

TEXAS COASTAL MANAGEMENT PROGRAM

DRAFT

INVENTORY OF COASTAL MANAGEMENT AUTHORITIES

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COASTAL MANAGEMENT DIVISION
RESOURCE AND ASSET MANAGEMENT DIVISION
TEXAS GENERAL LAND OFFICE

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INTRODUCTION

The development of the Texas Coastal Management Program (CMP) involves identifying land and water uses that have direct and significant impact on coastal resources, and determining how those uses will be managed. In addition, the CMP must demonstrate that Texas has the necessary legal authorities to implement the program, as required in the Coastal Zone Management Act.

The purpose of this reference document is to provide an inventory of existing federal, state, and local authorities regulating or managing activities impacting the coast. The inventory will be used to evaluate the effectiveness of current authorities in managing uses identified during program development. Where current authorities are determined to be insufficient to implement particular policies of the CMP, they will be strengthened or additional authorities will be sought.

The first section of the report is a regulatory authorities manual that describes how some of the more significant activities are regulated. The tables serve as a quick reference tool for federal, state and local activities pertaining to coastal management. Corresponding to each listed activity is a description of the method of regulation, the agency responsible for regulation the activity, and cites of the statutory authority and regulations.

List of Acronyms

BLM - Bureau of Land Management
COE - U.S. Army Corps of Engineers
DOA - Department of the Army
DOC - Department of Commerce
DOD - Department of Defense
DOE - Department of Energy
DOI - Department of the Interior
DOT - Department of Transportation
EPA - Environmental Protection Agency
FAA - Federal Aviation Administration
FERC - Federal Energy Regulatory Commission
FHA - Federal Highway Administration
F&WS - U.S. Fish & Wildlife Service
GLO - Texas General Land Office
GSA - General Services Administration
LCRA - Lower Colorado River Authority
LLRWDA - Low-Level Radioactive Waste Disposal Authority
MMS - Minerals Management Service
NOAA - National Oceanic & Atmospheric Administration
NPS - National Parks Service
NRC - Nuclear Regulatory Commission
SLB - School Land Board
RRC - Texas Railroad Commission
TAC - Texas Antiquities Commission or Texas Administrative Code
TACB - Texas Air Control Board
TBH - Texas Board of Health
TBLUL - Texas Board for Lease of University Lands
TDC - Texas Department of Corrections
TDH - Texas Department of Health
TDLR - Texas Department of Licensing & Regulation
TDOT - Texas Department of Transportation
TPWD - Texas Parks & Wildlife Department
TSPCB - Texas Structural Pest Control Board
TWC - Texas Water Commission
USCG - United States Coast Guard
WWDB - Water Well Drillers Board

REGULATORY AUTHORITIES MANUAL

Topics Summary

Dune Protection

Beach Access

Erosion Control

Floodplain Construction

Coastal Public Land

Discharges into Water

Dredging

Oil & Gas Exploration/Development

Wetlands/Special Aquatic Sites

REGULATORY AUTHORITIES MANUAL

Dune Protection

Natural Resources Code, Chapter 63

31 TAC 15 et seq.
(proposed)

Requires coastal counties and municipalities to adopt dune protection plans; establishes standards for construction seaward of established dune protection line; requires that dune destruction be avoided unless there is no practical alternative.

Beach Access

Natural Resources Code, Chapter 61

31 TAC 15 et seq.
(proposed)

Requires coastal counties and municipalities to adopt beach access plans in order to protect the public's rights to use and access the public beach; requires local governments to certify that construction adjacent to the public beach will not encroach upon the public beach or interfere with or otherwise restrict the public's use of and access to the public beach.

Erosion Control

Natural Resources Code, §33.601 et seq.

Rules pending

Requires GLO to establish rules, recommendations, standards, and guidelines for erosion avoidance and remediation and for prioritizing critical coastal erosion areas; to engage in erosion demonstration projects and studies; to promote public awareness regarding erosion and the importance of barrier islands, dunes, and bays as natural defenses against storms and hurricanes; to quantify the erosion rates along the Gulf of Mexico, prepare a plan and report with recommendations to the legislature on establishing and implementing a building set-back line that will accommodate a 50-year shoreline retreat.

31 TAC 15.6(c) (proposed) prohibits local governments from permitting or certifying the construction of new erosion response structures or the enlargement of existing structures.

Water Code, §16.320

Authorizes the GLO to develop a program for certification of structures subject to imminent collapse due to erosion under the National Flood Insurance Act, 42 U.S.C. §4001 et seq; requires GLO to adopt rules adequate to meet all erosion-related requirements of the National Flood Insurance Act.

Local Government Code, §421.001 et seq.
Rev.Civ.Stat.Art. 6830 et seq.

Authorizes all counties and municipalities bordering on the Gulf of Mexico to construct seawalls. Article 6839g authorizes any county bordering on the Gulf of Mexico, except Nueces, Kleberg, Kenedy, Jefferson, Orange, and Willacy counties, to construct breakwaters.

Agriculture Code, Chapter 201

Provides for the creation of soil and water conservation board and districts; authorizes districts to enter into cooperative agreements with private landowners to prevent or control soil erosion; authorizes districts to carry out preventive and control measures through agreements with state-land managers; authorizes districts to develop comprehensive plans for the conservation of soil resources and for the control and prevention of soil erosion within the district; under subchapter F, districts may, upon petition of 50 or more voters within the conservation district, propose enforceable land use regulations, but the regulations become effective only upon adoption by 90 percent of eligible voters voting in an election; subchapter H authorizes the board to provide technical assistance to landowners and operators for land improvement measures to reduce erosion.

Water Code, §15.431 et seq.

Establishes the agricultural trust fund and the soil and water conservation trust fund; supports technical assistance programs for development of on-farm soil and water conservation plans as provided in Agriculture Code, §201.201 et seq.

Floodplain Construction

Water Code, §16.311 et seq.

Adopted pursuant to 42 U.S.C. §4001 et seq., the Texas Flood Control and Insurance Act grants counties and qualified political subdivisions the authority to adopt land use regulations in flood prone areas.

Water Code, §16.321

Requires GLO to adopt and enforce rules necessary for protection from flooding on barrier islands, peninsulas, and mainland areas fronting on the Gulf.

31 TAC §15.6(f) (proposed) prohibits local governments from permitting or certifying construction that does not comply with FEMA's regulations governing construction in flood hazard areas.

Local Government Code, §240.901

Provides that counties bordering on the Gulf of Mexico or on the tidewater limits of the Gulf may determine the boundaries of flood-prone areas, and that such determinations are conclusive; authorizes counties to adopt and enforce rules regulating land use and development within flood-prone areas; requires that such rules be consistent with GLO rules promulgated under Water Code §16.320 and §16.321.

Activities on Coastal Public Land

Natural Resources Code, Chapter 33

31 TAC 155

Requires the School Land Board (SLB) to manage the publicly owned submerged lands, the water overlying that land, and all state-owned islands or portions of islands within the coastal area; authorizes the SLB to permit and regulate the placement, design, construction, and use of structures that extend onto coastal public land from adjacent land not owned by the state; authorizes SLB to prescribe reasonable filing fees and fees for granting leases, easements, and permits; authorizes SLB to grant leases for public purposes, easements for the placement of structures for purposes connected with the ownership of littoral property, for the construction of channels, wharves, docks, and marinas, and permits for limited continued use of previously unauthorized structures, and for channel easements to the holder of any surface or mineral interest in coastal public land for purposes necessary or appropriate to the use of the interests.

Discharges into Water

Water Code, Chapter 26

31 TAC 305 et seq.
31 TAC 307 et seq.

Prohibits discharges of waste into state waters without a permit; defines state waters to include wetlands; provides for issuance of permits; establishes state water quality standards and anti-degradation policy.

Water Code, §26.121, §26.131

Exempts the Railroad Commission from the permit requirements of Chapter 26; provides that the RRC is solely responsible for the control and disposition of waste and the abatement and prevention of pollution of surface and subsurface waters resulting from oil and gas exploration, development, and production activities; authorizes the RRC to issue discharge permits that meet TWC water quality standards.

Natural Resources Code, §91.101 et seq.

16 TAC §3.75

Requires the Railroad Commission to adopt rules to prevent the pollution of surface water or subsurface water arising from the drilling of exploratory wells and oil and gas wells; authorizes the RRC to issue permits for such activities. 16 TAC §3.75 is effective upon delegation of NPDES permit authority.

Clean Water Act, §402

40 CFR 122, 125

Establishes the National Pollution Discharge Elimination System (NPDES) permit program; authorizes EPA to issue permits for the discharge of pollutants into navigable waters from a point source, notwithstanding the prohibition of such discharges under §301; directs EPA to establish effluent limitations.

Requires that any applicant for a federal permit or license to conduct any activity that may result in any discharge into waters of the United States shall obtain from the Texas Water Commission (TWC) a certification that the discharge will comply with the water quality standards and other limitations and standards promulgated under 33 U.S.C. §1311 (effluent limitations/performance standards), §1312 (water quality related effluent limitations), §1313 (water quality standards), §1316 (new source performance standards) and §1317 (toxic and pretreatment effluent standards).

Certification is specifically required for all NPDES permit applications and U.S. Army Corps of Engineers' nationwide permits and general permits. However, 31 TAC §279.12(c) certifies by rule those activities which result in a discharge that does not exceed 1,000 cubic yards of dredged or fill material, except when the discharge is into a water quality limited segment or into an area where pollutants have been deposited or have accumulated.

Water Code, §26.177 and §26.178

Requires all cities with populations greater than 5,000 to establish water pollution control and abatement programs; the programs are required to be approved by the TWC and must include reasonable and realistic plans for controlling and abating pollution from generalized discharges of waste (nonpoint sources), such as storm sewer discharges and urban runoff; requires all financial assistance from the Water Development Board to cities to be conditioned on the submission of water control and abatement programs.

Dredging

Clean Water Act, §404

33 CFR 323.1 et seq.
40 CFR 230.1 et seq.

Provides for permits for the discharge of dredged or fill material into waters of the United States; the U.S. Army Corps of Engineers issues the permits under EPA's 404(b)(1) guidelines.

Clean Water Act, §401

31 TAC 279 et seq.

Requires that any applicant for a federal permit or license to conduct any activity that may result in any discharge into waters of the United States shall obtain from the TWC a certification that the discharge will comply with the water quality standards and other limitations and standards promulgated under 33 U.S.C. §1311 (effluent limitations/ performance standards), §1312 (water quality related effluent limitations), §1313 (water quality standards), §1316 (new source performance standards) and §1317 (toxic and pretreatment effluent standards).

Certification is specifically required for all NPDES permit applications and U.S. Army Corps of Engineers' nationwide permits and general permits. However, 31 TAC §279.12(c) certifies by rule those activities which result in a discharge that does not exceed 1,000 cubic yards of dredged or fill material, except when the discharge is into a water quality limited segment or into an area where pollutants have been deposited or have accumulated.

Natural Resources Code, §33.103

31 TAC §155.3

Requires an easement from the School Land Board for dredging on coastal public lands; sets criteria for decisions on applications for easements for docks, piers, wharfs, channels, boat or ship basins, marinas, bulkheads, seawalls, and dredged material disposal.

Parks & Wildlife Code, Chapter 86 31 TAC §57.1 et seq.

Authorizes TPWD to issue permits for the commercial dredging of shell, sand, marl, and gravel located within the tidewater limits of the state, on islands within such limits, and within freshwater areas of the state not embraced by survey of private land; establishes policy with respect to the disposal of dredged spoil.

Oil & Gas Exploration & Development

Natural Resources Code, Chapter 52 31 TAC 9.1 et seq.

Authorizes the SLB to lease the islands, saltwater lakes, bays, inlets, marshes, and reefs owned by the state within tidewater limits, channels and riverbeds, and the Gulf of Mexico within the jurisdiction of the state, for the production of oil and gas; authorizes the GLO to issue permits for geophysical and geochemical exploration on these same lands for purposes of discovering oil and gas. 31 TAC 9.6(i)(1) establishes pollution controls requirements.

Natural Resources Code, Title 3

Governs Railroad Commission powers and duties with respect to the conservation and regulation of oil and gas, pooling and cooperative agreements, and pipelines.

Wetlands/Special Aquatic Sites

Rivers and Harbors Act of 1899, Section 10 (33 U.S.C. §403)

33 CFR 322

33 CFR 330 (gen. permits)

Requires a permit from the U.S. Army Corps of Engineers for structures and/or work in or affecting navigable waters of the United States.

Clean Water Act, Section 404 (33 U.S.C. §1344)

33 CFR 323 (Corps)

40 CFR 230 (EPA)

Requires a permit from the U.S. Army Corps of Engineers for the discharge of dredged or fill material into the waters of the United States; provides that the Corps will deny permits if the proposed discharge would not comply with EPA's §404(b)(1) Guidelines, 40 CFR 230.

Clean Water Act, Section 401 (33 U.S.C. §1341)

31 TAC 279

Requires that an applicant for a federal permit or license to conduct any activity that may result in any discharge into waters of the United States obtain from the TWC a certification that the discharge will comply with the water quality standards and other limitations and standards promulgated under 33 U.S.C. §1311 (effluent limitations/ performance standards), §1312 (water quality related effluent limitations), §1313 (water quality standards), §1316 (new source performance standards) and §1317 (toxic and pretreatment effluent standards).

Flood Control Act, 33 U.S.C. §701b-11(a)

Requires that any federal agency planning any project involving flood protection to consider nonstructural alternatives to prevent or reduce flood damage, including acquisition of flood-plain lands for recreational, fish and wildlife, and other public purposes.

Swampbuster, 16 U.S.C. §3821

Provides that any person who in any crop year produces an agricultural commodity on converted wetlands shall be ineligible for federal agricultural price supports, farm storage facility loans, crop insurance, agricultural disaster assistance, and Farmers Home Administration loans.

Wetlands Reserve Program, 16 U.S.C. §3837

Requires the Secretary of Agriculture to establish a wetlands reserve program to assist owners of farmed or converted wetlands in protecting and restoring such wetlands through the purchase of conservation easements for 30 years or the maximum duration allowed under applicable state law.

Migratory Bird Conservation Act, 16 U.S.C. §715 et seq

Establishes the Migratory Bird Conservation Commission; requires the Commission to consider and act upon recommendations of the Secretary of Interior with respect to the purchase or rental of areas necessary for the conservation of migratory birds, including wetlands and other waterfowl habitat.

Wetlands Acquisition, 16 U.S.C. §§3921-3923

Requires the Secretary of Agriculture to establish a national wetlands priority conservation plan to identify those wetlands that should be given priority for federal and state acquisition; authorizes the Secretary to purchase wetlands or interests in wetlands, not acquired under the Migratory Bird Conservation Act (16 U.S.C. 715 et seq.), consistent with the wetlands priority conservation plan.

Coastal Wetlands Conservation Grants, 16 U.S.C. § 3954

Authorizes the Director of the U.S. Fish & Wildlife Service to make matching grants to coastal states to carry out coastal wetlands conservation projects; grants are made to states that submit proposals to carry out coastal wetlands conservation projects; priority is given to proposed projects that are consistent with the national wetlands priority conservation plan, that are located in coastal states that have dedicated funding for programs to acquire coastal wetlands, natural areas and open spaces, and that are located in maritime forests on coastal barrier islands.

North American Wetlands, 16 U.S.C. §4401 et seq.

Establishes the North American Wetlands Conservation Council, which recommends wetlands conservation projects to the Migratory Bird Conservation Commission for federal funding to acquire, restore, or enhance wetlands.

Fish & Wildlife Coordination Act, 16 U.S.C. §2901 et seq.

Authorizes the Secretary of Interior to approve State Conservation Plans for nongame fish and wildlife and to reimburse states for conservation projects carried out pursuant to such conservation plans, including habitat

acquisition.

Executive Order 11990 (May 24, 1977)

Requires all federal agencies to minimize the destruction, loss or degradation of federally-owned wetlands.

Water Code, Chapter 26

31 TAC 305 et seq.
31 TAC 307 et seq.

Prohibits discharges of waste into state waters without a permit; defines state waters to include wetlands; authorizes the TWC to issue permits; establishes state water quality standards and anti-degradation policy.

Water Code, Chapter 11

31 TAC 297 et seq.

Authorizes the TWC to issue permits to store, take, or divert state waters; prohibits diversions of water that damage adjacent property owners; prohibits waste as a public nuisance; requires that the TWC include permit conditions necessary to maintain beneficial inflows; requires that the TWC consider effects on instream uses, water quality, and wildlife habitat.

Clean Water Act, Section 401

31 TAC 279 et seq.

Requires that any applicant for a federal permit or license to conduct any activity that may result in any discharge into waters of the United States obtain from the TWC a certification that the discharge will comply with the water quality standards and other limitations and standards promulgated under 33 U.S.C. §1311 (effluent limitations/performance standards), §1312 (water quality related effluent limitations), §1313 (water quality standards), §1316 (new source performance standards) and §1317 (toxic

and pretreatment effluent standards).

Certification is specifically required for all NPDES permit applications and U.S. Army Corps of Engineers' nationwide permits and general permits. However, 31 TAC §279.12(c) certifies by rule those activities which result in a discharge that does not exceed 1,000 cubic yards of dredged or fill material, except when the discharge is into a water quality limited segment or into an area where pollutants have been deposited or have accumulated.

Natural Resources Code, §33.231 et seq.

