.
- Thousands of jobs and a huge economic boost for Central Ohio.
- Convenient access to passenger-focused Port Columbus International Airport, (RGLP 2015).

Figure A: Rickenbacker Global Logistics Park



Figure A: <http://rickenbackerairport.com/en/rickenbacker-global-logistics-park/>

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The Intermodal Campus South is one of five planned industrial/logistics campuses located adjacent to the airport. In conjunction with the Norfolk southern Intermodal Terminal approximately 7,500 acres in the Rickenbacker area has been or will be re-developed. (Miller 1995)

Historically, the areas around Rickenbacker were primarily farm fields, assorted woodlots, small residential housing and a small amount of commercial development.

With the proposed build out of the Rickenbacker Global Logistics Park the cumulative effects of the development to the surrounding watersheds would include increased impervious surfaces, increased amounts of storm water runoff reaching downstream water and decreased amounts of time it takes the storm water runoff to reach downstream. While the development of the Rickenbacker Global Logistics Park is reasonable and foreseeable, plans are not complete on other campuses. However, required 404/401 permits will be acquired prior to construction in any water of the United States and mitigation will be completed with the goal of no-net loss.

1.7.2 Preferred Alternative (PA), Minimal Degradation Alternative (MDA) and Non-degradation Alternative:

The development of the Intermodal South Campus will impact 9 isolated wetlands and one small man-made pond. Cumulative effects to the watershed could include increased erosion and sediment due to construction activities and the potential outfall of collected storm water runoff. These negative impacts will be controlled and minimized through the use of best management practices, both during and post construction. In relation to the other campuses, development of the Intermodal Campus South will have little, if any cumulative impacts to the surrounding watersheds. All 404/401 permit conditions will be adhered to throughout construction.

1.8 Indirect Impacts

1.8.1 Preferred Alternative (PA) and Minimal Degradation Alternative (MDA) and Non-Degradation Alternative (NDA):

Temporary indirect erosion and sediment could impact Big Run and Walnut Creek during construction. Due to the distance to the named streams and the fact that these impacts are to isolated wetlands, any impacts are minor in effect and efforts will be taken to minimize and control such impacts .

1.9 Construction Storm Water Management Plans

1.9.1 Preferred Alternative (PA) and Minimal Degradation Alternative (MDA):

Best management practices (BMPs) for erosion control would be followed during project construction. Compliance with the applicable National Pollutant Discharge Elimination System (NPDES) permit requirements (General Permit Authorization for Storm Water Discharges Associated with Construction Activity under the National Pollutant Discharge Elimination System (OHC00004)) is expected to provide adequate sediment and erosion control protection to relevant water resources. A well-designed water pollution and erosion control plan, which would be

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incorporated into the final construction plans, would minimize short-term construction impacts on the quality of the water exiting the site. Temporary sediment and erosion control practices such as utilization of sediment basins, silt fence or ditch checks would be followed while constructing the proposed project. The costs of storm water pollution and prevention control measures for the PA is slightly more due to the additional land to be developed. The MDA is slightly less in cost due to the reduced size of Bldg. #831.

As shown in Table 1, the costs for the design and implementation of water pollution controls, including the storm water pollution prevention plan for the PA and the MDA is expected to be \$14,719,320 and \$13,966,628, respectively.

Table 4: Water Pollution Control Costs:

Alternative:	Cost:
Preferred Alternative	\$14,719,320
Minimal Degradation Alternative	\$13,966,628

1.9.2 Non-Degradation Alternative (NDA):

There would be no storm water pollution and prevention control costs associated with the Non-Degradation Alternative.

1.10 Post-Construction Storm Water Management Plans

1.10.1 Preferred Alternative (PA) and Minimal Degradation Alternative (MDA):

As shown in Item 6: Figure 5, the proposed development of the Intermodal Campus South will include five distribution warehouses and supporting infrastructure, including drives, parking areas, truck loading and unloading bays as well as 5 detention ponds. The proposed detention ponds, totaling approximately 24 acres, will border the development area. Storm water from the buildings and the paved areas will be routed to the detention ponds for storage and treatment. Treated discharge will be routed to the east to un-named tributaries of Big Run and Walnut Creek.

1.10.2 Non-Degradation Alternative (NDA):

Construction has begun on the BASF distribution warehouse, located on the northwest corner of the portion of the site directly east of the Norfolk Southern Intermodal Terminal. This area is devoid of any aquatic resources and precautions have been put in place to prevent disturbance of the remainder of the site by construction activities; specifically orange construction fencing has been installed demarking wetlands near the construction area.

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The NDA involves not constructing the five remaining distribution warehouses at the proposed Intermodal Campus South, see Item: 6 Figures 5 and 6. No construction storm water pollution costs are associated with the Non-Degradation Alternative.