FINDING OF NO SIGNIFICANT IMPACT
AND
FINDING OF NO PRACTICABLE ALTERNATIVE
CONSTRUCT AIR TRAFFIC CONTROL TOWER AND CRASH RESCUE FACILITY
MACDILL AIR FORCE BASE, FLORIDA

Agency: United States Air Force (USAF), Headquarters Air Mobility Command

Background: Pursuant to the President's Council on Environmental Quality (CEQ) regulations, Title 40 Code of Federal Regulations (CFR) Parts 1500-1508, as they implement the requirements of the National Environment Policy Act (NEPA) of 1969, 42 U.S.C. § 4321, et seq., and Air Force Instruction (AFI) 32-7061, Environmental Impact Analysis Process, as promulgated at 32 CFR Part 989, the USAF conducted an assessment of the potential environmental consequences associated with implementation of the following proposed actions: to construct a new fire crash rescue facility, construct a new air traffic control tower facility, and demolish the existing air traffic control tower at MacDill Air Force Base (AFB). The environmental assessment considered all potential impacts of the proposed action and the no action alternative, both as solitary actions and in conjunction with other proposed activities. The finding of no significant impact (FONSI) summarizes the results of the evaluation of the proposed action and alternative. The discussion focuses on activities that have the potential to change both the natural and human environments. The finding of no practicable alternative (FONPA) summarizes the options considered and why the proposed crash rescue facility and the air traffic control tower were designed and sited as proposed. Environmental analysis of these three actions was completed collectively because all three actions will be funded, designed, and completed as a single project.

Proposed Action: Construct a new 39,000-square-foot crash rescue facility, construct an 11-story, 8,700-square-foot air traffic control tower, and demolish the existing control tower.

Alternative: Several alternatives such as alternate locations or renovation and expansion of existing facilities were initially considered during pre-design stages of the project; however, upon further evaluation, these alternatives were determined not to meet the purpose and need for the proposed action because they did not satisfy the selection criteria. Consequently, the no action alternative was the only alternative to the proposed action evaluated throughout the EA. The no action alternative would involve no construction or demolition activities and no changes to the current operation at MacDill AFB. The environmental assessment process identified the proposed action as the preferred course of action since it would best suit the needs of the base, and if implemented properly, would not result in significant environmental impacts. The environmental consequences associated with implementation of the proposed action are summarized in the following sections.

Air Quality: Fugitive dust will not constitute a major source of air pollutants based on quantitative analyses. The estimated values for carbon monoxide (CO), volatile organic compounds (VOC), nitrogen oxides (NO_x), sulfur oxides (SO_x), and particulate matter (PM_{10})

Report Documentation Page

Form Approved
OMB No. 0704-0188

1. REPORT DATE	2. REPORT TYPE	3. DATES COVERED
22 AUG 2003	**Environmental Assessment**	**00-00-2000 to 00-00-2003**

4. TITLE AND SUBTITLE	5a. CONTRACT NUMBER
Environmental Assessment to Construct Air Traffic Control Tower and Crash Rescue Facility at MacDill Air Force Base, Florida	5b. GRANT NUMBER
	5c. PROGRAM ELEMENT NUMBER
6. AUTHOR(S)	5d. PROJECT NUMBER
	5e. TASK NUMBER
	5f. WORK UNIT NUMBER
7. PERFORMING ORGANIZATION NAME(S) AND ADDRESS(ES) **United States Air Force,MacDill Air Force Base,Tampa,FL,33621**	8. PERFORMING ORGANIZATION REPORT NUMBER
9. SPONSORING/MONITORING AGENCY NAME(S) AND ADDRESS(ES)	10. SPONSOR/MONITOR'S ACRONYM(S)
	11. SPONSOR/MONITOR'S REPORT NUMBER(S)

12. DISTRIBUTION/AVAILABILITY STATEMENT
Approved for public release; distribution unlimited

13. SUPPLEMENTARY NOTES

14. ABSTRACT
Environmental Assessment to Construct Air Traffic Control Tower and Crash Rescue Facility at MacDill Air Force Base, Florida

15. SUBJECT TERMS

16. SECURITY CLASSIFICATION OF:			17. LIMITATION OF ABSTRACT	18. NUMBER OF PAGES	19a. NAME OF RESPONSIBLE PERSON
a. REPORT **unclassified**	b. ABSTRACT **unclassified**	c. THIS PAGE **unclassified**	**Same as Report (SAR)**	**161**	

were substantially less than USEPA de minimis values and less than 10 percent of the Hillsborough County emissions inventory, and therefore, an air conformity analysis is not necessary.

Noise: Noise levels will increase temporarily during construction and demolition; however, the increased noise levels would not be continuous and it is believed that the work force will accept the temporary increase in noise.

Wastes, Hazardous Materials, and Stored Fuels: Asbestos-containing building materials have been identified in Facility 1108. Prior to demolishing the existing control tower, the contractor shall hire an environmental consulting company to fully assess the extent of the asbestos and lead-based paint in the control tower. The environmental consulting company shall also be responsible for abatement of the hazardous materials and monitoring of the environment during abatement. Assuming these precautions are followed, the proposed action would not result in significant impacts from hazardous materials or wastes. The project will be monitored to ensure proper removal, handling, and disposal procedures are documented and prescribed procedures and laws are followed. There will be no impacts to stored fuels with implementation of the proposed action.

Water Resources: There will be no significant impacts to surface or ground water quality with implementation of the proposed action to include operation of the new facilities upon their completion.

Floodplains: Construction of the crash rescue facility and the control tower and demolition of the existing control tower would take place within the 100-year coastal floodplain. Currently, 80 percent of MacDill AFB is located within the coastal floodplain. The 20 percent of the installation that is not located within the floodplain is primarily being used for airfield operations and support. Consequently, there are no construction sites situated above the coastal floodplain available on the installation. This factual situation leads to the conclusion that there is no practicable alternative (as defined in Executive Order 11988, Floodplain Management) to constructing the crash rescue facility and the control tower in the coastal floodplain on the base.

All practicable measures to minimize the impact of floods on human health, safety, and welfare, and preserve the natural values of the floodplains will be implemented for the project. These measures include use of silt fence to limit sedimentation and erosion during construction. Used post construction measures include installation of storm water retention areas, which preserve floodplain values by retaining storm water on-site. Additionally, the project uses sod and other vegetation to increase permeability of the soil to improve evaporation of storm water and reduce potential erosion into the floodplain. In addition, the new buildings would be constructed 11 feet above mean sea level in accordance with Federal Emergency Management Agency (FEMA) guidelines. The project would not involve discharges of hazardous or sanitary wastewater to the floodplain or Tampa Bay. No contaminated fill would be produced during construction. There will be no negative impacts on floodplain functions and values or threats to human life, health, and safety.

Biological Resources: Adverse impacts on wetlands (including wetland communities of Tampa Bay), wildlife, aquatic life, or protected species will not occur with implementation of the proposed action. The United States Fish and Wildlife Service was consulted and concurred that no known threatened and endangered species or species habitat are present at the proposed work sites. No adverse impacts on threatened or endangered species will occur during construction and operation of the crash rescue facility or the new control tower. Jurisdictional wetlands are not located on the proposed construction or demolition sites and will not be filled, altered, or impacted by construction or operation of the proposed facilities.

Socioeconomic Resources: The proposed action would have a minor short-term economic benefit for the Tampa community.

Cultural Resources: There will be a no impact to cultural resources with implementation of the proposed action. In accordance with Section 106, correspondence with the State Historic Preservation Office has been completed to confirm that they concur with MacDill's assessment of no impact to cultural resources.

Land Use: The proposed action will result in no change to the existing land use.

Transportation Systems: Implementation of the proposed action will have a short-term, minor adverse impact on the transportation systems at MacDill AFB, but the impact will be temporary, and is not considered significant.

Airspace/Airfield Operations: Implementation of the proposed action will have a long-term positive impact on airfield operations but no impact on airspace at MacDill AFB.

Safety and Occupational Health: Asbestos-containing materials have been identified in Facility 1108 and demolition of the facility would disturb this material. However, prior to demolition of the facility, a comprehensive asbestos and lead-based paint survey will be completed, and a qualified abatement subcontractor will remove and properly dispose of any identified asbestos-containing materials and lead-based paint. Implementing this approach will greatly reduce the potential for health and safety impacts to construction workers.

Environmental Management (including Geology and Soils): The operating crash rescue facility and the control tower would participate in base recycling programs to reduce solid waste disposal volumes. During construction and demolition activities, soil erosion in disturbed areas will be controlled by implementation of a sediment and erosion control plan, as well as best management practices.

Environmental Justice: No disproportionately high or adverse effects on minority or low-income populations would occur as a result of the construction and operation of the crash rescue facility or the control tower or as a result of demolition of the existing control tower.

Indirect and Cumulative Impacts: There are no direct, indirect, or cumulative impacts associated with implementation of the proposed action. The construction and demolition activities of the proposed action were considered in conjunction with other ongoing or planned

construction projects, and found that together they do not constitute a significant cumulative impact.

Unavoidable Adverse Impacts: There are no unavoidable significant impacts associated with the construction and operation of the crash rescue facility, the control tower, or demolition of existing control tower.

Relationship Between Short-term Uses and Enhancement of Long-term Productivity: Implementation of the proposed action would have a positive effect on long-term productivity by improving emergency response efficiency and air traffic control operations at MacDill AFB.

Irreversible and Irretrievable Commitment of Resources: The construction and demolition activities of the proposed action would irreversibly commit fuels, manpower, materials, and costs related to constructing useable facilities for the installation.

Florida Coastal Zone Management: In accordance with the Federal Coastal Zone Management Act (CZMA) and the Florida CZMA, this federal action must be consistent "to the maximum extent practicable" with the Florida Coastal Management Program (CMP). Appendix A to the EA contains the Air Force's Consistency Statement, and finds that the conceptual proposed action and alternative plans presented in the EA are consistent with Florida's CMP. In accordance with Florida statutes, the Air Force has submitted a copy of the attached EA to the state of Florida to perform a coastal zone consistency evaluation. The state of Florida concurs that the proposed action is consistent with Florida's CMP.

FINDING OF NO SIGNIFICANT IMPACT: Based upon my review of the facts and analyses contained in the attached environmental assessment, which is hereby incorporated by reference, I conclude that implementation of the proposed action will not have a significant environmental impact, either by itself or cumulatively with other projects at MacDill AFB. Accordingly, the requirements of NEPA, the regulations promulgated by the Council on Environmental Quality, and the Air Force are fulfilled and an environmental impact statement is not required. The Tampa Tribune published a Notice of Availability on July 7th, 2003. No comments were received during the public comment period ending August 8th, 2003. The signing of this combined finding of no significant impact and finding of no practicable alternative (FONSI/FONPA) completes the environmental impact analysis process under Air Force regulations.

FINDING OF NO PRACTICABLE ALTERNATIVE: Pursuant to Executive Order 11988, the authority delegated in Secretary of the Air Force Order (SAFO) 791.1, and taking the above information into account, I find that there is no practicable alternative to locating the proposed fire crash rescue facility or the proposed air traffic control tower at the sites proposed. The alternatives to construction of these facilities are either cost prohibitive or impractical due to existing structural constraints. Since construction of a fire crash rescue facility and a air traffic control tower are required, and since all land available for construction of facilities of this nature are within a coastal floodplain, there is no practicable alternative to building the proposed facilities within a floodplain. The proposed action, as designed, includes all practicable measures to minimize harm to the coastal floodplain. The Air Force has sent all required notices to federal

agencies, single points of contact, the state of Florida, local government representatives, and the local news media.

JOHN R. BAKER
Lieutenant General, USAF
Vice Commander

22 Aug 03
DATE

TABLE OF CONTENTS

SECTION 1.0 PURPOSE OF AND NEED FOR PROPOSED ACTION 1
1.1 Mission 2
1.2 Purpose Of And Need For Proposed Action 2
1.3 Location Of Proposed Action 4
1.4 The Scope Of The Environmental Review 4
1.5 Applicable Regulatory Requirements 4
1.6 Coastal Zone Consistency Determination 5

SECTION 2.0 DETAILED DESCRIPTION OF THE PROPOSED ACTION AND ALTERNATIVES 7
2.1 Selection Criteria 8
2.2 Detailed Description Of The Proposed Action 8
2.2.1 Fire/Crash Rescue Facility 9
2.2.2 Air Traffic Control Tower 11
2.2.3 Demolition Of Existing Control Tower 13
2.3 Description Of The No Action Alternative 14
2.4 Alternatives Considered But Eliminated From Further Study 15
2.5 Identification Of The Preferred Alternative 15
2.6 Identification Of The Environmentally Preferred Alternative 16
2.7 Other Activities In The Area 16
2.8 Comparison Of Environmental Effects Of The Proposed Action And Alternatives 16

SECTION 3.0 AFFECTED ENVIRONMENT 20
3.1 Air Quality 21
3.1.1 Attainment Status 23
3.1.2 Baseline Air Emissions 23
3.1.3 State Regulations 24
3.2 Noise 25
3.3 Wastes, Hazardous Materials, And Stored Fuel 26
3.3.1 Wastes 26
3.3.2 Hazardous Materials 27
3.3.3 Stored Fuel 28
3.4 Water Resources 28
3.4.1 Surface Water 28
3.4.2 Groundwater 29
3.5 Floodplains 30
3.6 Biological Resources 31
3.6.1 Vegetative Communities 31
3.6.2 Wetlands 31
3.6.3 Wildlife 32
3.6.4 Endangered, Threatened, And Special Concern Species 33
3.7 Socioeconomics 36

3.8 Cultural Resources 36
3.8.1 Prehistoric Resources 37
3.8.2 Historic Resources 37
3.9 Land Use 37
3.10 Transportation 38
3.11 Airspace And Airfield Operations 39
3.12 Accident Potential 39
3.13 Safety And Occupational Health 39
3.13.1 Asbestos 39
3.13.2 Lead-Based Paint 39

SECTION 4.0 ENVIRONMENTAL CONSEQUENCES 43
4.1 Air Quality 43
4.1.1 Proposed Action 43
4.1.1.1 Air Conformity Analysis 45
4.1.2 No-Action Alternative 47
4.1.3 Cumulative Air Quality Impacts 47
4.2 Noise 48
4.2.1 Proposed Action 48
4.2.2 No-Action Alternative 50
4.2.3 Cumulative Noise Impacts 50
4.3 Wastes, Hazardous Material, And Stored Fuel 50
4.3.1 Proposed Action 50
4.3.2 No-Action Alternative 53
4.4 Water Resources 53
4.4.1 Proposed Action 53
4.4.2 No Action Alternative 54
4.5 Floodplains 54
4.5.1 Proposed Action 54
4.5.2 No Action Alternative 56
4.6 Biological Resources 56
4.6.1 Proposed Action 56
4.6.1.1 Wetlands 56
4.6.1.2 Listed Species Habitat 56
4.6.2 No Action Alternative 57
4.7 Socioeconomics 57
4.7.1 Proposed Action 57
4.7.2 No-Action Alternative 57
4.8 Cultural Resources 57
4.8.1 Proposed Action 57
4.8.2 No Action Alternative 58
4.9 Land Use 58
4.9.1 Proposed Action 58
4.9.2 No Action Alternative 58

4.10 Transportation....58
4.10.1 Proposed Action....58
4.10.2 No-Action Alternative....59
4.11 Airspace/Airfield Operations And Bird-Aircraft Strike Hazard....59
4.12 Safety And Occupational Health....59
4.12.1 Proposed Action....59
4.12.2 No-Action Alternative....60
4.13 Geology And Soils....60
4.13.1 Proposed Action....60
4.13.2 No Action Alternative....61
4.14 Environmental Justice....61
4.15 Indirect And Cumulative Impacts....61
4.16 Unavoidable Adverse Impacts....62
4.17 Relationship Between Short-Term Uses And Enhancement Of Long Term Productivity....62
4.18 Irreversible And Irretrievable Commitment Of Resources....62

SECTION 5.0 PERSONS CONTACTED....63

SECTION 6.0 LIST OF PREPARERS....66

SECTION 7.0 REFERENCES....69

FIGURES

Figure 1-1 Project Location and Vicinity Map for Crash Rescue Facility Site, Construct Control Tower and Crash Rescue Facility, MacDill Air Force Base

Figure 1-2 Project Location and Vicinity Map for Control Tower Site, Construct Control Tower and Crash Rescue Facility, MacDill Air Force Base

Figure 2-1 Site Plan for Crash Rescue Facility Site, Construct Control Tower and Crash Rescue Facility, MacDill Air Force Base

Figure 2-2 Site Plan with Drainage for Crash Rescue Facility Site, Construct Control Tower and Crash Rescue Facility, MacDill Air Force Base

Figure 2-3 Site Plan for Control Tower Site, Construct Control Tower and Crash Rescue Facility, MacDill Air Force Base

Figure 2-4 Site Plan with Drainage for Control Tower Site, Construct Control Tower and Crash Rescue Facility, MacDill Air Force Base

Figure 3-1 Crash Rescue Facility in Relation to Environmental Contraints, Construct Control Tower and Crash Rescue Facility, MacDill Air Force Base

Figure 3-2 Control Tower in Relation to Environmetnal Constraints, Construct Control Tower and Crash Rescue Facility, MacDill Air Force Base

Figure 3-3 100-Year Floodplain, MacDill Air Force Base

TABLES (in text)

Table 2.8.1 Comparision of Environmental Consequences, Construct Control Tower and Crash Rescue Faclity, MacDill Air Force Base

Table 3.1.2 Stationary Air Emissions Inventory, Hillsborough County, Florida

Table 3.1.3 National and State Ambient Air Quality Standards

Table 3.6.4 Summary of Protected Species Identified at MacDill Air Force Base

Table 4.1.1 Proposed Action Air Emissions at MacDill AFB

TABLES (in back of report)

Table 2-1 Detailed Description of Environmental Consequences, Construct Crash Rescue Facility and Control Tower, MacDill AFB.

APPENDIX A CONSISTENCY STATEMENT A-1

APPENDIX B AF FORM 813 B-1

APPENDIX C AIR EMISSION CALCULATIONS FOR PROPOSED ACTION AND CUMMULATIVE AIR EMISSONS C-1

APPENDIX D PUBLIC NOTICE AND AGENCY CORRESPONDENCE D-1

APPENDIX E ASBESTOS SUVEY RESULTS E-1

SECTION 1.0
PURPOSE OF AND NEED FOR PROPOSED ACTION

This Environmental Assessment (EA) examines the potential for impacts to the environment resulting from construction of a fire crash rescue facility and a new air traffic control tower on MacDill Air Force Base (AFB) and demolition of the existing air traffic control tower.

The existing fire crash rescue facility does not meet current National Fire Protection Association (NFPA) standards or comply with Department of Defense Instruction (DoDI) 6055.6, which requires a three-minute response time for emergencies on the flightline. DoDI 6055.6, Chapter E2.5, E2.5.3.2, Response Times states: *For an unannounced aircraft emergency crash equipment will be capable of responding to any incident on the runway within 3 minutes*. The current crash rescue facility is located on the South Ramp approximately 2.5 miles from the mid point of the MacDill runway and the Fire Protection Flight cannot meet the three-minute response time. The fire rescue team has established a temporary fire station at Building 98, closer to the runway, in order to meet the response time requirement; however, this facility is undersize, improperly configured, and does not meet the long term needs of the base fire department. Construction of a new, sufficiently sized and planned crash rescue facility in a location central to the runway would greatly improve the fire departments response times and improve their organization by consolidating their operation into one building. The new crash rescue facility would allow the MacDill Fire Protection Flight to respond immediately to emergency situations on the flightline, which would reduce sever injuries, save lives, and protect resources.

The existing control tower at MacDill AFB, originally constructed in 1972, is undersized, outdated and in poor repair. Although equipment additions and upgrades have been

funded to support the military mission, the existing tower is too small to accommodate any additional equipment. Similarly, the structural, mechanical and electrical components of the existing tower are in a state of deterioration making major modifications to the existing control tower equipment impossible. Although the height of the existing tower provides sufficient surveillance of the runway, blind spots exist on both the North and South parking aprons. The Air Force is considering construction of a new, taller control tower to include upgrade of the electrical service to overcome the existing utilities deficiencies identified with the current air traffic control tower.

1.1 MISSION

Since 1996, MacDill AFB has been host to the 43rd Aerial Refueling Group (ARG) which joined the 6th Air Base Wing to form the 6th Air Refueling Wing (6 ARW). In January 2001, the 310 Airlift Squadron bedded down at MacDill AFB and subsequently assumed the CINC support mission. Consequently the wing was redesignated as a mobility wing as a result of having both an air refueling and an airlift squadron in the unit. The 6 AMW is the host unit at MacDill AFB and reports to the Air Mobility Command (AMC), headquartered at Scott AFB, Illinois. The mission of the wing is to provide worldwide air refueling and airlift in support of the Air Force's Global Reach, Global Power mission, and administrative, medical, and logistical support for United States Central Command (USCENTCOM) and the United States Special Operations Command (USSOCOM). In addition, the Base provides similar support to tenant agencies and the MacDill community, including over 70,000 retirees and their families. The organizational structure of 6 AMW consists primarily of a Maintenance Group, Medical Group, Operations Group, and Mission Support Group.

1.2 PURPOSE OF AND NEED FOR PROPOSED ACTION

The MacDill Fire Protection Flight requires an operations facility that meets Air Force and National Fire Protection Association (NFPA) standards. Air Force Policy Directive 32-20, July 94: Chap 2, 2.3 states*: Ensure fire protection operations comply with all*

applicable national, state, local and DoD regulations, as well as National Fire Codes published by the NFPA. Currently, the Fire Protection Flight operates out of three facilities (Building 8, 26 and 98), however, none of these facilities meet the requirements established in NFPA Standard 1500 or the AMC design guide. The facilities provide insufficient square footage to meet the required standards especially with regard to space required for vehicle parking, training, administrative activities, and sleeping. Facility 98 is a temporary station located closer to the runway in an effort to comply with Department of Defense Instruction (DODI) 6055.6, which specifies emergency response times for fire protection operations; however, a permanent facility is required.

The existing air traffic control tower is also old, out of date and in poor repair. The control tower does not comply with current Air Force and Federal Aviation Administration (FAA) standards. Several major deficiencies with the current control tower are impacting airfield operations at MacDill AFB, as well as personnel safety. These deficiencies include the height or location of the existing control tower which does not permit a full view of the airfield ramp and taxiways and is; therefore, a violation of established control tower criteria. The existing equipment in the control tower, which is old, out of date and requires frequent maintenance and repair, cannot be replaced because the control tower cab is too small to permit installation of new equipment. The routine breakdown of equipment directly impacts air traffic control services and increases controller workloads. Although repaired many times, the roof still leaks threatening to damage electronic equipment in the tower cab and creating safety concerns in other areas of the tower. Construction of a new air traffic control tower would rectify the current deficiencies with the existing control tower and provide some additional improvements such as an elevator, adequate hot and cold water, additional square footage, and fire sprinkler system.

1.3 LOCATION OF PROPOSED ACTION

The Proposed Action would take place at MacDill AFB, located in Tampa, Florida. The Base occupies approximately 5,630 acres and is in Hillsborough County adjacent to the City of Tampa, at the southern tip of the Interbay Peninsula. The Base is surrounded on three sides by Tampa Bay and Hillsborough Bay, and is bordered on the north by development within the City of Tampa. The new crash rescue facility would be constructed adjacent to the newly constructed fire training facility on the south side of airfield (Figure 1-1) south of the intersection of Taxiway K and Taxiway L. The new air traffic control tower would be constructed adjacent to but behind the existing tower along the western side of the runway (Figure 1-2).

1.4 THE SCOPE OF THE ENVIRONMENTAL REVIEW

This EA identifies, describes, and evaluates potential environmental impacts associated with the alternatives identified for implementation of the Proposed Action. The EA includes an analysis of the impacts of the alternatives on the following environmental resources: air quality, noise, cultural resources, hazardous materials/waste, water resources, biological resources, land use, socioeconomics, safety and occupational health, geology and soils.

1.5 APPLICABLE REGULATORY REQUIREMENTS

This environmental analysis has been conducted in accordance with the President's Council on Environmental Quality (CEQ) regulations, Title 40 of the Code of Federal Regulations (CFR) §§1500-1508, as they implement the requirements of the National Environmental Policy Act (NEPA) of 1969, 42 U.S.C. §4321, et seq., and Air Force Instruction (AFI) 32-7061 Environmental Impact Analysis Process, as promulgated in 32 CFR Part 989. These regulations require federal agencies to analyze the potential environmental impacts of proposed actions and alternatives and to use these analyses in making decisions on a proposed action. Cumulative effects of other ongoing activities

also must be assessed in combination with the Proposed Action. The CEQ was instituted to oversee federal policy in this process. The CEQ regulations declare that an EA is required to accomplish the following objectives:

- Briefly provide sufficient evidence and analysis for determining whether to prepare an Environmental Impact Statement (EIS) or a Finding of No Significant Impact (FONSI);
- Aid in an agency's compliance with NEPA when an EIS is not necessary, and facilitate preparation of an EIS when necessary.

32 CFR Part 989 specifies the procedural requirements for the implementation of NEPA and preparation of the EA.

Other environmental regulatory requirements relevant to the Proposed Action and alternatives also are identified in this EA. Regulatory requirements under the following programs among others will be assessed: Noise Control Act; Clean Air Act; Clean Water Act; National Historic Preservation Act; Endangered Species Act; Resource Conservation and Recovery Act (RCRA), Toxic Substances Control Act (TSCA); Federal Coastal Zone Management Act and Occupational Safety and Health Act. Requirements also include compliance with Executive Order (EO) 11988, Floodplain Management; EO 11990, Protection of Wetlands; and EO 12898, Environmental Justice.

1.6 COASTAL ZONE CONSISTENCY DETERMINATION

The Federal Coastal Zone Management Act (CZMA) creates a state-federal partnership to ensure the protection of coastal resources. The Federal CZMA requires each Federal agency activity within or outside the coastal zone, that affects any land or water use or natural resources of the coastal zone, to be carried out in a manner which is consistent to the maximum extent practicable with the enforceable policies of the state program, in this case the Florida Coastal Management Program (CMP). The Florida CZMA presumes

that "direct Federal activities" will directly affect the coastal zone. According to the Florida CMP, "direct Federal activities" are those that "are conducted or supported by or on behalf of a Federal agency in the exercise of its statutory responsibilities, including development projects."

The Federal CZMA requires Federal agencies carrying out activities subject to the Act to provide a "consistency determination" to the relevant state agency. The Federal regulations implementing the Act then require the state agency to inform the Federal agency of its agreement or disagreement with the Federal agency's consistency determination. Therefore, the Proposed Action and alternatives to implementing the Proposed Action require a consistency determination to be submitted by the U.S. Air Force to the relevant Florida agency and a response from the State of Florida of either agreement or disagreement with that determination. The Air Force's Consistency Determination is contained in the Consistency Statement at Appendix A. The State of Florida has agreed with the Air Force's Consistency Determination for the Proposed Action and their letter of concurrence is provided in Appendix D – Public Notice and Agency Correspondence. Of the Florida statutory authorities included in the CMP, impacts from the Proposed Action, and mitigation of such impacts in the following areas are addressed in this EA: beach and shore preservation (Chapter 161), historic preservation (Chapter 267), economic development and tourism (Chapter 288), public transportation (Chapters 334 and 339), saltwater living resources (Chapter 370), living land and freshwater resources (Chapter 372), water resources (Chapter 373), environmental control (Chapter 403), and soil and water conservation (Chapter 582).

SECTION 2.0
DETAILED DESCRIPTION OF THE PROPOSED ACTION AND ALTERNATIVES

This section provides a description of the Proposed Action and alternatives to the Proposed Action. The Proposed Action involves two construction actions including construction of a new crash rescue facility for the Fire Protection Flight and construction of a new air traffic control tower for Airfield Operations. Construction of these facilities is required to correct major deficiencies with the existing facilities and bring the base into compliance with Air Force, NFPA and FAA standards. The Proposed Action also includes demolition of the existing control tower. Environmental analysis of these three actions is being completed collectively because all three actions would be funded, designed and completed as a single project.

One alternative to the Proposed Action initially considered was the renovation and expansion of existing facilities for both the crash rescue facility and the control tower. Another alternative evaluated in this environmental assessment was the no action alternative. Under the no action alternative, no new facilities would be constructed and the Fire Protection Flight and Airfield Operations would continue to use their existing, substandard facilities.

This section specifically includes:

- A list of the environmental constraints and other selection criteria that influence selection of potential locations for implementing the Proposed Action;
- A detailed description of the Proposed Action;
- A description of the no action alternative; and
- A matrix comparing the environmental effects of the Proposed Action and the alternative.

2.1 SELECTION CRITERIA

The new crash rescue facility is required to be located in an area that is convenient to the Fire Protection Flight and permits quick and easy access to all areas of the airfield. The crash rescue facility must be located close enough to the airfield area to meet the three minute response time requirement for aircraft emergencies. The crash rescue facility must comply with NFPA standards in accordance with Air Force Policy Directive 32-20, July 94: Chap 2, 2.3, particularly NFPA Standard 1500, and provide the Fire Protection flight with sufficient space to meet their operations, training, administrative and living quarters needs.

The air traffic control tower facility must be properly constructed and provide air traffic controllers an unobstructed view of the entire airfield area including the north and south ramps (aircraft parking and refueling/defueling). The control tower must provide sufficient space to meet the air traffic control operations, personnel training, crew briefing, maintenance, administrative and training needs. The tower must also provide sufficient space to house the electronic, communications and environmental control equipment that is required for operation of an air traffic control tower. Selecting a site for the control tower adjacent to the existing control tower would reduce construction costs and environmental impacts because the new tower could be connected to the existing utilities at the site including water, electric and the septic system.

The Proposed Action meets the selection criteria for the crash rescue facility and control tower.

2.2 DETAILED DESCRIPTION OF THE PROPOSED ACTION

The Proposed Action involves construction of a new fire/crash rescue facility and air traffic control tower and demolition of the existing control tower.