Requires the GLO, in coordination with the TPWD, to certify the coastal wetlands most essential to the public interest and to assign priorities for acquisition for those wetlands; requires the TPWD to acquire those coastal wetlands certified as most essential to the protection of the public interest; and requires the TPWD to issue regulations to preserve and protect the productivity and integrity of the coastal wetlands acquired.

Parks & Wildlife Code, §14.001 et seq.

Requires the GLO and the TPWD to develop a state wetlands conservation plan for state-owned wetlands to provide a policy framework for achieving a goal of no overall net loss of state-owned wetlands.

TABLE 1

FEDERAL ACTIVITIES AND AUTHORITIES RELEVANT TO COASTAL MANAGEMENT

ACTIVITY SUBJECT TO MANAGEMENT	METHOD OF REGULATION	FEDERAL AGENCY	FEDERAL STATUTE	FEDERAL REGULATIONS
Activities affecting water quality or quantity.	State Certification	EPA	Clean Water Act 33 U.S.C. §1341	40 CFR 136.1 <u>et seq.</u>
Discharge of pollutants into water.	Permit	EPA	Clean Water Act 33 U.S.C. §1251 <u>et seq.</u>	40 CFR 122.1 <u>et seq.</u>
Transportation of dredged material for the purpose of dumping it in ocean waters.	Permit and License	COE	Marine Protection Research and Sanctuaries Act of 1972, 33 U.S.C. §1401 <u>et seq.</u>	33 CFR 324.1 <u>et seq.</u>
Ocean dumping.	Permit	EPA	33 U.S.C. §1412	40 CFR Chap. I, Subchap. H.
Discharge of dredged or fill materials into the waters and adjacent wetlands of the U.S.	Permit and License	COE EPA	33 U.S.C. §1251 <u>et seq.</u>	33 CFR 323.1 <u>et seq.</u> 40 CFR 230.1 <u>et seq.</u>
Dumping material other than dredged material in navigable waters.	Permit	EPA	33 U.S.C. §1412	40 CFR Chap. I, Subchap. H.
Navigation projects.	Standards and Contracts	DOD	33 U.S.C. §633	none
Construction and operation of deep water ports.	Permit	USCG	The Deep Water Port Act of 1974, 33 U.S.C. §1501 <u>et seq.</u>	33 CFR Parts 148, 149, 150
The construction of bridges, causeways, dams or dikes across the navigable waters of the U.S.	Permit	COE	The Rivers and Harbors Act of 1899, §9 33 U.S.C. §401	33 CFR 321.1 <u>et seq.</u>
The obstruction or alteration of, the construction of any structure in, and the excavation or filling of any navigable waters of the U.S.	Permit	COE	The Rivers and Harbors Act of 1899, §10 33 U.S.C. §403	33 CFR 322.1 <u>et seq.</u>
Construction of coast guard bases, facilities and installations.	Self-regulated	DOT (USCG)	14 U.S.C. §656	none
Construction of roads, bridges or rights of way in the coastal zone.	Permit	DOT (FHA) USCG	33 U.S.C. §§4401, 491, and 525	23 C.F.R. 650; 33 C.F.R. 1, 2, 114-116
The construction, operation or alteration of airports.	Permit	FAA	49 U.S.C. §1432 49 U.S.C. §2214	14 C.F.R. 139

ACTIVITY SUBJECT TO MANAGEMENT	METHOD OF REGULATION	FEDERAL AGENCY	FEDERAL STATUTE	FEDERAL REGULATIONS
Location, acquisition and design of new or enlarged defense installations.		DOD	10 U.S.C. §2662 <u>et seq.</u> (acquisition) 10 U.S.C. §2801 <u>et seq.</u> (construction)	32 CFR 736 32 CFR 608
Location and design of proposed federal government property, acquisition and building construction.		GSA	40 U.S.C. §490 (operation & acquisition of federal buildings) 40 U.S.C. §§541-544 (design) 40 U.S.C. §601 <u>et seq.</u> (construction, alteration, and acquisition of public buildings)	41 CFR §19.000 <u>et seq.</u>
Siting and operation of nuclear and fossil fuel power plants and transmission lines.	Permit, License and Certificate	DOE	42 U.S.C. §2131 <u>et seq.</u>	10 CFR §50.1 <u>et seq.</u>
Construction and operation of nuclear facilities and the possession and use of byproduct, source and special nuclear material.	Permit, License, Opinions and Orders	NRC	The Atomic Energy Act of 1954 §§6, 7, 8, and 10, 42 U.S.C. §2011 <u>et seq.</u> The National Environmental Policy Act of 1969, 42 U.S.C. §4321 <u>et seq.</u>	10 C.F.R. 730, 960, 962, 1009, 1046, 1047 7 C.F.R. 16, 520, 650, 657, 1794, 3100; 10 C.F.R. 1021; 12 C.F.R. 408; 14 C.F.R. 21, 36, 91, 201, 211, 221, 1216; 18 C.F.R. 707, 725; 22 C.F.R. 161; 23 C.F.R. 630, 752, 771, 777; 29 C.F.R. 11; 30 C.F.R. 201, 212; 32 C.F.R. 651; 33 C.F.R. 230; 40 C.F.R. 6; 43 C.F.R. 3410, 3430, 3450, 3480, 3490; 44 C.F.R. 10; 46 C.F.R. 12, 31, 105; 49 C.F.R. 622; 50 C.F.R. 530
Construction and operation of non-federal hydroelectric power projects.	Permit, License and Certificate	DOE	16 U.S.C. §791a <u>et seq.</u> and §797(e)	18 CFR 4.1 <u>et seq.</u>
The underwriting of the conversion of existing dams to small scale hydroelectric projects.		DOE	16 U.S.C. §2701 <u>et seq.</u>	10 CFR 797.1 <u>et seq.</u>
Non-federal hydroelectric projects primary transmission lines.	License	FERC	16 U.S.C. §§796(11), 797(e), and 808.	18 C.F.R. 125
Interconnection of electric transmission facilities.	Order	FERC	16 U.S.C. §824a(b)	18 C.F.R. 239
Geological and geophysical exploration.	Permit	MMS (DOI)	43 U.S.C. §1331 <u>et seq.</u> 42 U.S.C. §4332	30 C.F.R. 251 (OCS)

ACTIVITY SUBJECT TO MANAGEMENT	METHOD OF REGULATION	FEDERAL AGENCY	FEDERAL STATUTE	FEDERAL REGULATIONS
Transportation, storage or conversion of LNG.	Standards	DOT	49 U.S.C. §1671 <u>et seq.</u>	49 C.F.R. 193
Construction and operation of LNG import/export marine terminals pursuant to the Natural Gas Act.	Permit, License and Certificate	DOE	15 U.S.C. §717 <u>et seq.</u>	33 CFR 127
Installation of platforms, pipelines, artificial islands, fixed structures, navigational and free floating structures.	Permit Lighting, Location, and Apparatus Operating Requirements	COE USCG	33 U.S.C. §403 14 U.S.C. §§85, 63 43 U.S.C. §1333	33 C.F.R. 322 33 C.F.R. 67
Siting, design, construction and activity of natural gas pipelines (onshore and offshore), transportation and storage facilities.	Permit, License and Certificate Certificates Standards (Safety) Certificates of Public Convenience and Necessity	DOE FERC DOT FERC	15 U.S.C. §717-717w, as amended; 154 U.S.C. §3301-3422; 43 U.S.C. §1331-1356; 42 U.S.C. §7101-7352 49 App. U.S.C. §§1672 and 1804 15 U.S.C. §717f(c)	18 C.F.R. 284 (NGPA) 49 C.F.R. 192
Pipeline rights-of-way on the Outer Continental Shelf.	Rights-of-Way and Leases	MMS	43 U.S.C. §1331 <u>et seq.</u>	30 C.F.R. 256
Abandonment of natural gas pipeline facilities.	Permission and Approval	FERC	15 U.S.C. §717f(b)	18 CFR 157
Construction and operation of facilities, including pipelines, used in gas transportation.	Permit, License and Certificate Construction Temporary Permit	DOE FERC FERC	15 U.S.C. §717 (c, e) 15 U.S.C. §717 (f)	18 C.F.R. 2.69 18 C.F.R. 2.57
Discharges of pollutants from fixed platforms and structures and/or dumping of non-dredged material.	Permit, Restrictions	EPA	33 U.S.C. §1251, <u>et seq.</u>	40 C.F.R. 435
OCS pre-lease or sale activities and activities described in OCS plans.	Permit, Selection Criteria, License	MMS	43 U.S.C. §1331 <u>et seq.</u> 42 U.S.C. §4532 <u>et seq.</u>	30 C.F.R. parts 260, 280, 281
Transportation of liquids by pipeline.	Standards Governing Design, Installation, Inspection, Emergency Plans and Procedures, Operation and Maintenance	DOT	49 U.S.C. §2002	49 C.F.R. 195

ACTIVITY SUBJECT TO MANAGEMENT	METHOD OF REGULATION	FEDERAL AGENCY	FEDERAL STATUTE	FEDERAL REGULATIONS
Drilling and mining on public lands.	Permit and License	BLM	30 U.S.C. §22 <u>et seq.</u> (mining claims & patents) 30 U.S.C. §181 <u>et seq.</u> (mineral leasing on BLM/NF lands) 16 U.S.C. §1902 (NPS) 16 U.S.C. §668dd(c) (NWRS) 16 U.S.C. §1133(d)(3) (wilderness)	43 CFR Chapter II, Subchapter C, Group 3000-3500. 36 CFR 9.1 <u>et seq.</u> 43 CFR 3100.0-3 <u>et seq.</u> 43 CFR 3500.0-3 <u>et seq.</u> and 8560.4-7 <u>et seq.</u>
Any activity related to oil spill or other cleanup operations that involves permit or alteration of a critical area.	Methods, Procedures and Notification Requirements	USCG	14 U.S.C. §633 33 U.S.C. §1321(j)(1)(A) 42 U.S.C. §9615	33 C.F.R. 153
Transport of hazardous substances.	Permit and Manifest	EPA	42 U.S.C. §6923	40 C.F.R. 263.10 <u>et seq.</u>
Storage, treatment, and disposal of hazardous waste.	Permit	EPA	42 U.S.C. §6924, 6925	40 C.F.R. Parts 122, 123, 61, 264, 265, 267
Air emissions.	Permit	EPA	Clean Air Act 42 U.S.C. §9601 <u>et seq.</u>	40 C.F.R. Parts 50-54, 56-58, 60-62, 65-67, 69, 79-82, 85-87
Construction and/or maintenance of shoreline protection projects.	Planning, Design and Construction Procedures	COE	33 U.S.C. §426g 42 U.S.C. §1962d-5	33 C.F.R. 263
Beach nourishment.	Discretionary	COE	33 U.S.C. §426 42 U.S.C. §1962d-5f	33 C.F.R. 263.26
Construction or maintenance of sewage or drainage ditches or canals located in coastal waters or wetlands.	Permit	COE	33 U.S.C. §403	33 CFR 322
Incidental taking of endangered species.	Permit	F&WS	Endangered Species Act of 1973, 16 U.S.C. §1531 <u>et seq.</u>	50 CFR §17.1 <u>et seq.</u>
Incidental taking of marine mammals.	Permit	NOAA	Marine Mammal Protection Act of 1972, 16 U.S.C. §1361 <u>et seq.</u>	50 CFR §18.1 <u>et seq.</u>
Federal-Aid Highway Projects.	Program and project approvals	FHA	23 U.S.C. §101 <u>et seq.</u> (§138)	23 CFR §450.100 <u>et seq.</u> and §630.102 <u>et seq.</u>
Preservation of historic and cultural sites.	Evaluation and Certification (Grants to state and local gov't)	NPS	National Historic Preservation Act, 16 U.S.C. §470 <u>et seq.</u>	36 C.F.R. 61

TABLE 2

EXISTING STATE COASTAL AUTHORITIES

USE OR ACTIVITY SUBJECT TO MANAGEMENT	METHOD OF STATE REGULATION	STATE AGENCY	STATUTORY AUTHORITY	REGULATION
Dune Protection	Permits, establish dune protection lines, identify critical dune areas	GLO Local Gov't	TX Nat. Res. Code Ch. 63	31 TAC §15.1 <u>et seq.</u> (proposed)
Wetlands Certification, Acquisition, and Definition	Certification	GLO	TX Nat. Res. Code Ch. 33, Subch. G	In progress
	Acquisition	TPWD	TX Nat. Res. Code Ch. 33, Subch. G; TX Parks and Wildlife Code §11.051, §13.008, §§14.001-.003, and §43.301	TX Parks and Wildlife Commission may authorize proposed wetlands acquisitions at their discretion
	Definition	TWC	TX Water Code Ch. 11	
Erosion Control	Rules, educational programs, demonstration projects	GLO	TX Nat. Res. Code Ch. 33, Subch. H (§§33.601-33.604)	31 TAC §15.1 <u>et seq.</u> (proposed)
Beach Access and Recreation	Regulations, comment process, enforcement assistance to AG	GLO	TX Nat. Res. Code §61.011(c), §61.011(d), and §61.015(c)	31 TAC §15.1 <u>et seq.</u> (proposed)
	Enforcement policy, comment process, certification	AG	TX Nat. Res. Code §61.011(c), §61.011(e), and §61.015(c)	
	Local ordinances	Local Gov't	TX Nat. Res. Code §61.011(b) and §61.015(a)-(g)	In progress
Maintenance of Public Beaches	Funding incentives to local gov't, Adopt - a - Beach program	GLO, in coordination with local gov'ts	TX Nat. Res. Code Ch. 61, Subch. C	31 TAC §25.1 <u>et seq.</u> [1991 Emergency Rules]
Beach Traffic and Litter	County Commissioner court order City Ordinance	GLO (delegated to local gov'ts)	TX Nat. Res. Code Ch. 61, Subch. D	In progress
Mobile Beach Business	Permit	TPWD	TX Nat. Res. Code §§61.161-61.177, §61.001(1) and §61.001(5)	31 TAC §55.41 <u>et seq.</u>
Construction of Mobile Homes	Regulations, standards, registration	TDLR	TX Rev. Civ. Stat. Ann. Arts. 5221f	16 TAC §69.51 <u>et seq.</u>
Floodplain Construction	Rules and Regulations	GLO	TX Water Code §16.311 <u>et seq.</u>	In progress
	Ordinances	Local Gov't	Local Gov't Code §240.901 <u>et seq.</u>	
Construction and Activity on Coastal Public Land	Easements, Permits, and Leases	GLO/SLB	TX Nat. Res. Code Ch. 33	31 TAC §155.1 <u>et seq.</u>

Easements on State Land	Easement	GLO	TX Rev. Civ. Stat. Ann. Art. 5415i; TX Nat. Res. Code §§51.291-51.303	31 TAC §13.11 and 31 TAC §13.12
	Easement	TPWD	TX Nat. Res. Code §§34.011-34.016	31 TAC §51.91 and 31 TAC §51.92
	Easement, lease, permit (coastal public lands)	SLB/GLO	TX Nat. Res. Code §§33.001-33.005, §§33.011-33.016, §§33.051-33.064, §§33.101-33.134, and §§33.171-33.176	31 TAC §§155.1-155.11
	Easement, Lease	TDC	TX Gov't Code §§496.001-496.004	31 TAC §201.1 <u>et seq.</u>
Cultural Resources (Landmarks)	Permit	TAC	TX Nat. Res. Code Ch. 191	13 TAC §41.1 <u>et seq.</u> 13 TAC §45.1 <u>et seq.</u>
Discharges in Water:				
a. Point Source	1. Permit Certification	TWC	Water Code, Chap. 26	31 TAC 305, 307 31 TAC 279
	2. Permit	RRC ²	Water Code §26.121 and §26.131 Nat. Res. Code §91.101 <u>et seq.</u>	16 TAC §3.75
b. Nonpoint Source (stormwater runoff)	1. Control and Abatement Programs	TWC and Cities	Water Code §26.177 and §26.178	pending
	2. Permit ¹	LCRA	LCRA Act of 1934 §2p	
c. Commercial Swine Production Operations	Permit and/or rules	TWC	TX Water Code §5.103 §5.105, and §28.011	None
d. Meat Processing	Permit and/or rules	TWC	TX Water Code §5.103 §5.105, and §28.011	Ordinances 31 TAC §§321.31-321.41 31 TAC §§321.51-321.57
Dredge Spoil	Rules and Policy	TPWD	TX Parks and Wildlife Code §11.011 and §11.033	31 TAC §57.1 and §57.2
Water Rights and Water Uses	Permit ³	TWC	TX Water Code §5.103, §5.105, and §28.011	31 TAC Chapters 281, 295, 297, 299 ⁴ , 303 ⁵
Groundwater Extraction	Permit	Coastal Subsidence Districts	Each District is Created by the TX Legislature	CSD rules

¹ The LCRA has no jurisdiction over the agriculture industry as mandated by the TX legislature.

² See, Pollution in Oil and Gas Operations

³ Artesian wells are generally exempt from the permit requirement, but the location of the well must comply with applicable siting restrictions.