2.2.1 Fire/Crash Rescue Facility

The proposed fire/crash rescue facility (hereafter, crash rescue facility) would be constructed on the southern side of the airfield near the intersection of Taxiway K and Taxiway L and just north of the newly constructed fire training facility. The crash rescue facility would be situated roughly equidistant from the north and south ramps and the runway (Figure 1-1). The proposed one-story facility would be approximately 39,000 square feet in area and constructed of concrete block with a reinforced concrete foundation and standing seam metal roof. The crash rescue facility would consist primarily of an apparatus room but would include additional space for support areas including sleeping, living, administrative and building support areas. Detailed site plans are presented in Figures 2.1 and 2.2.

The apparatus room would be the focal point of the facility consisting of at least 10 drive-through bays. For operational convenience and flexibility, each bay and overhead door should be sized to accommodate the largest of the vehicles, the P-23. The overhead doors would be large metal roll-up doors that would be closed and locked for security. A large concrete apron would be constructed at each side of the drive-through bays to provide space to stage the emergency vehicles during busy airfield operation periods. Staging the emergency vehicles outside the building improves response times. The concrete apron on the north side of the apparatus room would be connected to the existing asphalt surface of Taxiway K and the concrete apron on the south side of the apparatus room would connect to the existing asphalt surface of an unnamed road that ties into Taxiway L.

The administrative and support facilities for the crash rescue facility would include a training room designed to accommodate 32 people, a self contained breathing apparatus maintenance room, a recreation room, a dining room for 26 people with adjoining kitchen, 24 bedrooms, men and women's restroom, shower and locker room, physical fitness room, laundry room and protective clothing locker room. Additional area in the

crash rescue facility would be dedicated to building support functions such as mechanical, electrical, communication, and fire protection systems as well as storage space.

In addition to the building itself, the crash rescue facility would include exterior features such as a parking lot for approximately 75 privately owned vehicles (POV), a volleyball court, half-court basketball area, designated dumpster area, electrical transformer area, air conditioner chiller unit and an emergency power generator.

The emergency power generation system for the crash rescue facility would consist of a large electric generator and an above ground storage tank for diesel. The storage tank would be double-walled with leak detection indicators in the interstitial space. The storage tanks would be installed outside the building on a concrete pad. The generator would either be housed in the crash rescue facility or possibly in a small storage shed constructed specifically for the generator.

The design and material used for this facility shall be consistent with the MacDill AFB Architectural Compatibility/Base Excellence Plan and shall meet or exceed local and state building codes. The proposed facility would be designed for hurricane winds and storm surges, as defined by local building codes. The building's foundation would be raised to a minimum elevation of 11.5 feet above mean sea level (msl) thereby meeting the requirement for the foundation being above the 100-year flood elevation.

Dust control measures would be instituted, as needed, during construction of the new building to control fugitive dust emissions. Any bare dirt surfaces would be covered with sod upon completion of the construction activities to minimize erosion.

If the decision-maker selects the Proposed Action, an engineering evaluation for storm water drainage becomes necessary and a storm water management permit from the Southwest Florida Water Management District would be required. In addition, compliance with the Phase II Stormwater Program would require securing a stormwater

construction permit since the construction area would be greater than one acre. State of Florida regulations require proper management of stormwater runoff, consequently an appropriately sized stormwater retention area has been designed for the new crash rescue facility. The stormwater retention area would be constructed on the west side of the new crash rescue facility, immediately adjacent to the new impervious surfaces for the apparatus room apron and new parking lot. The designed stormwater retention area is a "dry" retention basin in which stormwater floods the basin during rain events but quickly percolates into the soil to replenish the shallow surficial groundwater table. In accordance with State of Florida regulations, dry stormwater retention areas are required to be thoroughly drained and dry within 72 hours of the storm event. The retention area would be inspected and approved by the State of Florida prior to completion of the new facility, particularly the new parking lot. Construction of the stormwater retention area would require excavation of soil. Soil excavated for the retention area may be used to raise the land surface to insure that the buildings foundation is above the 100-year flood elevation; however, additional load of fill material would be required to fully raise the elevation of the site.

2.2.2 Air Traffic Control Tower

The proposed air traffic control tower would be constructed in the immediate vicinity of the current control tower but slightly behind the existing tower with respect to the active runway (Figure 1-2). Placing the new tower adjacent to but behind the existing tower would minimize visual obstructions to the existing tower during construction of the new tower. Upon completion, the new control tower is proposed to be approximately 30 feet taller than the existing tower; therefore, the existing (old) tower should not visually obstruct the new tower in the interim before the old tower is demolished. In addition, placing the two towers close to each other would allow the new tower to be easily connected to the existing utilities including water, waste water, power and communication lines that feed the existing tower.

The air traffic control tower would be constructed of concrete consisting of reinforced concrete footings and foundation, a supporting superstructure or pedestal and a control tower "cab". The control tower would be 11 stories or approximately 120 feet tall. The control tower cab would be roughly circular and fitted with double glazed tinted glass around the entire cab to provide a 360-degree viewing area. The control tower cab would provide space for air traffic control operations personnel, training areas and the air traffic control systems (equipment). The pedestal or base of the control tower would provide needed space for crew briefings, electronic, communication and environmental controls equipment, administrative and office areas, and maintenance areas. Each of these functions would occupy a floor or two within the base of the tower. An elevator would be included in the base to connect all the floors and the control tower cab.

The new control tower would also include a restroom and break room, which would have running hot and cold water. Sanitary sewer collection lines for the base wastewater treatment plant do not extend west of the runway; therefore, the new control tower would still discharge wastewater to an existing septic system. Base records indicate that the septic system for the existing control tower is sufficiently sized to service the new control tower; however, the existing lift station would have to be upgraded to provide adequate service.

The design and material used for this facility shall be consistent with the MacDill AFB Architectural Compatibility/Base Excellence Plan and shall meet or exceed local and state building codes. The proposed facility would be designed for hurricane winds and storm surges, as defined by local building codes. The building's foundation would be raised to a minimum elevation of 11.5 feet above mean sea level (msl) thereby bringing the foundation above the 100-year flood elevation.

If the decision-maker selects the Proposed Action, an engineering evaluation for storm water drainage becomes necessary and a storm water management permit from the Southwest Florida Water Management District would be required. As with the crash

rescue facility to insure proper management of stormwater runoff, an appropriately sized stormwater retention area has been designed for the new control tower facility. The stormwater retention area would be constructed on the west side of the new parking lot for the control tower. The retention area would be inspected and approved by the State of Florida before completion of the project. In addition, compliance with the Phase II Stormwater Program would require securing a stormwater construction permit since the construction area would be greater than one acre.

Dust control measures would be instituted, as needed, during construction of the new building to control fugitive dust emissions. Any bare dirt surfaces would be covered with sod upon completion of the construction activities to minimize erosion.

2.2.3 Demolition of Existing Control Tower

The Proposed Action also includes demolition of the existing control tower. The demolition of this facility would be accomplished by removing the upper portions of the tower with a crane. Once the top-heavy upper portion of the tower has been removed the base would be knocked over safely using standard construction equipment such as front-end loaders, bulldozers and track-hoes. The building would be reduced to rubble and loaded into large roll-off containers for disposal off-base at a construction and demolition debris landfill. Demolition would include removal of the concrete foundation for the control tower, which would involve some limited excavation. Once the foundation is removed the ground would be smoothed and leveled to match the surrounding grade.

Prior to initiating demolition of the existing control tower the facility would be surveyed for asbestos. Any identified asbestos material identified during the survey would be abated prior to demolishing the existing control tower. Any lead based paint on the facility would not be abated prior to demolition since it can be properly disposed as construction debris as long as it is not removed from the surface it was applied.

Silt fence would be installed around the demolition sites to reduce erosion resulting from wind and surface water runoff. Once the tower has been demolished, the material removed from the site and the land has been smoothed and graded, the disturbed areas of each site would be covered with a layer of sod. The sod would greatly reduce the potential for erosion by wind and surface water runoff.

All connections to the base potable water system would be cut from the old tower and reconnected to the new control tower. The connection to the septic tank and drainfield would also be cut from the existing tower and reconnected to the new control tower.

2.3 DESCRIPTION OF THE NO ACTION ALTERNATIVE

Under the No Action Alternative, neither the crash rescue facility or the air traffic control tower would be constructed. Fire rescue operations would continue to operate predominately out of Building 8 which is small, approximately 11,500 square feet, and does not provide sufficient space to house the fleet of crash rescue vehicles nor does Building 8 meet the Air Force guideline of 30,170 square feet for a large fire department. Response time would continue to be hindered since the existing fire station is located so far from the active runway. Fire rescue vehicles would continue to deteriorate rapidly due to continual exposure to the elements.

Under the no action alternative, air controller operations would continue to operate out of the existing control tower. This situation would continue to limit airfield operations. The existing control tower would continue to deteriorate further beyond AF and FAA standards causing major safety concerns for aircrews and air traffic controllers at MacDill AFB. The ability of air traffic controllers to accomplish surveillance of the whole airfield would not be corrected, threatening the safety of vehicles and aircraft operating at MacDill AFB. Further, air traffic controllers would face increased challenges trying to keep their systems operational, while supporting a variety of missions including USSOCOM and USCENTCOM combatant commander support.

2.4 ALTERNATIVES CONSIDERED BUT ELIMINATED FROM FURTHER STUDY

Several alternate locations for both the crash rescue facility and the control tower were identified during the pre-design but upon further evaluation the proposed locations represented the best possible site considering natural resources and airfield operation constraints.

Renovation of the existing control tower was considered; however, this alternative would not provide the necessary space to upgrade the air traffic control equipment and it would still leave a blind spot on the airfield from the control tower. Renovating an existing building in the vicinity of the flightline to use as a control tower is not a viable alternative since there are no existing buildings tall enough to provide a sufficient view of the flightline for air traffic control operations.

Renovation of an existing building to be used for the new crash rescue facility was considered briefly. Although several buildings are located close enough to the flightline to meet the response time requirements, these facilities were either far too small to meet the needs of MacDill's large fire department or the buildings were already occupied. Expansion of an existing building to meet the requirements of the fire department was also considered but eliminated as impractical due to the extensive amount of construction that would be required. In addition, the cost associated with raising an existing building to get it out of the 100-year floodplain and then expanding the facility the meet the square footage requirements exceeded the 70% of new construction costs guideline.

2.5 IDENTIFICATION OF THE PREFERRED ALTERNATIVE

Construction of a new crash rescue facility and air traffic control tower including demolition of the existing control tower as proposed in Section 2.2 is the agency-preferred alternative. Both projects would construct new, modern, efficient facilities, which would have a tremendous positive impact on personnel operating/working in these

facilities. Improvements in living/working conditions would result in better attitudes and work performance from personnel. In addition, the new facilities would improve the efficiency and effectiveness of the control tower and crash rescue operations.

2.6 IDENTIFICATION OF THE ENVIRONMENTALLY PREFERRED ALTERNATIVE

Construction of a new crash rescue facility and air traffic control tower including demolition of the existing control tower as proposed in Section 2.2 is the environmentally preferred alternative. This alternative is environmentally preferred because it would result in significant improvements in safety and efficiency for air traffic activities and crash rescue operations, with minimal environmental impacts. The benefits from the project would significantly outweigh the negligible environmental impacts, all of which would be easily mitigated.

2.7 OTHER ACTIVITIES IN THE AREA

Both of the proposed construction sites are located in areas away from the business portion of the base. Very little development has occurred in the vicinity of both sites because these areas are not centrally located or conveniently accessible. Consequently, for both projects there are no other proposed construction activities in the vicinity of the construction sites during the anticipated construction period. Work is currently being completed on the hydrant fueling system pipeline, a portion of which passes approximately 200 feet north of the control tower; however, this work should be completed by mid FY03, before construction of the new control tower is started.

2.8 COMPARISON OF ENVIRONMENTAL EFFECTS OF THE PROPOSED ACTION AND ALTERNATIVES

Table 2.8.1 is a summary of the potential environmental impacts of the Proposed Action and alternatives. A more detailed description of the potential environmental impacts

associated with the Proposed Action and no action alternative is presented in Table 2-1 in the back of the report.

Table 2.8.1 Comparison of Environmental Consequences

Environmental Resources	Alternative A – Proposed Action	Alternative B – No Action
Air Quality	Short-term – *Minor Adverse* Long-term – *Minor Adverse*	Short-term – No Impact Long-term – No Impact
Noise	Short-term – *Minor Adverse* Long-term – No Impact	Short-term – No Impact Long-term – No Impact
Hazardous Materials/ Wastes/Stored Fuels	Short-term – No Impact Long-term – *Minor Adverse*	Short-term – No Impact Long-term – No Impact
Water Resources	Short-term – No Impact Long-term – No Impact	Short-term – No Impact Long-term – No Impact
Floodplains	Short-term – No Impact Long-term – *Minor Adverse*	Short-term – No Impact Long-term – No Impact
Biological Resources	Short-term – No Impact Long-term – *Minor Adverse*	Short-term – No Impact Long-term – No Impact
Geology and Soils	Short-term – No Impact Long-term – No Impact	Short-term – No Impact Long-term – No Impact
Socioeconomics	Short-term – *Minor Positive* Long-term – No Impact	Short-term – No Impact Long-term – No Impact
Cultural Resources	Short-term – No Impact Long-term – No Impact	Short-term – No Impact Long-term – No Impact
Transportation	Short-term – No Impact Long-term – No Impact	Short-term – No Impact Long-term – No Impact
Airspace/Airfield Operations and BASH	Short-term – *Positive* Long-term - *Positive*	Short-term – *Adverse* Short-term - *Adverse*
Safety and Occupational Health	Short-term – *Positive* Long-term – *Positive*	Short-term – *Adverse* Long-term – *Adverse*
Environmental Justice	Short-term – No Impact Long-term – No Impact	Short-term – No Impact Long-term – No Impact
Indirect and Cumulative Impacts	Short-term – No Impact Long-term – No Impact	Short-term – No Impact Long-term – No Impact

THIS PAGE INTENTIONALLY LEFT BLANK

SECTION 3.0 AFFECTED ENVIRONMENT

This section describes the characteristics of the existing natural and man-made environment that could be affected by implementation of the Proposed Action including all considered alternatives. A summary of the overall mission objectives of MacDill AFB is also provided. This section establishes the basis for assessing impacts of the alternatives on the affected environment provided in Section 4.0.

First established in 1939 as an Army airfield, MacDill AFB became an Air Force Base in 1948. The Base has undergone several mission changes and played a vital role in training and strategic defense. Today, the host unit at MacDill AFB is the 6th Air Mobility Wing (AMW). The Base is home to several key tenant units, including USCENTCOM, USSOCOM, and the National Oceanic and Atmospheric Administration (NOAA) of the Department of Commerce (DOC).

MacDill AFB comprises 5,630 acres. The installation elevation ranges from sea level to approximately 15 feet above mean sea level (MSL). Much of the Base is less than 5 feet above MSL, and wetland areas are common, especially mangrove wetlands.

The Base has one active runway (04-22) and an inactive runway that is used as a taxiway. MacDill AFB airfield facilities provide the capability to accommodate any aircraft in service with the United States government. The Base contains more than 900 buildings, including administrative and support facilities, a hospital and dental clinic, military housing, and recreation areas.

MacDill AFB is located in Hillsborough County at the southern tip of the Interbay Peninsula. The Base is surrounded on three sides by Tampa Bay and Hillsborough Bay and is bordered on the north by development within the City of Tampa. Land uses adjacent to the Base are a mix of single-family residential, light commercial and industrial designations.

The area has a humid, subtropical climate characterized by long, hot summers and short, mild winters. The average annual temperature is approximately 73 degrees Fahrenheit (°F) with average minimum and maximum temperatures being approximately 63°F and 82°F, respectively. The rainy season generally occurs from May through September, with the dry season occurring during late fall and winter. Annual rainfall averages approximately 44 inches.

3.1 AIR QUALITY

The Clean Air Act (CAA), as amended in 1977 and 1990, provides the basis for regulating air pollution to the atmosphere. Different provisions of the CAA apply depending on where the source is located, which pollutants are being emitted, and in what amounts. The CAA required the United States Environmental Protection Agency (USEPA) to establish ambient ceilings for certain criteria pollutants. The ceilings were based on the latest scientific information regarding the effects a pollutant may have on public health or welfare. Subsequently, USEPA promulgated regulations that set national ambient air quality standards (NAAQS). Two classes of standards were established: primary and secondary. Primary standards define levels of air quality necessary, with an adequate margin of safety, to protect public health, including the health of "sensitive" populations such as asthmatics, children, and the elderly. Secondary standards define levels of air quality necessary to protect public welfare (e.g. decreased visibility; damage to animals, crops, vegetation, wildlife, and buildings) from any known to anticipated adverse effects of a pollutant.

Air quality standards are currently in place for six "criteria" pollutants: carbon monoxide (CO), nitrogen dioxide (NO_2), ozone (O_3), sulfur oxides (SO_x, measured as sulfur dioxide [SO_2]), lead (Pb), and particulate matter with an aerodynamic diameter less than or equal to 10 micrometers (PM_{10}). There are many suspended particles in the atmosphere with aerodynamic diameters larger than 10 micrometers, and the collective of all particle sizes is commonly referred to as total suspended particulates (TSP). The NAAQS are the

cornerstone of the CAA. Although not directly enforceable, they are the benchmark for the establishment of emission limitations by the states for the pollutants USEPA determines may endanger public health or welfare.

O_3 (ground-level O_3), which is a major component of "smog", is a secondary pollutant formed in the atmosphere by photochemical reactions involving previously emitted pollutants or precursors. O_3 precursors are mainly nitrogen oxides (NO_x) and volatile organic compounds (VOCs). NO_x is the designation given to the group of all oxygenated nitrogen species, including nitric oxide (NO), NO_2, nitrous oxide (N_2O), and others. However, only NO, NO_2, and N_2O are found in appreciable quantities in the atmosphere. VOCs are organic compounds (containing at least carbon and hydrogen), that participate in photochemical reactions, and include carbonaceous compounds except metallic carbonates, metallic carbides, ammonium carbonate, carbon dioxide (CO_2), and carbonic acid. Some VOCs are considered nonreactive under atmospheric conditions and include methane, ethane, and other organic compounds.

As noted above, O_3 is a secondary pollutant and is not directly emitted from common emissions sources. Therefore, to control O_3 in the atmosphere, the effort is made to control NO_x and VOC emissions. For this reason, NO_x and VOC emissions are calculated and reported in emission inventories.

The Environmental Protection Commission of Hillsborough County (EPC) is responsible for issuing and enforcing the CAA Title V Air Operation Permit (Permit No. 0570141-001-AV issued 21 Oct 99) for MacDill AFB. The regulated emission units at MacDill AFB include four JP-8 tanks, one additive storage tank, three steam generating boilers, two liquid oxygen/nitrogen generators, nine paint spray booths, and a bead-blasting booth. The 1998 air emission inventory at MacDill AFB found the installation is a major source of nitrogen oxides with potential emissions of 184 tons per year. The Title V Air Operation Permit indicates the installation is not a major source of hazardous air

pollutants. MacDill AFB files compliance emission test data with the county, and periodically monitors emission sources as necessary under the Title V permit.

3.1.1 Attainment Status

The fundamental method by which USEPA tracks compliance with the NAAQS is the designation of a particular region as "attainment" or "non-attainment." Based on the NAAQS, each state is divided into four types of areas for each of the criteria pollutants:

1) Those areas that are in compliance with the NAAQS (attainment),

2) Those areas that don't meet the ambient air quality standards (non-attainment),

3) Those areas that were formerly non-attainment, but are currently in maintenance of attainment status, and

4) Those areas where a determination of attainment/non-attainment cannot be made due to a lack of monitoring data (unclassifiable – treated as attainment until proven otherwise).

MacDill AFB is located in Hillsborough County within the West Central Florida Intrastate Air Quality Control Region (AQCR). Hillsborough County has received full air permitted delegation from the State. This allows the EPC, exclusively, to conduct permitting determinations, process applications, and issue air pollution permits for most facilities. While Hillsborough County has one monitoring location not in attainment for lead, the USEPA has designated the air quality within Hillsborough County as meeting NAAQS for all criteria pollutants (60 FR 62748, December 7, 1995). The county was formerly non-attainment for ozone, but is currently in maintenance of attainment.

3.1.2 Baseline Air Emissions

An air emissions inventory is an estimate of total mass emission of pollutants generated from a source or sources over a period of time, typically a year. The quantity of air

pollutants is generally measured in pounds per year or tons per year (tpy). Emission sources may be categorized as either mobile or stationary emission sources. Typically, mobile emission sources at Air Force installations include aircraft, surface vehicles, aerospace ground equipment, and weapons testing. Stationary emission sources may include boilers, generators, fueling operations, industrial processes, and burning activities among others. Accurate air emissions inventories are needed for estimating the relationship between emissions sources and air quality. The 1998 Air Emissions Inventory summary for Hillsborough County is presented in Table 3.1.2 and includes only stationary sources.

Table 3.1.2 Stationary Air Emissions Inventory, Hillsborough County, Florida

Stationary Pollutant Emission Sources	CO (tpy)	VOC (tpy)	SO_x (tpy)	NO_x (tpy)	PM_{10} (tpy)[3]	Pb (tpy)
Hillsborough County[1]	19,272	27,703	NA	82,563	NA	53
MacDill AFB[2]	5.19	2.75	0.30	6.04	0.51	--

1 Source: 1997 Air Emissions Inventory, EPC of Hillsborough County (NA = not available)

2 Source: MacDill AFB 1998 Air Emissions Inventory, Executive Summary

3 PM_{10} estimated as 50 percent of the 1990 tons per year reported for TSP.

Radon gas. The level at which the USEPA recommends consideration of radon mitigation measures is 4 picocuries per liter (pCi/L). According to a sampling report obtained from 6 AMDS/SGPB, radon is not a concern at MacDill AFB (USAF, 1987). All samples analyzed were below the USEPA target levels of 4 pCi/L.

3.1.3 State Regulations

The CAA does not make the NAAQS directly enforceable, but requires each state to promulgate a State Implementation Plan (SIP) that provides for implementation, maintenance, and enforcement of the NAAQS in each AQCR in the state. The CAA also

allows states to adopt air quality standards that are more stringent than the federal standards. The Florida SIP has adopted the NAAQS as the Florida standards as listed in Table 3.1.3.

Table 3.1.3 National and State Ambient Air Quality Standards

Criteria Pollutant	Averaging Time	Primary NAAQS[a,b,c]	Secondary NAAQS[a,b,d]	Florida Standards[a,b]
Carbon Monoxide	8-hour 1-hour	9 ppm (10 mg/m^3) 35 ppm (40 mg/m^3)	No standard No standard	9 ppm (10 mg/m^3) 35 ppm (40 mg/m^3)
Lead	Quarterly	1.5 μg/m^3	1.5 μg/m^3	1.5 μg/m^3
Nitrogen Dioxide	Annual	0.0543 ppm (100 μg/m^3)	0.0543 ppm (100 μg/m^3)	0.0543 ppm (100 μg/m^3)
Ozone	8-hour	0.08 ppm (150 μg/m^3)	0.08ppm (150 μg/m^3)	0.08ppm (150 μg/m^3)
PM_{10}	Annual 24-hour	50 μg/m^3 150 μg/m^3	50 μg/m^3 150 μg/m^3	50 μg/m^3 150 μg/m^3
Sulfur Oxides (measured as SO_2)	Annual 24-hour 3-hour	0.03 ppm (80 μg/m^3) 0.14 ppm (365 μg/m^3) No standard	No standard No standard 0.50 ppm (1,300 μg/m^3)	0.03 ppm (80 μg/m^3) 0.14 ppm (365 μg/m^3) No standard

PM_{10} Particles with aerodynamic diameters less than or equal to a nominal 10 micrometers

a The 8-hour primary and secondary ambient air quality standards are met at a monitoring site when the average of the annual fourth-highest daily maximum 8-hour average ozone concentration is less than or equal to 0.08ppm.

b The NAAQS and Florida standards are based on standard temperature and pressure of 25 degrees Celsius and 760 millimeters of mercury.

c National Primary Standards: The levels of air quality necessary to protect the public health with an adequate margin of safety. Each state must attain the primary standards no later than three years after the state implementation plan is approved by the USEPA.

d National Secondary Standards: The levels of air quality necessary to protect the public welfare from any known or anticipated adverse effects of a pollutant. Each state must attain the secondary standards within a "reasonable time" after the state implementation plan is approved.

3.2 NOISE

The meaning of noise for this analysis is undesirable sound that interferes with speech communication and hearing, or is otherwise annoying (unwanted sound). Under certain conditions, noise may cause hearing loss, interfere with human activities at home and

work, and may affect people's health and well-being in various ways. Community noise levels usually change continuously during the day, and also exhibit a daily, weekly, and yearly pattern.

The day-night average sound level (DNL) developed to evaluate the total daily community noise environment applies here. In June 1980, the Federal Interagency Committee on Urban Noise published guidelines relating DNL values to compatible land uses. This committee was composed of representatives from the U.S. Departments of Defense, Transportation, and Housing and Urban Development; the USEPA; and the Veterans Administration. Since their issuance, Federal agencies have generally adopted their guidelines for noise analysis. Most agencies have identified 65 dB DNL as a criterion that protects those most affected by noise and that can often be achieved on a practical basis. Base activities that have the highest potential source of noise impacts are the aircraft/airspace operations. The Air Installation Compatible Use Zone (AICUZ) Study (1996) plotted the day-night average sound level (DNL) from 65 to 80 dB for a typical busy day at MacDill. The DNL contours reflect the aircraft operations at MacDill AFB. The DNL 65 dB contour covers the main runway, and extends about one mile southwest over Tampa Bay, and about 1.5 miles northeast over Hillsborough Bay. The proposed Crash Rescue Facility is outside the 65 dB contour; however, the proposed location for the Control Tower lies within the 65 dB contour due to its proximity to the runway.

3.3 WASTES, HAZARDOUS MATERIALS, AND STORED FUEL

3.3.1 Wastes

There are two classifications of wastes generated at MacDill AFB: nonhazardous solid waste and hazardous waste. Nearly 80 percent of the solid waste generated from various residential and industrial sources is incinerated as an energy source at the City of Tampa incineration facility off base. The remainder is disposed at Hillsborough County landfill

facilities. Curbside recycling is available in Military Family Housing areas at the Base and cardboard, paper, and aluminum recycling is conducted throughout the Base.

Hazardous wastes generated at MacDill AFB include solvents, fuels, lubricants, stripping materials, used oils, waste paint-related materials, and other miscellaneous wastes. The responsibility for managing hazardous waste lies with the generating organization and 6 CES/CEV. Wastes come from approximately 50 locations throughout the Base and are managed at satellite accumulation points base-wide. At a satellite accumulation point, up to 55 gallons of waste can be accumulated for an indefinite length of time. Satellite accumulation points are located at or near the points of hazardous waste generation. The former hazardous waste storage facility at Building 1115 is now in closure status under RCRA and is currently classified as a 90-day accumulation point. At a 90-day accumulation point an indefinite quantity of hazardous waste can be accumulated for up to 90 days. The Defense Reutilization and Marketing Office (DRMO) is responsible for the sale, reclamation, or disposal of hazardous materials and wastes.

Used oil is accumulated at sites around the Base and is periodically picked up by an outside contractor for recycling. Waste antifreeze, tires, batteries, and fluorescent bulbs are also picked up by outside contractors for recycling.

3.3.2 Hazardous Materials

Approximately 105 operations base-wide use hazardous materials. Hazardous materials on-base include various organic solvents, chlorine, freon, paints, thinners, oils, lubricants, compressed gases, pesticides, herbicides, nitrates, and chromates. A detailed tracking and accounting system is in place to identify potentially hazardous materials and to ensure that Base organizations are approved to use specific hazardous materials. The Base is following Air Force guidelines to identify and eliminate the use of ozone-depleting chemicals.

3.3.3 Stored Fuel

The Base receives jet fuel (JP-8) at the Defense Fuel Supply Point (DFSP) by pipeline from Port Tampa, while other fuels are delivered to the Base by commercial tank trucks. JP-8 storage capacity at DFSP and MacDill AFB is over 7.5 million gallons. The storage facilities consist of four large, aboveground, floating-roof tanks at DFSP (total capacity 5.3 million gallons total); 44 underground hydrant tanks for the flightline (total capacity 2.2 million gallons); three aboveground storage tanks (ASTs) at the Fuels Mobility Support Equipment (FMSE) area; and small ASTs and underground storage tanks (USTs) at various locations throughout the Base.

3.4 WATER RESOURCES

3.4.1 Surface Water

Surface water flows at the Base are primarily from storm water runoff. Topographic maps show that the entire Base is an independent drainage area with no natural surface waters entering or leaving the site prior to final discharge into Tampa Bay. Most of the Base drains toward the southern tip of the Interbay Peninsula; however, the easternmost section of the Base drains toward Hillsborough Bay.

About 25 percent of the Base surface cover is impervious. The soil type is predominantly poorly drained fine sands. The drainage system consists of piping and surface ditches. Man-made ponds exist primarily on the southeast portion of the Base. In the southern portion of the Base there is a poorly drained area that includes two creeks, Coon's Hammock Creek and Broad Creek. This area is subject to shallow flooding by the highest of normal tides.

The USEPA issued a National Pollutant Discharge Elimination System (NPDES) multi-sector storm water general permit (No. FLR05B679) to MacDill AFB in October 1998. This permit authorizes the discharge of storm water associated with industrial activity.

Areas of potential runoff contamination at the Base are the runways and the airfield aprons.

In addition to runoff flows, there are non-rainfall related flows discharging into the storm water system. These flows include drainage from equipment maintenance facilities. To control for discharges of floating pollutants resulting from accidental spills, the Base maintains a number of boom-type containment systems and absorbents across storm water channels. Most of these facilities discharge into the sanitary sewer system. The Base also maintains a Spill Prevention Control and Countermeasures (SPCC) Plan to satisfy 40 CFR 112. Per the same regulation, a Facility Response Plan was developed given the location of the Base adjacent to navigable waters and shorelines, as well as the amount of fuel storage capacity existing on site.

3.4.2 Groundwater

There are two aquifer systems underlying MacDill AFB, the surficial aquifer and the Floridan aquifer. The surficial aquifer system, which consists generally of sand, clayey sand, and shell, is unconfined and is approximately 20 feet thick; however, the surficial aquifer is not used for water supply at MacDill AFB. In residential areas beyond the Base boundaries, small-diameter wells are installed in the surficial aquifer to supply small irrigation systems. The Floridan aquifer underlies the surficial aquifer and is separated from it by a clay confining layer. The Floridan aquifer is a major source of groundwater in the region, but is not used for water supply at MacDill AFB. Potable water is supplied to MacDill AFB by the City of Tampa, which obtains most of its drinking water from surface water sources.

The water table in the surficial aquifer is shallow and ranges from land surface near Tampa Bay and tidal creeks, to approximately five feet below land surface at inland locations. Groundwater levels and flow directions generally are determined by low gradients and are tidally influenced by ditches and canals, and by Hillsborough and Tampa Bays. The direction of groundwater flow in the surficial aquifer is generally radial

from the north-central portion of the Base towards the coastline. Groundwater mounding has been shown to occur in the golf course area where reclaimed water from the on-base wastewater treatment plant is applied by spray irrigation.

Groundwater quality has been affected by past and present Base activities. Elevated volatile organic compound concentrations have been found in surficial aquifer groundwater at various sites that contain, or contained petroleum storage tanks. Elevated metals concentrations have been found in areas of former landfills. Elevated nitrate, nitrite, and pesticide concentrations have been identified in golf course areas.

3.5 FLOODPLAINS

According to information provided by the Federal Emergency Management Agency (FEMA Maps dated 1982-1991), 80 percent of the Base is within the 100-year floodplain (see Figure 3-1). The maps indicate that all the residential, industrial, and institutional (medical and education) land uses on the Base are within the 100-year floodplain, along with most of the commercial and aviation support areas. The remaining 20% of land that is above the floodplain is designated primarily for airfield operations.

The extent of the floodplain is an important consideration for MacDill AFB because EO 11988, *Floodplain Management*, regulates the uses of these areas. The objective of this presidential order is to avoid to the extent possible the long- and short-term adverse impacts associated with occupancy and modification of floodplains. The order applies to all Federal agencies conducting activities and programs that may potentially affect floodplains. To comply with EO 11988, before taking any action, the Air Force must evaluate the impacts of specific proposals in the floodplain. The sites proposed for the crash rescue facility and the control tower are both located in the 100-year floodplain.

3.6 BIOLOGICAL RESOURCES

3.6.1 Vegetative Communities

Land use on MacDill AFB includes urban, light industrial, residential, or improved vacant land. The improved vacant land includes cleared open fields, grassed areas, treated wastewater spray fields, and the golf course. The developed and semi-developed areas on the Base comprise approximately 3,500 acres of the 5,630-acre Base. The few undeveloped areas within the Base boundaries have all experienced some degree of disturbance, such as ditching, clearing, or the encroachment of exotic vegetation. The unimproved vegetative communities include forested uplands and shrub-scrub wetlands.

3.6.2 Wetlands

The 1998 Wetland Delineation Study identified, delineated, and classified approximately 1,195 acres of wetlands on MacDill AFB. Wetland systems included palustrine wetlands (317 acres) and scrub/shrub wetlands (880 acres). Mangrove wetlands are the principal scrub/shrub wetland community on the Base. Black mangrove (*Avicennia germinans*) and white mangrove (*Laguncularia racemosa*) are the dominant species. Red mangrove (*Rhizophora mangle*) is also present at the waterward fringes of the community. The mangroves have been negatively impacted by historic dredge and fill activities and the excavation of mosquito ditches. However, despite these impacts, this community provides valuable wildlife habitat and is protected by state and local regulations.

A jurisdictional wetland survey performed by an U.S. Army Corps of Engineers (USCOE) certified wetland delineator identified general locations of Waters of the United States and vegetated wetlands at MacDill AFB (USAF, 1998). Wetlands are indicated in the vicinity of each of the proposed construction sites; however, not within the boundaries of the construction sites. A site visit by a representative of the MacDill AFB natural resources staff verified the presence of wetlands approximately 600 feet south of the proposed crash rescue facility site (Figure 3-2) and approximately 100 feet east of the control tower site (Figure 3-3).

3.6.3 Wildlife

Representatives from the Florida Fish and Wildlife Conservation Commission (formerly the Florida Game and Freshwater Fish Commission), National Audubon Society, and the Tampa Bay Sanctuaries completed an evaluation of the wildlife habitat on MacDill AFB in 1994. These surveys determined that the habitat quality ranged from poor to excellent, with the upland forested communities considered poor and the mangrove wetlands considered excellent. The upland forested habitat has been degraded for native fauna due to the suppression of the natural fire cycle, the fragmentation of the habitat, and the invasion of exotic vegetation. The mangrove wetland habitat has been degraded somewhat by the excavation of mosquito ditches and the deposition of spoil within the wetlands. However, the large contiguous habitat area that the mangroves provide and the relative inaccessibility to humans have increased the habitat value.

The surveys also included an evaluation of the wildlife species present and potentially present on the Base. The species observed during the surveys included one reptile, 10 mammals, and 79 birds. Based on the types of habitat available, the survey concluded that 20 reptiles, 17 mammals, and 155 birds might occur within the boundaries of the Base.

MacDill AFB has developed an Integrated Natural Resources Management Plan (INRMP) which details how the base manages, protects and improves its natural resource and outdoor areas. The INRMP, recently updated in November 2000 has been reviewed and approved by the Air Force as well as Federal and state Fish and Wildlife regulatory organizations. The INRMP utilizes an ecosystem management approach and aims to protect and improve entire ecologic communities which will in turn benefit individual species with the community. The INRMP outlines numerous projects designed to restore habitat areas, protect and encourage threatened and endangered species, improve outdoor recreation, and generally promote the protection, improvement and use of the base's natural areas.

3.6.4 Endangered, Threatened, and Special Concern Species

Wildlife species listed by federal or state agencies as endangered, threatened, or of special concern and known to occur permanently or periodically, or have the potential to occur on the Base are shown in Table 3.6.4. The majority of the listed species are associated with the mangrove community and include shore birds, wading birds, and raptors. These species use the mangrove community primarily for foraging and nesting.

The forested upland communities provide habitat for several state and federally listed species. The southeastern American kestrel, the burrowing owl, and gopher tortoise have been observed within this community on the Base. Other listed species that may occur in this habitat include gopher frog, Florida pine snake, short-tailed snake, Bachman's warbler, and Florida mouse. A pair of bald eagles has repeatedly nested on MacDill AFB for the past several years. Over the years, the eagles have constructed two nests, the first nest was abandoned about three years ago in favor of a new location closer to the South Ramp. The tree with the active nest was blown over during Tropical Storm Gabriel in September 2001. At the time of writing of this EA a new nest site has not been identified and the abandoned nest is not being rebuilt.

In 1996, the *Endangered Species Management Plan MacDill AFB* and the *Biological Survey of MacDill AFB* identified the general locations of protected species at MacDill AFB. Neither survey identified nesting sites or other species habitat for protected species at or in the vicinity of the two proposed construction sites (USAF, 1996).

TABLE 3.6.4

SUMMARY OF PROTECTED SPECIES IDENTIFIED AT MACDILL AFB

Common name	Scientific Name	Status	
		Federal	State
Reptile/Amphibians			
American alligator	*Alligator mississippiensis*	T (SA)	SSC
Atlantic loggerhead turtle	*Caretta caretta caretta*	T	T
Atlantic green turtle	*Chelonia mydas mydas*	E	E
Gopher tortoise	*Gopherus polyphemus*	-	SSC
Gopher frog	*Rana capito*	C2	SSC
Florida pine snake	*Pituophis melanoleucus mugitus*	C2	SSC
Short-tailed snake	*Stilosoma extenuatum*	C2	T
Birds			
Roseate spoonbill	*Ajaia ajaja*	-	SSC
Limpkin	*Aramus guarauna*	-	SSC
Burrowing owl	*Athene cunicularia*	-	SSC
Piping plover	*Charadrius melodus*	T	T
Southeastern snowy plover	*Charadrius alexandrinus tenuirostris*	C2	T
Little blue heron	*Egretta caerulea*	C2	SSC
Reddish egret	*Egretta rufescens*	C2	SSC
Snowy egret	*Egretts thula*	-	SSC
Tricolored heron	*Egretta tricolor*	-	SSC
Peregrine falcon	*Falco peregrinus tundris*	T	E

Common name	Scientific Name	Status	
		Federal	State
Birds (continued)			
Southeast American kestrel	*Falco sparverius paulus*	C2	E
Florida sandhill crane	*Grus Canadensis pratensis*	-	T
American oystercatcher	*Haematopus palliatus*	-	SSC
Bald eagle	*Haliaeetus leucocephalus*	T	T
Wood stork	*Mycteria americana*	E	E
Brown pelican	*Pelecanus occidentalis*	-	SSC
Least tern	*Sterna antillarum*	-	T
Roseate tern	*Sterna dougalii*	T	T
Bachman's warbler	*Vermivora bachmanii*	E	E
Black skimmer	*Rynchops niger*	-	SSC
White ibis	*Eudocimus albus*	-	SSC
Mammals			
Florida mouse	*Podomys floridanus*	C2	SSC
West Indian (FL) manatee	*Trichechus manatus*	E	E
Fish			
Common snook	*Centropomus undecimalis*	-	SSC
Plants			
No State or Federally listed plant species are known to exist on MacDill AFB		-	-

T=Threatened, T(SA)=Threatened/Similarity of Appearance, E= Endangered, SSC= Species of Special Concern, C2=Candidate for listing

Source: Endangered Species Management Plan, MacDill AFB, Florida, 1996

3.7 SOCIOECONOMICS

The Economic Impact Region (EIR) for MacDill AFB is the geographic area within a 50-mile radius of the Base subject to significant Base-related economic impacts. The area includes all or part of Hillsborough, Pinellas, Polk, Pasco, Hardee, Manatee, Sarasota, and DeSoto Counties.

According to the 1998 Economic Resource Impact Statement for MacDill AFB, the Center for Economic and Management Research of the University of South Florida has estimated the total economic impact of MacDill AFB on the EIR as $3.5 billion with over 105,000 jobs supported. The two types of impacts the Base has on the economy are Base operations and retiree income.

Base operations require input of local labor, goods, and services. This impact supports approximately 41,000 jobs in the Tampa Bay region and provides a total annual economic impact of $1.34 billion. The direct impact on local income produced by Base expenditures is $494 million.

Retirees who have moved into the region because of the services provided to them by the Base place additional demands on all facets of the region's economy. Retiree income provides a total economic impact of $2.19 billion and supports over 64,000 jobs in the EIR. This total impact reflects retirees' spending patterns and the interaction with the economy this creates.

3.8 CULTURAL RESOURCES

Cultural resources are prehistoric and historic sites. These resources consist of districts, buildings, structures and objects that are significant in American history, architecture, archaeology, engineering, and culture. Historic properties listed in or eligible for listing in the National Register of Historic Places (NRHP) are subject to protection or consideration by a federal agency in accordance with Section 106 of the National Historic Preservation Act of 1966, as amended.

3.8.1 Prehistoric Resources

Five archaeological sites are on MacDill AFB. Their identifying numbers are 8HI49, a sand mound in the southeastern area of the Base at Gadsden Point that may have been inadvertently destroyed during construction of the golf course; 8HI50, a shell mound in the southeastern area of the Base; 8HI3380 (Coon's Hammock Site), a Woodland-period shell midden in the southern area of the Base, adjacent to Coon's Hammock Creek; 8HI3382, an Archaic period site located near the flight line; and Site HI5656 (EOD area). Site 8HI3382 and portions of site 8HI50 have been determined by the State Historic Preservation Officer (SHPO) to be eligible for listing in the NRHP. The remaining sites are not eligible for listing in the NRHP.

3.8.2 Historic Resources

Construction of MacDill AFB began in November 1939, and the Base was dedicated in April 1941. Sites and structures related to the early missions remain on Base today. Eligible for listing in the NRHP is the historic district that comprises the buildings along Hangar Loop. This district includes the five hangars and their associated support buildings that make up the proposed MacDill Field World War II-Era Historic District. The second area eligible for listing is the general officer housing area situated on Staff Loop adjacent to Bayshore Drive. The proposed crash rescue facility and control tower sites are not located in either of the Historic Districts.

3.9 LAND USE

Land use at MacDill AFB includes airfield, industrial, commercial, institutional (educational & medical), residential, recreational, and vacant land. The sites proposed for the crash rescue facility and control tower are both designated as industrial land use.

Directly adjacent to the northern boundary of MacDill AFB are urban portions of the City of Tampa. Tampa regulates planning, zoning, and the subdivision of land within its corporate boundaries, which do not include MacDill AFB.

Developed land is contiguous to portions of the northern Base boundary and is characterized by infilling of vacant and undeveloped land parcels, within an established grid street pattern. Adjacent land is privately owned and zoned for residential, commercial, and industrial use by the City of Tampa.

3.10 TRANSPORTATION

MacDill AFB is served by four operating gates. The main gate is located at Dale Mabry Highway, and secondary gates are at Bayshore Boulevard and MacDill Avenue. A 1998 Entry Gate Development Study (USAF) detailed traffic counts at the Dale Mabry and Bayshore gates during both morning and evening rush hours and during lunch hour. During the peak hours, over 4,400 vehicles pass through the Dale Mabry gate, and over 1,800 vehicles travel through the Bayshore gate. Both gates are open 24 hours per day. The MacDill Avenue gate is open only from 6 to 8 a.m. during the morning peak hour, and traffic counts are not available for this gate. The fourth gate, located on the west side of the Base near Manhattan Avenue, has been reopened and is used as the sole entry point for commercial, contractor, delivery, and recreational vehicles.

Traffic conditions on the roadways that access the Base are generally acceptable. However, sections of Bayshore Boulevard near Gandy Boulevard and sections of Gandy Boulevard west of Dale Mabry currently operate at congested levels of service.

The transportation system on Base consists of arterials, collectors, and local streets that connect with the off-base network through the three gates. On-base arterial facilities include North and South Boundary Roads, Bayshore Boulevard, Marina Bay Drive, and Tampa Point Boulevard. The 1998 traffic study determined that service levels for traffic on Base are generally acceptable. However, modification to intersections along South Boundary Boulevard, Tampa Point Boulevard, and Marina Bay Drive would increase flow and safety.

3.11 AIRSPACE AND AIRFIELD OPERATIONS

The airspace region of influence includes the airspace within a 20-nautical-mile radius of MacDill AFB from the ground surface up to 10,000 feet above MSL. Radar monitoring and advisories within the region are provided by the Tampa Terminal Radar Approach Control (TRACON). There are 13 military and public airports, as well as five private use airports located within or adjacent to the controlled airspace associated with the MacDill AFB region of influence. No special use airspace exists within the region.

3.12 ACCIDENT POTENTIAL

MacDill AFB has a bird-aircraft strike hazard plan. It provides guidance for reducing the incidents of bird strikes in and around areas where flying operations occur. The plan establishes provisions to disperse information on specific bird hazards and procedures for reporting hazardous bird activity. The design and construction of any facilities within the vicinity of the airfield must comply with certain restrictions such as covering open water areas that may encourage bird foraging activity, and keeping grassed areas cut to regulation height.

3.13 SAFETY AND OCCUPATIONAL HEALTH

3.13.1 Asbestos

The MacDill AFB Asbestos Management Plan identifies procedures for management and abatement of asbestos. Prior to renovations or demolition of existing non-residential buildings, asbestos sampling is performed by a contractor to determine the percent and type of asbestos in the material. The asbestos is removed prior to the demolition or renovation of any facility in accordance with applicable Federal and state regulations.

3.13.2 Lead-Based Paint

The Base engineer assumes that all structures constructed prior to 1978 possibly contain lead-based paint (LPB). A LBP survey of family housing units and non-housing high priority facilities was completed in 1994. The survey identified LBP in 80 percent of the

tested facilities. LBP abatement is accomplished in accordance with applicable Federal and state regulations prior to demolition activities to prevent any health hazards.

THIS PAGE INTENTIONALLY LEFT BLANK

SECTION 4.0
ENVIRONMENTAL CONSEQUENCES

Although insignificant, minor impacts to the environment could result from implementation of the Proposed Action. Section 4.0 discusses the potential effects associated with implementation of the Proposed Action and the alternative to the Proposed Action. The Proposed Action is to construct a new crash rescue facility and a new air traffic control tower at the locations proposed in Section 2.2. The Proposed Action also includes demolition of the existing control tower, Facility 1108, upon completion of the new control tower. The only alternative to the Proposed Action evaluated in this section is the No-Action alternative. This alternative would not construct either of the proposed new facilities and operations at MacDill AFB would continue as they do now with no improvement in safety or efficiency. Other alternatives were initially considered but failed to meet the purpose and need for the proposed action because they did not satisfy the selection criteria.

4.1 AIR QUALITY

4.1.1 Proposed Action

Air quality impacts would occur during construction of the new crash rescue facility and the air traffic control tower as well as demolition of the existing control tower; however, these air quality impacts would be temporary.

Fugitive dust (particulate matter: suspended and PM_{10}) and construction vehicle exhaust emissions would be generated by (1) equipment traffic; and (2) entrainment of dust particles by the action of the wind on exposed soil surfaces and debris. These emissions would be greater during the new area site grading. Emissions would vary daily.

Dust would be generated by equipment travel over temporary roads and would fall rapidly within a short distance from the source. In addition, all of the proposed construction and demolition sites are in isolated areas of the base significantly limiting impacts from dust.

The quantity of fugitive dust emissions from the construction site is proportional to the land being worked and the level of construction activity. USEPA has estimated that uncontrolled fugitive dust emissions from ground-disturbing activities would be emitted at a rate of 4.6 pounds per acre per working day or 0.05 tons per acre of construction per month of activity (USEPA, 1995). These emissions would produce slightly elevated short-term particulate concentrations, would be temporary, and would fall rapidly with distance from the source.

Chapter 62-296, Florida Administrative Code (FAC), requires that no person shall allow the emissions of unconfined particulate matter from any activity (including vehicular movement, transportation of materials, construction, demolition, or wrecking, etc.) without taking reasonable precautions to prevent such emissions. Reasonable precautions include:

- Paving and maintenance of roads, parking areas, and yards;
- Applications of water or chemicals (foam) to control emissions from such activities such as demolition, grading roads, construction, and land clearing;
- Application of asphalt, water, or other dust suppressants to unpaved roads, yards, open stock piles, and similar areas;
- Removal of particulate matter from roads and other paved areas under the control of the owner or operator of the facility to prevent reentrainment, and from building or work areas to prevent particulates from becoming airborne; and
- Landscaping or planting of vegetation.

Pollutants from construction equipment and vehicle engine exhausts include nitrogen oxides (NO_x), carbon monoxide (CO), PM_{10}, and VOCs. Internal combustion engine

exhausts would be temporary and, like fugitive dust emissions, would not result in long-term impacts. Pollutant emission estimates are presented in Appendix C and summarized in Table 4.1.1. The USEPA estimates that the effects of fugitive dust from construction activities would be reduced significantly with an effective watering program. Watering the disturbed area of the construction site twice per day with approximately 3,500 gallons per acre per day would reduce total suspended particle emissions as much as 50 percent (USEPA, 1995)

Table 4.1.1 Proposed Action Air Emissions at MacDill AFB

Pollutant	Proposed Action Annual Emissions (tpy)	Hillsborough County Emissions Inventory[a] (tpy)	Net Change (%)	De minimis Values[c] (tpy)	Above/ Below De minimis
CO	6.71	19,272	0.03	100	Below
VOC	3.29	27,703	0.01	100	Below
NO_X	7.67	82,563	0.007	100	Below
SO_X	0.38	NA	--	100	Below
PM10[b]	0.63	NA	--	100	Below
Pb	--	53	--	25	--

[a] Based on stationary permitted emissions presented in 1997 Ozone Emissions Inventory, EPC.
[b] PM_{10} estimated as 50 percent of the 1990 tpy reported for TSP
[c] Source: 40 CFR 93.153, November 30, 1993.
tpy Tons per year
% Percent

Minor, insignificant air emissions would result from operation of both the control tower and crash rescue facilities. These emissions, primarily associated with the occasional operation of the emergency power generators at each facility, have been determined to be a de-minimus emission source and would not cause the base to exceed threshold limits for it's Title V air permit.

4.1.1.1 Air Conformity Analysis

Federal actions must comply with the USEPA Final General Conformity Rule published in 40 CFR 93, Subpart B (for federal agencies) and 40 CFR 51 Subpart W (for state requirements). The Final Conformity Rule, which took effect on January 31, 1994,

requires all Federal agencies to ensure that proposed agency activities conform with an approved or promulgated SIP or Federal implementation plan (FIP). Conformity means compliance with a SIP or FIP for the purpose of attaining or maintaining NAAQS. Specifically, this means ensuring the Federal activity does not: 1) cause a new violation of the NAAQS; 2) contribute to an increase in the frequency or severity of violations of the existing NAAQS; 3) delay the timely attainment of any NAAQS; or 4) delay interim or other milestones contained in the SIP for achieving attainment.

The Final General Conformity Rule applies only to Federal actions in designated non-attainment or maintenance areas, and the rule requires that total direct and indirect emissions of non-attainment criteria pollutants, including ozone precursors, be considered in determining conformity. The rule does not apply to actions that are not considered regionally significant and where the total direct and indirect emissions of non-attainment criteria pollutants do not equal or exceed de minimis threshold levels for criteria pollutants established in 40 CFR 93.153(b). A Federal action would be considered regionally significant when the total emissions from the proposed action equaled or exceeded 10 percent of the non-attainment area's emissions inventory for any criteria air pollutant. If a Federal action meets de minimis requirements and is not considered a regionally significant action, then it does not have to undergo a full conformity determination. Ongoing activities currently being conducted are exempt from the rule so long as there is not an increase in emissions above the de minimis levels as the result of the Federal action.

For purposes of analysis, it was assumed that the type and square footage of the facilities described under the Proposed Action construction are those specified in Section 2.2.2, for a total of approximately 62,010 square feet of new construction and demolition. It was assumed that the period of construction was limited to one year. The annual emissions presented in Table 4.1.1 include the estimated annual PM_{10} emissions associated with implementation of the Proposed Action at MacDill AFB (see Appendix C).

The Proposed Action involves construction of a new crash rescue facility, as well as the replacement of the substandard control tower with a new control tower; however, no significant increase in baseline air emissions is anticipated upon completion of the project.

An air conformity analysis was performed using the estimated annual emissions associated with the implementation of the Proposed Action. The estimated values for CO, VOCs, NO_x, SO_x, and PM_{10} were determined to be less than the USEPA de minimis values and less than 10% of the Hillsborough County emissions inventory (see Table 4.1.1).

A conformity determination under the CAA conformity rules is not required because; 1) the Proposed Action is not regionally significant since Hillsborough County emissions will increase by less than 10%, and 2) the Proposed Action estimated emissions are below the de minimis values as stated in 40 CFR 93.153(b). Since the action's emissions are low, temporary, and insignificant, the Proposed Action would conform to the SIP.

4.1.2 No-Action Alternative

Because the status quo would be maintained, there would be no impacts to air quality under the No-Action alternative.

4.1.3 Cumulative Air Quality Impacts

The cumulative air impacts would include air sources from other proposed construction projects on MacDill AFB. Table 1 in Appendix C presents the estimated air emissions calculated for projects proposed for the near future, during the timeframe that construction and demolition activities would be completed. Based on the calculations provided in Appendix C, implementation of the Proposed Action would not result in cumulative air impacts that exceed guidance standards.

4.2 NOISE

The primary human response to environmental noise is annoyance (AIHA, 1986). The degree of annoyance has been found to correlate well with the DNL. Annoyance for short-term activities, such as construction noise and fire fighting, could be influenced by other factors such as awareness and attitude toward the activity creating the noise.

Several social surveys have been conducted in which people's reaction to their noise environment has been determined as a function of DNL occurring outside their homes. Guidelines have been developed for individual land uses based upon the information collected in these surveys and upon information concerning activity interference. For various land uses, the level of acceptability of the noise environment is dependent upon the activity that is conducted and the level of annoyance, hearing loss, speech interference, and sleep interference that results therefrom.

4.2.1 Proposed Action

Noise impacts associated with the Proposed Action would result from construction of the new crash rescue facility and the new control tower, as well as demolition of the existing control tower. The degree of noise impacts would be a function of the noise generated by construction equipment, the location and sensitivity of nearby land uses, and the timing and duration of the noise-generating activities. Normally, construction activities are carried out in stages and each stage has its own noise characteristics based on the mixture of construction equipment in use.

The highest calculated cumulative energy equivalent sound levels from construction activities are estimated to be approximately 85 dB at 50 feet from the center of the project site. Typical noise levels at 50 feet for various equipment that would be used during construction include: 80 dB for bulldozers, 83 dB for cranes, 85 dB for backhoes, and 91 dB for trucks (USEPA, 1971). The closest sensitive receptors are occupants of the various facilities that are adjacent to the construction and demolition sites.

The only facilities close to the proposed crash rescue facility are Buildings 91 and 1137, both located approximately 300 feet southwest of the proposed crash rescue facility site. Both buildings are occupied: Building 91 is being used to stage fire fighting vehicles as a temporary fire station; and Building 1137 is used as administrative/training space for fire fighter personnel. Due to the moderate distance between the existing facilities and the proposed construction site, construction of the crash rescue facility is not expected to result in significant noise impacts.

Since the new control tower would be constructed immediately adjacent to the existing control tower, air traffic control personnel working in the control tower would be impacted by noise both during construction of the new tower as well as demolition of the existing tower. The new control tower would be located approximately 30 feet northwest of the existing control tower. Presumably, air traffic control personnel would be tolerant of the construction noise since completion of the construction project would provide them with a new, larger facility, which would greatly improve their work environment. The noise impacts would also be limited in duration. Given the end result of the construction project and the temporary nature of the noise, it is believed that impacts from noise to personnel in the control tower would be negligible

Therefore, in summary, under the Proposed Action potential noise impacts would occur during the construction and demolition activities. These impacts; however, are temporary and considered minor.

The overall noise level produced during operation of the proposed crash rescue facility and new control tower would be consistent with normal Base activities on the installation, and would be insignificant.

4.2.2 No-Action Alternative

Under the No-Action Alternative no new noise impacts would occur since no demolition would occur and the new crash rescue facility and the new control tower would not be constructed.

4.2.3 Cumulative Noise Impacts

The cumulative noise impacts would include noise sources from the proposed construction activities, and other construction projects that have been approved in the vicinity of the project area. Currently; however, there are no other projects proposed for construction in the vicinity of new crash rescue facility or the new control tower. Consequently, no cumulative noise impacts would result from the Proposed Action. In general the noise increases associated with the Proposed Action would be incremental and considered insignificant in comparison with the noise level present at an active flying base.

4.3 WASTES, HAZARDOUS MATERIAL, AND STORED FUEL

The following section describes sanitary wastewater treatment, solid waste collection and disposal, hazardous material and waste management, and stored fuels management.

4.3.1 Proposed Action

A temporary increase in the generation of solid waste would occur during construction of the proposed crash rescue facility and control tower as well as demolition of the existing control tower. Local off-base waste handling services/facilities have sufficient capacity to handle this increased output. Since the number of personnel on base would not change with implementation of the Proposed Action, there would be no net increase in solid waste generation upon completion of the project.

The new crash rescue facility includes restrooms, showers, and kitchen facilities. The addition of these facilities would require connection to the base sanitary sewer system.

Although several new connections to the sanitary sewer system would result from the Proposed Action, these connections are not expected to increase the amount of wastewater generated on MacDill AFB since there would be no increase in the number of personnel on the base. Some of the fire fighting personnel would simply be transferring residence from the existing fire stations to the new crash rescue facility which would reduce the wastewater generated at the old station and correspondingly increase the wastewater generated at the new facility.

The new control tower also includes construction of restroom facilities; however, these facilities would not discharge to the base sanitary sewer system. No sanitary sewer collection lines have been installed west of the runway. Consequently, facilities west of the runway utilize individual septic systems for wastewater disposal. The existing control tower is connected to a septic system and the new control tower would be connected to the same septic system upon completion. An initial evaluation of the current control tower's septic system indicates that it is has sufficient capacity to service the new tower facility and would not need to be modified or upgraded.

Hazardous wastes/materials, such as paint, adhesives, and solvents, would be on site during construction of both the crash rescue facility and the control tower as well as demolition of the existing control tower. All hazardous wastes/materials would be temporarily stored and disposed of per Base procedures. All construction related hazardous wastes/materials, including petroleum products, would be removed and disposed of according to Base procedures following the completion of tasks. The disposal of such waste would be in compliance with established Base procedures. No impacts from hazardous materials or waste would occur during operation of the new crash rescue facility or the new control tower.

The existing control tower was constructed in 1972 and has the potential to contain asbestos and lead based paint. A review of the available records for the current control tower, Facility 1108, indicate that no surveys for lead based paint have been competed for

the building. The records indicate that an asbestos survey, completed in 1990 by the base Civil Engineering Squadron, identified 100 square feet of asbestos roofing tile at the control tower. No other asbestos results were found for Facility 1108. Prior to demolition of the existing control tower, the facility must be surveyed for asbestos containing building materials and lead based paint. If surveys identify asbestos containing building materials in Facility 1108, these materials must be removed from the facility before demolition begins by a licensed asbestos contractor in accordance with all Federal, state and local guidelines. If asbestos containing building materials are removed prior to demolition, an independent environmental consulting firm shall perform environmental monitoring of the work area during the asbestos abatement work.

If lead based paint is identified in Facility 1108 above the 0.5 percent (%) (or 5,000 mg/kg) action level, the material would be managed and disposed of in accordance with state and Federal regulations.

There are no Installation Restoration Program (IRP) sites within the area identified for construction of the crash rescue facility or the new control tower or in areas adjacent to the proposed construction sites. There is no reason to suspect that contaminated soil or groundwater would be encountered during construction of either of the proposed facilities. However, if contaminated media were encountered during construction, the material would be managed through the base IRP, using IRP funds, and following established IRP guidelines. Consequently, the discovery of contaminated media would not represent a significant impact to the project.