⁴ If Applicable

⁵ If Applicable

Sewage Facilities	Effluent guidelines and specifications	TDH & TBH	TX Health & Safety Code, §341.001 <u>et seq.</u> TX Water Code Ch. 26	25 TAC §§301.12-301.14, 25 TAC §301.17, 25 TAC §301.51 <u>et seq.</u> , 25 TAC §301.101 <u>et seq.</u>
Removal of Commercial Marl, Sand, Gravel, Shell and Mudshell	Permits, Policies and Requirements	TPWD	TX Parks and Wildlife Code §11.033 and §86.001 <u>et seq.</u>	31 TAC §57.11 (Policy) Marl, Sand and Gravel: 31 TAC §§57.61-57.76, 57.91, 57.101. Shell and Mudshell: 31 TAC §§57.42-57.46, 57.50
Sand Gravel Washing	Regulations and Permit	TWC	TX Water Code §5.103 and §5.105	31 TAC §321.61 <u>et seq.</u>
Activities on the Gulf Intracoastal Waterway	Surveys, hearings to determine need	TDOT	TX Rev. Civ. Stat. Ann. Art. 5415 e 2	Need-based Maintenance for Navigation
Air Emissions	Construction and operation permits	TACB	TX Health and Safety Code §381.001 and §382.001	31 TAC §101 <u>et seq.</u>
Control of Protected Species(Fauna)	Permit or prohibition	TPWD	TX Parks and Wildlife Code §§43.151-43.157	31 TAC §65.151 <u>et seq.</u>
Endangered, Threatened and Protected Native Plants	Permit	TPWD	TX Parks and Wildlife Code §§12.301-12.307; TX Water Code §26.124(b)	31 TAC §69
Aquaculture	License	TPWD	TX Parks and Wildlife Code §43.551, §47.0091, and §134.001 <u>et seq.</u>	31 TAC §57.361 <u>et seq.</u>
Fisheries	Permit	TPWD	TX Agric. Code Ch. 134	31 TAC §57
Commercial and Recreational Fishing	License	TPWD	Commercial: TX Parks and Wildlife Code Ch. 47 and §§66.020-66.024 Sport: TX Parks and Wildlife Code Ch. 46	31 TAC §65.72(1)(a) (General license provision)
Shellfish Sanitation	Certification, inspection, license and permit	TDH	TX Health and Safety Code §436.013	25 TAC Ch. 241
Hunting, Grazing, and Farming	Licenses, seasons, and leases	TPWD	TX Parks and Wildlife Code Title 5	31 TAC §65
Geophysical and Geochemical Explorations	Lease, rules and permit	GLO/SLB	TX Nat. Res. Code §31.051, §32.062, and §141.071	31 TAC §9.4
Pollution in Oil and Gas Operations	Lease	GLO	TX Nat. Res. Code §31.051, §32.062	31 TAC §9.6(i)
	Permit	RRC	TX Water Code §26.131; TX Nat. Res. Code §91.101	16 TAC §3.8 (a), (b), (d), and (e)
	Lease, permit, easement	TDC/TPWD	TX Nat. Res. Code §34.051 <u>et seq.</u>	31 TAC §201.16

Spills: a) Oil 1. Inland 2. Coastal 3. Coastal spills of <240 barrels and >5 barrels of crude which result from activities associated with the exploration, development or production of oil or gas (including transportation by pipeline) b) Hazardous Substances c) Other Substances d) All Spills (Jurisdiction limited to the rescue and rehabilitation of aquatic life and wildlife and the habitats on which they depend)	Contingency plan, notification and reporting requirements	TWC	TX Water Code §5.103, §5.105, §§26.262-26.266 (Authority for New regs is in TX Water Code §26.039, and §§26.261-26.268)	31 TAC §343.1, §343.2, §335.4, and §335.5 (new rules in progress - 31 TAC §§327.1-327.9)
	Contingency plan (vessels and facilities), registration procedures for facilities, certification of cleanup organizations and facilities	GLO	TX Nat. Res. Code Ch. 40	In progress
	Notification and reporting requirements. Administration of the oil field cleanup fund.	RRC	TX Nat. Res. Code §40.053(b) and §91.111	16 TAC §3.8(e) 16 TAC §3.20(a)(1)
	Contingency plan, TX superfund - program, notification and reporting requirements	TWC	TX Water Code §26.127 and §26.262	31 TAC §343.1 and §343.2
	Contingency plan, notification and reporting requirements	TWC	TX Water Code §26.127 and §26.262	31 TAC §343.1 and §343.2
	Contingency plan - identification of environmentally sensitive areas and priority zones	TPWD	TX Nat. Res. Code §40.053	In progress [currently performed on a case - by - case basis]
Oil, Gas and Geothermal Operations	Permit and lease	RRC	TX Nat. Res. Code §85.201, §85.202(a)(8), §86.042; TX Water Code §27.031 and §27.051 (disposal wells)	16 TAC §3.5
	Lease, rules and permit	GLO/SLB	TX Nat. Res. Code §31.051, §32.062, and §141.071	31 TAC §§9.1-9.3 and §§9.5-9.9
	Lease	TBLUL	TX Education Code §66.64 and 66.68	31 TAC §§403.1-403.8, §§405.1-405.4, §§407.1-407.17

Underground Injection Wells				
1. Class I	Permit	TWC ⁷	TX Water Code §5.103, §5.105, §27.019; S.B. 1099	31 TAC Chapters 281, 305, 331 (S.B. 1099 is incorporated in all current permits)
2. Class II	Review TWC permit	WWDB ⁸	TX Water Code §27.017	None
	Permit	RRC	TX Water Code Ch.27 TX Nat. Res. Code §81.052, §85.051, §§85.201-85.203, §88.011, §91.101, and §141.012	16 TAC §3.46 and §3.47
3. Class III,	Permit	TWC	TX Water Code §5.103, §5.105, §27.019; S.B. 1099	31 TAC Chapters 281, 305, 331 (S.B. 1099 is incorporated in all current permits)
4. Class IV	Prohibition	TWC	TX Water Code §5.103 and §27.019	Prohibition
5. Class V	Permit	TWC	TX Water Code §5.103, §5.105 and §27.017; S.B. 1099	31 TAC Chapters 281, 305, 331 (S.B. 1099 is incorporated in all current permits)
	License, construction standards	WWDB	TX Water Code §5.103 and §27.01	31 TAC §287.91 and §331.132
6. Classes I, III, V ⁶	Letter to the TWC certifying no corruption of oil and gas reserves (included in the permit application)	RRC		16 TAC §3.946 and §3.974
Pipelines (Oil, Gas and Hazardous Liquids)	Permit	RRC	TX Rev. Civ. Stat. Ann. Arts. 6252-13a; TX Water Code §§21.001-21.612, §§22.001-22.104, §§24.001-24.046; TX Nat. Res. Code §§51.291-51.303, §§52.291-52.296, §§81.001-113.234, §§131.001-131.270, §§141.001-141.079	16 TAC §3.65
Mineral Leasing (Other than Oil and Gas)	Lease, Guidelines, Reporting and Notification Requirements	GLO/SLB	TX Nat. Res. Code §31.051 and §32.062	31 TAC §§10.1-10.9
Surface Mining	Permit	RRC	TX Nat. Res. Code Ch. 131	16 TAC §§11.91-11.100

⁶ The TDH and the RRC have the opportunity to review and comment on the TWC permit applications.

⁷ The TDH Regulates above ground process plant facilities associated with in situ uranium mining exclusive of wellhead assemblies, well monitoring equipment, fluid holding ponds, and preinjection equipment associated with waste disposal wells. 31 T.A.C. §331.31. The TWC and the TDH have joint authority for the fluid holding ponds. 31 T.A.C. §331.33.

⁸ The WADB has been abolished by the TX legislature, effective 9/1/92. These duties will be assumed by the TWC.

Industrial and Municipal Solid and Hazardous Waste	Permit, variances, siting restrictions, classification of facilities, design criteria, operational standards	TDH	TX Health and Safety Code §361.001 <u>et seq.</u>	25 TAC §325 (generally); 25 TAC §325.41 and §325.42 (classification); 25 TAC §§325.51-325.64 (permit and design); 25 TAC §325.231 (variances)
	Authorization (if no TDH permit), technical review (if subject to a TDH permit), and permit (if facility is considered a new source or a modification under the federal Clean Air Act)	TACB	TX Health and Safety Code §361.001 <u>et seq.</u> and §382.001 <u>et seq.</u>	25 TAC §§325.701-325.721 (generally); 25 TAC §25.705 (review); 25 TAC §325.706 (permit requirements); 31 TAC §116.1 <u>et seq.</u> ; 31 TAC §§120.1-120.31; 31 TAC §121 <u>et seq.</u>
	Permit	RRC	S.B. 1103; TX Nat. Res. Code §91.601 <u>et seq.</u>	Additional lease requirements
	Permit, variance, standards, and notification, recordkeeping, and reporting requirements	TWC	TX Water Code §5.103, §5.105, §5.131, and §5.132; TX Health and Safety Code §361.001 <u>et seq.</u>	31 TAC §335.1 <u>et seq.</u>
Waste Incineration				
a. Solid	Permit	TDH	TX Health and Safety Code §§361.061-361.110	25 TAC §325.75 and §§325.171-325.190
b. Hazardous	Permit	TWC	TX Water Code §5.103 and §5.105	31 TAC §335
c. Solid and Hazardous	Design and operating standards, testing, monitoring and recordkeeping requirements	TACB		25 TAC §325.705 and §325.706
Medical Waste	Design and operating standards, testing, monitoring and recordkeeping requirements	TACB	TX Health and Safety Code §382.017	31 TAC §§111.123-111.129
	Permit	TDH		25 TAC §§1.131-1.137
Radiation Control	License, permit, registration, safety requirements, inspection, emergency planning and implementation	TDH/TBH	TX Health and Safety Code, Title 5 §401.051, §401.063 §101.101 <u>et seq.</u> , §401.202 TX Rev. Civ. Stat. Ann. Art. 4590f	25 TAC §§289.111-289.126
Low-Level Radioactive Waste Disposal	License, site limits, construction and operation standards	LLRWDA	TX Health and Safety Code Ch. 402	
Highways	Plan	TDOT	TX Rev. Civ. Stat. Ann. Art. 6663 <u>et seq.</u>	49 TAC §9.5 <u>et seq.</u>

Pesticides a. Structural b. Other	License, standards Registration of pesticides, experimental use permits, applicator certification, license, use and application training program, standards	TSPCB TDA	TX Rev. Civ. Stat. Ann. Art. 135b-6 TX Agric. Code §76.004	22 TAC §591.1 <u>et seq.</u> 4 TAC §7.1 <u>et seq.</u>
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TABLE 3

COUNTY ACTIVITIES RELEVANT TO COASTAL MANAGEMENT

ACTIVITY SUBJECT TO MANAGEMENT	METHOD OF REGULATION	COUNTY	STATUTORY AUTHORITY	REGULATION
SANITATION				
Solid Waste Management		All	4477-7 §§3(a)(b)	
Solid Waste Disposal	License	All	4477-7 §5(d)	
Littering and Health Nuisances		All	4477-9	
Sewage - Septic Tanks	Order, Resolution or Other Rule	All	TX Water Code §26.032	
Impacts on Water Quality	Inspections re: Enforcement	All	TX Water Code §26.001(17), (18)	
Nonpoint Source Water Pollution	Ordinance	All	TX Local Gov't Code §26.178	
Impacts on Air Quality	Enforcement Authority, Inspections, Investigations, Recommendations to TACB re: Activities affecting county	All	4477-5 §1.03(3), §4.03(3)	
Regional Water Quality Management	Rules	Harris, Chambers, and Galveston	Acts 1969 61st Leg. p. 1336, ch. 409	
PARKS & PUBLIC FACILITIES				
Protection of Threatened or Endangered Species	Ordinance	All	TX Local Gov't Code §26.178	
Park Acquisition, Maintenance and Management		All	Acts 1915 34th Leg., p. 102, ch. 53 VACS 6078 (repeal) TX Local Gov't Code §331.001 <u>et seq.</u> TX Parks and Wildlife Code §13.304	
Park Acquisition, Maintenance and Management in Gulf Coast Counties		Gulf Coast Counties	TX Local Gov't Code ch. 321	
Water Safety	Regulations, Area Restrictions	All	TX Parks and Wildlife Code §31.092(b)	
Private Businesses in County Parks	License and Permit	All	TX Local Gov't Code §331.006(a), (b)	
Recreational Facilities and Services	Fees	All	TX Local Gov't Code §331.006(a), (b)	
Closure and Abandonment of County Parks	Notice and Hearing	All	TX Local Gov't Code Ch. 317	

Maintenance and Upkeep of Public Cemeteries		All	TX Rev. Civ. Stat. Ann. Art. 2351f-3	
Establishment and Maintenance of Museums	Acquisition	All	TX Gov't Code, Ch. 442; TX Const. Art. XVI, §39	
Establish and Maintain County Fair Grounds	Lease, Acquisition	All	TX Local Gov't Code §§319.001 - 319.003	
Establish, Provide Access To, Locate and Maintain Libraries		All	TX Local Gov't Code §323.001 <u>et seq.</u>	

AGRICULTURE

Creation of Agricultural Experiment Farm and Station		All	TX Agric. Code §43.002	
Sale, Use and Transportation of Herbicides	Inspection and Enforcement Authority	All	TX Agric. Code §75.021	
Wildlife Control	Bounties and Eradication Programs	All	TX Rev. Civ. Stat. Ann. Art. 190a <u>et seq.</u>	
Animal Slaughtering	Registration	All	TX Agric. Code §144.021	
Hunting		All	TX Parks and Wildlife Code §61.001 <u>et seq.</u>	

GULF COAST

Construction and Maintenance of Seawalls	Tax Power to Supply Necessary Funds	Gulf Coast Counties	TX Const. Ann. Art. XI, §7	
Restricted Beach Access	1. Closure (3 day maximum) 2. Dune Improvements	Gulf Coast Counties	TX Local Gov't Code §240.902 TX Nat. Res. Code §61.013(d)	
Motor Vehicle Traffic and Possession of Animals on Beaches	Speed Limits and Leash Laws	Gulf Coast Counties	TX Nat. Res. Code §61.122 and §61.122(b)	
Beach Maintenance	Cleaning	Gulf Coast Counties	TX Nat. Res. Code §61.061 <u>et seq.</u>	
Zoning of Beaches	Ordinance	Cameron and Willacy	TX Local Gov't Code	
Dune Protection	Protection Lines; Prohibition of Removal of Sand Vegetation; Prohibition of Use of Recreational Vehicles	Gulf Coast Counties	TX Nat. Res. Code §63.011, §63.092, and §63.093	
Removal of Sand, Marl, Gravel and Shell from Islands and Peninsulas Bordering the Gulf of Mexico	Permit	Gulf Coast Counties	TX Nat. Res. Code §61.211 <u>et seq.</u>	

ROADS AND BRIDGES				
Control and Establishment of County Roads		All	TX Const. Art. XI, §2; TX Const. Art. VIII, §9; and TX Rev. Civ. Stat. Ann. Art. 2351	
Road Drainage (including drainage of private property along a public road)	County Commissioners' Approval	All	TX Rev. Civ. Stat. Ann. Arts. 6702-1, §2.101 <u>et seq.</u> and §3.105	
Bridges, Tunnels and Overpasses		All	TX Rev. Civ. Stat. Ann. Arts. 2351(3) and (5)	
TRANSPORTATION				
Establishment and Control of Ferries	Tolls and Fares	All	TX Rev. Civ. Stat. Ann. Arts. 2351 and 6798	
Acquisition and Operation of Airports	Tax and Lease	All	TX Rev. Civ. Stat. Ann. Arts. 46d-1 and 1269h	
UTILITIES				
Placement of Utility Lines - Water	Designation of Location or Relocation of Water Corporation's Line	All	TX Rev. Civ. Stat. Ann. Art 1433	
Placement of Utility Lines - Power	Designation of Location or Relocation of Water Corporation's Line	All	TX Rev. Civ. Stat. Ann. Art. 1436a and b	
Placement of Utility Lines - Telephone and Telegraph	Regulate Placement of Lines	All	TX Rev. Civ. Stat. Ann. Art. 1422	
LAND USE				
Wetlands Mitigation	Permit and Regulations	All	TX Rev. Civ. Stat. Ann. Art. §5421u	
Subdivision Development	County Requirements and Approval	All	TX Local Gov't Code §232.002	
Building Line Setbacks	Prohibition	All	TX Rev. Civ. Stat. Ann. Art. 6812c; TX Local Gov't Code Ch. 233	
County Lake Zoning	Ordinances	All	TX Local Gov't Code	
Outdoor Businesses	Ordinances	All	TX Rev. Civ. Stat. Ann. Art. 2372dd-2	
FLOODPLAIN ACTIVITIES				
Building Regulations	Permits, Regulations, and Condemnation	All	TX Local Gov't Code §240.901	
Floodplain Zoning	Whatever Steps are Necessary to Comply with the Federal Flood Insurance Act	All	TX Water Code §16.311 <u>et seq.</u> Vernon's Ann. Civ. St. Art. 8280-13 (in Water Code Auxiliary Laws)	

TEXAS COASTAL MANAGEMENT PROGRAM

DRAFT

PUBLIC EDUCATION AND PARTICIPATION STRATEGY

October 30, 1992

COASTAL MANAGEMENT DIVISION
RESOURCE AND ASSET MANAGEMENT DIVISION
TEXAS GENERAL LAND OFFICE

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INTRODUCTION

A goal of the Texas Coastal Management Program (CMP) is to educate the public about coastal issues and to provide for public participation in the development and implementation of the CMP. The success of Texas' coastal management efforts to date can largely be attributed to strong involvement and support of coastal citizens and interest groups. The future success of the CMP will rest on the continued interest and support of these coastal constituents.