As with most operations facilities on MacDill AFB, both of the proposed facilities would include equipment for supplying emergency back-up power. Back-up power would be provided through an emergency diesel generator that would be supplied by a large storage tank. It is anticipated that the proposed storage tanks at each facility would be above-ground, double walled, steel tanks similar to those installed at other operational facilities on MacDill AFB. Construction and installation of the proposed storage tanks would be in

accordance with state regulations as outlined in Florida Administrative Code 62-761. These new tanks would be managed under the base storage tanks program and maintained by the base Power Production shop as are all the other emergency power generator systems on base. Therefore, assuming proper management of the storage tanks in accordance with state and local regulations, the Proposed Action would have no impact on stored fuels management and environmental compliance at the Base.

4.3.2 No-Action Alternative

Under the No-Action Alternative, no impacts to wastes or hazardous material or stored fuels would occur since there would be no change in the existing conditions.

4.4 WATER RESOURCES

4.4.1 Proposed Action

A small amount of soil erosion is expected to occur during construction and demolition activities since the soil surface would be exposed and disturbed at each location during the project. Soil erosion in areas that are disturbed would be controlled by implementation of a sediment and erosion control plan, including implementation of Best Management Practices (BMPs). This EA has been prepared under the assumption that upon completion of construction activities each site would, at a minimum, be covered with a clean layer of graded and grassed fill. Erosion from this surface, once the fill is in place, would be minimal. There would be no long-term impacts to water resources once the project is complete.

Under the Proposed Action, there would be no direct or indirect discharges to groundwater. No negative impacts to groundwater would occur with implementation of the Proposed Action.

Potable water would be required for the various restroom, locker room, and kitchen facilities that would be included in the proposed buildings. Although new connections to

the base potable water system would be required increase usage of potable water is not expected since there would be no increase in the number of personnel utilizing these facilities. Personnel would simply be relocating from one facility to another and use of the utilities at the former facility would be reduced or eliminated. The Proposed Action may in fact represent a positive effect on potable water usage on base since the new fixtures would be more efficient and protective of health. Overall, implementation of the Proposed Action would have a negligible impact on potable water on base.

4.4.2 No Action Alternative

Under the No Action alternative, there would be no change to the current conditions and no impact to water resources would occur with implementation of this alternative.

4.5 FLOODPLAINS

In accordance with the requirements of EO 11988, the Air Force must demonstrate that there is no practicable alternative to carrying out the proposed action within the floodpool or floodplain. No other practicable sites were identified during the initial siting phase, and potential siting locations were limited due to the nature of the project.

4.5.1 Proposed Action

Both of the proposed facilities would be located entirely in the 100-year floodplain. Both the control tower and the crash rescue facility are required to be located near the runway. Since the runway is located in the 100-year floodplain there is no practicable alternative to locating the proposed facilities in the floodplain.

The crash rescue facility would be constructed on the strip of grassy land between Taxiway K and Building 1137 at the junction of Taxiways L and K. Including parking areas, the crash rescue facility project is expected to result in approximately 80,000 square feet of impervious surface. Increases in impervious surface would be minimized

where practical, especially with parking area, by utilizing the existing asphalt surfaces around the proposed project site.

The new control tower facility would be constructed in the area that is currently occupied by the small parking lot for the existing control tower. Construction on a site with existing asphalt surface would limit impacts to the floodplain; however, additional impervious surface must still be constructed to provide parking at each facility. Demolition of the existing control tower would eliminate additional existing impervous surface; which benefits the floodplain, but overall the control tower project would likely result in slight increase in impervious surface within the floodplain.

To mitigate the increased impervious surfaces associated with the proposed action, each facility would include an appropriately sized, pervious stormwater retention area. Each project site would be constructed so that surface water (stormwater) from any added impervious surface is directed to the site stormwater retention area. Inclusion of designed and permitted stormwater retention areas would minimize the potential for flooding by creating a sufficiently sized, pervious accumulation point for stormwater. Creation of a stormwater retention system at each site would further reduce impacts to the floodplain by providing limited 'treatment' of the stormwater through biologic and natural process prior to infiltration into the surficial aquifer.

The proposed construction sites for the crash rescue facility and the control tower were selected because the available sites made good sense from an engineering, cost, and logistics perspective, and construction on these sites would produce no major negative impacts. Construction and operation of the crash rescue facility and the control tower would not damage floodplain values, including fish and wildlife habitat, or water quality. Nor would new construction pose a threat to human life, health, or safety. Under the Proposed Action, no significant negative impacts to the floodplain would occur.

4.5.2 No Action Alternative

There would be no changes to existing conditions with implementation of the No Action alternative and there would be no impacts to the floodplain.

4.6 BIOLOGICAL RESOURCES

4.6.1 Proposed Action

4.6.1.1 Wetlands

With proper planning, implementation of the Proposed Action would have no impact on wetlands; however, wetland areas have been identified in the vicinity of both proposed facilities. The proposed buildings themselves would not alter wetland areas and the other parts of the proposed facilities such as parking lots, access roads and utility corridors have been located to avoid wetlands. The wetland areas in the vicinity of the crash rescue facility were located 600 feet south of the construction site and would not be impacted by the project. Due to the close proximity of wetlands in relation to proposed construction activities for the control tower project, a site-specific wetlands delineation of the area was completed by the MacDill AFB environmental flight. The wetland boundaries were surveyed and incorporated into the design drawings to insure that proposed construction activities would not cross wetland lines.

Demolition of the existing control tower would not impact wetland areas.

4.6.1.2 Listed Species Habitat

Section 3.6.4 lists the Federal- and State-listed species that potentially occur at MacDill AFB. No Federal or state-listed species or species habitat is present at either of the proposed construction site or the demolition site. No Federal or state-listed species or species habitat would be impacted by the proposed project. Coordination with the U.S. Fish and Wildlife Service has been completed to insure compliance with the Endangered Species Act and confirms that the project would have no impact on listed species.

4.6.2 No Action Alternative

No new construction or demolition would occur with implementation of the No Action alternative and no impacts to biological resources would occur.

4.7 SOCIOECONOMICS

4.7.1 Proposed Action

Construction of the new crash rescue facility storage facility would cost approximately $3.5 million to build and construction of the new control tower would cost approximately $4.5 million. Demolition of the existing control tower is expected to cost approximately $200,000. In total, the project would result in a total cost of $8.2 million. This would equal less than 2% of the nearly $494 million annual expenditures that MacDill AFB provides to the local economy, and would therefore constitute a minor beneficial impact. The Proposed Action would also have a minor beneficial impact on the work force in the region during the construction period.

4.7.2 No-Action Alternative

Under the No-Action Alternative, no impacts to socioeconomic resources would be incurred.

4.8 CULTURAL RESOURCES

4.8.1 Proposed Action

There are no cultural resources in the vicinity of either of the proposed construction sites and implementation of the Proposed Action is not expected to impact cultural resources on MacDill AFB. The closest cultural resources site to either construction area is the EOD site (8Hi5656) located approximately 3,500 feet south of the proposed crash rescue facility site. No other cultural resources are located within a mile of either proposed construction site.

4.8.2 No Action Alternative

Under the No-Action Alternative, no impacts to cultural resources would be incurred.

4.9 LAND USE

4.9.1 Proposed Action

The proposed crash rescue facility would be constructed on an undeveloped strip of grassy land between Taxiway K and Building 1137 at the junction of Taxiways K and L. This land is designated as airfield land use and the surrounding areas are a mix of industrial uses, airfield operations, and open space. Upon completion of the crash rescue facility the site would be classified as operations and maintenance land use.

The land use at the site of the new control tower would not change with implementation of the Proposed Action since new tower would be constructed immediately adjacent to the existing control tower.

4.9.2 No Action Alternative

Under the No-Action Alternative, no impacts to land use would be incurred.

4.10 TRANSPORTATION

4.10.1 Proposed Action

There would be a temporary negative impact from construction vehicles during construction of the crash rescue facility and control tower and demolition of the existing tower. An increase in construction vehicles entering, leaving and driving around the base is expected with implementation of the Proposed Action, particularly with respect to dump trucks delivering fill material to each construction site. A significant volume of fill material would be required to raise each building foundation above the 100-year floodplain. It is anticipated that between 50 and 100 dumptruck loads of fill would be required. These construction impacts would be temporary however, and the level of

service of Base roads would not decline. The operation of the new crash rescue facility and control tower would have no long-term impact on transportation on MacDill AFB, since there would be no net increase in traffic.

4.10.2 No-Action Alternative

No impacts on transportation would be incurred under the No-Action alternative.

4.11 AIRSPACE/AIRFIELD OPERATIONS AND BIRD-AIRCRAFT STRIKE HAZARD

Construction of the crash rescue facility and the air traffic control tower would both have a positive impact of airfield operations. The new crash rescue facility would improve response times during aircraft incidents potentially reducing impacts to the airfield, aircraft and flight personnel and saving lives. Construction of the new control tower would improve air traffic controller visibility of the airfield reducing the potential for accidents on the runway, taxiways and ramp areas.

Implementation of the Proposed Action would have no impact on Bird-Aircraft Strike Hazard.

4.12 SAFETY AND OCCUPATIONAL HEALTH

4.12.1 Proposed Action

The proposed construction activities for the project would pose safety hazards to the workers similar to those associated with typical industrial construction projects, such as falls, slips, heat stress, and machinery injuries. Construction would not involve any unique hazards and all construction methods would comply with OSHA requirements to ensure the protection of workers and the general public during construction. Vigilant but not controlling governmental oversight of contractor activities would help assure OSHA compliance.

The demolition portion of the project could encounter lead-based paint and asbestos-containing building material. Prior to initiating demolition activities the existing control tower would be surveyed by a qualified independent consulting firm for asbestos and lead-based paint to confirm the presence or absence of these materials. If asbestos or lead-based paint are identified during the survey the demolition contractor shall hire a qualified independent environmental abatement subcontractor to remove and dispose of the asbestos containing building material and lead-base paint. The same environmental firm shall perform environmental monitoring during the abatement work in accordance with military, Environmental Protection Agency, and other applicable environmental regulations. At least 10 working days prior to beginning asbestos abatement actions, the contractor shall notify the State of Florida Department of Environmental Protection of planned demolition activities involving the disturbance of more than 160 square feet, 260 linear feet, or 35 cubic feet of regulated asbestos-containing material. The contractor shall provide the government documentation of any notifications provided to the state prior to starting the asbestos abatement work. Upon completion of the demolition work all waste disposal manifests shall be turned over to the government.

4.12.2 No-Action Alternative

No impacts on safety and occupational health would be incurred under the No-Action Alternative.

4.13 GEOLOGY AND SOILS

4.13.1 Proposed Action

There would be no impacts to geology. Soils exposed during site grading and construction activities are subject to erosion and a small amount of soil erosion is expected during construction and demolition activities, since portions of the soil surface would be exposed and disturbed. Soil erosion in areas that are disturbed would be

controlled by implementation of a sediment and erosion control plan, including implementation of Best Management Practices (BMPs).

This EA has been prepared under the assumption that all non-impervious areas disturbed during construction and demolition activities would, at a minimum, be covered with a clean layer of graded and grassed fill. Covering the areas of exposed soil created during construction and demolition with sod would significantly reduce the potential for erosion. Overall, the impacts to soils would be minimal and temporary and are not considered significant.

4.13.2 No Action Alternative

No impacts to geology and soil would be incurred with implementation of the No-Action Alternative.

4.14 ENVIRONMENTAL JUSTICE

Construction of the new crash rescue facility and the new control tower as well as demolition of the existing control tower would not affect minority or low-income populations. There are no minority or low-income populations in the area around the proposed construction and demolition sites, and thus, there would be no disproportionately high or adverse impacts on such populations. No adverse environmental impacts would occur outside MacDill AFB. Therefore, no adverse effects on minority and low-income populations would result from implementation of the Proposed Action at MacDill AFB.

4.15 INDIRECT AND CUMULATIVE IMPACTS

There are no direct, indirect, or cumulative impacts associated with construction of the new crash rescue facility or the new control tower or demolition of the existing control tower at MacDill AFB.

4.16 UNAVOIDABLE ADVERSE IMPACTS

There are no significant unavoidable adverse impacts associated with construction of the new crash rescue facility or the new control tower or demolition of the existing control tower at MacDill AFB.

4.17 RELATIONSHIP BETWEEN SHORT-TERM USES AND ENHANCEMENT OF LONG TERM PRODUCTIVITY

Construction of the new control tower would have a positive effect on long-term productivity by improving airfield operations and airfield safety and providing the Operations Support Squadron with a modern, efficient facility. Likewise, construction of the new crash rescue facility would have a positive effect on long-term productivity by providing the Fire Protection Flight with a properly sized, centrally located facility.

4.18 IRREVERSIBLE AND IRRETRIEVABLE COMMITMENT OF RESOURCES

Construction of the new crash rescue facility would convert an existing undeveloped grassy site into an operational facility. Construction of the new control tower would commit a paved parking lot to operational use. Demolition of the existing control tower would create an open area that may become the new parking area or may be maintained as open grass field. The only irreversible and irretrievable commitment of resources would be the commitment of fuels, manpower, material, and costs related to construction and demolition under the Proposed Action.

SECTION 5.0 PERSONS CONTACTED

Bob Fisher	6 CES/CECE, MILCON Program MacDill AFB, FL 33621 1-813-828-8681
Scott Davis	6 CES/CECE, Civil Engineering MacDill AFB, FL 33621 1-813-828-8685
Chief John Warhul	Fire Protection Flight MacDill AFB, FL 33621 1-813-828-3438
SMSgt Jim Cody	6 OSS/OSAT MacDill AFB, FL 33621 1-813-828-2120
Laura Kammerer	Division of Historical Resources Compliance Review Section 500 S Bronough St. Tallahassee, FL 32399-0250 1-800-847-7278
Brian Pridgen	US Fish and Wildlife Service 9549 Koger Blvd Suite 111 St. Petersburg, FL 33702 1-727-570-5398
Jasmine Raffington	FL Coastal Management Program Florida State Clearing House 2555 Shumard Oak Blvd. Tallahassee, FL 32399-2100 1-850-414-6568
Ms. Cheri Trainor	Florida State Clearing House 2555 Shumard Oak Boulevard Tallahassee, FL 32399-2100

Mr. Leonard Paris	U.S. Army Corps of Engineers Mobile District P.O. Box 6230 MacDill AFB, FL 33608-6230
Mr. David Dale	National Marine Fisheries Service 9721 Executive Center Drive North St. Petersburg, FL 33702
Ms. Tina Russo	Hillsborough County Public Library 900 North Ashley Drive Tampa, FL 33602
Mr. Art Bagley	University of Tampa Merl Kelce Library 401 West Kennedy Boulevard Tampa, FL 33602
Mr. Steve West	Florida Department of Environmental Protection Bureau of Beaches and Coastal Systems 3900 Commonwealth Blvd. Tallahassee, FL 32399-3000
Mr. Bill Herr	6 CES/CEVR, Toxics Program Manager MacDill AFB, FL 33621 1-813-828-0465
Mr. Mike Harrison	6 CES/CEVW, Water Program Manager MacDill AFB, FL 33621 1-813-828-0459
Mr. Andy Rider	6 CES/CEVC, Air Program Manager MacDill AFB, FL 33621 1-813-828-2718
Mr. Dan Arrendale	6 CES/CEVH, Hazardous Waste Program Manager MacDill AFB, FL 33621 1-813-828-0461
Mr. Jason Kirkpatrick	6 CES/CEVN Cultural/Natural Resources Program MacDill AFB, FL 33621 1-813-828-0459

Mr. Anthony Gennarro	6 CES/CEVR Installation Restoration Program MacDill AFB, FL 33621 1-813-828-0776
6 MDG/SGPB	Bioenvironmental Engineering Office MacDill AFB, FL 33621 1-813-828-3534

SECTION 6.0
LIST OF PREPARERS

Mr. Jason Kirkpatrick
6 CES/CEVN
7621 Hillsborough Loop Dr.
MacDill AFB, FL 33621-5207
Voice: (813) 828-0459
FAX: (813) 828-2212
e-mail: jason.kirkpatrick@macdill.af.mil

THIS PAGE INTENTIONALLY LEFT BLANK

SECTION 7.0
REFERENCES

Advisory Council on Historic Preservation, 1986. *36 CFR Part 800: Protection of Historic Properties*. U.S. Government Printing Office, Washington, D.C.

American Weather Service (AWS), 1993. AWS Climatic Brief, Air Force Combat Climatology Center, Air Weather Service, Scott AFB, October 1993.

Florida Natural Areas Inventory (FNAI), 1996. Florida Natural Areas Inventory, 1996. Biological Survey of MacDill Air Force Base.

United States Environmental Protection Agency (USEPA), 1988 Gap Filling PM_{10} Emission Factors for Selected open Area Dust Sources (EPA-450/4-88-003), United States Environmental Protection Agency, Research Triangle Park, February 1988.

USAF, 1992. U.S. Air Force, 1986. *From the 1940s to Now ... A Historical Synopsis of the 56th Tactical Training Wing .... And MacDill Air Force Base, Florida.* 56 FW Historian's Office, MacDill AFB.

USAF, 1994. U.S. Air Force, 1994. Environmental Assessment, Transfer and Reuse of Part of MacDill Air Force Base, Florida.

USAF, 1995 U.S. Air Force, 1995. Environmental Assessment for Implementation of the Integrated Natural Resources Management Plan MacDill Air Force Base, Florida.

USAF, 1999 U.S. Air Force, 1999. DRAFT Title V Permit No. 0570141-

001-AV MacDill Air Force Base, Florida.

USAF, 1997 — Economic Resource Impact Statement MacDill Air Force Base, Florida.

USAF, 2000 — U.S. Air Force, November 2000. Integrated Natural Resource Management Plan (INRMP) MacDill Air Force, Florida

USAF, 1995. — Compilation of Air Pollutant Emission Factors, Volume I: Stationary Point and Area Sources, 5th Edition (AP-42), United States Environmental Protection Agency, Research Triangle Park, January 1995 (Supplement A, February 1996).

USAF, 1998 — U.S. Air Force, 1998. Interim Remedial Action/Closure Report for Underground Storage Tank Removal and Facility Demolition: Site 56 and Site 32. MacDill AFB, Florida, April 1998.

USAF, 1998. — U.S. Air Force, 1998. Environmental Compliance Assessment and Management Program (ECAMP), MacDill Air Force Base, Florida.

USAF, 1996 — U.S. Air Force, 1996. Biological Survey of MacDill Air Force Base – Final Report

USAF, 1996 — U.S. Air Force, 1996. Endangered Species Management Plan MacDill Air Force Base, Florida

USAF, 1996 — U.S. Air Force, 1996. Environmental Assessment for the Replacement of Military Family Housing MacDill Air Force Base, Florida.

USAF, 1996 — U.S. Air Force, 1996. Cultural Resources Management Plan (CRMP) MacDill Air Force Base, Florida.

USAF, 1996. U.S. Air Force, 1996. Air Installation Compatible Use Zone (AICUZ) Study, MacDill AFB, Tampa.

USAF, 1998 U.S. Air Force, 1998. Delineation Study of the Waters of the United States Including the Landward Extent of Wetlands and Surface Waters MacDill Air Force Base Tampa, Hillsborough County, Florida.

USAF, 1998 U.S. Air Force, 1998. Entry Gate Development Study MacDill Air Force Base, Florida.

USEPA, 1995 Compilation of Air Pollutant Emission Factors, Volume I: Stationary Point and Area Sources, 5th Edition (AP-42), USEPA, Research Triangle Park, January 1995 (Supplement A, February 1996).

USEPA, 1985 Compilation of Air Pollutant Emission Factors, Volume II: Mobile Sources, 4th Edition (AP-42), USEPA, Ann Arbor, September 1985, (Supplement A, January 1991).

USEPA, 1971 Noise from Construction Equipment and Operation, Building Equipment and Home Appliances

State of Florida, 1981 Florida Coastal Management Program

THIS PAGE INTENTIONALLY LEFT BLANK

FIGURES

TABLES

APPENDIX A

CONSISTENCY STATEMENT

APPENDIX B

AIR FORCE FORM 813

APPENDIX C

AIR EMISSIONS CALCULATIONS FOR PROPOSED ACTION

AND CUMULATIVE AIR EMISSIONS CALCULATIONS

APPENDIX D

PUBLIC NOTICE

AND AGENCY CORRESPONDENCE

APPENDIX E

ASBESTOS SURVEY RESULTS

APPENDIX F

LEAD-BASED PAINT RESULTS

FIGURES

THIS PAGE INTENTIONALLY LEFT BLANK

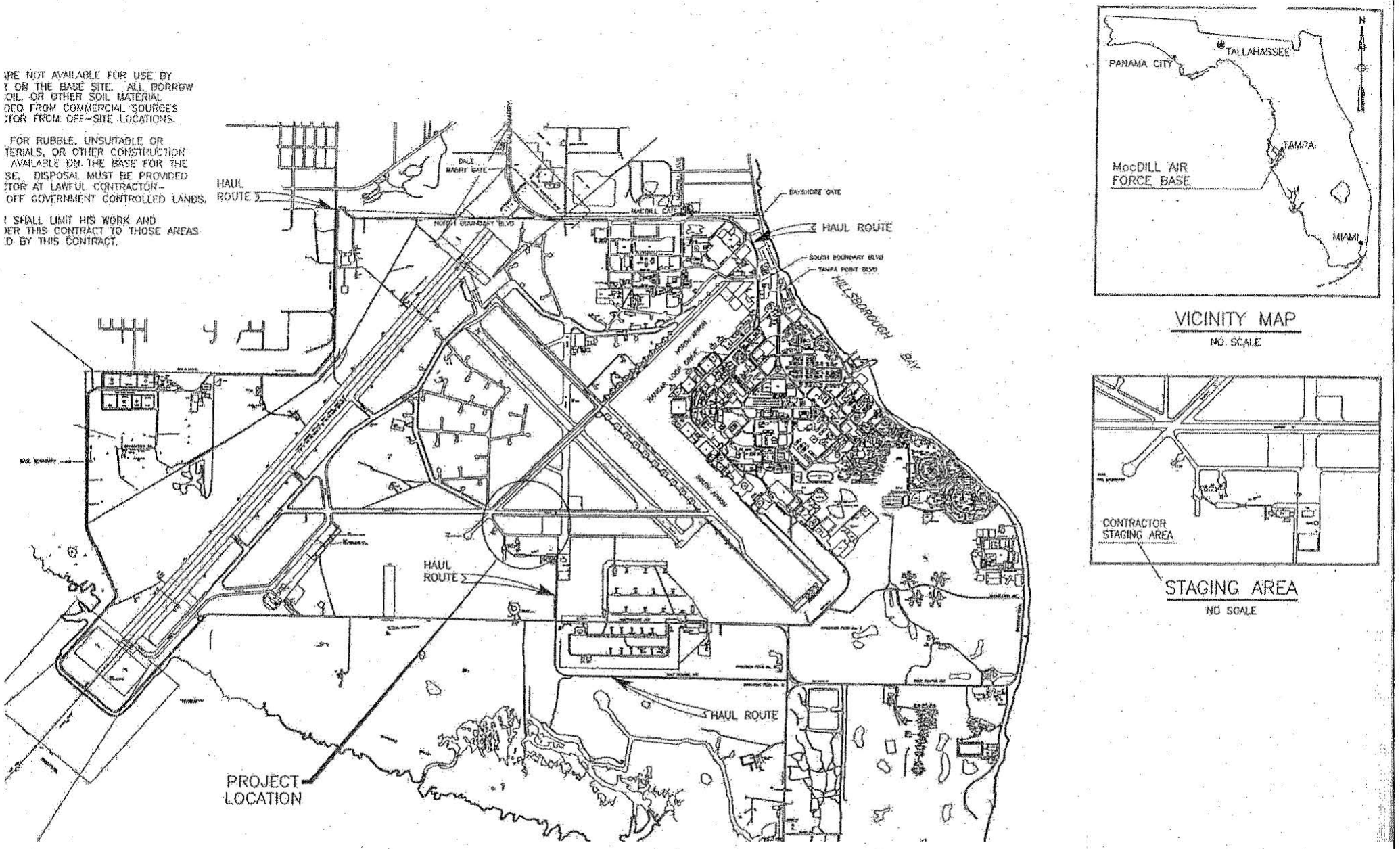
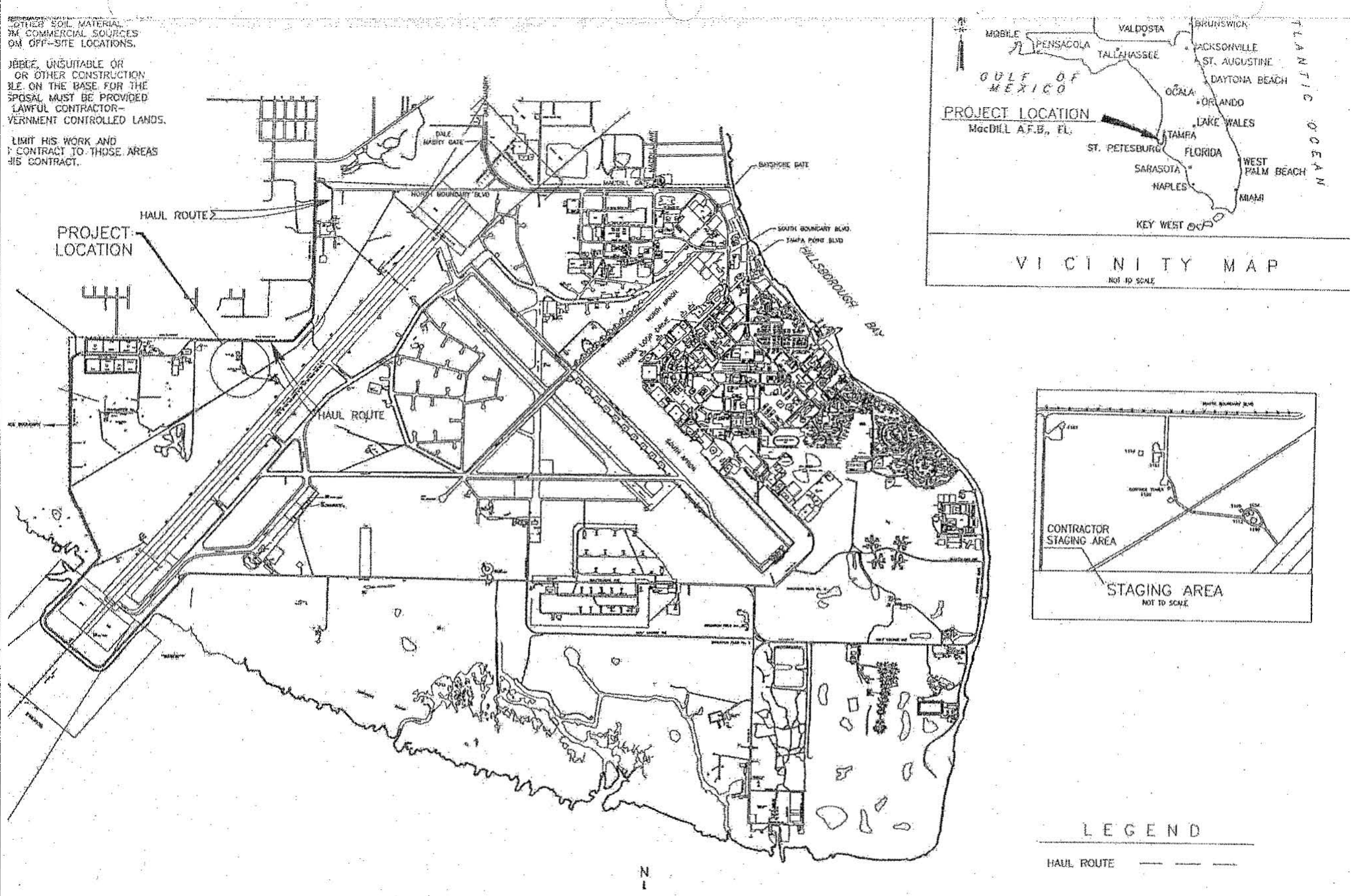


FIGURE 1-1 Site Location and Vicinity Map for Construct Crash Rescue Facility Project, MacDill Air Force Base, Florida



LEGEND

HAUL ROUTE

FIGURE 1-2 Site Location and Vicinity Map for Control Tower Site, MacDill Air Force Base, Florida

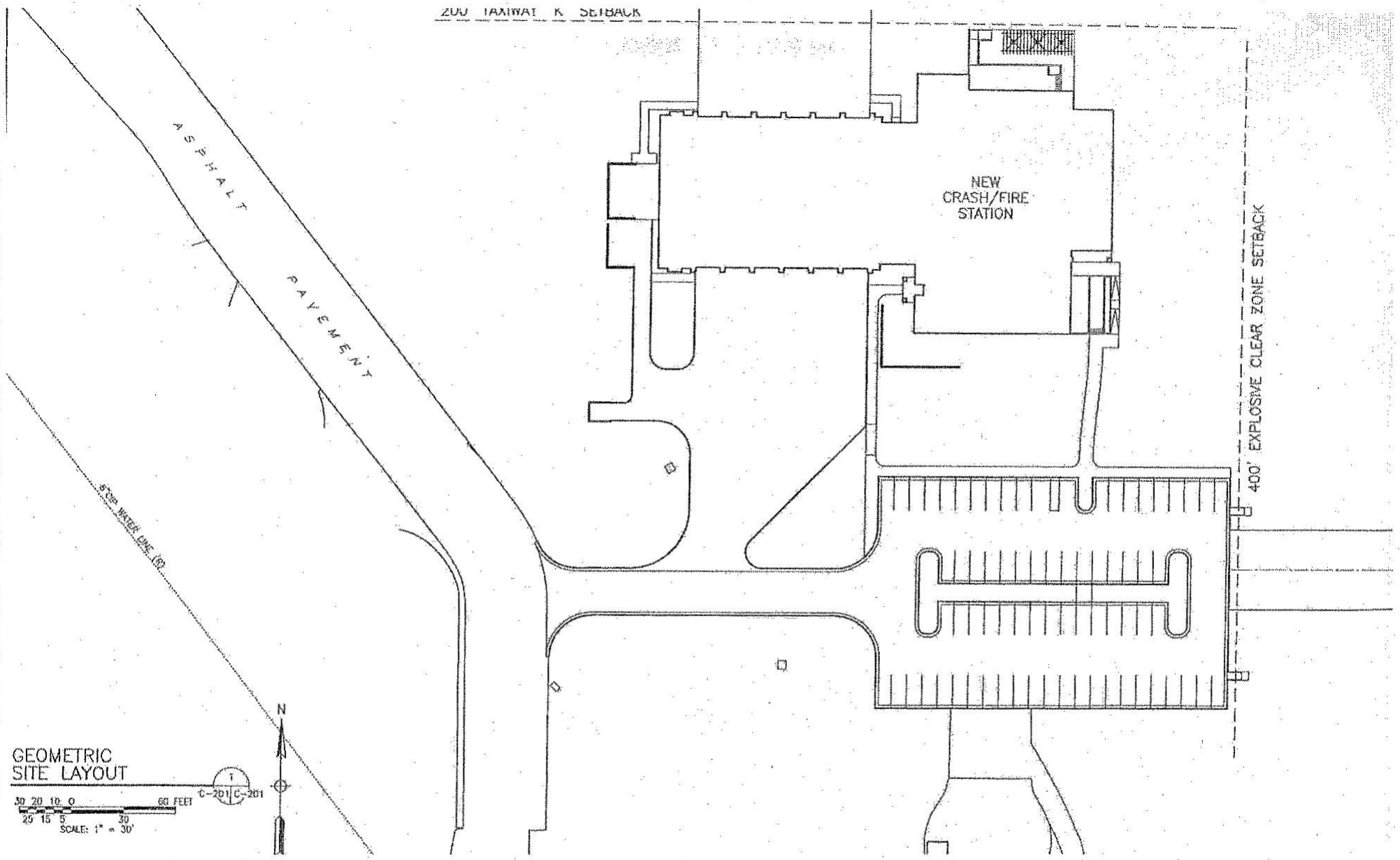


Figure 2-1 - Site Plan for Crash Rescue Facility Site, Construct Control Tower and Crash Rescue Facility, MacDill Air Force Base

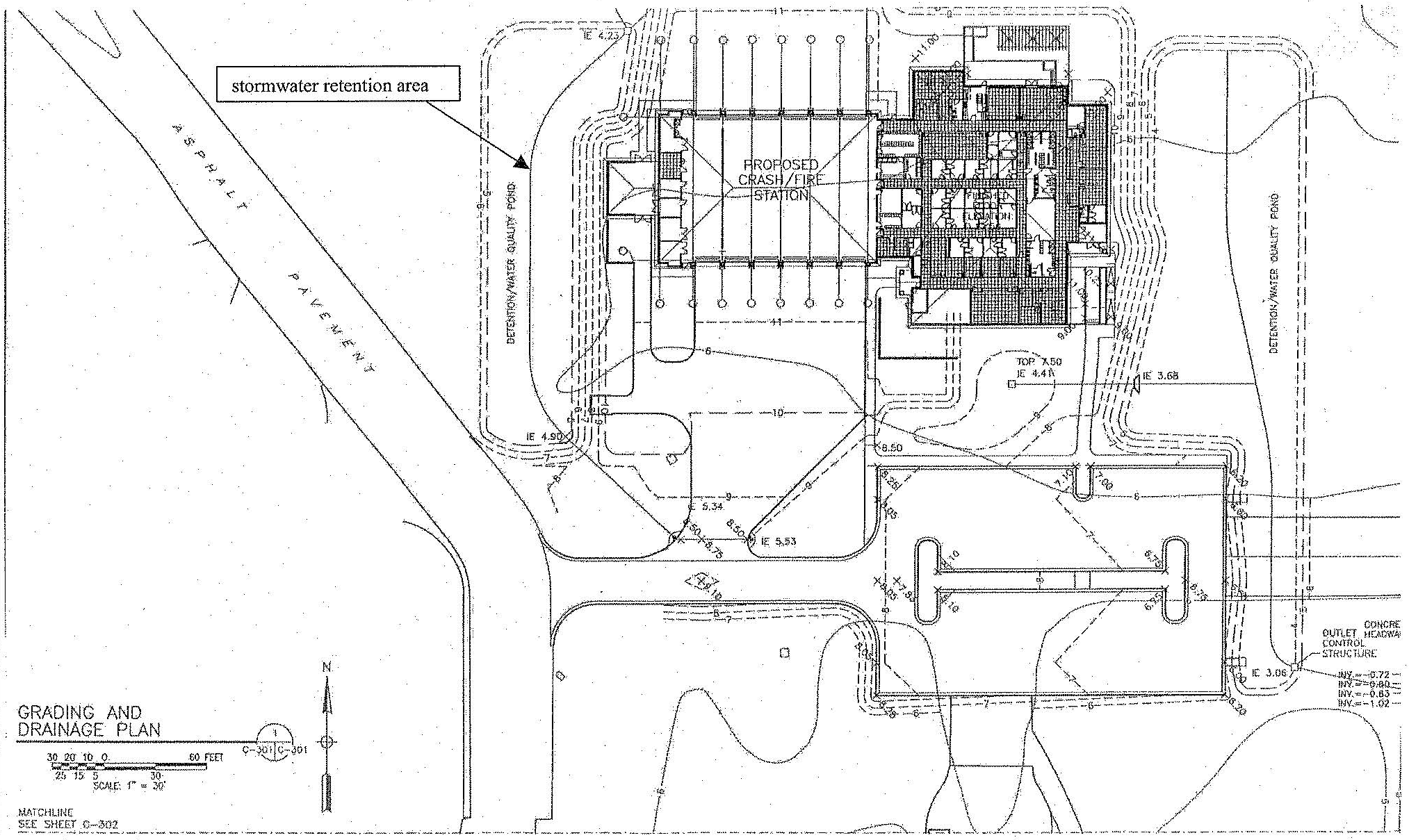


Figure 2-2 Site Plan with Drainage for Crash Rescue Facility Site, Construct Control Tower and Crash Rescue Facility, MacDill Air Force Base

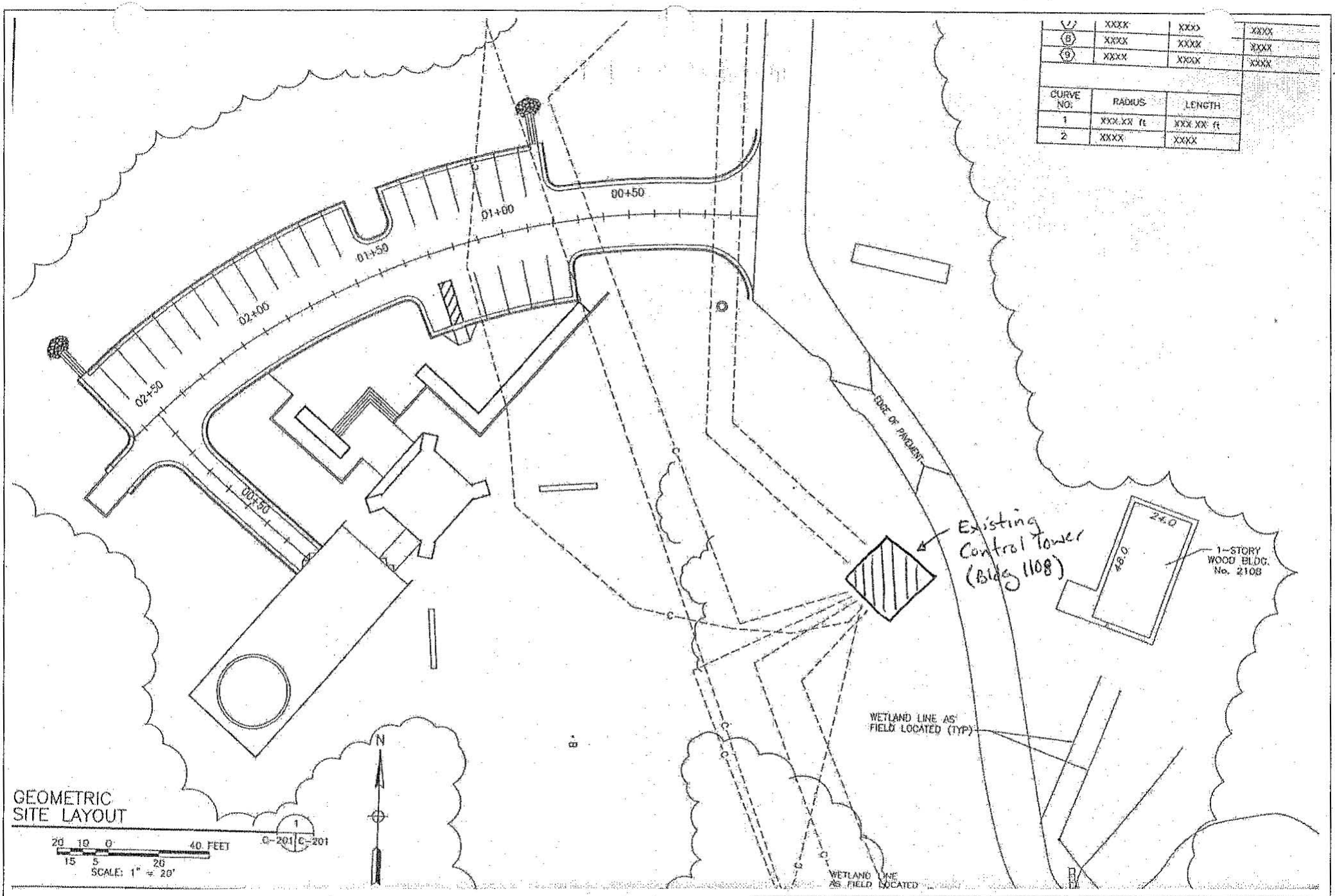


Figure 2-3 Site Plan for Control Tower Site, Construct Control Tower and Crash Rescue Facility, MacDill Air Force Base

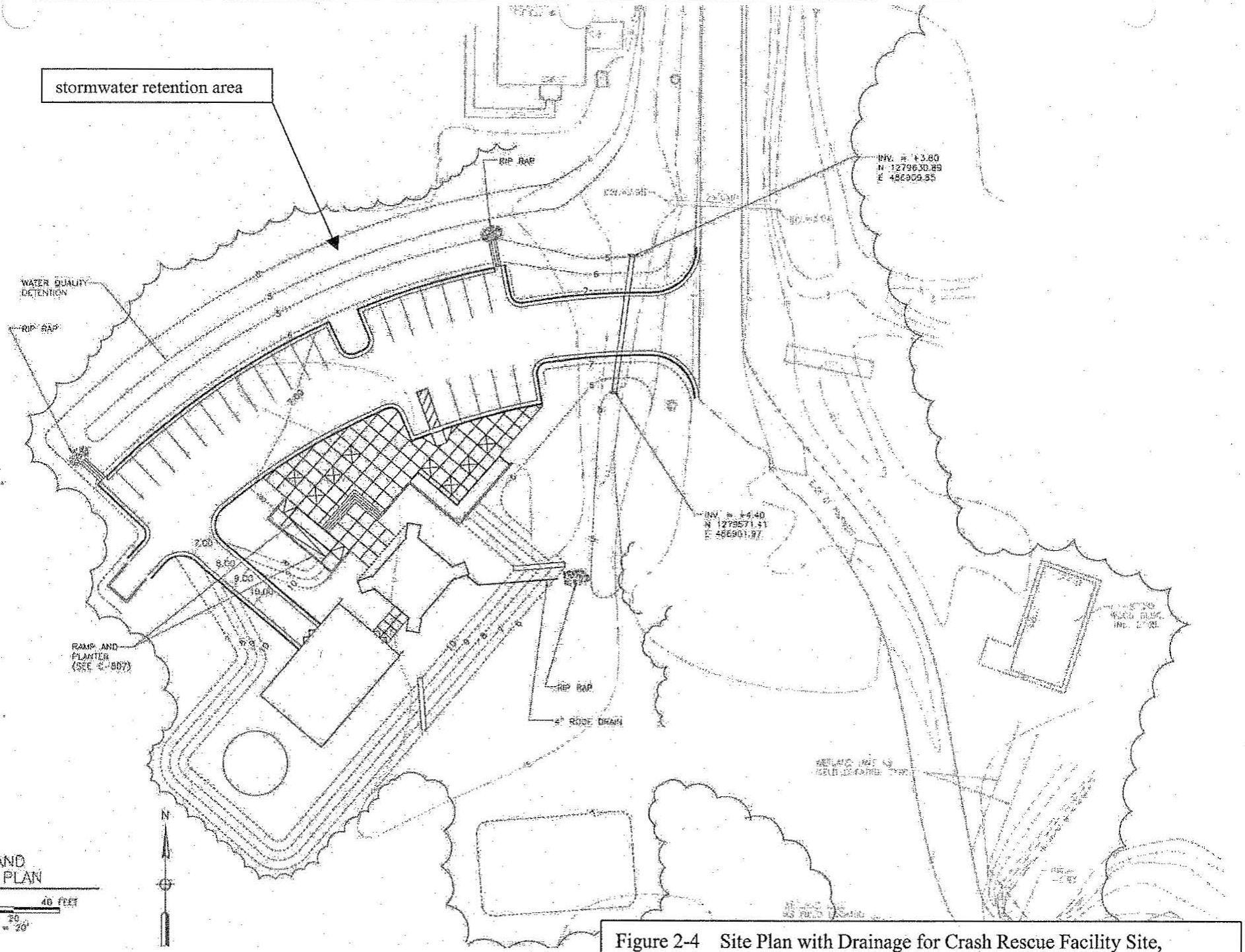


Figure 2-4 Site Plan with Drainage for Crash Rescue Facility Site, Construct Control Tower and Crash Rescue Facility, MacDill Air Force Base

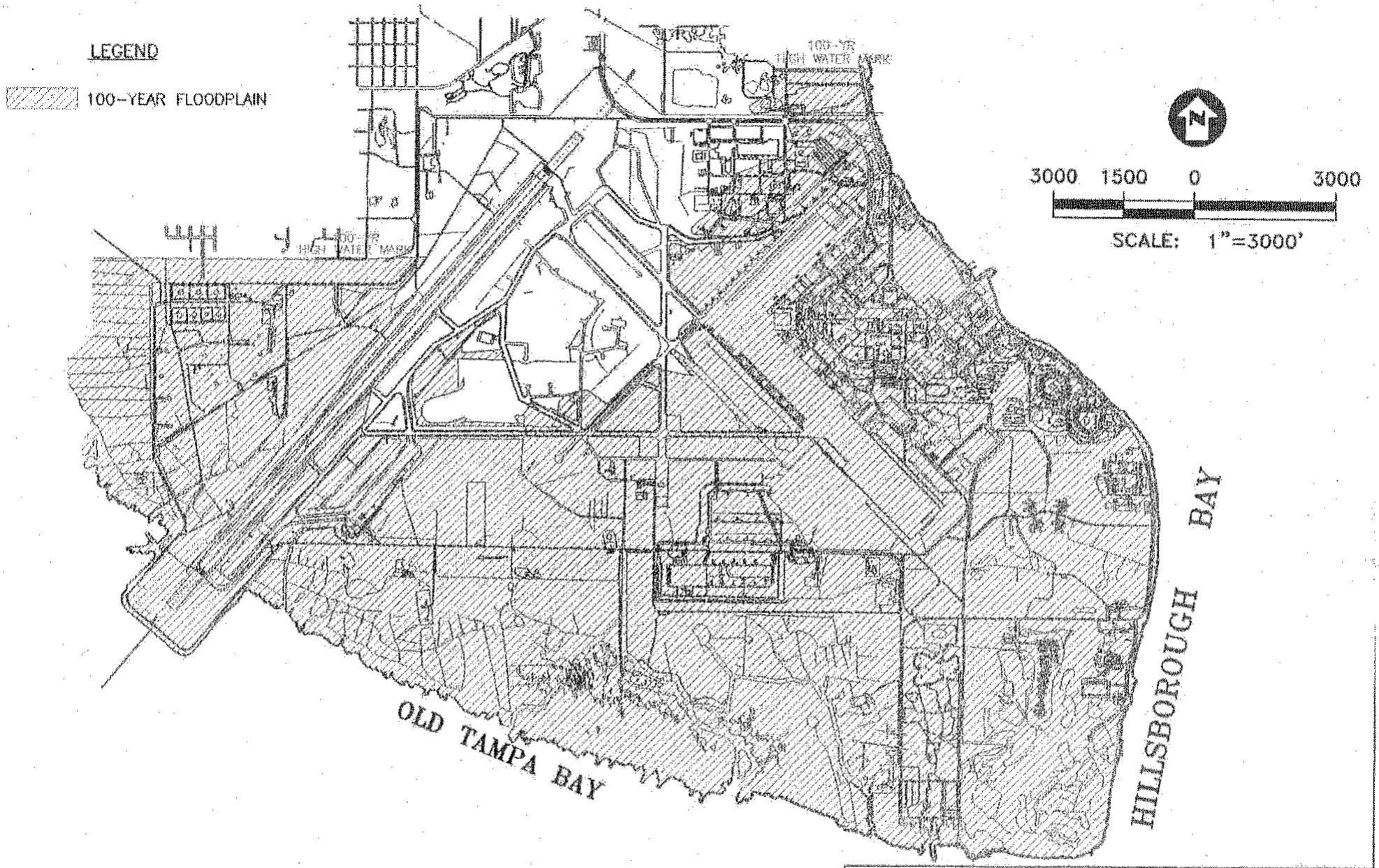


FIGURE 3.1

100-YEAR FLOODPLAIN

MacDill AFB, FLORIDA

Source: 6CES

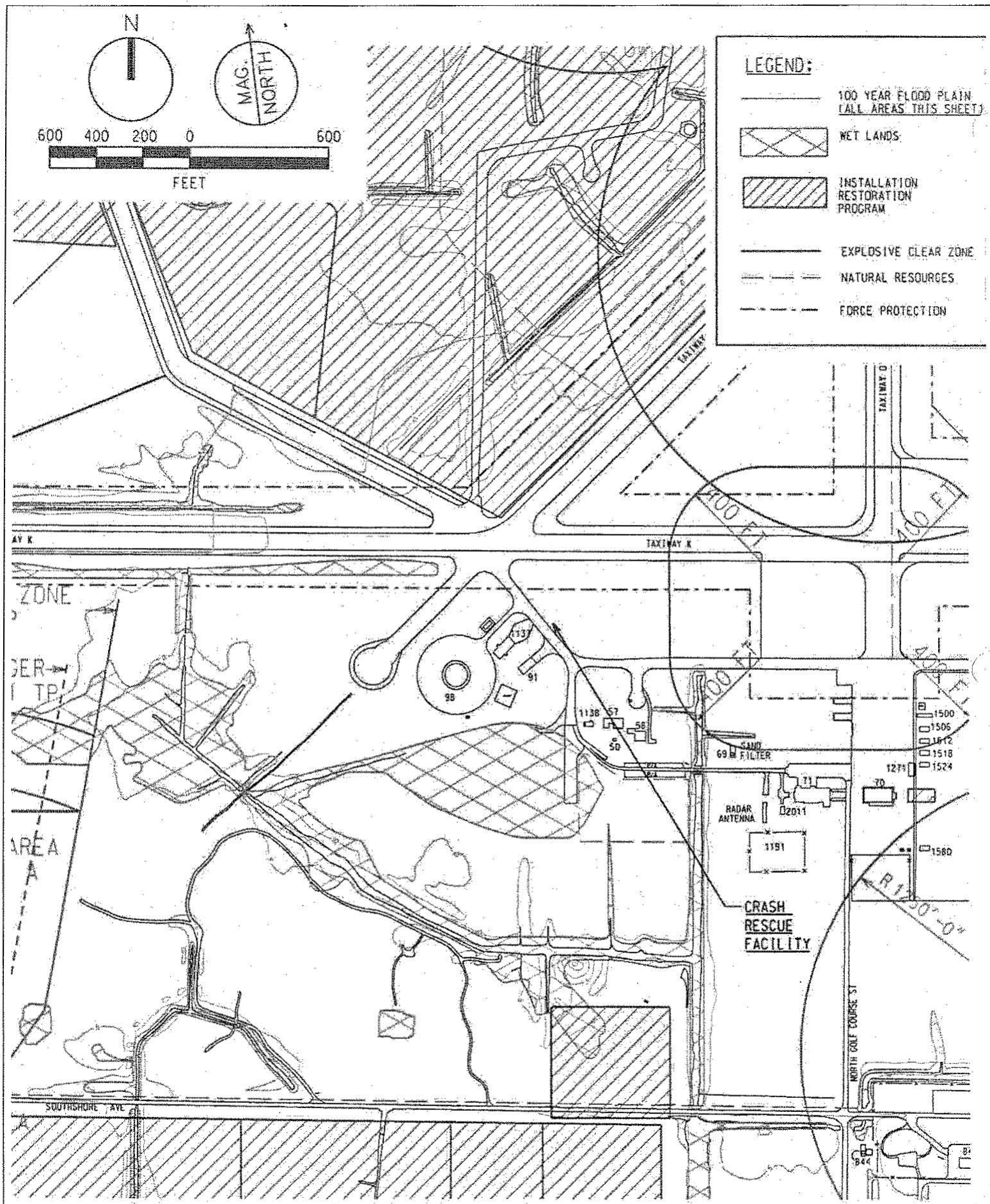


Figure 3-2 Crash Rescue Facility in Relation to Environmental Contraints, Construct Control Tower and Crash Rescue Facility, MacDill Air Force Base

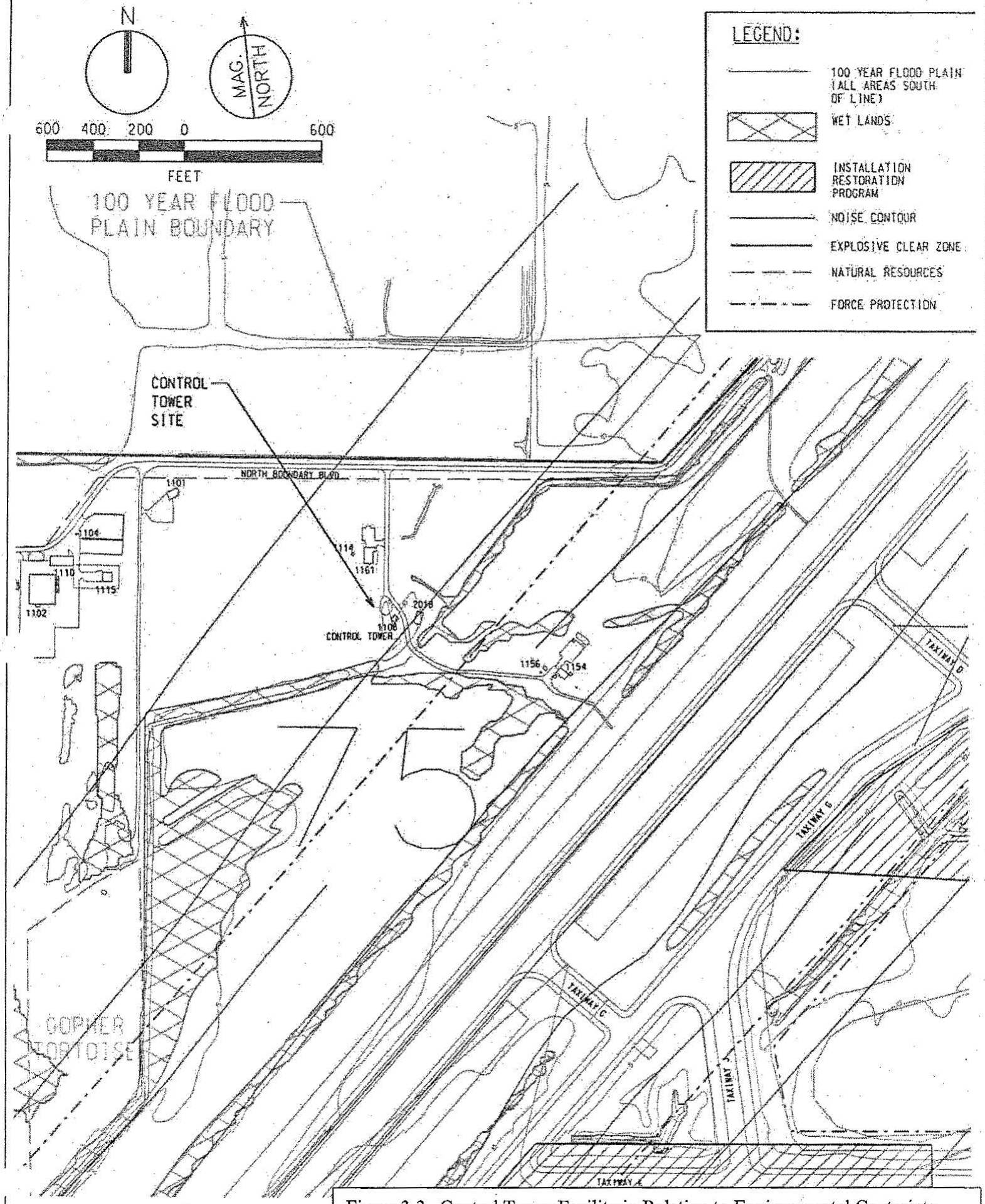


Figure 3-3 Control Tower Facility in Relation to Environmental Contraints, Construct Control Tower and Crash Rescue Facility, MacDill Air Force Base

THIS PAGE INTENTIONALLY LEFT BLANK

TABLES

THIS PAGE INTENTIONALLY LEFT BLANK

TABLE 2-1. COMPARISON OF ENVIRONMENTAL CONSEQUENCES
Construct Crash Rescue Facility and Air Traffic Control Tower and Demolish Existing Control Tower
MacDill Air Force Base

Environmental Resource	Proposed Action		No Action Alternative	
	Positive Effect	Negative Effect	Positive Effect	Negative Effect
Air Resources	None	**Short term** - Very slight increase in fugitive dust and exhaust emissions. **Long Term** - an added air emission source associated with the new generator for the crash rescue facility	None	None
Noise	None	None	None	None
Wastes, Hazardous Material, and Stored Fuel				
Hazardous Materials/Waste	None	None	None	None
Solid Waste	None	None	None	None
Wastewater	None	None	None	None
Stored Fuel	None	**Long Term** - a new fuel storage tank would be required for the generator, potential for spills and leaks of fuel to environment.		
Water Resources				
Surface Water and Sediment	None	None	None	None
Groundwater	None	None	None	None
Potable Water	None	None	None	None
Floodplains	None	**Long Term** - Increased impervious surface associated with new facilities	None	None
Biological Resources				
Vegetation	None	**Long term** - less grass, more pavement	None	None
Wildlife	None	None	None	None

TABLE 2-1. COMPARISON OF ENVIRONMENTAL CONSEQUENCES
Construct Crash Rescue Facility and Air Traffic Control Tower and Demolish Existing Control Tower
MacDill Air Force Base

Environmental Resource	Proposed Action		No Action Alternative	
	Positive Effect	Negative Effect	Positive Effect	Negative Effect
Biological Resources (cont.)				
T&E Species	None	None	None	None
Wetlands	None	None	None	None
Geology and Soils	None	None	None	None
Socioeconomics	**Short term** - Increase in construction employment and sales/rental of equipment and building materials for Tampa Bay area.	None	None	None
Cultural Resources	None	None	None	None
Land Use	None	None	None	None
Transportation	None	None	None	None
Airspace/Airfield Operations and Bird-Aircraft Strike Hazard	**Short and Long Term** - Improved air traffic control and improved airfield efficiency and safety	None	None	**Short and Long Term** - limited airfield visibility by air traffic controllers, limits effeciency of controllers.
Safety and Occupational Health				
ACM/LBP/PCBs	None	None	None	None
Health & Safety	**Short and Long term** - improved airfield safety due to improved response time for rescue workers and improved visibility for air traffic controllers	None	None	**Short and Long term** - Increased potential for accidents due to limited view of entire airfield. Slower response time to emergency situations on the runway.

TABLE 2-1. COMPARISON OF ENVIRONMENTAL CONSEQUENCES
Construct Crash Rescue Facility and Air Traffic Control Tower and Demolish Existing Control Tower
MacDill Air Force Base

Environmental Resource	Proposed Action		No Action Alternative	
	Positive Effect	Negative Effect	Positive Effect	Negative Effect
Environmental Justice	None	None	None	None
Indirect & Cumulative Impacts	None	None	None	None

Notes:

T&E Species - Threatened and Endangered Species
ACM - Asbestos Containing Materials
LBP - Lead Based Paint
PCBs - Polychlorinated biphynls
SW & GW - Surface water & Groundwater

THIS PAGE INTENTIONALLY LEFT BLANK

APPENDIX A

CONSISTENCY STATEMENT

THIS PAGE INTENTIONALLY LEFT BLANK

APPENDIX A
CONSISTENCY STATEMENT

This consistency statement will examine the potential environmental consequences of the Proposed Action and ascertain the extent to which the consequences of the Proposed Action are consistent with the objectives of Florida Coastal Management Program (CMP).

Of the Florida Statutory Authorities included in the CMP, impacts in the following areas are addressed in the EA: beach and shore preservation (Chapter 161), historic preservation (Chapter 267), economic development and tourism (Chapter 288), public transportation (Chapters 334 and 339), saltwater living resources (Chapter 370), living land and freshwater resource (Chapter 372), water resources (Chapter 373), environmental control (Chapter 403), and soil and water conservation (Chapter 582). This consistency statement discusses how the proposed options may meet the CMP objectives.

CONSISTENCY DETERMINATION

Chapter 161: Beach and Shore Preservation

No disturbances to the base's canals are foreseen under the Proposed Action or Alternative Action.

Chapter 267: Historic Preservation

The Air Force and the Florida State Historic Preservation Officer have determined that there are two areas on MacDill AFB with buildings that are potentially eligible for the National Register of Historic Places. The Proposed Action site is not located within either of MacDill's historic districts. Consultations between the Air Force and State Historical Preservation Officer have been completed to insure compliance with the National Historic Preservation Act.

Chapter 288: Economic Development and Tourism

The EA presents the new employment impact and net income impact of the Proposed Action and alternative. The options would not have significant adverse effects on any key Florida industries or economic diversification efforts.

The EA quantitatively addresses potential impacts to transportation systems and planning and implementation of transportation improvements.