This document outlines the strategy that will be followed to educate the public about coastal issues and the CMP, to provide for full public participation in the development of the program, and to provide ample notification of activities and pending decisions related to the CMP. Specific activities, publications, proposed rules, and notification procedures are also described for the strategy elements.

PUBLIC EDUCATION STRATEGY

I. Topics

A. General CMP Information - Information on the need for the CMP, the benefits and requirements of the federal Coastal Zone Management Act, and program development activities including opportunities for public input.

B. Issue-Specific Information - Information on individual CMP elements, such as wetlands, beaches, dunes, barrier islands, dredging, energy management, etc.

II. Mechanisms

A. Meetings/Workshops - Meetings will be held on the coast and in Austin as forums for the provision of information to the general public and interest groups on the above topics as well as for public participation in the development of CMP elements.

B. Publications - Fact sheets, brochures, reports, etc. will be prepared for distribution to the public by mail and at meetings, workshops, and conferences.

C. Media - The program will promote information transfer via newspaper articles, television, press conferences, and videos.

D. Staff Outreach - GLO staff and staff of other state agencies will present CMP information at meetings and conferences of interest groups.

III. Specific Activities Completed/Planned

A. Meetings/Workshops

1. Dune Workshops - Galveston, Corpus Christi, South Padre Island (8-92) [funding provided by EPA]

2. CMP Information Briefings - Austin (10-23-92); South Padre Island (10-27-92); Galveston (11-10-92); Corpus Christi (11-16-92)

3. Workshop on Current Regulatory Programs for Wetlands - Galveston (11-10-92); Corpus Christi (11-17-92) [funding provided by EPA]

B. Publications

1. Texas Coastal Management Program Development Proposal - available
2. CMP informational brochure - currently in production
3. Dune Protection Guide - available [funding provided by EPA]
4. Dune Protection and Improvement Manual - available [funding provided by EPA]
5. Regulatory Manual for Wetlands - in production [funding provided by EPA]

C. Media

1. Press releases and/or newspaper notices have been sent to news media for initial Coastal Coordination Council meeting (11/91) and for GLO-sponsored workshops (Dune Workshops, Wetlands Workshops, CMP Informational Briefings), etc.
2. A press conference to officially announce and celebrate the development process of the CMP and the addition of Corpus Christi Bay to the National Estuary Program will be held in Corpus Christi (11-16-92).
3. Video - A coastal documentary is being prepared highlighting the problems affecting the Texas coast and ways by which the problems are being addressed. The documentary will also include four or five successful coastal projects involving public/private partnership. (Planned for spring 1993.)

D. Staff Outreach - Opportunities for staff to publicize the CMP and distribute program information arise frequently. Examples include providing a display booth at the Galveston Bay Days (4/92), the Gator Fest in Beaumont (9/92), and the Texas State Fair (10/92) and holding briefings for interest groups such as the Farm Bureau, the State Soil and Water Conservation Districts, and conference of oil producers.

PUBLIC PARTICIPATION STRATEGY

I. Formal Structure

A. Coastal Coordination Council and Executive Committee

1. Both bodies are subject to requirements of the Texas Open Meetings Act (Appendix 1) and the Texas Administrative Procedures and Texas Register Act (Appendix 2).
2. The CCC is required to meet quarterly by statute. The Executive Committee meets approximately every 3 weeks.
3. Provisions are made for public comment on specific agenda items at meetings of both bodies. The public is also given the opportunity to comment on other issues at the end of each meeting.

B. Advisory Committees

1. Role in Program Development

A number of advisory committees will assist the CCC staff in the development of the CMP, including drafting various program elements and policies, and reviewing draft publications. Committees that were established during the development of the state's plan for coastal public lands will be reactivated. Advisory committee members represent their government agencies or constituency groups and are responsible for serving as liaisons between the group they represent and the CCC staff developing the CMP.

2. List of Advisory Committees

- o State Task Force - resource and development agencies affected by the CMP (currently being reactivated and expanded)
- o Federal Task Force - (to be reactivated and expanded)
- o Public Advisory Committee - open to all interest groups; (to be reactivated)
- o Soil and Water Conservation Districts Coastal Policy Development Committee - established; has met twice

o Consistency Review Work Group (established by the Executive Committee to include CCC agencies' staff; will be expanded to other state agencies)

II. Opportunities for Issue-Specific Participation

A. Workshops/Public Meetings

Workshops and public meetings will be held to inform the public about specific issues, and to obtain input from the public about their concerns on the issues and their recommendations for CMP policy development. Workshops and public meetings will be held along the coast on issues such as wetlands management and dune protection, as well as on the completed draft CMP.

Wetland workshops will be held in November 1992 in Galveston (11/10) and Corpus Christi (11/17). Further workshops are expected to be held on draft CMP wetland policies in the spring of 1993.

B. Rule and Policy Development

1. CCC and EC meetings: The public has the opportunity to comment on all draft and proposed policies and rules related to the CMP during the formal meetings. A public record of all comments is maintained on file.

2. Administrative Procedures and Texas Register Act requirements: All proposed rules and policies must be published in the Texas Register for a minimum public comment period of 30 days, with provisions for public hearings upon request. Notice of adoption of rules must also be published in the Texas Register.

In addition to the hearings on administrative procedures, hearings will be held on certain proposed CMP rules or policies. The GLO or the appropriate agency will hold hearings along the coast to facilitate public comment on proposed rules.

Public hearings are currently being held on the GLO's proposed dune protection and beach management rules. The hearings will be in Austin (10/23), South Padre Island (10/27), Galveston (11/9), and Corpus Christi (11/16).

PUBLIC NOTIFICATION MECHANISMS AND PROCEDURES

I. Notification of Formal Meetings - CCC and EC

A. Requirements of the Texas Open Meetings Act (Appendix 1)

B. Requirements of the Texas Administrative Procedures and Texas Register Act (Appendix 2)

II. Notification of Proposed and Final Policies and Rules

Administrative Procedures and Texas Register Act for proposed and adopted rules.

III. CMP Mailing List

A. Composition

The mailing list consists of over 1500 names of individuals; state, federal, and local government officials and staff; all members of CMP advisory committees; and interest groups such as environmental, trade, and recreational organizations.

B. Information Provided

1. Notices and agendas of all CMP meetings and workshops.

2. Notices and/or copies of proposed rules and policies for comment.

3. Monthly newsletter, which include updates on progress of CMP development, decisions of the CCC, and meeting notices.

4. Fact sheets and other publications pertaining to the CMP.

Special Award Condition #2
Draft Report

CRITICAL AREA PROGRAM

INTRODUCTION

Coastal wetlands are an integral part of estuarine ecosystems and have tremendous biologic and economic values. Texas wetlands serve as nursery grounds for over 95 percent of the recreational and commercial fish species found in the Gulf of Mexico; they provide permanent and seasonal habitat for a great variety of wildlife, including 75 percent of North America's bird species; they serve as natural flood control and water purification systems; and they are important recreational areas for hunters, fishermen, and nature enthusiasts.

There are approximately 1.1 million acres of coastal wetlands remaining in Texas (Field et al., 1991). This valuable resource is disappearing at an alarming rate. The Texas Parks and Wildlife Department (TPWD) estimates that 35 percent of the state's coastal marshes were lost between 1950 and 1979 (Texas Parks and Wildlife Department 1988). An estimated 29 percent of the wetlands in Texas river deltas has been lost since 1950 (White and Calnan, 1990).

Wetland loss results from both natural processes and human activities. Human activities affecting wetlands may be managed to reduce and prevent wetland loss, but they are currently regulated by overlapping and fragmented policies, goals, and authorities of federal and state agencies, which can reduce the effectiveness of management.

To address the need for comprehensive planning and wetland protection, the Texas Legislature passed Senate Bill 1054, the "Coastal Management Plan for State-owned Coastal Wetlands." S.B. 1054 adopted a state policy goal of "no overall net loss" of state-owned coastal wetlands. In addition, the Coastal Coordination Council has adopted the goal of protecting, restoring, and enhancing coastal wetlands and other resource areas.

These goals are in keeping with those of the federal Coastal Zone Management Act (CZMA). For federal approval, the Texas Coastal Management Program (CMP) must include enforceable policies that minimize the destruction, loss, or degradation of wetlands and preserve and enhance their natural values.

Enforceable policies for state-owned and private wetlands will be formulated in the development of the Critical Area Program (CAP) element of the CMP.

The function of the CAP is to protect, preserve, and enhance coastal wetlands, submerged aquatic vegetation, tidal flats, and oyster reefs. The final enforceable policies and rules will provide integrated management and protection of these critical resource areas of the Texas coast.

The CAP is intended to be a comprehensive management program addressing resource issues that cut across individual state and federal agency responsibilities or that are not now adequately addressed by state or federal policy. To maintain this focus on policy coordination and development, the CAP itself will not be responsible for the day-to-day implementation of the individual management efforts but will coordinate them into an effective networked program that is consistent with the overall CMP.

The CAP will utilize existing regulatory authorities governing development of wetlands. The core concept of the CAP is that networking and strengthening existing agency regulations will provide strong protection for critical areas. The CAP therefore embraces several key components that reflect networking objectives: integrated policy development, coordinated implementation of agencies' authority, multidisciplinary technical assistance to agencies and local communities, federal consistency, and public education and information.

The key to the success of a networked program is the level of coordination among the component programs. That success will be achieved through the CMP and adoption of CMP policies and oversight of program implementation by the Coastal Coordination Council.

This document describes the core concepts and functions of the CAP. The first section explains the geographic scope of the program. The second section describes the critical area habitats. The third section discusses the potential uses and activities subject to review under the program. The last section discusses the authorities and techniques that will be used to implement the program.

GEOGRAPHIC SCOPE

All critical areas within one of the following inland boundary options will be managed and protected through the Texas CAP:

- o the CMP boundary, which is currently being determined;
- o a subset of the CMP boundary delineated by cultural landmarks; or
- o a boundary encompassing wetlands, submerged aquatic vegetation, tidal flats, and oyster reefs in tidal waters and wetlands adjacent to tidal waters.

The types of critical areas to be managed include wetlands as defined by the U.S. Army Corps of Engineers (COE) and Environmental Protection Agency (EPA), submerged aquatic vegetation, tidal flats, and oyster reefs. For initial study, information will be gathered for critical areas within the CMP planning and study areas.

A significant percentage of the critical areas within the CMP planning area are in the public domain, as they are held by state and federal agencies. Acreages of public wetlands in federal and state wildlife refuges, parks, preserves, and management areas are shown in Table 1 (Moulton, 1990). Total wetland acreages for each of the 19 counties in the planning area are shown in Table 2. Total wetland acreage was calculated by using a grid-sampling procedure on the 1979 U.S. Fish and Wildlife Service National Wetland Inventory maps (Field et al., 1991).

There are an estimated 1,103,900 total acres of wetlands, including salt, brackish, and fresh marshes, and forested and scrub shrub wetlands, in the planning area (Field et al., 1991). Public wetlands comprise 347,087 acres, or approximately 31 percent of the total wetland acreage. The estimate for public wetlands is conservative, as it does not include wetlands below mean high tide on state-owned submerged lands. Submerged aquatic vegetation, oyster reefs, and most tidal flats are also on state-owned lands.

Table 1. Descriptions of protected coastal wetland habitats.
(modified from Moulton, 1990).

AREA NAME	COUNTY	TOTAL ACRES	WETLAND ACRES
Texas Point NWR	Jefferson	8,952	8,057
McFaddin NWR	Jefferson	42,956	40,808
Anahuac NWR	Chambers	28,243	25,419
Moody NWR	Chambers	3,517	3,342
Brazoria NWR	Brazoria	12,199	11,589
San Bernard NWR	Brazoria	24,454	23,231
Big Boggy NWR	Matagorda	4,371	4,371
Matagorda Island NWR	Calhoun	55,395	22,158
Aransas NWR	Aransas	67,065	33,533
Laguna Atascosa NWR	Cameron	45,187	40,668
J.D. Murphree WMA	Jefferson	13,264	12,601
Lower Neches WMA	Orange	6,151	5,536
Sea Rim SP	Jefferson	15,109	13,598
Galveston Island SP	Galveston	1,950	975
Bryan Beach SP	Brazoria	878	439
Christmas Bay SP	Brazoria	501	376
Peach Point WMA	Brazoria	11,377	9,102
Sheldon WMA	Harris	2,503	1,252
Mad Island WMA	Matagorda	5,700	5,415
Guadalupe Delta WMA	Calhoun	4,262	4,049
Matagorda Pen. SP	Matagorda	6,255	4,379
Mustang Island SP	Nueces	3,703	1,852
Davis Hill SP	Liberty	1,682	841
Christmas Bay CP	Brazoria	4,831	2,416
Welder Flats CP	Calhoun	1,500	1,500
South Bay CP	Cameron	3,420	3,420
Armand Bayou CP	Harris	290	24
Padre Island NS	Kleberg Kenedy Willacy	130,696	65,348
TOTAL			347,087

Table 2. Texas Coastal Wetlands by County (Acres x 100)
(modified from Field and others, 1991)

County	Salt and Brackish Marsh	Fresh Marsh	Forested and Scrub-Shrub	Tidal Flats	County Total
Aransas	254	186	10	109	559
Brazoria	536	274	205	41	1,056
Calhoun	338	275	27	50	691
Cameron	312	198	17	531	1,059
Chambers	459	256	80	28	822
Galveston	351	37	7	80	475
Harris	12	85	39	8	144
Jackson	105	44	42	5	195
Jefferson	629	888	121	44	1,681
Kenedy	244	921	47	1,120	2,332
Kleberg	47	469	5	148	668
Liberty	0	136	759	0	895
Matagorda	563	206	58	87	914
Nueces	52	95	17	81	244
Orange	31	83	76	0	190
Refugio	112	312	86	21	531
San Patricio	120	60	11	40	230
Victoria	15	150	157	1	323
Willacy	139	260	21	358	779
TOTAL	4,319	4,935	1,785	2,752	13,791

CRITICAL AREAS

Wetlands, Submerged Aquatic Vegetation, and Tidal flats

Salt Marsh

Typical species in the salt marsh community include smooth cordgrass (*Spartina alterniflora*), saltwort (*Batis maritima*), glasswort (*Salicornia virginica* and *S. bigelovii*), saltgrass (*Distichlis spicata*), seashore dropseed (*Sporobolus virginica*), sea ox-eye (*Borrichia frutescens*), and salt-marsh bulrush (*Scirpus maritimus*). Black mangroves (*Avicennia germinans*) are significant components of salt marsh systems in some areas along the central and south Texas coast. Salt marshes have their broadest distribution south of the Galveston Bay area, where they are common on the bayward side of barrier islands and peninsulas and along the mainland shores of narrow bays such as West Galveston Bay. Although salt marshes occur on bay-head deltas, the communities change rather rapidly to brackish and fresh marshes up the valleys.

Brackish Marsh

The brackish-marsh community is transitional between salt marshes and fresh marshes. Among the dominant species in topographically higher areas of this community are marshhay cordgrass (*Spartina patens*), Gulf cordgrass (*Spartina spartinae*), saltgrass, and sea ox-eye. Other species in lower, wetter areas include Olney bulrush (*Scirpus olneyi*), cattail (*Typha* spp.), California bulrush (*Scirpus californicus*), and alligatorweed (*Alternanthera philoxeroides*). Brackish marshes dominate the coastal marsh community between Sabine Lake and Galveston Bay and are the most extensive wetland communities in the Galveston Bay system (White and Paine, 1992). They are widely distributed along the lower reaches of the Trinity delta, inland from West Galveston Bay, in the inland part of the marsh system south of the Brazos River, and along much of the lower reaches of the Lavaca and Guadalupe river valleys.

Fresh Marsh

Environments in which fresh marshes occur are generally beyond the limits of saltwater flooding except locally during hurricanes. The freshwater influence from rivers, precipitation, runoff, and groundwater is sufficient to maintain a freshwater vegetation assemblage consisting of species such as cattail, California bulrush, three-square bulrush (*Scirpus americanus*), water hyacinth (*Eichornia crassipes*), spiny aster (*Aster spinosus*), and rattlebush (*Sesbania drummondii*). Fresh marshes occur inland along river or fluvial systems and in upland basins both on the mainland and on barrier islands. Inland from the chenier plain and upstream along the river valleys of the Neches,

Trinity, San Jacinto, Colorado, Lavaca, Guadalupe, and San Antonio Rivers, salinities decrease and fresh marshes intergrade with and replace brackish marshes.

Swamps and Bottomland Hardwoods

Swamps are most commonly defined as woodlands or forested areas that contain saturated soils or that are inundated by water during much of the year. In Texas, these are areas in which bald cypress (Taxodium distichum) and water tupelo (Nyssa aquatica) occur in association with other species of trees such as sweetgum (Liquidambar styraciflua) and willows (Salix spp.). Swamps occur principally in the entrenched valleys of the Sabine, Neches, and Trinity rivers. The swamps grade at slightly higher elevations into river bottomland hardwood forest or streamside woodland. Entrenched and nonentrenched river valleys to the south are dominated by drier woodlands or forested areas.