Chapter 372: Saltwater Living Resources

The EA addresses potential impacts to local water bodies. Water quality impacts were surveyed for existing conditions at the Proposed Action and alternative. Results indicate that no impacts would result from the Proposed Action or alternative.

Chapter 372: Living Land and Freshwater Resources

Threatened and endangered species, major plant communities, conservation of native habitat, and mitigation of potential impacts to the resources are addressed in the EA. The Proposed Action and alternative would not result in permanent disturbance to native habitat and should not impact threatened or endangered species.

Chapter 373: Water Resources

There would be no impacts to surface water or groundwater quality under the Proposed Action or alternative as discussed in the EA.

Chapter 403: Environmental Control

The EA addresses the issues of conservation and protection of environmentally sensitive living resources; protection of groundwater and surface water quality and quantity; potable water supply; protection of air quality; minimization of adverse hydrogeologic impacts; protection of endangered or threatened species; solid, sanitary, and hazardous waste disposal; and protection of floodplains and wetlands. Where impacts to these resources can be identified, possible mitigation measures are suggested. Implementation of mitigation will, for the most part, be the responsibility of MacDill AFB.

Chapter 582: Soil and Water Conservation

The EA addresses the potential of the Proposed Action and alternative to disturb soil and presents possible measures to prevent or minimize soil erosion. Impacts to groundwater and surface water resources also are discussed in the EA.

CONCLUSION

The Air Force finds that the conceptual Proposed Action and alternative plans presented in the EA are consistent with Florida's CMP.

APPENDIX B

AIR FORCE FORM 813

THIS PAGE INTENTIONALLY LEFT BLANK

REQUEST FOR ENVIRONMENTAL IMPACT ANALYSIS

Report Control Symbol
RCS: 26802-23

INSTRUCTIONS: *Section I to be completed by Proponent; Sections II and III to be completed by Environmental Planning Function. Continue on separate sheets as necessary. Reference appropriate item number(s).*

SECTION I - PROPONENT INFORMATION

1. TO *(Environmental Planning Function)*	2. FROM *(Proponent organization and functional address symbol)*	2a. TELEPHONE NO.
6 CES/CEV	6 CES/CECE	(813) 828-0459

3. TITLE OF PROPOSED ACTION
Construct Air Traffic Control Tower and Fire/Crash Rescue Facility

4. PURPOSE AND NEED FOR ACTION *(Identify decision to be made and need date)*
See Attached.

5. DESCRIPTION OF PROPOSED ACTION AND ALTERNATIVES *(DOPAA) (Provide sufficient details for evaluation of the total action.)*
See Attached.

6. PROPONENT APPROVAL *(Name and Grade)*	6a. SIGNATURE	6b. DATE
Bob Fisher		25 Aug 02

SECTION II - PRELIMINARY ENVIRONMENTAL SURVEY. *(Check appropriate box and describe potential environmental effects including cumulative effects.) (+ = positive effect; 0 = no effect; - = adverse effect; U = unknown effect)*

	+	0	-	U
7. AIR INSTALLATION COMPATIBLE USE ZONE/LAND USE *(Noise, accident potential, encroachment, etc.)* Jwk 9/26/02		X		
8. AIR QUALITY *(Emissions, attainment status, state implementation plan, etc.)* Andy 9/26/02			X	
9. WATER RESOURCES *(Quality, quantity, source, etc.)* Mike SW permit likely required Jwk 9/27/02				X
10. SAFETY AND OCCUPATIONAL HEALTH *(Asbestos/radiation/chemical exposure, explosives safety quantity-distance, etc.)* SEPB: Evaluate asbestos & LBP prior demolition. Bill need surveys 9/26/02	X			
11. HAZARDOUS MATERIALS/WASTE *(Use/storage/generation, solid waste, etc.)* Dan 26SEP02		X		
12. BIOLOGICAL RESOURCES *(Wetlands/floodplains, flora, fauna, etc.)* Jwk 9/26/02				X
13. CULTURAL RESOURCES *(Native American burial sites, archaeological, historical, etc.)* Jwk 9/26/02		X		
14. GEOLOGY AND SOILS *(Topography, minerals, geothermal, Installation Restoration Program, seismicity, etc.)* Tony AFG 9/30/02		X		
15. SOCIOECONOMIC *(Employment/population projections, school and local fiscal impacts, etc.)* Jwk 9/26/02	X			
16. OTHER *(Potential impacts not addressed above.)*				

SECTION III - ENVIRONMENTAL ANALYSIS DETERMINATION

17.
- [ ] PROPOSED ACTION QUALIFIES FOR CATEGORICAL EXCLUSION (CATEX) # _____ ; OR
- [X] PROPOSED ACTION DOES NOT QUALIFY FOR A CATEX; FURTHER ENVIRONMENTAL ANALYSIS IS REQUIRED.

18. REMARKS
MacDill AFB is located in a maintenance area for the following criteria pollutants: Ozone. Direct emissions from construction and indirect emissions from visiting traffic and/or follow-on operations, when totaled are less than the deminimus amounts in 40 CFR 93.153, therefore, a conformity determination is not required.

19. ENVIRONMENTAL PLANNING FUNCTION CERTIFICATION *(Name and Grade)*	19a. SIGNATURE	19b. DATE
MARK J MEYERS, Colonel, USAF Vice Commander, 6 AMW		9 NOV 02

4. Purpose and Need for Action:

The MacDill Fire Protection Flight requires an operations facility that meets Air Force and National Fire Protection Association (NFPA) standards. Currently, the Fire Protection Flight operates out of three facilities (Building 8, 26 and 98), however, none o. these facilities meet the requirements established in NFPA Standard 1500 or the AMC design guide. Facility 98 is a temporary station located closer to the runway in an effort to comply with Department of Defense Instruction (DODI) 6055.6 which specifies emergency response times for fire protection operations, however, a permanent facility is required. This project would construct the required permanent crash rescue facility.

The existing air traffic control tower is also old, out of date and in poor repair. The control tower does not comply with current Air Force and Federal Aviation Administration (FAA) standards. Several major deficiencies with the current control tower are impacting airfield operations at MacDill AFB as well as personnel safety. Construction of a new air traffic control tower would rectify the current deficiencies with the existing control tower and bring the AF into compliance with AF and FAA air traffic control standards.

5. Description of Proposed Action and Alternatives:

Proposed Action - The Proposed Action involves two construction actions including construction of a new crash rescue facility for the Fire Protection Flight and construction of a new air traffic control tower for Airfield Operations. The Proposed Action also includes demolition of the existing control tower. Environmental analysis of these three actions is being completed collectively because all three actions would be funded, designed and completed as a single project.

The proposed Fire/Crash Rescue facility would be constructed on the southern side of the airfield near the intersection of Taxiway K and Taxiway C and just west of the newly constructed fire training facility. The proposed 39,000 square foot, one-story facility would be constructed of concrete block with a reinforced concrete foundation and standing seam metal roof. The crash rescue facility would consist primarily of an apparatus room but would include additional space for support areas including sleeping, living, administrative and building support areas. The building's foundation would be raised to a minimum elevation of 11.5 feet above mean sea level (msl) thereby being the foundation above the 100-year flood elevation.

The proposed air traffic control tower would be constructed in the immediate vicinity of the current control tower but slightly behind the existing tower with respect to the active runway. The 8,700 square foot air traffic control tower would be constructed of concrete consisting of reinforced concrete footings and foundation, a supporting superstructure or pedestal and a control tower "cab". The control tower would be 11 stories or approximately 120 feet tall. The control tower cab would be roughly circular and fitted with double glazed tinted glass around the entire cab to provide a 360-degree viewing area. The proposed facility would be designed to withstand hurricane-force winds and storm surges, as defined by local building codes. The building's foundation would be raised to a minimum elevation of 11.5 feet above mean sea level (msl) thereby bringing the foundation above the 100-year flood elevation.

The Proposed Action also includes demolition of the existing control tower. The demolition of this facility would be accomplished by removing the upper portions of the tower with a crane. Once the top-heavy upper portion of the tower has been removed the base can be knocked over safely using standard construction equipment such as front-end loaders, bulldozers and track-hoes. The building would be reduced to rubble and loaded into large roll-off containers for disposal off-base at a construction and demolition debris landfill.

No Action Alternative - Under the No Action Alternative, neither the crash rescue facility or the air traffic control tower would be constructed. Fire rescue operations would continue to operate predominantly out of Building 8, which is undersized and insufficient. Response time would continue to be hindered since the existing fire station is located more than a mile from the closest part of the active runway. Fire rescue vehicles would continue to deteriorate rapidly due to continual exposure to the elements.

Under the no action alternative, air controller operations would continue to operate out of the existing control tower. This situation would continue to limit airfield operations. The existing control tower would continue to deteriorate further beyond AF and FAA standards causing major safety concerns for aircrews and air traffic controllers at MacDill AFB. The ability of air traffic controllers to accomplish surveillance of the whole airfield would not be corrected, threatening the safety of vehicles and aircraft operating at MacDill AFB.

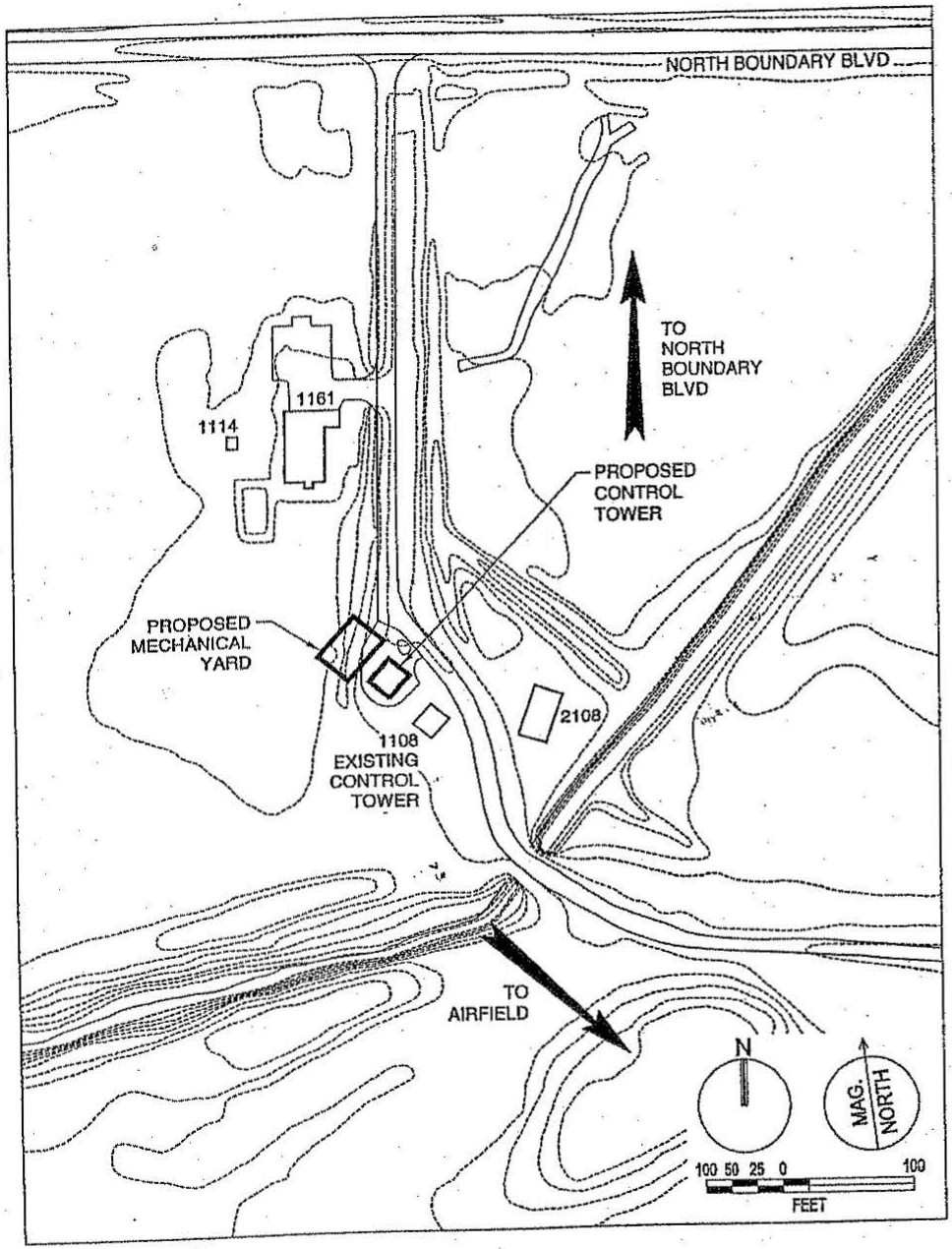


Figure 2: Site Plan – Air Traffic Control Tower

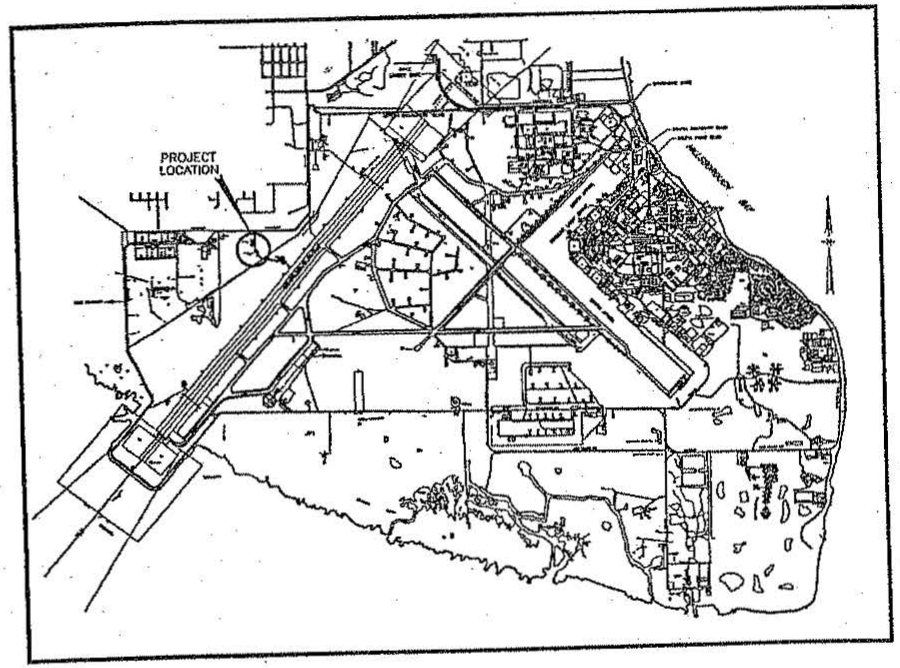


Figure 1: Location Plan – MacDill AFB

FIGURE 1 – Proposed Air Traffic Control Tower Site
MacDill AFB, Florida

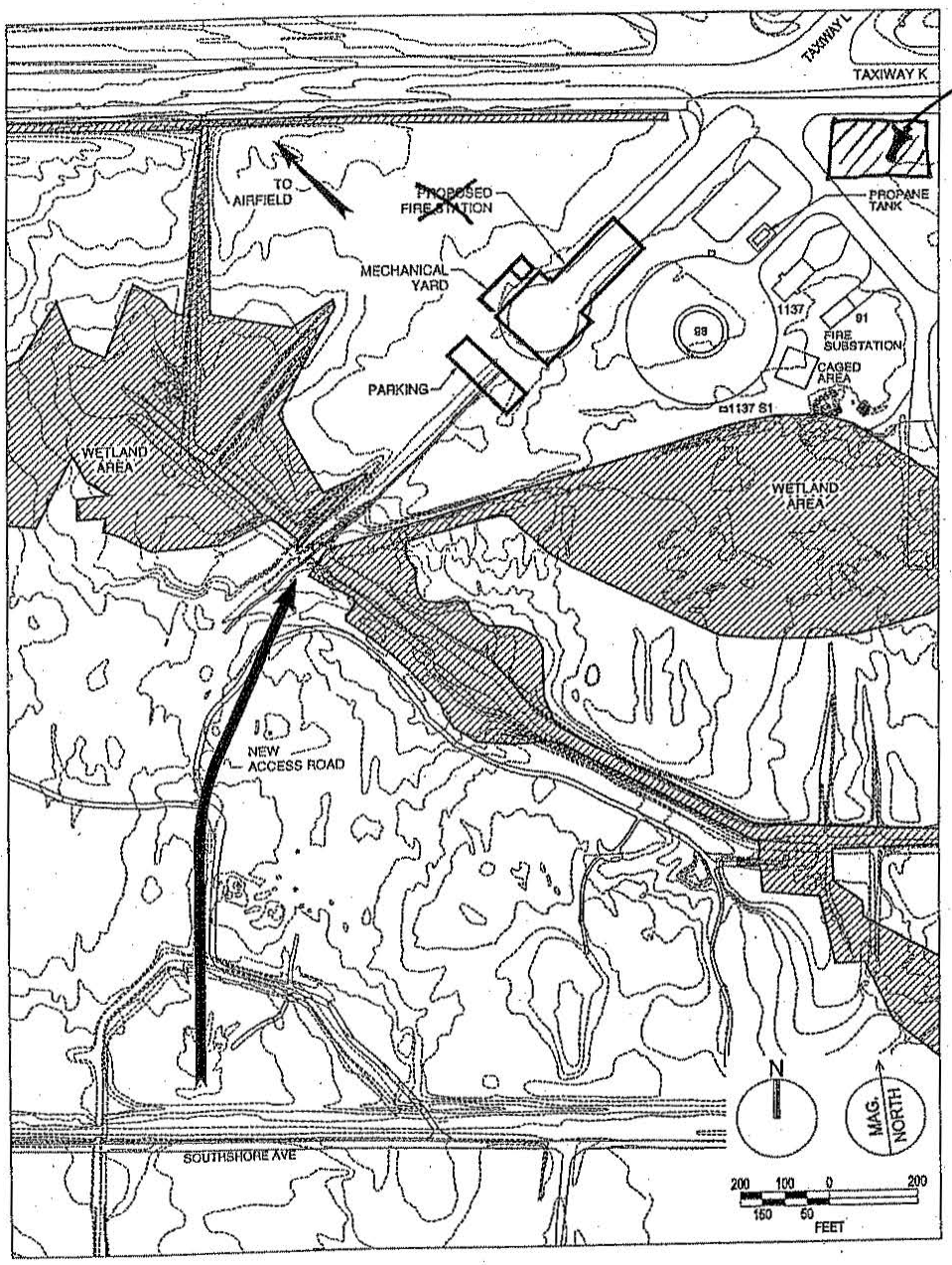


Figure 2: Site Plan – Crash Fire Station

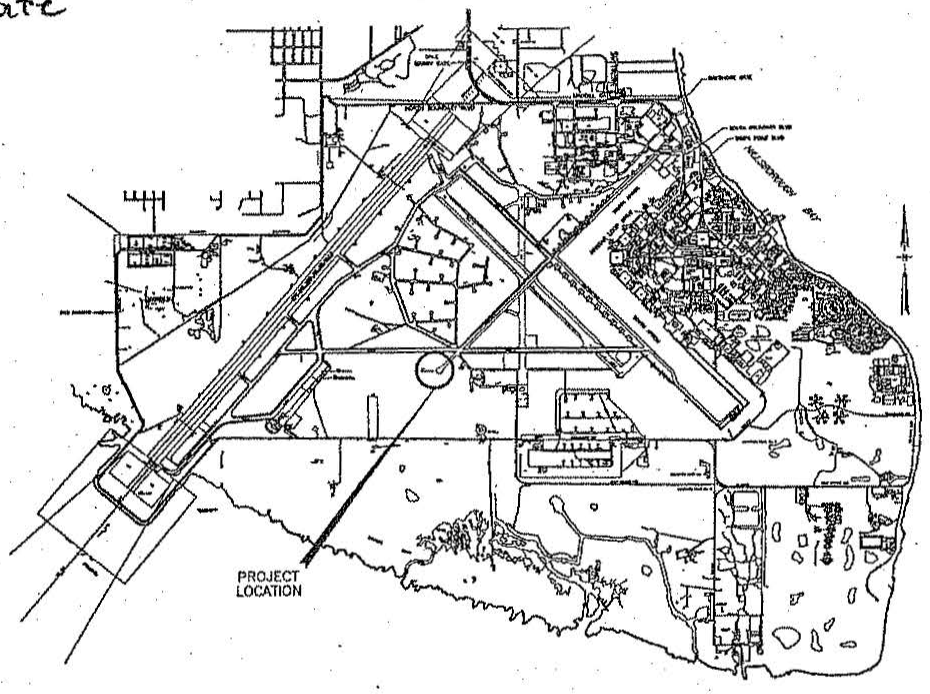


Figure 1: Location Plan – MacDill AFB

FIGURE 2 – Proposed Vehicle Crash Rescue Facility Site
MacDill AFB, Florida

APPENDIX C

AIR EMISSIONS CALCULATIONS FOR PROPOSED ACTION

AND CUMULATIVE AIR EMISSIONS CALCULATIONS

THIS PAGE INTENTIONALLY LEFT BLANK

TABLE - CONSTRUCTION SITE AIR EMISSIONS
Combustive Emissions of ROG, NOx, SO2, CO and PM10 Due to Construction

6-Jul-01

Input:

Total Building Area:	62,010	ft^2	calculation: (39,000 SF {CRF} + 8,700 SF {ATCT} x 1.3 (margins of area) = 62,010 SF
Total Paved Area:	6,201	ft^2	
Total Disturbed Area:	6.0	acres	
Construction Duration:	2.0	years	
Annual Construction Activity:	260	days/yr	

Results:[Average per Year Over the Construction Period]

	ROG	NOx	SO2	CO	PM10
Emissions, lbs/day	25.29	58.97	2.92	51.60	4.81
Emissions, tons/yr	3.29	7.67	0.38	6.71	0.63

Calculation of Unmitigated Emissions

Summary of Input Parameters

	ROG	NOx	SO2	CO	PM10
Total new acres disturbed:	6.00	6.00	6.00	6.00	6.00
Total new acres paved:	0.14	0.14	0.14	0.14	0.14
Total new building space, ft^2:	62,010	62,010	62,010	62,010	62,010
Total years:	2.00	2.00	2.00	2.00	2.00
Area graded, acres in 1 yr:	3.00	3.00	3.00	3.00	3.00
Area paved, acres in 1 yr:	0.07	0.07	0.07	0.07	0.07
Building space, ft^2 in 1 yr:	31,005	31,005	31,005	31,005	31,005

Annual Emissions by Source (lbs/day)

	ROG	NOx	SO2	CO	PM10
Grading Equipment	0.8	4.8	0.3	1.0	0.8
Asphalt Paving	0.0	0.0	0.0	0.0	0.0
Stationary Equipment	5.2	4.2	0.3	0.9	0.2
Mobile Equipment	5.0	49.9	2.3	49.6	3.7
Architectural Coatings (Non-Res)	14.4	0.0	0.0	0.0	0.0
Total Emissions (lbs/day):	25.3	59.0	2.9	51.6	4.8

5/9/2003

Emission Factors

Reference: Air Quality Thresholds of Significance, SMAQMD, 1994.

Source	SMAQMD Emission Factor				
	ROG	NOx	SO2 *	CO *	PM10
Grading Equipment	2.50E-01 lbs/acre/day	1.60E+00 lbs/acre/day	0.11 lbs/acre/day	0.35 lbs/acre/day	2.80E-01 lbs/acre/day
Asphalt Paving	2.62E-01 lbs/acre/day	NA	NA	NA	NA
Stationary Equipment	1.68E-04 lbs/day/ft^2	1.37E-04 lbs/day/ft^2	9.11E-06 lbs/day/ft^2	2.97E-05 lbs/day/ft^2	8.00E-06 lbs/day/ft^2
Mobile Equipment	1.60E-04 lbs/day/ft^2	1.61E-03 lbs/day/ft^2	7.48E-05 lbs/day/ft^2	0.0016 lbs/day/ft^2	1.20E-04 lbs/day/ft^2
Architectural Coatings (Non-Res)	8.15E-02 lbs/day/ft	NA	NA	NA	NA

* Factors for grading equipment and stationary equipment are calculated from AP-42 for diesel engines using ratios with the NOx factors.
Factors for mobile equipment are calculated from ratios with Mobile5a 2001 NOx emission factors for heavy duty trucks for each site.

TABLE - CONSTRUCTION EMISSION FACTOR

Calculation of PM10 Emissions Due to Site Preparation (Uncontrolled).
Revised 16 June 1997.

User Input Parameters / Assumptions

Acres graded per year:	3.0	acres/yr	
Grading days/yr:	10	days/yr	(From "grading")
Exposed days/yr:	120	days/yr graded area is exposed	
Grading Hours/day:	8	hr/day	
Soil piles area fraction:	0.01	(Fraction of site area covered by soil piles)	
Soil percent silt, s:	15	%	
Soil percent moisture, M:	8	%	
Annual rainfall days, H:	107	days/yr that rainfall exceeds 0.01 inch (Tampa, FL)	
Wind speed > 12 mph %, I:	12	%	
Fraction of TSP, J:	0.45	(SCAQMD recommendation)	
Mean vehicle speed, S:	5	mi/hr	(On-site)
Dozer path width:	5	ft	
Qty construction vehicles:	0	vehicles	
On-site VMT/vehicle/day:	5	mi/veh/day	(Excluding bulldozer VMT during grading)

Emissions Due to Soil Disturbance Activities

Operation Parameters (Calculated from User Inputs)

Grading duration per acre	26.7	hr/acre	
Bulldozer mileage per acre	1.7	VMT/acre	(Miles traveled by bulldozer during grading)
Construction VMT per day	2	VMT/day	
Construction VMT per acre	6	VMT/acre	(Travel on unpaved surfaces within site)

Equations Used (Corrected for PM10)

Operation	Empirical Equation	Units	AP-42 Section (4th Edition)
Bulldozing	0.75(s^1.5)/(M^1.4)	lbs/hr	8.24, Overburden
Grading	(0.60)(0.051)S^2.0	lbs/VMT	8.24, Overburden
Vehicle Traffic	(3.72/(M^4.3))*.6	lbs/VMT	8.24, Overburden

Source: Compilation of Air Pollutant Emission Factors, Vol. I, USEPA AP-42.
Section 8.24, Western Surface Coal Mining (4th Edition)

Calculation of PM10 Emission Factors for Each Operation

Operation	Emission Factor (mass/ unit)	Operation Parameter	Emission Factor (lbs/ acre)
Bulldozing	2.37 lbs/hr	26.7 hr/acre	63.3 lbs/acre
Grading	0.77 lbs/VMT	1.7 VMT/acre	1.3 lbs/acre
Vehicle Traffic	0.00 lbs/VMT	6 VMT/acre	0 lbs/acre

Emissions Due to Wind Erosion of Soil Piles and Exposed Graded Surface

Reference: CEQA Air Quality Handbook, SCAQMD, April 1993.

Soil Piles EF = 1.7(s/1.5)[(365 - H)/235](I/15)(J) = (s)(365 - H)(I)(J)/(3110.2941), p. A9-99.

Soil Piles EF = 6.7 lbs/day/acres covered by soil piles

Consider soil piles area fraction so that EF applies to graded area

Soil piles area fraction: 0.01 (Fraction of site area covered by soil piles)

Soil Piles EF = 0.067 lbs/day/acres graded

Graded Surface EF = 26.4 lbs/day/acre (recommended in CEQA Manual, p. A9-93).

Calculation of Annual PM10 Emissions

Source	Emission Factor	Graded Acres/yr	Exposed days/yr	Emissions lbs/yr	Emissions tons/yr
Bulldozing	63.3 lbs/acre	3.00	NA	190	0
Grading	1.3 lbs/acre	3.00	NA	4	0
Vehicle Traffic	0.0 lbs/acre	3.00	NA	0	0
Erosion of Soil Piles	0.1 lbs/acre/day	3.00	120	24	0
Erosion of Graded Surface	26.4 lbs/acre/day	3.00	120	9,504	5
TOTAL				9,722	5

TABLE - CONSTRUCTION (GRADING) EMISSIONS

Estimate of time required to grade a specified area.

Updated 17 June 1997.

Input Parameters

Construction area: 3 acres/yr
Qty Equipment: 0

Assumptions.

Terrain is mostly flat.
Terrain is populated with medium brush; trees are negligible.
An average of 6" soil is removed during stripping.
An average of 6" soil is excavated from one half of the site and backfilled to the other half of the site; no soil is hauled off-site or borrowed.
200 hp bulldozers are used for site clearing.
300 hp bulldozers are used for stripping, excavation, and backfill.
Vibratory drum rollers are used for compacting.

Stripping, Excavation, Backfill and Compaction require an average of two passes each.
Excavation and Backfill are assumed to involve only half of the site.

Calculation of days required for one piece of equipment to grade the specified area.

Reference: Means Heavy Construction Cost Data, 6th Ed., R. S. Means, 1992.

Means Line No.	Operation	Description	Output	Units	Acre/(equip)(day)	(Equip)(day)/acre	Acres/yr	(Equip)(days)/yr
021 108 0550	Site Clearing	Dozer & rake, medium brush	0.6	acre/day	0.6	1.67	3.00	5.00
021 144 0300	Stripping	Topsoil & stockpiling, adverse soil	1,650	cu. yd/day	2.05	0.49	3.00	1.47
022 242 5220	Excavation	Bulk, open site, common earth, 150' hau	800	cu. yd/day	0.99	1.01	1.50	1.51
022 208 5220	Backfill	Structural, common earth, 150' haul	1,950	cu. yd/day	2.42	0.41	1.50	0.62
022 226 5020	Compaction	Vibrating roller, 6 " lifts, 3 passes	1,950	cu. yd/day	2.42	0.41	3.00	1.24
TOTAL								9.84

Calculation of days required for the indicated pieces of equipment to grade the designated acreage.