Submerged Aquatic Vegetation

Submerged aquatic vegetation occurs in relatively shallow (less than 6 ft.) subtidal areas of the bay-estuary-lagoon system. Five marine spermatophytes occur on the Texas Gulf Coast: shoalgrass (Halodule wrightii), widgeongrass (Ruppia maritima), turtlegrass (Thalassia testudinum), clovergrass (Halophila engelmannii), and manatee grass (Syringodium filiformis). All five marine spermatophytes occur in the lower Laguna Madre. On the upper coast, the most common species is widgeongrass. However, four out of five marine spermatophytes have been reported along the upper coast in Christmas Bay. Species of submerged aquatic vegetation that occur in river deltas and do not tolerate long-term salinities above 6 ppt include Najas sp. and Vallisneria sp. (Zimmerman et al., 1990).

Tidal Flats

Mudflats and sandflats are ecologically important areas of the coast and a vital part of estuarine food chains. They are defined as silt and clay or sand substrates that usually occur in the intertidal zone and are regularly exposed and flooded by tides. In contrast to wetland habitats, mudflat and sandflat vegetation is minimal due to unstable sediments. Algal mats often occur on sandflats. Mudflats and sandflats are the main feeding grounds for coastal shorebirds, fish, and many invertebrates. Detritus and plankton collect on the flats and are eaten by primary consumers, which in turn are prey for higher levels of the food chain. Overall, sandflats are more abundant than mudflats. Extensive sandflats occur in the Laguna Madre area of South Texas, whereas mudflats are common on the upper coast in the Houston/Galveston and Beaumont/Port Arthur areas.

Status and Trends

The U.S. Fish and Wildlife Service (USFWS) estimates that Texas coastal marshes, including fresh, brackish, and salt, totaled approximately 937,400 acres in 1956 (Texas Parks and Wildlife Department, 1988). In 1980, the TPWD estimate was 611,760 acres of marsh, or a 35 percent loss since 1956 (Texas Parks and Wildlife Department, 1988).

Salt, brackish, and freshwater wetlands are being replaced by open water and barren flats in the Neches, Trinity, San Jacinto, Lavaca, Guadalupe, and Nueces River deltas (White and Calnan, 1990). Only the Colorado River delta increased in wetlands area after the mid-1950's; vegetation increased by about 2 percent between 1956 and 1982. The greatest wetland losses occurred along the San Jacinto (40%) and Neches (40%) rivers, and smaller losses occurred along the Trinity (30%), Lavaca (15%), Guadalupe (6%), and Nueces (3%) rivers. The total loss in emergent vegetated wetlands since the 1950's amounts to about 21,000 acres, which represents 29 percent of the vegetated area existing in the mid-1950's. The San Jacinto and Neches river areas accounted for about 70 percent of the total loss. Subsidence is the overriding cause along the San Jacinto River, which is near the center of maximum subsidence resulting from groundwater withdrawal and oil and gas production in the Houston area. In the Neches River valley, a combination of factors, including subsidence, relative sea-level rise, fault movement, channel dredging, spoil disposal along levees, and impoundment of sediments along streams, has probably contributed to wetland loss.

The TPWD and USFWS estimate that the Texas bay-estuary-lagoon system contains 189,865 acres of marine spermatophytes or seagrasses (unpublished data). In Laguna Madre, the estuarine system with the greatest area of seagrass, 2,470 acres were lost between the 1960's and 1988. Seagrasses in the Galveston Bay system have declined by approximately 90 percent since 1956 (Pulich and White, 1991). The decline in the Galveston Bay system has been attributed to both natural and anthropogenic causes, including hurricanes, subsidence, erosion and redistribution of dredged sediments, excessive nutrients from wastewater discharges, toxic spills from petrochemical industries, and nonpoint-source runoff.

It has been estimated that the Texas coast contained 282,048 acres of sand and mudflats in the 1950's (Brown, 1972-1980). A more recent estimate based on 1979 photography shows 275,200 acres of sand and mudflats (Field et al., 1991). In both studies, sandflats were considerably more extensive than mudflats.

Oyster Reefs

Extensive reefs of the Eastern oyster, Crassostrea virginica, are present in many bays and estuaries. Oyster reefs, as defined in this report, are natural or planted structures in intertidal or subtidal areas that are composed of oyster shell, live oysters, and other organisms that are discrete, contiguous, and clearly distinguishable from scattered oysters in marshes and mud flats and from wave-formed shell windrows. Oysters and oyster reefs are not only ecologically important, possessing all the ecological characteristics of Special Aquatic Sites as defined in Section 230.3 of the EPA 404(b)(1) guidelines, but are also harvested commercially.

Status and Trends

Oyster reefs are found in all major Texas bays north of Corpus Christi and are most abundant in the brackish waters of enclosed bays. Although reefs are not developed in the Baffin/Alazan Bay system and in Laguna Madre, a few scattered reefs occur in South Bay near Port Isabel. The TPWD reports that 17,532 acres of public reefs in Texas bays and 2,356 acres of bay bottom (all in the Galveston Bay system) are leased for oyster production (Quast et al., 1988). Approximately 93 percent of the public reefs are found in the Galveston, Matagorda, and San Antonio Bay systems.

A significant portion (15%) of the total oyster reef acreage in Texas estuaries is classified as polluted due to chronic contamination by bacteria associated with human wastes (Quast et al., 1988). Shellfish harvest classification in Texas in 1985 showed that 727,941 acres were approved, 570,045 acres were conditionally approved, and 328,500 acres were closed to harvest (Duke and Kruczynski, 1992). Sixty percent of Galveston Bay's total of 331,000 acres of oyster reef available for shellfish production was closed in 1990. In addition to fecal wastes, heavy metals, petroleum hydrocarbons, pesticides, chlorine derivatives, sewage, turbidity from dredging, and freshwater runoff can also negatively affect oysters.

USES TO BE MANAGED

Land and water uses and activities having a direct and significant impact on critical areas will be managed through the CAP. The core management techniques include a combination of existing legal authorities and consistency review of all uses or activities occurring within the CMP boundary and subject to the CMP. The following uses and activities are being considered for management through the CAP:

- Dredging and filling
- Construction in navigable waters
- Wastewater discharges
- Stormwater discharges
- Water diversions and withdrawals
- Solid waste disposal
- Hazardous waste disposal
- Marina operation and construction
- Reclamation and remediation
- Flood control
- Sediment control
- Future port development
- Shoreline construction, including docks, piers, wharves, boatramps, bulkheads, seawalls, jetties, groins, breakwaters, pilings, and cabins
- Pesticide and herbicide applications
- Aquaculture

Authorities Network

Using the core management concepts of the CAP, Section 401 water-quality certification will manage the following uses:

- Dredging and filling
- Construction in navigable waters
- Wastewater discharges
- Stormwater discharges
- Marina operation and construction
- Flood control
- Future port development
- Shoreline construction
- Aquaculture

State authorities under rules of the Texas Water Commission (TWC) and other agencies will be used to manage the following uses:

- Water diversions and withdrawals
- Solid waste disposal
- Hazardous waste disposal
- Sediment control
- Pesticide and herbicide applications

Uses and activities on state-owned public lands will be managed through the easement, permitting, and leasing authority of the General Land Office (GLO). These include channel dredging, pipelines and transmission lines, shoreline construction, marina siting and operation, and offshore development.

CAP MANAGEMENT TECHNIQUES

401 Water Quality Certification

Private wetlands in Texas are managed primarily through federal regulation and permitting. State-owned wetlands are managed through the General Land Office's permitting authority.

Dredging and filling of wetlands are regulated by the U.S. Army Corps of Engineers. Waste discharges into the surface waters of the state, including wetlands, are regulated by the Environmental Protection Agency (EPA) and the Texas Water Commission (TWC).

The state regulatory mechanism for protection of wetlands is the state water quality certification process under Section 401 of the Clean Water Act (CWA, officially titled the Federal Water Pollution Control Act). The core concept for protecting coastal wetlands within the Texas Coastal Area is the use of this existing regulatory process.

The 401 water quality certification process essentially allows the TWC to determine whether federal permits for discharges into the surface waters of the state will be granted, denied, or conditionally granted. The basis of this regulatory action is the Texas Surface Water Quality Standards, Title 31, Chapter 307 of the Texas Administrative Code (copy attached).

The GLO and the TWC agree that the current 401 process does not adequately address wetland degradation from federally permitted discharges. The two agencies are coordinating policy development to enhance the 401 process and water quality standards so that wetlands are better protected.

Adoption of modifications and revisions to the current 401 process will strengthen the state's role in wetland management and protection, as well as satisfy requirements of the federal Coastal Zone Management Act (§923.3[b][i]). These requirements address the need for "specific policies that provide the framework" for the Texas Coastal Management Program element for wetlands management.

The Clean Water Act

Any legal discharge into the waters of the United States is permitted under the Clean Water Act. If the discharge originates in the state of Texas, Section 401 of the CWA authorizes Texas to waive, grant, or deny state certification. State certification ensures that federally permitted activities do not violate the Texas Surface Water Quality Standards. If the 401 state certification is denied, any associated federal permit or license must also be denied.

Federal permits are required for discharges of pollutants into surface waters and for dredging and filling of wetlands. Federal permits and licenses issued for activities that may result in discharges into state waters and thus be subject to 401 certification are: NPDES (National Pollution Discharge Elimination System) permits for point-source discharges under Section 402 of the CWA; discharges of dredged material under Section 404 of the CWA; permits for activities in navigable waters which may affect navigation under Sections 9 and 10 of the Rivers and Harbors Act; and licenses required for hydroelectric projects, issued under the Federal Power Act. The EPA issues permits for NPDES permits for discharges into surface waters of the United States. The COE issues permits for dredging and filling of wetlands (CWA §404).

Pollution discharges into surface waters of the United States must comply with the requirements of the CWA. CWA requirements address effluent limitations (CWA §301), water-quality-related effluent limitations (CWA §302), water quality standards and implementation plans (CWA §303), national standards of performance (CWA §306), and toxic and pretreatment effluent standards (CWA §307).

State Water Quality Certification

Although Texas does not have a wetland permitting program, 401 certification can indirectly regulate projects in or affecting wetlands. Because wetlands are now considered "waters of the state," the Texas Surface Water Quality Standards can be applied to wetlands. However, the 401 certification process currently has no specific guidelines for the protection of wetland water quality.

State water quality certifications are based on the Texas Surface Water Quality Standards (31 TAC §§307.2-307.10) and the requirements of the CWA (§§301, 302, 303, 306, and 307). The certification may deny, or place conditions on, federal permits for dredging and filling of wetlands, point-source pollution discharges, and hydropower licenses.

Certification is specifically required for all NPDES permit applications and COE Nationwide and General permits. However, 31 TAC 279.12(c) certifies by rule those activities that do not exceed 1,000 cubic yards of dredged or fill material, except when the discharge is into a water quality limited segment or into an area where pollutants have been deposited or accumulated.

The Texas Railroad Commission (RRC) and the TWC have 401 certification authority. The RRC can provide 401 certification for activities associated with exploration, development, and production of oil, gas, and geothermal resources (Chapter 91 of the Texas Natural Resources Code).

In issuing 401 certifications for permits issued by the COE under Section 404 of the CWA and Sections 9 and 10 of the Rivers and Harbors Act and for NPDES permits issued by the EPA, the TWC follows the policy guidelines set forth in Chapter 26 of the Texas Water Code. Certification decisions are made after the TWC reviews the project activity and considers comments from other reviewing agencies.

In reviewing an application for 401 certification, the TWC determines if the proposed activity will comply with the guidelines in the Texas Administrative Code (31 TAC §279.9). These guidelines determine if an activity will (1) result in any discharge; (2) result in a violation of Sections 301, 302, 303, 306, or 307 of the CWA; (3) result in a violation of the Texas Surface Water Quality Standards; or (4) result in a violation of any other relevant requirements of state law as provided by the CWA.

The TWC waives 401 certification if the proposed activity produces no discharge or is outside TWC jurisdiction. The TWC grants 401 certification when there is "reasonable assurance" that the activity will not violate the TWC standards (31 TAC §279.9). Conditional 401 certification can be issued to ensure that no violation occurs. Certification is denied if a proposed activity may cause an unacceptable discharge and would be in violation of the standards enumerated in Section 279.9.

The public is allowed to participate in the decision process by means of comments sent to the TWC and/or presented at public hearings. No more than three public hearings concerning a certification application have ever been requested.

Notification of the TWC decision is sent to the applicant and, depending on the type of permit reviewed, to either the EPA or the COE. Written notification is also sent to anyone who requests it.

The TWC notification of determination for NPDES permits is not required to contain a statement of the basis for the decision. The TWC notification of determination for COE and other federal permits must contain a statement explaining the basis for the decision.

Future Water Quality Certification

The GLO, TWC, and RRC are working together to strengthen the current Section 401 state water quality certification process.

The changes deemed necessary by these agencies include revisions to the state's surface water quality standards and changes in the water quality certification rules. The goal of this cooperative effort is to integrate policy development and coordinate agency

actions to increase wetland protection, preservation, and enhancement.

The TWC staff has suggested revisions to the water quality standards and the 401 certification rules. These rule revisions can be accomplished by the rule changing authority of the TWC. The EPA requires revisions to the water quality standards every three years. The water quality standard revisions are proposed by the staff of the TWC and reviewed for public comment. The EPA has final approval authority over any revisions. The revisions of the water quality standards can be accomplished in 1993 with EPA approval.

The TWC staff proposes to submit revisions of the water quality standards that will specifically address wetland water quality. The preliminary staff evaluation has indicated that the following additions should be considered for public review in the 1993 revisions of the Texas Surface Water Quality Standards.

1. The following standards provisions will be explicitly applied to wetlands:

a. The narrative criteria for aesthetic, radiological, toxic, nutrient, and salinity parameters (31 TAC §§307.4[b], [c], [d], and [g]).

b. Numerical limitations on thermal elevations above ambient (31 TAC §307.4[f]).

c. Numerical limitations on fecal coliform bacteria to levels which are appropriate for contact recreation (31 TAC §307.4[i]).

d. A requirement to conduct a site-specific assessment of uses and standards, in response to administrative or regulatory actions by the TWC which affect a particular wetlands area that is not already assigned site-specific standards (31 TAC §307.4[k]).

e. The primary level of antidegradation protection, which states that existing water-quality related uses of a waterbody will be maintained (31 TAC §307.5[b][1]).

f. The numerical criteria for toxic substances to protect aquatic life and human health. At a minimum, the acute toxic criteria to protect aquatic life will be applicable to all wetlands (31 TAC §307.6).

2. Other additions to the general criteria targeting wetlands will be considered, such as narrative prohibitions on significant changes in sediment loads, and flow characteristics that would impair water-quality-related uses of wetlands.

3. Additional water-quality-related use categories appropriate for wetlands will be considered.

4. The feasibility of applying additional minimum presumed uses and numerical criteria to broad categories of wetlands will be evaluated. Of particular importance is determining what types of wetlands should automatically be considered to have aquatic life uses that need the protection of chronic aquatic life toxic criteria and/or human health toxic criteria to protect for human consumption of fish.

5. Another consideration is to determine if some types of wetlands should be automatically presumed to be high quality waters which "exceed fishable or swimmable quality." This presumption can be important, since it invokes additional antidegradation protection under Section 307.5(b)(2). In essence, this part of the antidegradation policy states that even if all numerical criteria are attained, high-quality waters which exceed fishable or swimmable quality may not be degraded by a significant lowering of water quality unless the action causing this degradation is shown to be economically and socially justified. Under the present implementation procedures, this part of the antidegradation policy is applied to waters which are assigned an aquatic life-use category of "high" or "exceptional."

The TWC staff has proposed the following changes in the rules governing water quality certification procedures:

1. Require the applicant to publish notice statewide and locally in addition to the current joint notification distributed by the COE.

2. Identify a list of criteria for evaluating all permit actions.

3. Modify the current Nationwide and General permits as follows:

a. Require public notice under the same guidelines as individual permits.

b. Condition all nationwide certificates to require any 404 activity within designated areas (e.g., the CMP or CAP boundary) to acquire an individual certification.

(1) Identify specific Nationwide permit types that would require individual permits.

(2) Identify specific wetland types of critical concern needing special consideration and require individual permits for these types of wetlands. The classification of the wetland would have to be included in the expanded application discussed above.

Authority of the Texas General Land Office and School Land Board

The Texas General Land Office (GLO) and School Land Board manage surface and mineral resources of state-owned lands that have been dedicated to the state's public school fund. This includes approximately 860,000 acres of uplands and 4 million acres of submerged land in rivers, bays and the Gulf of Mexico.

The three-member School Land Board, which is chaired by the Commissioner of the GLO, issues grants of interest on state-owned upland property for various purposes including oil and gas production, hard mineral production, hunting, timber harvest, and grazing. Permits are also issued for activities on submerged lands, including exploration and development of hydrocarbon reserves, dredging of channels, and construction of various structures such as piers, docks, wharves and marinas. The GLO, under the authority of the land commissioner, grants easements for roads, transmission lines, and pipeline rights-of-way on state lands. The GLO also has statutory authority to grant leases for public recreation, preserves and refuges, and scientific research activities on state-owned lands.