(Equip)(day)/yr: 9.84
Qty Equipment: 0
Grading days/yr: 9.84

Round to	10 grading days/yr

TABLE 4A
Total Air Emissions for Projects at MacDill

Pollutants	MFH-Phase 4	Fitness Center	Mission Planning Center	Control Tower/ Crash Rescue	TLFs	CE Storage Facility/Demo	SVS Storage Facility/ Demo	War Res. Facility	Hydrant Fueling System	Military Service Station	Runway Pavement Repairs	Project Totals	Hills Cty Emissions 1997	Net Change	De minimis	Above/Below De minimis
CO	13.3	12.64	7.2	6.71	16.88	7.37	5.40	0.81	30.97	0.11	2.60	**103.99**	19,272	0.54%	100	Below
VOC	5.54	5.31	3.59	3.29	6.6	3.50	2.81	0.61	10.38	0.21	1.88	43.72	27,703	0.16%	100	Below
NO_X	15.42	14.16	8.74	7.67	19	8.22	6.11	0.94	33.84	0.24	12.02	**126.36**	82,563	0.15%	100	Below
SO_X	0.77	0.7	0.44	0.38	0.93	0.40	0.3	0.05	1.64	0.01	0.80	6.42	NA		100	Below
PM_{10}	1.29	1.12	0.78	0.63	1.51	0.64	0.49	0.08	2.57	0.04	2.10	11.25	NA		100	Below
Pb												0	53		25	Below
Estimated Start/End Date	7/2000 to 6/2002	4/2001 to 6/2002	1/2002 to 6/2003	9/2003 to 9/2005	4/2001 to 7/2002	11/2001 to 11/2002	5/2002 to 5/2003	8/2001 to 6/2002	8/2001 to 1/2004	6/2002 to 6/2003	10/2001 to 3/2003					

**Note: All values in tons per year unless otherwise noted.
Net change = Project totals / Hills Cty emissions
Above/Below De minimis = Project totals above or below de minimis
NA = not available.

YEAR 2003, 2004 and 2005 EMISSIONS WERE CALCULATED BY TAKING AN APPROPRIATE PERCENTAGE OF THE TOTAL EMISSIONS DETERMINED ABOVE. SEE TABLES 4B through 4D BELOW

TABLE 4B
Emissions for Year 2003

		MFH-Phase 4	Fitness Center	Mission Planning Center	Control Tower/ Crash Rescue	TLFs	CE Storage Facility	SVS Storage Facility	War Res. Facility	Hydrant Fueling System	Military Service Station	Runway Pavement Repairs	2003 Project Totals	De minimis	Above/Below De minimis
Estimated % of Time During 2003 That Project Would Be Active		**0%**	**0%**	**50%**	**25%**	**0%**	**0%**	**42%**	**0%**	**100%**	**50%**	**25%**			
	Pollutants														
	CO	0.00	0.00	3.60	1.68	0.00	0.00	2.27	0.00	30.97	0.06	0.65	**39.22**	100	Below
	VOC	0.00	0.00	1.80	0.82	0.00	0.00	1.18	0.00	10.38	0.11	0.47	**14.75**	100	Below
	NO_X	0.00	0.00	4.37	1.92	0.00	0.00	2.57	0.00	33.84	0.12	3.01	**45.82**	100	Below
	SO_X	0.00	0.00	0.22	0.10	0.00	0.00	0.13	0.00	1.64	0.01	0.20	**2.29**	100	Below
	PM_{10}	0.00	0.00	0.39	0.16	0.00	0.00	0.21	0.00	2.57	0.02	0.53	**3.87**	100	Below
	Pb												**0**	25	Below

TABLE 4D
Emissions for Year 2004

		MFH-Phase 4	Fitness Center	Mission Planning Center	Control Tower/ Crash Rescue	TLFs	CE Storage Facility	SVS Storage Facility	War Res. Facility	Hydrant Fueling System	Military Service Station	Runway Pavement Repairs	2004 Project Totals	De minimis	Above/Below De minimis
Estimated % of Time During 2004 That Project Would Be Active		0%	0%	0%	100%	0%	0%	0%	0%	8%	0%	0%			
	Pollutants														
	CO	0.00	0.00	0.00	6.71	0.00	0.00	0.00	0.00	2.48	0.00	0.00	**9.19**	100	Below
	VOC	0.00	0.00	0.00	3.29	0.00	0.00	0.00	0.00	0.83	0.00	0.00	**4.12**	100	Below
	NO_X	0.00	0.00	0.00	7.67	0.00	0.00	0.00	0.00	2.71	0.00	0.00	**10.38**	100	Below
	SO_X	0.00	0.00	0.00	0.38	0.00	0.00	0.00	0.00	0.13	0.00	0.00	**0.51**	100	Below
	PM_{10}	0.00	0.00	0.00	0.63	0.00	0.00	0.00	0.00	0.21	0.00	0.00	**0.84**	100	Below
	Pb												**0**	25	Below

TABLE 4B
Emissions for Year 2005

		MFH-Phase 4	Fitness Center	Mission Planning Center	Control Tower/ Crash Rescue	TLFs	CE Storage Facility	SVS Storage Facility	War Res. Facility	Hydrant Fueling System	Military Service Station	Runway Pavement Repairs	2002 Project Totals	De minimis	Above/Below De minimis
Estimated % of Time During 2005 That Project Would Be Active		0%	0%	0%	75%	0%	0%	0%	0%	0%	0%	0%			
	Pollutants														
	CO	0.00	0.00	0.00	5.03	0.00	0.00	0.00	0.00	0.00	0.00	0.00	**5.03**	100	Below
	VOC	0.00	0.00	0.00	2.47	0.00	0.00	0.00	0.00	0.00	0.00	0.00	**2.47**	100	Below
	NO_X	0.00	0.00	0.00	5.75	0.00	0.00	0.00	0.00	0.00	0.00	0.00	**5.75**	100	Below
	SO_X	0.00	0.00	0.00	0.29	0.00	0.00	0.00	0.00	0.00	0.00	0.00	**0.29**	100	Below
	PM_{10}	0.00	0.00	0.00	0.47	0.00	0.00	0.00	0.00	0.00	0.00	0.00	**0.47**	100	Below
	Pb												**0**	25	Below

APPENDIX D

PUBLIC NOTICE

AND AGENCY CORRESPONDENCE

THIS PAGE INTENTIONALLY LEFT BLANK

DEPARTMENT OF THE AIR FORCE
6TH AIR MOBILITY WING (AMC)
MACDILL AIR FORCE BASE, FLORIDA

MEMORANDUM FOR DIVISION OF HISTORIC RESOURCES
ATTN: MS. JANET SNYDER MATTHEWS

FROM: 6 CES/CD
7621 Hillsborough Loop Drive
MacDill AFB FL 33621-5207

SUBJECT: Construction of New Air Traffic Control Tower and Crash Rescue Facility at MacDill Air Force Base (AFB)

1. The United States Air Force (USAF) intends to construct a new air traffic control tower and a new vehicle crash rescue facility. The project would also include demolition of the existing air traffic control tower. The new air traffic control tower will improve the safety and efficiency of air traffic operations at MacDill AFB and keep the base in compliance with Federal Aviation Administration standards. The new control tower would be constructed immediately adjacent to the existing control tower on the west-central side of the runway (Figure 1). Once the new control tower is constructed, the existing control tower constructed in 1972, would be demolished. Construction of a new vehicle crash rescue facility (fire station) in a more centralized location on the flightline will improve emergency response times for MacDill AFB fire fighters and comply with Department of Defense Instruction 6055.6 which specifies a 3-minute emergency response time for fire protection operations. In addition, the new fire station facility will bring the fire protection flight into compliance with the National Fire Protection Association Standard 1500 and provide MacDill AFB fire fighters with a much needed modern facility. The new crash rescue facility would be constructed on the southern side of the airfield area just south of the Taxiway L and K intersection (Figure 2).

2. A representative from the MacDill AFB Natural/Cultural Resources staff surveyed the proposed project sites to determine if any cultural resources would be affected by the project. There are no historic or archeological sites on or in the vicinity of the areas proposed for construction or demolition under the project. The proposed construction and demolition sites are not located in either of the MacDill AFB Historic Districts. Consequently, MacDill AFB believes that the proposed project would not adversely impact cultural resources. If the State Historical Preservation Office agrees with this assessment, please document your concurrence by signing where indicated on page 2. If you would like to inspect the proposed project sites, please contact the MacDill AFB Natural/Cultural Resources staff.

6 CES/CD
SUBJECT: Construction of a New Air Traffic Control Tower and a new Crash Rescue Facility at MacDill Air Force Base (AFB)

3. If you have any questions about the proposed project, please contact Mr. Jason Kirkpatrick at (813) 828-0459.

DALE CLARK, GS-13
Deputy Base Civil Engineer

Attachments:
Figure 1 – Proposed Air Traffic Control Tower Sites on MacDill AFB
Figure 2 – Proposed Vehicle Crash Rescue Facility Site on MacDill AFB

MEMORANDUM FOR 6 CES/CD

The State Historic Preservation Office concurs with MacDill AFB that construction of a new air traffic control tower and a new crash rescue facility as well as demolition of the existing control tower will have no adverse effect on cultural resources at MacDill AFB.

Frederick P. Gaske, Deputy SHPO
JANET SNYDER MATTHEWS
State Historic Preservation Officer

Date: 3/15/02

DEPARTMENT OF THE AIR FORCE
6TH AIR MOBILITY WING (AMC)
MACDILL AIR FORCE B

U.S. FISH & WILDLIFE SERVICE

FWS Log. No. 02-679 (St. Pete)

The Proposed action is not likely to adversely affect resources pro by the Endangered Species Act of 1973, as amended (16 U.S.C. 15 seq.). This finding fulfills the requirements of the Act.

MEMORANDUM FOR U.S. FISH AND WILDLIFE

With reference to the Fish and Wildlife Coordination Act (16 U.S.C. 1531 et seq.) the Service does not have sufficient staff to review and comment on this applicatior therefore, we are unable to make recommendations and take no action regarding thi application.

Dan Palmer for 3/18/0

Peter M. Benjamin
Assistant Field Supervisor

Date

FROM: 6 CES/CD
7621 Hillsborough Loop Drive
MacDill AFB FL 33621-5207

6 CES/CD
SUBJECT: Construction of New Air Traffic Control Tower and Crash Rescue Facility at MacDill Air Force Base (AFB)

1. The United States Air Force (USAF) intends to construct a new air traffic control tower and a new vehicle crash rescue facility. The project would also include demolition of the existing air traffic control tower. The new air traffic control tower will improve the safety and efficiency of air traffic operations at MacDill AFB and keep the base in compliance with Federal Aviation Administration standards. The new control tower would be constructed immediately adjacent to the existing control tower on the west-central side of the runway (Figure 1). Once the new control tower is constructed, the existing control tower constructed in 1972, would be demolished. Construction of a new vehicle crash rescue facility (fire station) in a more centralized location on the flightline will improve emergency response times for MacDill AFB fire fighters and comply with Department of Defense Instruction 6055.6 which specifies a 3-minute emergency response time for fire protection operations. In addition, the new fire station facility will bring the fire protection flight into compliance with the National Fire Protection Association Standard 1500 and provide MacDill AFB fire fighters with a much needed modern facility. The new crash rescue facility would be constructed on the southern side of the airfield area just south of the Taxiway L and K intersection (Figure 2).

2. A representative from the MacDill AFB Natural Resources staff surveyed the proposed construction sites to determine if any threatened or endangered species inhabit the sites. Both of the sites proposed for construction, as well as the demolition site, are located in open grassy areas adjacent to the airfield and no threatened or endangered species were observed on any of the sites. However, the proposed 2,100-foot access road to the crash rescue facility would be constructed through a heavily wooded site and may bisect some wetland areas. Prior to implementation of the proposed project MacDill AFB requests that the USFWS inspect the proposed construction sites including the proposed access road to confirm that the project would not adversely impact any threatened or endangered species. If, after inspecting the proposed construction and demolition sites, the USFWS believes that the project would not adversely impact threatened or endangered species or habitat areas, please indicate so by stamp or signing where indicated below.

6 CES/CD
SUBJECT: Construction of a New Air Traffic Control Tower and a new Crash Rescue Facility at MacDill Air Force Base (AFB)

3. To schedule an inspection of the proposed project sites or if you have any questions about the project, please contact Mr. Jason Kirkpatrick at (813) 828-0459.

DALE CLARK, GS-13
Deputy Base Civil Engineer

Attachments:

Figure 1 – Proposed Air Traffic Control Tower Site at MacDill AFB
Figure 2 – Proposed Vehicle Crash Rescue Facility Site at MacDill AFB

1st Indorsement
To: 6 CES/CD

The U.S. Fish and Wildlife Service agrees with MacDill AFB that the proposed construction and demolition activities described above will not adversely impact threatened or endangered species on MacDill AFB.

_____ _____
U.S. Fish and Wildlife Service Representative Date

HQ AMC/CEVP Comment Response Matrix On Proposed Action and Alternatives for Environmental Assessment Construct Control Tower and Crash Rescue Facility at MacDill AFB FL		
Location	**Comment**	**Response**
numbers	environmental constraints reflected.	
Figures Section sequence or page numbers	Figure 1-2, Air Traffic Control Site plan requires update with final site location, storm water retention pond, and environmental constraints reflected.	More detailed final figures will be prepared.
Table 2-1, Environmental Consequences	Wetlands, Previously discussed.	There would be no impacts to wetlands with the construction of stormwater retention areas (ponds).
Appendix B	Air Force Form 813 requires update. Replace with signed AF Form 813.	A Final 813 will be included in the Final EA
Appendix C	The word "Cumulative" is misspelled on the Appendix C cover.	Cumulative will be spelled correctly.
Appendix C	Unable to determine if calculations for construction equipment emissions associated with constructing the storm water retention area and pond are reflected in the tables contained in Appendix C, Air Emission Calculations for the Proposed Action and Cumulative Air Emission Calculations.	Air Emission calculations will be revised to include additional areas of construction.

HQ AMC/CEVP Comment Response Matrix On
Proposed Action and Alternatives for Environmental Assessment
Construct Control Tower and Crash Rescue Facility
at MacDill AFB FL

Location	Comment	Response
	Hazard (BASH) Management Techniques. Paragraph 2.3.5, "Controlling Drainage" in AFI 91-212, specifically describes issues pertaining to proposed drainage retention area and pond described in the Draft EA.	MILCON program manager will be notified of the potential BASH concerns.
Table 2.8.1, Comparison of Environmental Consequences, page 17.	Reevaluate the "positive" rating assigned in this table. The impact resulting from construction of a storm water retention pond in the area of the flight line, could adversely impact the rating specifically with regard to the Bash Program.	Positive rating is due to improvements in visibility from the tower and response time for the fire department in response to possible air accidents. The retention ponds will not have a negative impact on BASH so the rating shall remain a positive.
Section 3.6.2, Wetlands, page 30.	Consider Revising paragraph 2 based on a specific size and location of the storm water retention pond for the control tower and storm water retention area for the crash rescue facility.	New figures and text have been provided in the EA to better define and locate the proposed stormwater retention areas.
Section 4.0, Environmental Consequences, Section 4.6, Biological Resources, page 54.	4.6.1.1, Wetlands. Construction of a storm water retention pond for the control tower and storm water retention area for the crash rescue facility may have an impact on wetlands. Reevaluate.	Construction of the stormwater retention areas for both the control tower and the crash rescue facility would have no connection or impacts to adjacent wetland areas. Final design plans confirm that the stormwater retention areas are not near wetlands.
Section 4.10, Transportation, page 56	The last line of this paragraph indicates there will be no net increase in the traffic on MacDill AFB as an environmental consequence of this construction. This sentence should be modified. The number of construction vehicles needed to deliver fill materials sufficient to reach the desired height of 11.5 feet above mean sea level for each facility will cause a significant increase in the number of construction vehicles on the installation.	The paragraphs states that no "long term" impact to transportation would occur. This assessment is based on the fact that the staffing at each facility (and on the base as a whole) would not change upon completion of construction. The first part of the project discusses the negative "temporary" impacts to transportation. MacDill AFB feels this paragraph accurately reflects the impacts associated with the project. No change.
Figures Section sequence or page	Figure 1-1, Fire Crash Site plan requires update with final site location, storm water retention area, and	More detailed final figures will be provided.

HQ AMC/CEVP Comment Response Matrix On
Proposed Action and Alternatives for Environmental Assessment
Construct Control Tower and Crash Rescue Facility
at MacDill AFB FL

Location	Comment	Response
page 3.	construction sites under consideration by the installation for the Crash Rescue Facility. Additionally, updated maps indicate the presence of wetlands to the South and West of the proposed site, which are not reflected in the map provided at Figure 1.2 in the Draft EA. A firm site location needs to be established and an accurate evaluation made for impacts caused to the adjacent wetlands resulting from the need to significantly raise the elevation of the proposed location for the crash rescue complex.	location shown will be included as a figure for both facilities. Closest wetlands are more than 600 feet south of the CRF site. The proposed construction, including elevating the site with more than six feet of fill, would have no impact on wetlands. Text will be revised to reflect this fact and a constraints map figure will be added to show location of nearby wetlands
Section 2.2.1, Fire Crash Rescue Facility, Para 6, page 10.	This paragraph describes a "Required" storm water retention area. This area needs to be better defined and should be reflected on the proposed site map.	The figures provided were taken from the Requirements Document. Design drawings are not currently available for this project. Updated figures have been provided.
Section 2.2.2, Air Traffic Control Tower, Para 6, page 12.	This paragraph describes construction of a storm water retention pond. The specifics regarding the size and location for this area need to be better defined and should be reflected on the proposed site map. The Draft EA indicates that soil removed in the construction of the pond will be utilized to raise the elevation of the new tower. If a pond is constructed then Table 2.8.1, Comparison of Environmental Consequences (Pg 17) should be reevaluated and the Biological Resources Section, Wetlands area updated (if applicable) from the current assessment of "none."	Construction of the retention areas would not impact adjacent wetlands. No changes are required.
Section 2.2.2, Air Traffic Control Tower, Para 6	One caution is that construction of a storm water retention pond in the area around the flight line runs contrary to Bash Program policy. Undesirable habitat and land use conditions are outlined in both AFI 91-202, United States AF Mishap Prevention Program, dated 1 Aug 1998 and AFI 91-212, Bird Aircraft Strike	Stormwater retention areas are designed as "dry" basins. These areas receive a flush of stormwater following storm events and a allow the controlled percolation of stormwater into the ground. The basins very rarely have standing water in them – only during sever or extended rain events. Regardless, the

HQ AMC/CEVP Comment Response Matrix On
Proposed Action and Alternatives for Environmental Assessment
Construct Control Tower and Crash Rescue Facility
at MacDill AFB FL

Location	Comment	Response
Commenter: (Mr. Doug Allbright, HQ AMC/CEVP, DSN 779-0846 (618) 229-0846, doug.allbright@scott.af.mil)		*Date: 27 Jan 03*
Overall Comment on Draft EA	Maintain consistency in order of facilities and action described. In Section 1.0 Purpose and Need, the Tower is described before the Crash Facility. The same is true for Section 2.0 Detailed Description. However, in Section 2.1 and subsequent sections, this order is reversed causing confusion. Recommend that all sections follow suit with the Air Traffic Control Tower being described first and the Crash Facility second, just as the project title indicates.	MacDill CEVN concurs. Inconsistencies will be corrected. Discussion about Control Tower first then Crash Rescue Facility second.
Section 1.0, Purpose and Need for Proposed Action, Para 2, page 1.	Para 2: Start paragraph 2 similar to Para 3 by clearly describing the desired action. "The existing crash rescue facilities…". Paragraph 2 in the Draft EA provides good background information, but does not immediately establish the purpose for this proposed action. Recommend the 6TH AMC/CEV incorporate comments from the AF Form 813, Para 4 into paragraph 2 of the EA. Specifically include cites to NFPA Standards and DOD Instructions which show that existing Fire Protection Flight facilities do not meet the National Fire Protection Standards/DOD Instructions, are outdated, and pose life safety and/or crash response deficiencies.	MacDill CEVN concurs. Purpose and need paragraphs will be strengthened through citation of NFP standards and AF Instructions – pulled from AF Form 813.
Page 2, Para 1.1, Lines 13 and 14, page 2.	The organization structure of the Draft EA for the 6th AMW should be changed to reflect the new AMC Standard to include the Maintenance Group rather than Logistics Group and the Mission Support Group vice Support Group.	These are carry over from previous report and will be changed.
Section 1.3, Location for Proposed Actions,	Replace the site maps in the Draft EA with current maps (including environmental constraints). New maps provided by the 6th AMW/CEV indicate multiple	Site maps will be replaced with updated site maps. An appropriate section from the base environmental constraints map with the proposed site construction

DEPARTMENT OF THE AIR FORCE
6TH AIR MOBILITY WING (AMC)
MACDILL AIR FORCE BASE, FLORIDA

MEMORANDUM FOR SEE DISTRIBUTION

NOV 13 2002

FROM: 6 CES/CD

SUBJECT: Draft Environmental Assessment for Construct Air Traffic Control Tower and Crash Rescue Facility

1. The U.S Air Force requests your review of the attached Draft Environmental Assessment (EA) for an upcoming project at MacDill Air Force Base (AFB). The proposed project includes construction of a new 8,700 square foot, 10-story air traffic control tower to replace the existing, substandard control tower from the early 1970's. The project would also construct a new 39,000 square foot fire crash rescue facility. The new crash rescue facility would be more centrally located on the airfield permitting faster emergency response times and bringing the Air Force into compliance with National Fire Protection Association standard 1500. The final phase of the project would demolish the existing air traffic control tower once the new tower is complete.

2. The EA describes the Proposed Action and alternatives (Chapter 2). It establishes baseline environmental conditions for the Base (Chapter 3) and evaluates the potential impacts associated with implementation of the Proposed Action and alternatives (Chapter 4). Resource areas discussed in the EA include air quality, noise, hazardous materials/waste and petroleum, floodplains, water, biological, socioeconomic, cultural, land-use, transportation, safety and occupational health, and environmental justice.

3. This EA meets the requirements of the National Environmental Policy Act (NEPA) for evaluation of impacts of a proposed action as part of the planning process. If the EA determines that no significant impacts would result from the Proposed Action, the Air Force will prepare a Finding of No Significant Impact (FONSI) for the project.

4. In order to maintain our schedule for completion of the EA, we would appreciate receiving your comments by December 27th, 2002. If you have any questions or require additional information, please contact Mr. Jason Kirkpatrick at (813) 828-0459.

GENE A. ROGERS, GS-13
Deputy Base Civil Engineer

DISTRIBUTION LIST

Lt Col Carlon
HQ AMC/CEVP
507 Symington Drive
Scott AFB, IL 62225-5022

Mr. David Hale
National Marine Fisheries Service
9721 Executive Center Drive North
St. Petersburg, FL 33702

Laura Krammerer
Division of Historical Resources
Compliance Review Section
500 S. Bronough St.
Tallahassee, FL 32399-0250

Brian Pridgen
U.S. Fish and Wildlife Service
9549 Koger Blvd. Suite 111
St. Petersburg, FL 33702

Jasmine Ruffington
Florida Coastal Management Program
2555 Shumard Oak Blvd.
Tallahassee, FL 32399-2100

Mr. Steve West
Florida Department of Environmental Protection
Bureau of Beaches and Coastal Systems
3900 Commonwealth Blvd.
Tallahassee, FL 32399-3000

Cherie Trainor
Florida State Clearing House
2555 Shumard Oak Blvd.
Tallahassee, FL 32399-2100

Ms. Tina Russo
Hillsborough County Public Library
900 N. Ashley Drive
Tampa, Florida 33602

Mr. Lenard Paris
USCOE Mobile District
P.O. Box 6230
MacDill AFB, FL 33606-6230

Mr. Art Bagley
University of Tampa
Merl Kelce Library
401 West Kennedy Blvd
Tampa, Florida 33606

Control Towers/Crash Rescue Facility

THE TAMPA TRIBUNE
Published Daily
Tampa, Hillsborough County, Florida

State of Florida }
County of Hillsborough } ss.

Before the undersigned authority personally appeared J. Rosenthal, who on oath says that she is Advertising Billing Manager of The Tampa Tribune, a daily newspaper published at Tampa in Hillsborough County, Florida; that the attached copy of advertisement being a

LEGAL NOTICE

in the matter of PUBLIC NOTICE

was published in said newspaper in the issues of NOVEMBER 29, 2002

Affiant further says that the said The Tampa Tribune is a newspaper published at Tampa in said Hillsborough County, Florida, and that the said newspaper has heretofore been continuously published in said Hillsborough County, Florida, each day and has been entered as second class mail matter at the post office in Tampa, in said Hillsborough County, Florida for a period of one year next preceding the first publication of the attached copy of advertisement; and affiant further says that she has neither paid nor promised any person, this advertisement for publication in the said newspaper.

J Rosenthal

Sworn to and subscribed by me, this 02 day of DECEMBER, A.D. 20 02

Personally Known ✓ or Produced Identification _____
Type of Identification Produced _____

Susie Lee Slaton

OFFICIAL NOTARY SEAL
SUSIE LEE SLATON
COMMISSION NUMBER
DD000060
MY COMMISSION EXP.
APRIL 16, 2005

PUBLIC NOTICE
UNITED STATES AIR FO

The Air Force is invit
pubic review and comm
on the Finding of
Significant Imp
(FONSI)/Finding of
Practical Alternat
(FONPA) and support
Environment
Accessment (EA) draft
a proposed construct
project at MacDill Air Fo
Base. The project, entit
Construct Air Tra
Control Tower and Cr
Rescue Facility, wo
construct a new 8,
square foot, 10-story
traffic control tower
replace the substanda
early 1970's vintage con
tower. The project wo
also construct a new 39,
square foot fire cr
rescue facility. The n
crash rescue facility wo
be more centrally loca
on the airfield permitt
faster emerger
response times
bringing the Air Force i
compliance with Natio
Fire Protection Associat
standard 1500. The fi
phase of the project wo
demolish the existing
traffic control tower o
the new tower is comple

Notice of Availability

The document is part of
Air Force environmer
impact analysis proces
satisfy requirements un
the Natior
Environmental Policy
(NEPA). The FONSI/FON
and supporting EA draf
available for public rev
and comment beginn
November 20, 2002 at
Tampa/Hillsborou
County Public Libra
located at 900 N. Ash
Drive, Tampa, FL 33606.
documents may be fo
in the Humanities Sec
of the Main Library.
Comment period will c
on December 27, 2
Address written comm
to the 6 AMW Pu
Affairs, 8209 Hangar L
Drive, Suite 14, Ma
AFB, FL 33621-5502.
telephone number is (
828-2215
4566 11/2

ATCT/CRF EA

THE TAMPA TRIBUNE
Published Daily
Tampa, Hillsborough County, Florida

State of Florida }
County of Hillsborough } ss.

Before the undersigned authority personally appeared C. Pugh, who on oath says that she is Advertising Billing Supervisor of The Tampa Tribune, a daily newspaper published at Tampa in Hillsborough County, Florida; that the attached copy of advertisement being a

LEGAL NOTICE

in the matter of PUBLIC NOTICE

was published in said newspaper in the issues of JULY 3, 2003

Affiant further says that the said The Tampa Tribune is a newspaper published at Tampa in said Hillsborough County, Florida, and that the said newspaper has heretofore been continuously published in said Hillsborough County, Florida, each day and has been entered as second class mail matter at the post office in Tampa, in said Hillsborough County, Florida for a period of one year next preceding the first publication of the attached copy of advertisement; and affiant further says that she has neither paid nor promised any person, this advertisement for publication in the said newspaper.

C Pugh

Sworn to and subscribed by me, this 03 day of JULY, A.D. 2003

Personally Known ✓ or Produced Identification _____
Type of Identification Produced _____

Susie Lee Slaton

NOTARY PUBLIC STATE OF FLORIDA
OFFICIAL NOTARY SEAL
SUSIE LEE SLATON
COMMISSION NUMBER
DD000060
MY COMMISSION EXP.
APRIL 16, 2005

Legal Advertisement

Public Notice
United State
Air Force

MacDill Air Force Base is in
ing public review and comme
on the Draft Finding of
Significant Impa
(FONSI)/Finding of
Practical Alternative (FONP
and supporting Environment
Assessment (EA). The proje
entitled Construct Air Traff
Control Tower and Cras
Rescue Facility, would co
struct a new 8,700 square foo
10-story air traffic contro
tower to replace the substa
dard, early 1970's vintage co
trol tower. The project woul
also construct a new 39,00
square foot fire crash rescu
facility. The final phase of th
project would demolish th
existing air traffic contro
tower once the new tower is
complete.

Notice of Availability
The document is part of the Air
Force environmental impact
analysis process to satisfy
requirements under the
National Environmental Policy
Act (NEPA). The
FONSI/FONPA and supporting
EA draft is available for public
review and comment beginning
July 7th, 2003 at the
Tampa/Hillsborough County
Public Library, located at 900
N. Ashley Drive, Tampa, FL
33606. The documents may be
found in the Humanities
Section of the Main Library.
The comment period will close
on August 8, 2003. Address
written comments to the 6
AMW Public Affairs, 8209
Hangar Loop Drive, Suite 14,
MacDill AFB, FL 33621-5502.
The telephone number is
(813F) 828-2215.

2245

July 3, 2003

SPOT

Continued From Page 1

negligence victims.

"They've contributed, yes," said Jaqueline Imbertson, whose husband was left disabled by a botched medical procedure and now heads the patient advocacy group. She stood by her earlier characterization that it is a grass-roots organization even though trial lawyers founded it several years ago and have pumped

count this year.

A spokeswoman for the trial lawyers, Jacqui Sisto, also said Wednesday that the group is paying for the ad. "We'll run them as long as we need to continue to educate the public on the issue," Sisto said.

The advocacy group, which has more than 400 members, is intended to help put human faces on the problem of medical negligence.

"The existence of Floridians for Patient Protection ... brings the element of reality" to the debate and attempts to remove the notion that it's a bat-

have trial lawyers hiding behind these phony front groups, and they're masquerading as advocacy groups."

BOB ASZTALOS
Director of the Coalition to Heal Healthcare in Florida

tle between doctors and lawyers, Sisto said.

Imbertson repeatedly called the group a grass-roots organization of victims and their families willing to do whatever

of health care in Florida, "however we need to go about doing that."

Supporters of legal caps were quick to attack the group for failing to make its connection to trial lawyers clear from the beginning.