The application process for each type of permit involves an environmental review and a determination of the best use of state resources based on current rules (31 TAC Chapters 1, 4, 9, 10, 13, 15, 151, 153, and 155). This review process is coordinated with other state and federal regulatory agencies. It includes the development of contractual conditions to protect natural resources on state lands or to provide for mitigation of unavoidable environmental damage. Policy changes are being considered that are consistent with the CMP, will strengthen the review process, and will provide direct protection to wetlands on state-owned land.

The GLO was designated in the Texas Oil Spill Prevention and Response Act of 1991 as lead agency for protecting environmentally sensitive coastal areas from spills of oil and other hazardous materials. The GLO has also been designated by Governor Richards as one of the three state trustee agencies in Natural Resource Damage Assessment (NRDA) for oil spill and superfund sites that affect our trust resources.

Consistency Review

Federal

Under Section 307 of the CZMA, the following activities, projects, and plans within or outside a state's coastal boundary must receive a state consistency determination if they affect any land or water use or natural resource within the coastal boundary:

- federal agency activities
- federal development projects
- federally licensed or permitted activities
- any plans for the exploration or development of, or production from, any area which has been leased under the Outer Continental Shelf Lands Act

The Coastal Coordination Council will develop and implement procedures for consistency determinations for federal activities, projects, or plans as required by the CZMA.

State

Texas is developing a state consistency review process that meets the requirements of the CZMA and the state Coastal Coordination Act. The state consistency review process requires every state agency and subdivision permitting, authorizing, or undertaking activities subject to the CMP to comply with the program.

Details of this process are presented in the report, "State Consistency Review Process."

Mitigation Policies for Critical Areas

The preliminary critical area policies presented here are based on 404(b)(1) guidelines. They are applicable to all actions subject to consistency review in critical areas within the jurisdictional boundaries of the CAP.

General Policies

1. No adverse impacts to critical areas will be authorized if a practicable alternative exists.
2. Significant degradation of coastal waters is to be avoided.
3. If adverse impacts to critical areas are unavoidable, the project will be designed so that those impacts are reduced to the absolute minimum required to accomplish the project's basic purpose.
4. If adverse impacts to critical areas occur, mitigation of those impacts in an approved manner and at approved mitigation sites will be required.
5. Cumulative impacts of a project with respect to previous, existing, and proposed future activities will be given full consideration during the permitting, review, and authorization process.

Preliminary Mitigation Review Policies

Review Policy 1 - No activity or use that results in adverse impacts to critical areas will be allowed if a practicable alternative exists. If a proposed project location is in a critical area and the project is "nonwater-dependent," it is presumed that there are practicable alternative sites that will produce a less adverse environmental impact.

No adverse impacts to critical areas will be allowed under the CAP if a practicable alternative that is less environmentally damaging exists. Under this policy, a practicable alternative is presumed to exist when adverse impacts to critical areas are proposed, and that practicable alternative is further presumed to be environmentally less damaging than destroying the critical areas. An applicant proposing to impact critical areas must clearly demonstrate that a practicable alternative does not exist and/or that practicable alternatives that do exist are more environmentally damaging than the proposed impacts on the critical area. Cost alone is not a determinative factor in judging the existence of a practicable alternative, but it may be considered, along with other factors, in determining that a practicable alternative does not exist.

If an applicant wishes to show that alternatives may involve greater environmental impact than the destruction of the critical area, then an ecological argument must be prepared and documented to support this showing. The mere fact that an applicant has designed a project in a particular manner will not support a showing of no practicable alternative on the basis of "purpose of the proposed project."

Water dependency may be used to support a finding that no practicable alternative exists by arguing the logistics of water dependency under the definition of practicable alternative. However, the mere fact of water dependency will not justify a proposed action at any site selected by the applicant if a less damaging alternative site exists.

The above-listed requirements are virtually the same as found in 40 CFR 230.1 to 230.8, the 404(b)(1) EPA guidelines that are applicable to COE permits. Generally, this policy tracks the 404(b)(1) guidelines, and in most cases compliance with the COE requirements will suffice for CMP compliance.

Activities that do not require the discharge of dredge or fill material will be evaluated under these policies if they occur within the coastal area and are subject to either state approval and/or COE permitting and/or local permitting. These policies are equally applicable to review of Section 404 permits, Section 10 permits, state land decision-making, and any other permit issued within the CMP boundaries. The goal of these requirements

is to protect, enhance, or restore the critical areas of the coast.

Review Policy 2 - Activities or actions that may result in significant degradation of coastal waters should be avoided.

The protection of the quality of coastal waters is extremely important under the CAP. In certain situations, there may be no practicable alternative to a proposed action that would have adverse impacts on a critical area. Yet the proposed action may cause or contribute to significant degradation of coastal waters. Activities within the Texas CAP boundary that cause or contribute to the significant degradation of coastal waters through the loss or destruction of critical areas should be avoided.

Significant degradation of coastal waters may occur in several ways. Adverse impacts may occur to plankton, benthos, fish, shellfish, wildlife, critical resources, life stages of aquatic life and other wildlife (including the spread of impacts through chemical, physical, or biological processes), and to the diversity, productivity, and stability of the aquatic ecosystem. Such effects may include, but are not limited to, loss of fish and wildlife habitat or loss of the capacity of a wetland to assimilate nutrients, purify water, or reduce wave energy. The recreational, aesthetic, and economic value of coastal waters may also be significantly degraded.

Review Policy 3 - If adverse impacts to critical areas are allowed, then the extent of the impacts will be kept to an absolute minimum.

Under Policy 1, a practicable alternative may not exist; for example, a water-dependent use may require location in a critical area. In such a situation, the destruction or degradation will be minimized to the extent necessary to achieve the project purpose. Further, the action will be evaluated to determine not only direct, but cumulative and associated impacts, and it will be designed to minimize any cumulative or associated impacts to critical areas.

Review Policy 4 - If adverse impacts on critical areas cannot be avoided and have been minimized, then the project will include a compensatory mitigation plan for the affected habitat.

Compensatory mitigation will be required for all adverse impacts on wetlands, submerged aquatic vegetation, or oyster reefs under the CAP. Mitigation conditions will be included in a permit, easement, or lease contract as a requirement for project approval. As a general rule, a compensation ratio of not less than 3:1 will be required for long-term or permanent impacts. For short-term or temporary impacts, mitigation will include

restoration of the impacted habitat and replacement at a 1:1 ratio. Unavoidable impacts will be mitigated by replacement of degraded habitat according to the following preferred sequence: (1) on-site and in-kind; (2) off-site and in-kind; (3) on-site and out-of-kind; and (4) off-site and out-of-kind.

Review Policy 5 - The effects upon critical areas of past, present, and reasonably foreseeable future projects will be assessed.

Every project must be considered on its own merits, and its impacts on critical areas must be assessed in light of historical permitting activity, along with anticipated future activities in the area. Although a particular project may constitute a minor impact in itself, the cumulative effect of a large number of such projects could be significant impairment of water resources and interference with the productivity and water quality of existing aquatic ecosystems.

CONCLUSION

The CAP will protect coastal wetlands, submerged aquatic vegetation, tidal flats, and oyster reefs on the Texas coast through the networking of existing state, federal, and local management authorities. The primary mechanisms that will be relied upon to manage human activities in critical areas are state water quality certification under Section 401 of the CWA, the rules and policies of the General Land Office and School Land Board, and the federal and state consistency review process of the CMP.

The 401 water quality certification process is a powerful mechanism by which Texas can exert control over projects in or affecting wetlands. The process offers several advantages in protecting state waters: it is an existing program; it increases federal and state cooperation; it can integrate the many state programs concerning wetlands management; and it gives the state broad authority to review proposed activities in or affecting state waters (including wetlands).

The policy and procedural changes being developed by the GLO, TWC, and RRC will improve protection of wetland water quality. Changes in the rules for the 401 certification process--narrative criteria for wetlands, designated uses for all wetlands, and application of the state's antidegradation policy to wetlands--will increase the predictability of and enforceable basis for regulatory decisions.

Procedural changes will require applicants and decision makers to consider alternative project sites or methods, cumulative impacts, impacts upon wetlands, and other factors related to the hydrology and biology of wetlands.

General Land Office and School Land Board rules and policies governing activities on submerged lands will be amended to strengthen the environmental assessment process and to provide direct protection to critical areas. The CMP consistency review process will ensure that all agencies authorizing or undertaking activities subject to the CMP comply with the goals and policies of the program. These will include mitigation policies for critical areas.

As the CMP develops, new critical area protection and management programs will be incorporated. As the first step in this direction, the full use of existing regulatory authorities will be pursued.

DEFINITIONS

- o Wetlands - Areas that are inundated or saturated by surface or groundwater at a frequency and duration sufficient to support, and that under normal circumstances do support, a prevalence of vegetation typically adapted for life in saturated soil conditions. Wetlands generally include swamps, marshes, bogs, and similar areas. This definition is consistent with the current definitions of both the Corps of Engineers (COE) and the Environmental Protection Agency (EPA), and it will remain consistent with any future COE/EPA wetland definition. The field interpretation of this definition will be based upon the 1987 COE Wetlands Delineation Manual or its replacement.
- o Practicable - Available and capable of being done after taking into consideration cost, existing technology, and logistics in light of overall project purposes.
- o Significant degradation - (a) Significantly adverse effects of the discharge of pollutants on human health or welfare, including but not limited to effects on municipal water supplies, plankton, fish, shellfish, wildlife, and critical resources; (b) significantly adverse effects of the discharge of pollutants on life stages of aquatic life and other wildlife dependent on aquatic ecosystems and spread of pollutants or their byproducts outside of the disposal site through biological, physical, and chemical processes; (c) significantly adverse effects of the discharge of pollutants on aquatic ecosystem diversity, productivity, and stability, including, but not limited to, loss of fish and wildlife habitat or loss of the capacity of a wetland to assimilate nutrients, purify water, or reduce wave energy; or (d) significantly adverse effects of the discharge of pollutants on recreational, aesthetic, and economic values.
- o Water-dependent use - A use or activity that must be located in close proximity to waters within the coastal boundary in order to serve its purpose and function. Activities or uses presumed to be water-dependent include fishing, swimming, boating, wildlife viewing, marinas, boat docks, loading areas, fish processing plants, boat repair and boat construction facilities, beacons, lighthouses, mariculture, certain meteorological and oceanographic activities, and support facilities which are necessary for the successful functioning of permitted water-dependent uses, such as parking lots and short-term storage facilities.

- o Mitigation - The National Environmental Policy Act regulations define mitigation as: (1) avoiding adverse impacts altogether by not taking a certain action or parts of an action; (2) minimizing impacts by limiting the degree or magnitude of the action and its implementation; (3) rectifying the impact by repairing, rehabilitating, or restoring the affected environment; (4) reducing or eliminating the impact over time by preservation and maintenance operations during the life of the action; and (5) compensating for the impact by replacing or providing substitute resources or environments.

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Special Award Condition #3
Draft Report

STATE CONSISTENCY REVIEW PROCESS

INTRODUCTION

The keystone of the Coastal Management Program (CMP) is the state consistency review process being developed by an interagency working group established by the Executive Committee (EC) of the Coastal Coordination Council (Council). The authority for managing the use of coastal natural resources is vested in a large number of state agencies and subdivisions. The state consistency review process must respect each agency's and subdivision's jurisdiction.

Because the permitting and authorization processes of state agencies and subdivisions have different permit turnaround deadlines that are often legally required, the state consistency review process cannot add such a burdensome layer of review that an agency or subdivision will be unable to meet its legal mandates. The state has a responsibility to the regulated community to make predictable and fair decisions. The state consistency review process must be as streamlined, straightforward, and reasonable as possible.

Finally, Texas is facing budgetary constraints which preclude the hiring of large numbers of new staff to conduct consistency reviews. The state consistency review must be incorporated to the greatest extent possible into existing permitting and authorization processes.

SCOPE

Geographic Scope of Review

Uses or activities occurring within the coastal boundary and subject to the CMP will be reviewed for consistency. Presently, the Council has designated the first tier of coastal counties as the CMP planning area and adjacent counties as the CMP study area. Please refer to the "Coastal Management Program Planning Area" report for a description of the planning and study areas.

Scope of Reviewable Actions

The wetlands and consistency review working groups are developing a draft list of uses subject to the Coastal Management Program. Please refer to the report, "Uses Subject to Management," for a draft list of uses being considered for management under the CMP and the sources being used to determine the state's definition of "direct and significant impacts."

GENERAL

Coastal Management Program Goals and Policies

As set out in the Coastal Coordination Act, Subchapter F of Chapter 33, Texas Natural Resources Code, the Coastal Coordination Council is the state agency that can ensure compliance with the CMP. The goals and policies adopted by the CMP will serve as the administrative directives that bind state agencies and subdivisions to conformance with the CMP as required in Section 923.43(c)(2) of the Coastal Zone Management Program Development and Approval Regulations (CZMP regulations).

Consistency Review Process Control Techniques

The state consistency review process will use control technique B, direct state land and water use planning and regulation, and control technique C, state review on a case-by-case basis of actions affecting land and water uses subject to the management program. The review process will rely on existing authorities (the networking option under technique B) to ensure consistency with goals and policies identified in the CMP pursuant to Section 923.3 of the CZMP regulations. See the diagram for a general overview of the state consistency review process.

Staffing

Coastal management funds will be used to hire a CMP coordinator for each Council member agency (TWC, TPWD, RRC, AGO, and GLO). The coordinators will be the employees of the individual agencies. The coordinators will be responsible for submitting information and recommendations on CMP-related issues to their respective agencies' EC members, informing agency permit processors about any new CMP-related rules and training them on conducting consistency reviews, and conducting staff level consistency reviews for actions meeting the interagency review criteria as a member of the consistency review group.

The CMP coordinators for the five Council member agencies and designated CMP staff will serve on the consistency review group. The consistency review group will meet regularly, and at a minimum, monthly, to exchange information and conduct reviews.

THE STATE CONSISTENCY REVIEW PROCESS

State agencies and subdivisions will conduct consistency reviews as part of their permitting, certification, or other authorization process. The Council will ensure each agency's and subdivision's compliance by requiring an interagency consistency

review of new and amended rules and regulations and of actions meeting the criteria for case-by-case review. The Council will review any other actions or authorizations meeting Council referral requirements. The Council will also require notification and annual reports from the relevant state agencies and subdivisions.

The Network Control Technique

State Agency and Subdivision Reviews

Each relevant state agency and subdivision will study its existing or any proposed rules, regulations, and authorization processes that apply to the uses subject to the CMP and determine whether they are consistent with the CMP. The report of findings will be prepared by the CMP coordinator with the aid and input of staff experts. State agencies and subdivisions without a CMP-funded coordinator will receive technical assistance from CMP staff.

A schedule for these reviews will be established and adopted by the Council in 1993. CMP staff will work with the relevant agencies and subdivisions to establish a reasonable review schedule.

CMP Compliance Schedule

A schedule will be established for state agencies and subdivisions to bring their relevant rules, regulations, and authorization processes into compliance with the CMP. This schedule will go into effect after the state agency and subdivision reviews are complete. CMP staff will work with the relevant agencies and subdivisions to establish a reasonable compliance schedule.

State Agency and Subdivision Rule Making

Rule making will be subject to case-by-case review by the interagency review group. The review group will review and comment on proposed rules prior to their publication in the Texas Register, during the formal public comment period, and immediately preceding final agency action. The latter review will be conducted on any changes to the proposed rules resulting from public comments received.

If a rule making agency's draft rules are inconsistent with the CMP enforceable policies, the procedures for case-by-case review will be followed, with the EC and possibly the Council reviewing the proposed rules. Emergency rules will also be subject to the consistency review process.

The burden falls on the review group to conduct the review in a timely manner.

Interagency Notification

Relevant state agencies and subdivisions will be required to notify the Council member agencies of permit applications subject to the management program upon receipt of the application. The level of detail contained in the notice will depend on the type of consistency review to which the application is subject. For example, for projects or actions outside coastal critical areas, the notification may consist of the permit application's cover sheet, which may include the applicant's name, address, and phone number, a brief description of the project or action, and its location (latitude and longitude). Each state agency and subdivision will also be required to send notice of final action to CMP staff.

The burden to raise the issue of a project's or action's noncompliance with the CMP will fall to the Council member agencies.

Annual Report

Each state agency or subdivision will be required to submit an annual report to the Council. The report will include a description of programmatic issues, permit statistics (including the number referred for case-by-case review), information on any hearings called on consistency questions, a description of how the agency's consistency comments were received by other state agencies and subdivisions, a description of decisions disputed on consistency grounds and the level at which the issues were resolved, descriptions of any problems with the consistency review process, and recommendations for changes in the process.

The annual report will be used by the Council to monitor the effectiveness of the consistency review process and the CMP in general. State agencies or subdivisions exhibiting problems with consistency reviews will receive technical assistance from CMP staff.

The Case-by-Case Review Control Technique

The state will identify the types of actions and projects that will be subject to interagency review on a case-by-case basis by following strict criteria delineated during program development. Criteria such as proximity to or location in environmentally sensitive areas, size or complexity of project, level of impact, and type of operation will be used.

Interagency Review Procedure

1. Actions subject to the CMP will be identified for interagency review by the state agency or subdivision with primary review authority based on the criteria established during program development. The designation for interagency review will be made early enough in the processing period to allow for adequate review by the interagency review group.
2. The state agency or subdivision will forward to the review group copies of all pertinent information (e.g., permit application, maps). The review group will work closely with the state agency or subdivision staff to determine if the proposed action or project is consistent with the CMP. If a proposed action or project is inconsistent with the CMP, the review group will submit written comments to the agency or subdivision identifying how the action or project is inconsistent and recommending changes that will bring the action or project into compliance.
3. If the review group identifies an inconsistent action or project and cannot resolve the issue with the agency's staff prior to final action, the matter will be referred to the EC.
4. The EC will review the proposed action or project for consistency with the CMP. If the EC cannot resolve the matter prior to final action, the EC members will inform their respective Council members.
5. CMP staff must notify the relevant state agency or subdivision within five working days if an action or project is referred to the EC. CMP staff must notify the relevant state agency or subdivision within five working days if an action or project is referred to the Council.
6. A communications and notification process will be established that will allow Council members to refer a matter to the Council without meeting. Through this notification process, the chairman of the Council or three other Council members can refer a final action for review by the Council. The Council has 30 days from the day the action is final to refer the action for Council review.
7. An action referred to the Council will be stayed in accordance with Council policies and rules until the Council affirms or protests the action's consistency with the CMP. If the Council affirms the action's consistency, the stay is lifted. If the Council protests the action, the action is remanded to the state agency or subdivision.

8. The state agency or subdivision must bring its final action into compliance with the CMP before the stay can be lifted. If the state agency or subdivision does not or will not bring its final action into compliance, it must notify the Council of this decision within 10 working days of the day the action was final.

9. If, upon remand, a state agency or subdivision does not bring its action into compliance with the CMP, the Council will ask the Attorney General's Office to file suit to enforce the Council's inconsistency determination.

LEGAL ANALYSIS OF THE COUNCIL'S AUTHORITIES

Authority of the Council to Compel a State Agency or Subdivision to Be Consistent with the CMP

Section 33.208 of the Texas Natural Resources Code provides the Council's ultimate authority to ensure that agency and subdivision actions are consistent with the CMP:

The attorney general, at the request of the Council, shall file in a district court of Travis County or in the county in which the violation occurs a suit to enforce this subchapter.

Section 33.205(a) of the Act establishes the obligation of agencies and subdivisions to act in accordance with the CMP. Section 33.205(a) reads in pertinent part:

All actions taken or authorized by state agencies and subdivision that may adversely affect coastal natural resource areas . . . must comply with the goals and policies of the coastal management plan.

Authority of the Council to Disapprove Activities Inconsistent with the CMP

The legal process by which the Coastal Coordination Council reviews and disapproves agency actions is established in Sections 33.205 and 33.206 of the Coastal Coordination Act, Subchapter F, Texas Natural Resources Code.

Section 33.205(b) authorizes either the Chairman of the Council or any three regular members of the Council to submit a state agency or subdivision action to the Council for review. Section 33.025(c) provides that actions must be submitted to the Council for review within 30 days of the date the action becomes final,

and the Council must take action on the matter within 90 days following submittal. Section 33.206(d) authorizes only the Council Chairman to submit federal actions for review.

If the Council reviews and protests an action, Section 33.206(b) requires the Council to remand the action to the agency or subdivision with findings describing how the action is inconsistent with the CMP. The Council at its discretion may elect to include recommendations. Section 33.206(b) further requires that on remand

. . . the state agency or subdivision shall modify or amend the action to make it consistent with the goals and policies of the coastal management plan.

If the Council has made recommendations on remand and the agency or subdivision decides not to amend its action in conformance with the Council's recommendations, then the agency or subdivision must notify the Council of that decision. Section 33.206(c) provides that agency or subdivision actions taken upon remand are subject to the same review procedures as actions taken prior to remand.

Section 33.206(d) provides with respect to federal actions:

If, after review, the council finds a federal action does not comply with goals and policies of the coastal management plan, the council may refer the matter to any federal official authorized to review or act on the matter and may pursue resolution of the matter with the federal official.

Authority of the Council to Seek Judicial Review

As discussed above, Section 33.208 gives the Council the necessary authority to seek judicial enforcement of its determinations in the event that an agency permits or authorize an action inconsistent with the goals and policies of the CMP.

Section 33.207, however, is a more general provision authorizing any person aggrieved by a final action of the Council to seek judicial review under the Administrative Procedure and Texas Register Act (Article 6252-13a, Vernon's Texas Civil Statutes).

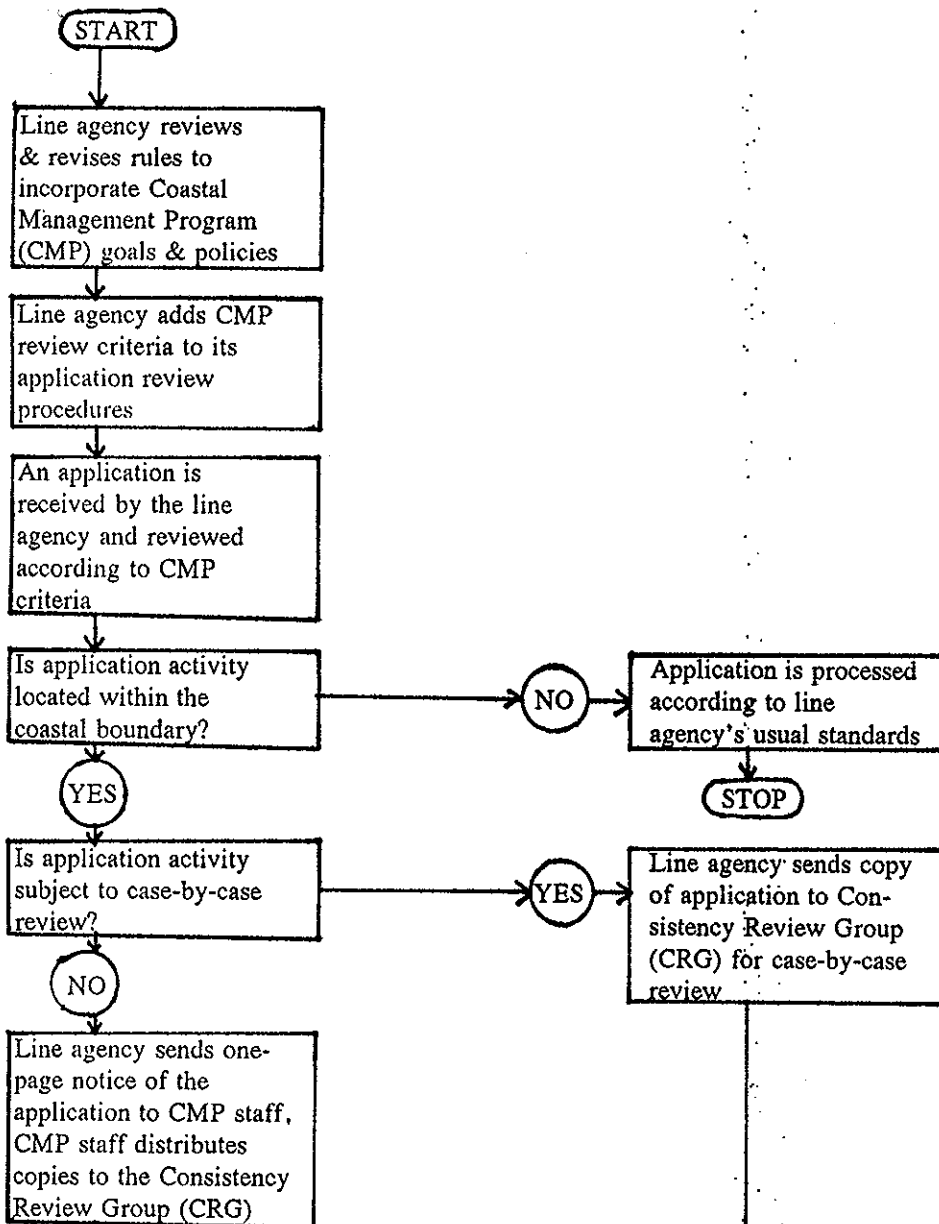
CUMULATIVE AND SECONDARY IMPACTS

To date, no work has been done to develop an individual mechanism to identify and address cumulative and secondary impacts. However, this may be addressed through the state's work on the definition of "direct and significant impacts." Work on this issue will continue through 1993.

NEXT STEPS.

The state consistency review process will continue to take shape throughout the next year. Upon approval of the conceptual review process outlined above by the EC, the interagency working group will continue to refine the process, set schedules, and develop review criteria.

State Consistency Review Process
Draft Flow Chart



Special Award Condition #4
Draft Report

COASTAL MANAGEMENT PROGRAM ORGANIZATION AND STRUCTURE

INTRODUCTION

The goal of the Texas Coastal Management Program (CMP) is to ensure the continued natural productivity and economic health of the Texas coastal region by promoting the wise use of coastal resources. Essential to achievement of this goal is coordinated, efficient, responsive, and predictable governmental decision making on coastal issues. The authority to manage coastal resources in Texas is vested in a number of state and federal agencies and state subdivisions. Historically, this system of split authorities has had no formal mechanism to ensure a consistent, coordinated approach to coastal management. Overlapping or conflicting authorities and policies have hindered effective management of the Texas coast. The CMP and the Texas Coastal Coordination Act of 1991 are the mechanisms that will network existing authorities for more effective, coherent and consistent management of coastal resources.

In general, a networked coastal management program must clearly define the responsibilities of the various implementing agencies. The program must also provide linkages between the responsible agencies and a strong mandate for consistent implementation of coastal management authorities. It is important that a lead agency be designated to coordinate the networked organizations, guide the formulation of coastal policies, and monitor program implementation.

This report outlines the organizational framework for the CMP, the administrative responsibilities of the General Land Office (GLO) as the designated lead agency, and the mechanisms for ongoing coastal policy formulation. For a discussion of the mechanisms and responsibilities for monitoring and enforcing consistent implementation of the CMP at the state level, please refer to the draft report, "State Consistency Review Process."

CMP ORGANIZATIONAL FRAMEWORK

The core framework of the CMP will be existing regulatory and management programs linked by the requirements of the Texas Coastal Coordination Act, which mandates that agencies, subdivisions, and programs with jurisdiction in the coastal area coordinate their actions and ensure that their actions are consistent with the CMP. This statute established the Coastal Coordination Council (CCC) to adopt CMP goals and policies that will guide agencies' actions and to oversee and ensure the consistent implementation of those policies by federal, state, and local agencies. The draft report on the state consistency review process provides a legal analysis of the authorities and mandates under the Coastal Coordination Act.

The CCC is an independent policymaking body consisting of executive officials of the primary state coastal management agencies, the attorney general, and an elected local official and a citizen from the coast appointed by the governor. The commissioner of the GLO chairs the CCC, further institutionalizing the mandated coordination of the CMP.

The primary responsibilities of the CCC are to establish and coordinate the state's coastal policies and to provide administrative oversight to ensure compliance with the CMP. The CCC is also authorized to make studies of problems and issues affecting the management of coastal resources. These studies may be used in the review of the CMP and in policy formulation when warranted. The CMP annual reports prepared by the implementing agencies, as described in the state consistency review process, will also assist the CCC in monitoring the implementation and administration of the CMP.

The CCC established an Executive Committee by rule in August, 1992. The role of the committee is to coordinate implementation of CCC directives and to develop and review policies, issues, and coastal management matters of state concern. The Executive Committee members are appointed by and represent each CCC member. The committee meets monthly to provide a frequent public forum for discussion of issues related to the development and implementation of the CMP. It also provides for greater participation of implementing agencies not serving on the CCC by establishing interagency work groups to address specific coastal issues and to develop policy recommendations for consideration by the Executive Committee and the CCC.

The Executive Committee will play a strong role in monitoring agencies' actions and ensuring consistency with the CMP. As described in the draft, "State Consistency Review Process," the Executive Committee will review agencies' actions and address

conflicts that the interagency Consistency Review Team is unable to resolve. The committee will refer actions that it determines to be inconsistent with the CMP to the CCC for review and action.

The individual CCC member agencies will function as the principal implementing agencies of the CMP since they have the primary coastal regulatory and management authority. These agencies are the GLO, the Texas Water Commission, the Railroad Commission of Texas, the Texas Parks and Wildlife Department, and the Office of the Attorney General. The gubernatorial appointees play a key role in ensuring that the CMP addresses the concerns of coastal citizens and local governments and in providing their constituents' perspectives during consistency reviews.

Since all state and local agency actions will be required to comply with the CMP, it is important that these entities be linked for the effective implementation of the CMP. One mechanism to ensure this linkage is a task force composed of representatives of all implementing state agencies, including agencies not represented on the CCC. This State Task Force will serve as an advisory body to the GLO coastal management staff and to the Executive Committee and CCC. The State Task Force will address coastal issues, evaluate program policies and implementation, and make formal recommendations to the Executive Committee and the CCC. The GLO coastal management staff will coordinate the State Task Force.

The implementing state agencies will also be required to review and amend their rules and regulations to comply with the CMP. They will be required to notify CCC agencies of actions subject to the CMP and undertake such actions in compliance with the CMP. For actions subject to case-by-case consistency review, the agency responsible for an action under review will participate in the review process as necessary. The implementing agencies will also be required to submit annual reports on their CMP implementation to the CCC. For further description of the responsibilities of implementing state agencies, see the draft report, "State Consistency Review Process."

Federal agencies play an important role in the CMP since many of the authorities for coastal management rest with federal agencies. These agencies will be subject to Coastal Zone Management Act (CZMA) federal consistency review requirements. To ensure effective coordination with these agencies, a Federal Task Force will be formed. This task force, like the State Task Force, will serve in an advisory capacity, evaluating the CMP and making recommendations to the GLO administrative staff, the Executive Committee, and the CCC.

State subdivisions are also subject to the Coastal Coordination Act and must comply with the CMP. It is important that there be a mechanism for all implementing subdivisions to have an active role in the administration and ongoing policy evaluation of the CMP.

However, the length of the Texas coastline, the number of subdivisions, and state and local financial constraints would make it impractical for all subdivisions to routinely participate in the State Task Force. One solution to this problem being considered is the formation of regional local government advisory committees (LGACs). These committees may be similar to the current councils of governments in membership. In order for each regional LGAC to have a strong role in the overall CMP, a representative from each would participate in the State Task Force, bringing policy and administrative recommendations forward for consideration. The GLO CMP administrative staff would assist in coordinating the LGACs.

Finally, it is essential that coastal citizens have a strong and active role in the CMP. The first avenue for participation and leadership is through membership on the CCC. Another formal mechanism being considered is the formation of regional citizens' advisory committees (CAC). Similar to the regional LGACs, the CACs would meet periodically to address coastal management issues of concern, evaluate the implementation of the CMP, and make recommendations to the Executive Committee. The GLO staff would assist in coordinating and staffing the CACs.

ADMINISTRATIVE RESPONSIBILITIES OF THE GENERAL LAND OFFICE

Section 33.052 of the Texas Natural Resources Code requires the GLO to serve as the lead agency to coordinate and develop the CMP in cooperation with other state agencies having responsibilities relating to coastal matters. When the enabling legislation was signed into law, Governor Ann Richards made a commitment to development of a state management program to be submitted for federal approval under the CZMA. She also designated the GLO as the state agency responsible for developing and implementing the CMP for federal approval and for administering grants under the CZMA.

The GLO is also statutorily required by the state Coastal Coordination Act to provide administrative support to the CCC in the formulation of coastal policies and the oversight of federal, state, and local actions to ensure their consistency with the CMP.

To meet these responsibilities, the GLO has established the Coastal Management Division (CMD) to serve as policy, technical, and administrative staff in the development and implementation of the CMP. The Environmental Law Division of the GLO's Legal Services Program assists the CMD and other GLO program areas with the development of policies and rules for effective implementation of the CMP. The GLO also formed an internal work group, consisting of upper management within the Executive, Resource and Asset Management, Energy, Legal, Oil Spill Prevention and Response, and Public Information program areas, to provide agencywide coordination and assistance in the development of the CMP.

The Coastal Management Division currently has 14 policy and technical staff members with expertise in coordinating intergovernmental management programs, grant and contract management, program administration, public participation, land use planning, information systems management, wetlands management, coastal physical processes, navigation management, living resources management, energy development, and water quality. It is projected that at least two more staff will be added: (1) a GLO CMP Consistency Review Coordinator and interagency Consistency Review Team member (see "State Consistency Review Process" report), and (2) a full-time grants administrator. The attached table outlines the primary responsibilities of the CMD in developing, implementing, monitoring, and administering the CMP.

COASTAL POLICY FORMULATION

The statute establishing the Coastal Coordination Council and the Coastal Management Program provides for continuing review of coastal issues and, when warranted, for amendment of the CMP to meet changing conditions and to incorporate new information. The Coastal Coordination Act states that it is the policy of the state to provide for more effective and efficient management of coastal resources by:

continually reviewing the principal coastal problems of state concern, coordinating the performance of agencies, subdivisions, and programs affecting coastal natural resource areas, and the coordinating measures required to resolve identified coastal problems.

In order for the state to effectively formulate and implement coastal policies, the CMP will provide various mechanisms to identify current and emerging coastal problems, to develop policies to address priority problems of state concern, and to incorporate new or amended policies into the CMP. The following is a discussion of mechanisms being considered for the CMP.