"The problem is we have trial lawyers hiding behind these phony front groups, and they're masquerading as advocacy groups," said Bob Asztalos, director of the Coalition to Heal Healthcare in Florida. That group is an alliance of more than 130 of the state's medical and business groups,

Legal Advertisement

Public Notice United States Air Force

MacDill Air Force Base is inviting public review and comment on the Draft Finding of No Significant Impact (FONSI)/Finding of No Practical Alternative (FONPA) and supporting Environmental Assessment (EA). The project entitled Construct Air Traffic Control Tower and Crash Rescue Facility, would construct a new 8,700 square foot, 10-story air traffic control tower to replace the substandard, early 1970's vintage control tower. The project would also construct a new 39,000 square foot fire crash rescue facility. The final phase of the project would demolish the existing air traffic control tower once the new tower is complete.

Notice of Availability
The document is part of the Air Force environmental impact analysis process to satisfy requirements under the National Environmental Policy Act (NEPA). The FONSI/FONPA and supporting EA draft is available for public review and comment beginning July 7th, 2003 at the Tampa/Hillsborough County Public Library, located at 900 N. Ashley Drive, Tampa, FL 33606. The documents may be found in the Humanities Section of the Main Library. The comment period will close on August 8, 2003. Address written comments to the 6 AMW Public Affairs, 8209 Hangar Loop Drive, Suite 14, MacDill AFB, FL 33621-5502. The telephone number is (813F) 828-2215.

2245 July 3, 2003

Time Payme

Water/Wastew Capacity Assessm Allows Payments

Your Hillsborough County Board of C program which allows developers, bu property owners to pay a portion of w ity fees for new development over tin

The method of payment is called a C allows a certain amount of water an charged for new development to be assessment on property tax bills. Th pending on the type of project, servic payment. There are administrative a est charges associated with each ass

County Commissioners are expected ity Assessment Units in September. A from the Water Department. Applica 2003, will be included in the units to 2003.

For more information or fo please call or w Water Depart 272-5977 4802 Gunn Hwy. Tampa, FL 33

HILLSBOROUGH
Board of County Co

Kirkpatrick Jason W Contr 6 CES/CEVN

From: Windler Peter R Maj AFSC/SEFW

Sent: Tuesday, February 11, 2003 9:25 AM

To: Kirkpatrick Jason W Contr 6 CES/CEVN; Summers Will GM-13 AMC/CEV

Cc: Granger Matthew E 1Lt AFSC/SEFW; Hall David C Capt AFSC/SEFW; LeBoeuf Eugene A Civ AFSC/SEFW; Swaby Donnavan W 1Lt AFSC/SEFW

Subject: RE: BASH Safety Center

Jason,
I apologize for taking so long to respond to your questions about the stormwater retention ponds at MacDill. While not as hazardous as other land uses on an airfield, storm water detention/retention ponds can attract hazardous wildlife to the airfield.

You refer to the ponds as retention ponds. Are they in fact retention or detention ponds? Detention ponds would be preferable to retention ponds on the airfield as they are designed to only hold water for short periods of time. A retention pond would be more attractive to wildlife on the airfield since it would provide water for a longer period of time.

The FAA addresses stormwater detention/retention ponds in its Advisory Circular #150/5200-33, section 3.7. It says the following:

"To facilitate hazardous wildlife control, FAA recommends using steep-sided, narrow, linearly-shaped, rip-rap lined, water detention basins rather than retention basins. When possible, these ponds should be placed away from aircraft movement areas to minimize aircraft-wildlife interactions. All vegetation in or around detention or retention basins that provide food or cover for hazardous wildlife should be eliminated.

If soil conditions and other requirements allow, FAA encourages the use of underground storm water infiltration systems, such as French drains or buried rock fields, because they are less attractive to wildlife."

I recommend the following:
1. Use an underground storm water infiltration system, if practical.
2. Build storm water detention ponds rather than retention ponds.
3. Do not allow grass and other vegetation to grow in the basins but line the basins with rip-rap. This will decrease the amount of water surface area available to wildlife.
4. Design the basins to be steep-sided, narrow and linearly-shaped.

Maj. Peter R. Windler
Senior Ecologist, USAF BASH Team
DSN 246-5674
Comm (505) 846-5674
Fax: x-0684

-----Original Message-----
From: Kirkpatrick Jason W Contr 6 CES/CEVN [mailto:Jason.Kirkpatrick@macdill.af.mil]
Sent: Wednesday, February 05, 2003 5:03 AM
To: Summers Will GM-13 AMC/CEV
Cc: Windler Peter R Maj AFSC/SEFW; LeBoeuf Eugene A Civ AFSC/SEFW
Subject: RE: BASH Safety Center

Will, thanks for the contact information.

Eugene or Maj. Windler;

I am looking for some advice from the experts on the potential for BASH problems. AMC has raised a question during the review of our environmental assessments about the potential for BASH issues due to the installation of stormwater retention areas near the airfield. See below information.

I am preparing the Environmental Assessment for the construction of the Control Tower and the Crash Rescue Facility. The new control tower will be installed next to the existing tower and the Crash Rescue Facility would be constructed near the intersection of Taxiway L and K. Both facilities will have a stormwater retention pond - a dry grass basin that collects water during rain events. Typically dry, but during heavy rain and extended rain the basin would contain standing water.

AMC feels that the ponds might be a BASH issue and should be considered a negative environmental impact with regard to Airfield Operations and BASH. What is your expert opinion on this. Your response will be incorporated in the EA. AMC's comments is included below.

AMC Comment 1) One caution is that construction of a storm water retention pond in the area around the flight line runs contrary to Bash Program policy. Undesirable habitat and land use conditions are outlined in both AFI 91-202, United States AF Mishap Prevention Program, dated 1 Aug 1998 and AFI 91-212, Bird Aircraft Strike Hazard (BASH) Management Techniques. Paragraph 2.3.5, "Controlling Drainage" in AFI 91-212, specifically describes issues pertaining to proposed drainage retention area and pond described in the Draft EA.

Would you all like to weigh in with an opinion on this. The stormwater retention areas are required by state law, but they could be covered (netting). I want to make sure the base is not creating in advertent problems. We already have a lot of water (drainage canal) on the airfield areas, so the added ponds don't seem like a big deal to me, but I just want to get another opinion. The figure is not the best, but it gives you a general idea where the sites are located.

Thanks.

Jason K

<<CT CRF Figure.pdf>>

-----Original Message-----

From: Summers Will GM-13 AMC/CEV

Sent: Tuesday, February 04, 2003 3:06 PM

To: Kirkpatrick Jason W Contr 6 CES/CEVN

Cc: Windler Peter R Maj AFSC/SEFW; LeBoeuf Eugene A Civ AFSC/SEFW

Subject: BASH Safety Center

Jason,
Please see the attached CC: for the final say on Bird Aircraft Safety Hazard, for the AF. They are located at the Safety Center, Kirtland AFB.

I am concerned with the need to control storm water runoff at the construction sites of the

future tower, and fire station. They can provide you with the best evaluation regarding our construction project to install necessary storm water retention basins adjacent to the flight line at MacDill AFB. Mr. Leboeuf was recently TDY at your base this past year and can adequately address BASH concerns and make recommendations, in addition to those provided by your wing safety office.

Please call on me if you need any further assistance.

r.,

Will S.

William J. Summers
Natural Resources Manager
HQ Air Mobility Command
(618)229-0842, or DSN 779-0842
FAX: X-0257

Kirkpatrick Jason W Contr 6 CES/CEVN

From: NMFS HCDPC [NMFS.HCDPC@noaa.gov]
Sent: Tuesday, December 17, 2002 11:32 AM
To: Kirkpatrick Jason W Contr 6 CES/CEVN; Sharon.Rolfes@noaa.gov
Subject: Air Traffic Control Tower

SUBJECT: Draft Environmental Assessment for Construction of Air Traffic Control Tower & Crash Rescue Facility
Notice Date: November 13, 2002

The National Marine Fisheries Service has reviewed the information provided regarding the subject project. Based on our initial assessment, we anticipate that any adverse effects that might occur on marine and anadromous fishery resources would be minimal and, therefore, do not have any comments to provide at this time.

Department of Environmental Protection

Jeb Bush
Governor

Marjory Stoneman Douglas Building
3900 Commonwealth Boulevard
Tallahassee, Florida 32399-3000

David B. Struhs
Secretary

January 17, 2003

Mr. Jason Kirkpatrick
6 CES/CEVN
7621 Hillsborough Loop Drive
MacDill AFB, Florida 33621-5207

RE: Department of the Air Force – Draft Environmental Assessment for Construction of Air Traffic Control Tower and Crash Rescue Facility – MacDill Air Force Base, Hillsborough County, Florida
SAI: FL200211223100C

Dear Mr. Kirkpatrick:

The Florida State Clearinghouse, pursuant to Executive Order 12372, Gubernatorial Executive Order 95-359, the Coastal Zone Management Act, 16 U.S.C. §§ 1451-1464, as amended, and the National Environmental Policy Act, 42 U.S.C. §§ 4321, 4331-4335, 4341-4347, as amended, has coordinated a review of the referenced Draft Environmental Assessment.

The Southwest Florida Water Management District (SWFWMD) indicates that an Environmental Resource Permit may be required for the proposed activity. Coordination with SWFWMD regulatory staff in Tampa is recommended to address permitting issues. Please refer to the enclosed comments

Based on the information contained in the document and the enclosed comments provided by our reviewing agencies, the state has determined that the above-referenced action is consistent with the Florida Coastal Management Program.

Thank you for the opportunity to review this project. If you have any questions regarding this letter, please contact Ms. Lauren P. Milligan at (850) 245-2163.

Sincerely,

Sally B. Mann

Sally B. Mann, Director
Office of Intergovernmental Programs

SBM/lm
Enclosures
cc: Trisha Neasman, SWFWMD

Southwest Florida
Water Management District

2379 Broad Street, Brooksville, Florida 34604-6899
(352) 796-7211 or 1-800-423-1476 (FL only)
SUNCOM 628-4150 TDD only 1-800-231-6103 (FL only)
On the Internet at: WaterMatters.org

An Equal Opportunity Employer

Tampa Service Office
7601 Highway 301 North
Tampa, Florida 33637-6759
(813) 985-7481 or
1-800-836-0797 (FL only)
SUNCOM 578-2070

Bartow Service Office
170 Century Boulevard
Bartow, Florida 33830-7700
(863) 534-1448 or
1-800-492-7862 (FL only)
SUNCOM 572-6200

Sarasota Service Office
6750 Fruitville Road
Sarasota, Florida 34240-9711
(941) 377-3722 or
1-800-320-3503 (FL only)
SUNCOM 531-6900

Lecanto Service Office
3600 West Sovereign Path
Suite 226
Lecanto, Florida 34461-8070
(352) 527-8131
SUNCOM 667-3271

December 17, 2002

Ms. Cindy Cranick
Clearinghouse Coordinator
Florida Department of Environmental Protection
3900 Commonwealth Boulevard, Mail Station 47
Tallahassee, Florida 32399-3000

Subject: **Department of the Air Force-Draft Environmental Assessment for Construction of Air Traffic Control Tower and Crash Rescue Facility-MacDill Air Force Base-Hillsborough County, Florida; SAI#: FL200211223100C**

Dear Ms. Cranick:

The District evaluated the referenced project, and found it consistent with ongoing programs and activities. We believe, however, that a District Environmental Resource Permit (ERP) may be required for the activity. Consequently, we recommend that the applicant coordinate, as early as possible, with our Tampa Regulation staff to address permitting issues. Alberto Martinez, Environmental Manager with Tampa Regulation, can be contacted at (813)985-7481 for assistance with this matter.

The District appreciates the opportunity to participate in the review of this application. If you should have any questions or if I can be of further assistance, please contact me in the District's Planning Department.

Sincerely,

Trisha Neasman

Trisha Neasman, AICP
Government Planning Coordinator

TN
cc: Alberto Martinez, SWFWMD Rand Baldwin, SWFWMD

COUNTY: HILLSBOROUGH

DATE: 11/19/02
COMMENTS DUE DATE: 12/22/02
CLEARANCE DUE DATE: 1/18/03
SAI#: FL200211223100C

Message:

STATE AGENCIES	WATER MNGMNT. DISTRICTS	OPB POLICY UNITS
X COMMUNITY AFFAIRS FISH and WILDLIFE COMMISSION STATE TRANSPORTATION ENVIRONMENTAL PROTECTION	SOUTHWEST FLORIDA WMD RECEIVED DEC 05 2002 OIP/OLGA	ENVIRONMENTAL POLICY UNIT RECEIVED DEC 2 2002 DEPT. OF COMM. AFFAIRS/DCP

The attached document requires a Coastal Zone Management Act/Florida Coastal Management Program consistency evalutation and is categorized as one of the following:

— Federal Assistance to State or Local Government (15 CFR 930, Subpart F). Agencies are required to evaluate the consistency of the activity.

X Direct Federal Activity (15 CFR 930, Subpart C). Federal Agencies are required to furnish a consistency determination for the State's concurrence or objection.

— Outer Continental Shelf Exploration, Development or Production Activities (15 CFR 930, Subpart E). Operators are required to provide a consistency certification for state concurrence/objection.

— Federal Licensing or Permitting Activity (15 CFR 930, Subpart D). Such projects will only be evaluated for consistency when there is not an analogous state license or permit.

Project Description:

Department of the Air Force - Draft Environmental Assessment for Construction of Air Traffic Control Tower and Crash Rescue Facility - MacDill Air Force Base - Hillsborough County, Florida.

To: **Florida State Clearinghouse**
AGENCY CONTACT AND COORDINATOR (SCH)
2555 SHUMARD OAK BLVD
TALLAHASSEE, FLORIDA 32399-2100
(850) 414-6580 (SC 994-6580)
(850) 414-0479

EO. 12372/NEPA
- [x] No Comment
- [ ] Comment Attached
- [ ] Not Applicable

Federal Consistency
- [ ] No Comment/Consistent
- [ ] Consistent/Comments Attached
- [ ] Inconsistent/Comments Attached
- [ ] Not Applicable

From:
Division/Bureau: DCA/DCP
Reviewer: [signature]
Date: 12/03/02

STATE CLEARINGHOUSE

User: Lauren Milligan, , ENVIRONMENTAL PROTECTION

Project Information

Project:	FL200211223100C
Description:	Department of the Air Force - Draft Environmental Assessment for Construction of Air Traffic Control Tower and Crash Rescue Facility - MacDill Air Force Base - Hillsborough County, Florida.
Keywords:	USAF - DEA - Control Tower - MacDill AFB - Hillsbo
Program:	

Review Comments

Reviewer:	FISH and WILDLIFE COMMISSION
Date:	12/10/2002
Description:	NC by Brian Barnett
Comment Type:	○ Draft ◉ Final

COUNTY: HILLSBOROUGH

Hillsborough
SAI - USAF-MD
2002-11254

Message:

DATE: 11/19/02
COMMENTS DUE DATE: 12/22/02
CLEARANCE DUE DATE: 1/18/03
SAI#: FL200211223100C

STATE AGENCIES	WATER MNGMNT. DISTRICTS	OPB POLICY UNITS
COMMUNITY AFFAIRS FISH and WILDLIFE COMMISSION X STATE TRANSPORTATION ENVIRONMENTAL PROTECTION	SOUTHWEST FLORIDA WMD	ENVIRONMENTAL POLICY UNIT X:02-10826 02-1800 NHPA

he attached document requires a Coastal Zone Management Act/Florida oastal Management Program consistency evalutation and is categorized s one of the following:

— Federal Assistance to State or Local Government (15 CFR 930, Subpart F). Agencies are required to evaluate the consistency of the activity.

X Direct Federal Activity (15 CFR 930, Subpart C). Federal Agencies are required to furnish a consistency determination for the State's concurrence or objection.

— Outer Continental Shelf Exploration, Development or Production Activities (15 CFR 930, Subpart E). Operators are required to provide a consistency certification for state concurrence/objection.

— Federal Licensing or Permitting Activity (15 CFR 930, Subpart D). Such projects will only be evaluated for consistency when there is not an analogous state license or permit.

Project Description:

Department of the Air Force - Draft Environmental Assessment for Construction of Air Traffic Control Tower and Crash Rescue Facility - MacDill Air Force Base - Hillsborough County, Florida.

RECEIVED
DEC 30 2002
OIP/OLGA

To: **Florida State Clearinghouse**
AGENCY CONTACT AND COORDINATOR (SCH)
2555 SHUMARD OAK BLVD
TALLAHASSEE, FLORIDA 32399-2100
(850) 414-6580 (SC 994-6580)
(850) 414-0479

EO. 12372/NEPA
- ☑ No Comment
- ☐ Comment Attached
- ☐ Not Applicable

Federal Consistency
- ☑ No Comment/Consistent
- ☐ Consistent/Comments Attached
- ☐ Inconsistent/Comments Attached
- ☐ Not Applicable

From: Division of Historical Resources
Bureau of Historic Preservation
Division/Bureau:
Reviewer: S. Edwards
Date: 12-18-02

Barbara E. Mattick, Deputy SHPO
12/23/02

OUNTY: HILLSBOROUGH

lessage:

DATE: 11/19/02
COMMENTS DUE DATE: 12/22/02
CLEARANCE DUE DATE: 1/18/03
SAI#: FL200211223100C

STATE AGENCIES	WATER MNGMNT. DISTRICTS	OPB POLICY UNITS
COMMUNITY AFFAIRS FISH and WILDLIFE COMMISSION STATE X TRANSPORTATION ENVIRONMENTAL PROTECTION	SOUTHWEST FLORIDA WMD	ENVIRONMENTAL POLICY UNIT

ıe attached document requires a Coastal Zone Management Act/Florida
oastal Management Program consistency evalutation and is categorized
one of the following:

— Federal Assistance to State or Local Government (15 CFR 930, Subpart F). Agencies are required to evaluate the consistency of the activity.

X Direct Federal Activity (15 CFR 930, Subpart C). Federal Agencies are required to furnish a consistency determination for the State's concurrence or objection.

— Outer Continental Shelf Exploration, Development or Production Activities (15 CFR 930, Subpart E). Operators are required to provide a consistency certification for state concurrence/objection.

— Federal Licensing or Permitting Activity (15 CFR 930, Subpart D). Such projects will only be evaluated for consistency when there is not an analogous state license or permit.

Project Description:

Department of the Air Force - Draft Environmental Assessment for Construction of Air Traffic Control Tower and Crash Rescue Facility - MacDill Air Force Base - Hillsborough County, Florida.

To: Florida State Clearinghouse
AGENCY CONTACT AND COORDINATOR (SCH)
2555 SHUMARD OAK BLVD
TALLAHASSEE, FLORIDA 32399-2100
(850) 414-6580 (SC 994-6580)
(850) 414-0479

EO. 12372/NEPA

- [X] No Comment
- [ ] Comment Attached
- [ ] Not Applicable

Federal Consistency

- [X] No Comment/Consistent
- [ ] Consistent/Comments Attached
- [ ] Inconsistent/Comments Attached
- [ ] Not Applicable

F :

Division/Bureau: Planning

Reviewer: Carin Watkins

Date: 12-24-02

(6)

COUNTY: HILLSBOROUGH

DATE: 11/19/02
COMMENTS DUE DATE: 12/22/02
CLEARANCE DUE DATE: 1/18/03
SAI#: FL200211223100C

Message:

STATE AGENCIES	WATER MNGMNT. DISTRICTS	OPB POLICY UNITS
COMMUNITY AFFAIRS FISH and WILDLIFE COMMISSION STATE X TRANSPORTATION ENVIRONMENTAL PROTECTION	SOUTHWEST FLORIDA WMD	ENVIRONMENTAL POLICY UNIT

The attached document requires a Coastal Zone Management Act/Florida Coastal Management Program consistency evalutation and is categorized as one of the following:

— Federal Assistance to State or Local Government (15 CFR 930, Subpart F). Agencies are required to evaluate the consistency of the activity.

X Direct Federal Activity (15 CFR 930, Subpart C). Federal Agencies are required to furnish a consistency determination for the State's concurrence or objection.

— Outer Continental Shelf Exploration, Development or Production Activities (15 CFR 930, Subpart E). Operators are required to provide a consistency certification for state concurrence/objection.

— Federal Licensing or Permitting Activity (15 CFR 930, Subpart D). Such projects will only be evaluated for consistency when there is not an analogous state license or permit.

Project Description:

Department of the Air Force - Draft Environmental Assessment for Construction of Air Traffic Control Tower and Crash Rescue Facility - MacDill Air Force Base - Hillsborough County, Florida.

RECEIVED
DEC 20 2002
OIP/OLGA

To: Florida State Clearinghouse
AGENCY CONTACT AND COORDINATOR (SCH)
2555 SHUMARD OAK BLVD
TALLAHASSEE, FLORIDA 32399-2100
(850) 414-6580 (SC 994-6580)
(850) 414-0479

EO. 12372/NEPA

- [x] No Comment
- [ ] Comment Attached
- [ ] Not Applicable

Federal Consistency

- [x] No Comment/Consistent
- [ ] Consistent/Comments Attached
- [ ] Inconsistent/Comments Attached
- [ ] Not Applicable

From:
Division/Bureau: FDOT D-7 Modal Planning + Dev.
Reviewer: Ruth Rhinesmith
Date: 12-17-02

COUNTY: HILLSBOROUGH

DATE: 11/19/02
COMMENTS DUE DATE: 12/22/02
CLEARANCE DUE DATE: 1/18/03
SAI#: FL200211223100C

Message:

STATE AGENCIES	WATER MNGMNT. DISTRICTS	OPB POLICY UNITS
COMMUNITY AFFAIRS FISH and WILDLIFE COMMISSION STATE TRANSPORTATION X ENVIRONMENTAL PROTECTION	SOUTHWEST FLORIDA WMD	ENVIRONMENTAL POLICY UNIT

he attached document requires a Coastal Zone Management Act/Florida oastal Management Program consistency evalutation and is categorized s one of the following:

— Federal Assistance to State or Local Government (15 CFR 930, Subpart F). Agencies are required to evaluate the consistency of the activity.

X Direct Federal Activity (15 CFR 930, Subpart C). Federal Agencies are required to furnish a consistency determination for the State's concurrence or objection.

— Outer Continental Shelf Exploration, Development or Production Activities (15 CFR 930, Subpart E). Operators are required to provide a consistency certification for state concurrence/objection.

— Federal Licensing or Permitting Activity (15 CFR 930, Subpart D). Such projects will only be evaluated for consistency when there is not an analogous state license or permit.

Project Description:

Department of the Air Force - Draft Environmental Assessment for Construction of Air Traffic Control Tower and Crash Rescue Facility - MacDill Air Force Base - Hillsborough County, Florida.

To: **Florida State Clearinghouse**
AGENCY CONTACT AND COORDINATOR (SCH)
2555 SHUMARD OAK BLVD
TALLAHASSEE, FLORIDA 32399-2100
(850) 414-6580 (SC 994-6580)
(850) 414-0479

EO. 12372/NEPA
☑ No Comment
☐ Comment Attached
☐ Not Applicable

Federal Consistency
☑ No Comment/Consistent
☐ Consistent/Comments Attached
☐ Inconsistent/Comments Attached
☐ Not Applicable

Fr :
Division/Bureau: FDEP / OIP
Reviewer: Lauren P. Milligan
Date: 01/13/03

FLORIDA STATE CLEARINGHOUSE
LOCAL GOVERNMENT COORDINATION
ROUTING SHEET

SAI#: FL200211223100C DATE: 11/19/02

COMMENTS DUE TO RPC: 12/13/02

AREA OF PROPOSED ACTIVITY: COUNTY: HILLSBOROUGH CITY:

[ ] FEDERAL ASSISTANCE [X] DIRECT FEDERAL ACTIVITY [ ] FEDERAL LICENSE OR PERMIT [ ] OCS

PROJECT DESCRIPTION

Department of the Air Force - Draft Environmental Assessment for Construction of Air Traffic Control Tower and Crash Rescue Facility - MacDill Air Force Base - Hillsborough County, Florida.

ROUTING:

RPC	Local Governments
___TAMPA BAY RPC	X HILLSBOROUGH

RECEIVED
DEC - 6 2002
Tampa Bay Regional Planning Council

IF YOU HAVE NO COMMENTS, PLEASE CHECK HERE AND RETURN FORM TO RPC : ✓

ALL CONCERNS OR COMMENTS REGARDING THE ATACHED PROJECT SHOULD BE SENT IN WRITING BY THE DUE DATE TO THE REGIONAL PLANNING COUNCILSHOWN BELOW. PLEASE REFER TO THE SAI # IN ALL CORRESPONDENCE:

Ms. ANGELA HURLEY
9455 KOGER BOULEVARD
SUITE 219
ST. PETERSBURG, FLORIDA 337022491

IMPORTANT: PLEASE DO NOT SEND COMMENTS DIRECTLY TO THE CLEARINGHOUSE!

IF YOU HAVE QUESTIONS REGARDING THE ATTACHED PROJECT OR THE INTERGOVERNMENTAL COORDINATION PROCESS, PLEASE CONTACT THE STATE CLEARINGHOUSE. IF YOU HAVE QUESTIONS REGARDING THE FEDERAL CONSISTENCY REVIEW PROCESS, PLEASE CONTACT THE FLORIDA COASTAL MANAGEMENT PROGRAM. THE TELEPHONE NUMBER FOR BOTH PROGRAMS IS (850) 414-6580 OR SUNCOM 994-6580.

local

FLORIDA STATE CLEARINGHOUSE
RPC INTERGOVERNMENTAL COORDINATION
AND RESPONSE SHEET

FSC082-02

SAI #: FL200211223100C DATE: 11/19/02

COMMENTS DUE TO CLEARINGHOUSE: 12/22/02

AREA OF PROPOSED ACTIVITY: COUNTY: HILLSBOROUGH CITY:

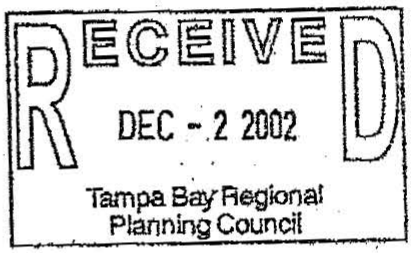
☐ FEDERAL ASSISTANCE ☒ DIRECT FEDERAL ACTIVITY ☐ FEDERAL LICENSE OR PERMIT ☐ OCS

PROJECT DESCRIPTION

Department of the Air Force - Draft Environmental Assessment for Construction of Air Traffic Control Tower and Crash Rescue Facility - MacDill Air Force Base - Hillsborough County, Florida.

ROUTING: RPC

X TAMPA BAY RPC



PLEASE CHECK ALL THE LOCAL GOVERNMENTS BELOW FROM WHICH COMMENTS HAVE BEEN RECEIVED; ALL COMMENTS RECEIVED SHOULD BE INCLUDED IN THE RPC'S CLEARINGHOUSE RESPONSE PACKAGE. IF NO COMMENTS WERE RECEIVED, PLEASE CHECK "NO COMMENT" BOX AND RETURN TO CLEARINGHOUSE.

COMMENTS DUE TO RPC: 12/13/02

___HILLSBOROUGH

NO COMMENTS: ___

IF THE RPC DOES NOT RECEIVE COMMENTS BY THE DEADLINE DATE, THE RPC SHOULD CONTACT THE LOCAL GOVERNMENT TO DETERMINE THE STATUS OF THE PROJECT REVIEW PRIOR TO FORWARDING THE RESPONSE PACKAGE TO THE CLEARINGHOUSE.)

NOTES:

ALL CONCERNS OR COMMENTS REGARDING THE ATTACHED PROJECT (INCLUDING ANY RPC COMMENTS) SHOULD BE SENT IN WRITING BY THE DUE DATE TO THE CLEARINGHOUSE. PLEASE ATTACH THIS RESPONSE FORM AND REFER TO THE SAI # IN ALL CORRESPONDENCE.

IF YOU HAVE ANY QUESTIONS REGARDING THE ATTACHED PROJECT, PLEASE CONTACT THE STATE CLEARINGHOUSE AT (850) 414-6580 OR SUNCOM 994-6580.

APPENDIX E

ASBESTOS SURVEY RESULTS

THIS PAGE INTENTIONALLY LEFT BLANK

CIVIL ENGINEERING JOB ORDER

Job Order: C 0293 Special Ind: Date: 900604 Time: 0945 Job Status: A
Inst Code: NVZR Fac: 554 Sfx: CWON: 554 Zone: Office: CTL Opr: MCJ
Fac Mgr: MANCHESTER ROLLEY Phone: 8304440 Orgn: EMS/CC GOQ:

Requestr: SGT GIBB Phone: 5217 Orgn: CES CD: 009
Location: 1108
Service: ASBESTOS SERVEY

EPS Desc: ASBESTOS SHINGLES - INSTALL 100 SF
EPS Noun: ASBESTOS SHINGLES EPS TTS: 1173 Estimated Hours: 2.4
Emerg: Urgent: Routine: X SMART: MC: PB Routine: PB MC:
Cur Shop : 471 Date to: 900604 Orig Commit Date: 900629 Commit Date: 900629
Remarks:

Asgd To : DIN Date: Time: Hours: Name:
Refer To: 471 900604 949
Refer To:
Refer To:

Total Hours:
Current Date Due out Completed: Reopened:

Close Out Complete 27 June 90

****

C I V I L E N G I N E E R I N G E V A L U A T I O N

In Order to assess the quality of Service provided to our customers we request that you complete the questionnaire below pertaining to Job Order number **C0293** and then return it to 56 CSG/DEMQ via Base Distribution

TO* CES
56 CSG/CC
56 CSG/DE
56 CSG/DEMQ
IN TURN

Requestor: SGT GIBB 5217 CES Building: 554
Job Order: C 0293 Completed: By the CES shop code: 471 0
Service: ASBESTOS SERVEY

Q U E S T I O N N A I R E

Base Civil Engineer personnel were courteous.	Yes__ No__
Base Civil Engineer response was timely.	Yes__ No__
Received adequate notification as to when the worker would arrive.	Yes__ No__
Worker utilized time efficiently.	Yes__ No__
Job was completed.	Yes__ No__
If not, were you given an estimated completion date?	Yes__ No__
Work was performed satisfactorily.	Yes__ No__
Job site was cleaned up after completion.	Yes__ No__

Remarks:_____

_____

Customer Signature: _____ Date:

THIS PAGE INTENTIONALLY LEFT BLANK