The GLO Coastal Management Division will play a primary role in identifying coastal problems and developing policies to address those of principal state concern. The duties of the CMD staff include administering the CMP, coordinating entities responsible for managing the program, communicating with OCRM and other states' coastal management programs, and providing staff support to the CCC and Executive Committee. These responsibilities enable CMD staff to identify emerging environmental, political, and administrative problems, as well as national priorities and regulations that may need to be addressed by the CMP. When problems are identified, the staff will evaluate them to determine how they should be addressed and, as needed, will draft policies for Executive Committee and CCC consideration.

The interagency Consistency Review Team will also provide a means for identifying coastal problems and developing policies. The Review Team will be responsible for initial review of actions subject to case-by-case consistency review (see State Consistency Review Process draft report) and for early efforts to resolve conflicts and inconsistencies with the CMP. This work will allow team members to identify potential gaps or problems in the implementation of the CMP as well as emerging environmental problems on the coast. The team will then be able to develop policies to address the issues and propose them to the Executive Committee for consideration.

The Executive Committee holds public meetings monthly to review issues to be addressed by and to develop policies for the CMP.

During program implementation, this body will also participate in the consistency review process to examine actions and address conflicts and inconsistencies with the CMP which could not be resolved by the staff Review Team. As with the Review Team, the Executive Committee will identify problems and formulate policies to propose to the CCC, as appropriate.

The Executive Committee meetings also provide opportunities for state agencies and subdivisions and the public to bring emerging issues before the committee for consideration. As needed, the Executive Committee may form work groups to develop policy recommendations for the Committee to consider and propose to the CCC.

Another opportunity for identification of coastal problems and development of policies is through the work of the various CMP advisory committees. These committees will be addressing coastal concerns and issues and possibly developing policies to propose to the Executive Committee for consideration.

For effective implementation and review of the CMP, clear procedural mechanisms must be established for the formulation of new or amended coastal policies. The CMD will be responsible for coordinating any requests for CMP evaluations or proposals for policy changes from Executive Committee members, the interagency Consistency Review Team, the CMP advisory committees, or formal work groups. These groups will send such proposals or requests to the CMD, which will then submit the proposals to the Executive Committee for consideration.

The Executive Committee will determine if further research or policy development should be undertaken on particular issues. If the committee determines that new or amended policies are warranted, it will formulate and propose such policies to the CCC for consideration.

The CCC will determine if any new or amended policies should be considered for incorporation into the CMP. All state agencies and subdivisions will be required to comply with new or amended policies adopted by the CCC for incorporation into the CMP and to revise their respective rules and regulations, as necessary. For further discussion and analysis of the process for CCC policy adoption and state consistency requirements, please see the CMP "State Consistency Review Process" draft report.

GLO COASTAL MANAGEMENT DIVISION

CMP RESPONSIBILITIES

- o Staff support for the Coastal Coordination Council
- o Staff support for the Executive Committee
- o Fiscal/grants administration
- o Coordination of CZMA Section 312 reviews
- o Assistance in consistency reviews of GLO actions. (CMP Coordinator; technical staff)
- o Participation in the interagency Consistency Review Team (CMP Coordinator)
- o Technical and policy assistance to state and local entities with responsibilities in implementing the CMP
- o Local program administration, including coordinating annual reporting responsibilities
- o Public participation coordination
- o Coordination and support for the State and Federal Task Forces
- o Coordination of state agency and subdivision CMP annual reports to the Coastal Coordination Council
- o Preparation of biennial reports to the Texas Legislature, as required by SB 1053

Special Award Condition #5
Status Report

RESOURCE DATA INVENTORY

INTRODUCTION

Development of a management plan for the Texas coastal area requires a thorough understanding of the interaction between natural resources and human activities in the region. This understanding can only be gained through the analysis of information which reveals the status and trends of these natural resources and human activities.

Compiling this information for the Texas coastal area presents an enormous task. Regulation, monitoring, and enforcement activities of Texas state government have been carried out by multiple agencies operating under separate but often overlapping mandates. The data necessary for an inventory of natural resources and the subsequent assessment of status and trends is scattered throughout the various levels of state and federal governmental agencies, environmental organizations, and academia.

The Texas General Land Office (GLO) has initiated a systematic inventory and collection of natural resources and human use data in preparation for future status and trends analyses. These analyses will, in part, determine the extent of regulation and management required in the Coastal Management Program (CMP) to protect wetlands and other areas of special concern.

DATA INVENTORY

The General Land Office began acquiring data sets applicable to development of a CMP during 1991. Due to manpower and budgetary limitations, this effort has primarily been restricted to the inventory of in-house data that can be digitized for future use and the acquisition of known digital data sets from cooperating state and federal sources.

As the effort continues, sufficient data will be accumulated for status and trends analyses, the results of which will assist decision makers as they evaluate the effectiveness of existing management techniques and implement new legislation, rules, and policies as needed for the protection of coastal natural resources.

The following list summarizes current GLO efforts related to developing a Natural Resources Inventory:

Internal GLO Data Management Changes

GIS Hardware/Software Upgrades

The GLO is in the process of expanding its GIS resources to facilitate acquisition and use of natural resources data. More than \$600,000 in new GIS hardware and software has been purchased and will be on-line by March 1993. Extensive staff training has been conducted and several inter/intraagency data links are being established that will play a crucial role in acquisition and exchange of information during development of the Natural Resources Inventory.

GLO Internal Coordination

Close coordination has been established between GLO's CMP staff and staff of the Oil Spill Response Program. This will avoid duplication of effort as data is collected.

Interagency Cooperative Activities

Interagency cooperative agreements have been established and additional proposals are being considered to aid the compiling of natural resource data. For example, a three-year project to update the National Wetland Inventory (NWI) maps for Texas has been initiated in cooperation with the U.S. Fish and Wildlife Service and the National Wetlands Research Center. Also, assistance is being sought from the Texas Soil and Water Conservation Districts to provide information about agricultural activities, pesticide use, landowner participation in water quality and conservation programs, and other issues pertinent to coastal management.

Natural Resource Data

Wetland Habitats

As stated above, the GLO is participating in updating the NWI maps for Texas. These maps will prove crucial to the development of status and trends analysis for wetlands and wetland habitats. The GLO is also investigating cooperative funding mechanisms to have this new NWI aerial photography digitized for use in the GIS database for other habitat protection efforts.

Seagrass Distribution

Seagrass habitats are not included in NWI efforts. The GLO is currently investigating the availability of published and gray literature regarding seagrass distribution in Texas and recently acquired digital files, compiled for academic research, that show historical seagrass distribution on the lower Texas coast.

Migratory Waterbirds

Maps depicting colonial migratory waterbird rookeries on the Texas gulf coast have been acquired and digitized. Digital files are also being prepared to illustrate leases in the coastal area that have been issued by the state to the Audubon society for management and protection of important bird resource areas.

Oysters

The GLO has completed digitizing oyster resources information obtained from the Texas Parks and Wildlife Department (TPWD) based upon historical surveys, and is working to acquire new digital surveys of oyster resources in Galveston Bay developed by contractors working on the Houston Ship Channel project.

Threatened/Endangered Species

Preliminary contacts have been made with the USFWS and the Texas Natural Heritage Program regarding acquisition of mapped data for threatened and endangered species. This data will be compiled and entered into the CMP database as it is acquired.

Special Management Areas

Special Management Areas

Maps will be produced showing Special Management Areas under state, federal, and private protection. For example, the Texas Nature Conservancy has provided listings of Conservancy projects throughout the state. These will be analyzed, and those sites within the CMP planning area will be digitized and placed in the GLO's data inventory for future reference, along with federal refuges, state/county/city parks, wildlife management areas, etc.

Coastal Preserves

Boundaries for Coastal Preserves (established by interagency memorandum of agreement between the GLO and TPWD) will be digitized and added to the CMP database.

Mitigation Sites

State and federal permits issued in Texas often require mitigation for wetland impacts. There does not exist, however, a single database illustrating the location and extent of mitigation projects on the Texas coast. The GLO will compile a data file in GIS format to inventory these activities. This file will also serve as a basis for future evaluation of mitigation effectiveness.

Human Uses

Dredging

The GLO is investigating funding mechanisms to develop a statewide dredging database. This database would contain information on the location, purpose, and impacts of all federal and private dredging in the CMP planning area.

Discharges

Inclusion of the Texas Water Commission's point-source discharge permit data into the CMP GIS database is being evaluated. Contact has also been established with the Galveston Bay National Estuary Program's "Citizens Reporting Hotline" to determine the feasibility of incorporating spill reports into the GIS database for spatial analysis of spill frequency and resulting investigations. Brine discharge permit information will be obtained from the Texas Railroad Commission (RRC) and added to the file.

Industrial Facilities Mapping

Contacts have been established with private companies that publish industrial facility siting summaries. If this data can be obtained and added to the GIS database, it can be used to cross-check regulatory permitting activities and identify concentrations of industrial users.

Redistricting Information

Existing information used for legislative redistricting work in Texas (Tiger files, etc.) is being acquired. These files will provide useful information about transportation infrastructure, population statistics, political boundaries, etc.

Sediment Transport

Maps are being prepared to illustrate river impoundments which limit sediment transport to Texas estuaries and the Gulf Coast.

Energy Development

Digitized well location maps for the CMP planning area will be compiled from information provided by the RRC as funding allows.

STATUS AND TRENDS ANALYSIS

Limited resources and funding will require that the GLO approach the development of a CMP status and trends report from the perspective of gathering existing data and reviewing that data to determine current cause and effect mechanisms, the status of

resources based upon this published information, and the postulation of expected trends based upon this analysis. This can be accomplished for key resources within the planning period established by this grant.

After entry into the Coastal Zone Management Program, it will be possible for the GLO and other agencies to refine this status and trends analysis using newly developed information and to initiate research to fill information gaps noted during the earlier phases of the program.

Several sources of generic status and trends data will be utilized, including a report recently published by the Habitat Degradation Subcommittee of the U.S. Environmental Protection Agency's Gulf of Mexico Program titled Status and Trends of Emergent and Submerged Vegetated Habitats, Gulf of Mexico, U.S.A. Additional information will be sought from the Galveston Bay and Corpus Christi National Estuary Programs. Grey literature will also be solicited from select universities and environmental organizations.

Special Award Condition #6
Draft Report

USES SUBJECT TO MANAGEMENT

The Coastal Zone Management Act of 1972 (CZMA), as amended, requires as a program element, "a definition of what shall constitute permissible land uses and water uses within the coastal zone which have a direct and significant impact on the coastal waters." The Coastal Management Program (CMP) consistency review working group, the CMP wetlands working group, and General Land Office staff are identifying the uses that will be subject to the management program and developing a definition of "direct and significant impacts."

DEFINITION OF DIRECT AND SIGNIFICANT IMPACTS

The definition of "direct and significant impacts" is being developed based on several sources of information:

- the Florida definition of "direct and significant impact,"
- the South Carolina definition of "direct and significant impact,"
- the Council on Environmental Quality definition of "significantly" found in 40 CFR, Section 1508.27 (attached), and
- the "Standards; Submission for Review" section (§33.205) of Subchapter F of Chapter 33, Texas Natural Resources Code., which states:

All actions taken or authorized by state agencies and subdivisions that may adversely affect coastal natural resource areas [emphasis added] . . . must comply with the goals and policies of the coastal management plan.

In determining the uses to be managed under the CMP, the broader language of the state statute must be taken into account in the definition of "direct and significant impacts."

IDENTIFICATION OF USES SUBJECT TO THE MANAGEMENT PROGRAM

The strategy being used to identify the uses that will be subject to the CMP is as follows:

1. Develop a comprehensive list of uses and associated activities that occur within the coastal boundary.

2. Identify the uses and activities on the list that impact coastal natural resources.
3. Identify the uses and activities on the list with "direct and significant impact." This will be the list of uses subject to the management program.

Listed below are the land and water uses that have been identified as possibly impacting coastal natural resources.

CATEGORY	USES
ENERGY & RELATED FACILITIES	oil and gas pre-exploration, exploration, production, refining, transportation, and storage; electric generating facilities (e.g., hydroelectric plants and nuclear plants)
NAVIGATION	channels; canals; associated disposal sites
MINING	mineral mining; sedimentary-mineral mining
TRANSPORTATION & RELATED FACILITIES	highways; railroads; bridges; shipping facilities and shipping operations
RESIDENTIAL & COMMERCIAL DEVELOPMENT	habitable structures; erosion-response projects (e.g., bulkheads, seawalls, breakwaters, groins); commercial structures
INDUSTRIAL DEVELOPMENT	
RESERVOIRS & OTHER IMPOUNDMENTS	dams; water supply projects; water rights
PORTS & HARBORS	

CATEGORY

USES

SHORELINE ACCESSWAYS

docks; piers; wharves;
boat ramps; marinas;
moorages; platforms; dune
walkovers; access roads;
parking lots

WASTE DISPOSAL FACILITIES

municipal sewage
treatment systems; septic
systems; package plants;
hazardous waste
facilities; landfills

AGRICULTURE

MARICULTURE

RECREATION

boating; fishing;
hunting; driving
recreational vehicles;
horseback riding;
camping; swimming

FISH, SEAFOOD & MEAT PROCESSING

COMMERCIAL FISHING

CONSERVATION/PRESERVATION

preserves; refuges; parks

PUBLIC FACILITIES & PUBLIC WORKS

schools; hospitals;
government buildings and
facilities; beach
maintenance and beach
access maintenance

ASSOCIATED ACTIVITIES

Seismic
Drilling (casing, siting, pits)
Dredging
Dredged material disposal
Filling
Draining
Fluid extraction
Fluid disposal (injection)
Fluid disposal (other)
Solid and hazardous waste disposal
Wastewater discharges
Stormwater discharges
Water diversions and withdrawals
Industrial processing
Reclamation and remediation

ASSOCIATED ACTIVITIES (cont'd.)

Refining
Hot water discharges
Fluid/mineral storage
Construction in navigable waters
Road/highway construction design
Sediment control
Shoreline construction
Other construction
Pesticide and herbicide applications

Special Award Condition #8
Status Report

COASTAL MANAGEMENT PROGRAM PLANNING AREA

INTRODUCTION

The Texas Coastal Management Program (CMP) will establish management boundaries in accordance with the requirements of the Coastal Zone Management Act of 1972 (CZMA). The CZMA (§306[d][2][a]) and associated federal regulations (15 CFR §§923.30-34) define the requirements that must be met in establishing the state coastal area boundaries:

1. The state must determine seaward, inland, and interstate boundaries of the coastal area. The coastal area is defined as the "coastal waters (including the lands therein and thereunder) and the adjacent shorelands (including the waters therein and thereunder), strongly influenced by each other and in proximity to the shorelands of several coastal states."

The fundamental principle in delineating the coastal area is that it "extends inland from the shorelines only to the extent necessary to control shorelands, the uses of which have a direct and significant impact on coastal waters."

2. CZMA defines the seaward boundary of the coastal area as extending to the outer limit of Texas territorial sea, or 10.35 miles offshore.

3. CZMA requires an identification of all federally owned land or lands which are held in trust by the federal government, its officers and agents in the coastal area and over which the state does not exercise control. A process for consultation with the federal officials administering such lands must be indicated.

4. CZMA requires a process for consulting with adjoining coastal states to minimize the possibility of incompatible uses occurring at boundary junctures.

5. CZMA requires the inland boundary to include the area encompassing all the uses subject to management, special management areas identified in 923.21, waters under saline influence, salt marshes and wetlands, transitional, and intertidal areas, and islands.

CMP PLANNING AREA

Meeting the CZMA boundary requirements is a task complicated by the size and ecological variability of the Texas coast, the complexity of human activities which impact coastal resources, and the intricacies of institutional arrangements within the state. In order to fully consider these factors, a CMP planning area and study area have been delineated within which analyses will be conducted to determine the final coastal area boundaries. Designation of a coastal planning area and coastal study area in no way changes the present jurisdiction, authority, or policy of state or local agencies and officials.

The planning area is the first tier of counties bordering the Gulf of Mexico (map attached). These counties are Aransas, Brazoria, Calhoun, Cameron, Chambers, Galveston, Harris, Jackson, Jefferson, Kenedy, Kleberg, Liberty, Matagorda, Nueces, Orange, Refugio, San Patricio, Victoria, and Willacy.

The study area will consist of counties adjacent to the planning area with activities that may contribute impacts to the coastal area. Activities within these counties will be assessed to determine if they have direct and significant impact on coastal waters and therefore need to be managed under the CMP.

The evaluation of options for the coastal area boundary will meet the following requirements at a minimum.

1. Analyze ecological, socioeconomic, political and administrative attributes of the planning and study areas.
2. Utilize identifiable cultural features or political boundaries.
3. Include all water and land uses directly and significantly impacting coastal waters.
4. Include any specially designated management areas.
5. Include tidal and saline waters, wetlands, islands, transitional and intertidal areas, sandflats, mudflats, and beaches.
6. Include uplands, transitional and intertidal areas that are subject to coastal storm surge, particularly hurricanes.
7. Exclude federally controlled lands.
8. Provide buffer areas where appropriate.
9. Coordinate boundary lines with those of Louisiana. Louisiana's inland coastal zone boundary, established in 1978, begins at the

intersection of the Intracoastal Waterway and the Texas/Louisiana border.

10. Incorporate, to the greatest extent possible, local government recommendations.

The attached table provides specific data that will be used to evaluate options for the coastal area boundaries.

BOUNDARY DETERMINATION PROCESS

The Texas Coastal Management Area will be established by evaluating the planning and study areas against the above criteria. The steps in delineating the coastal area are:

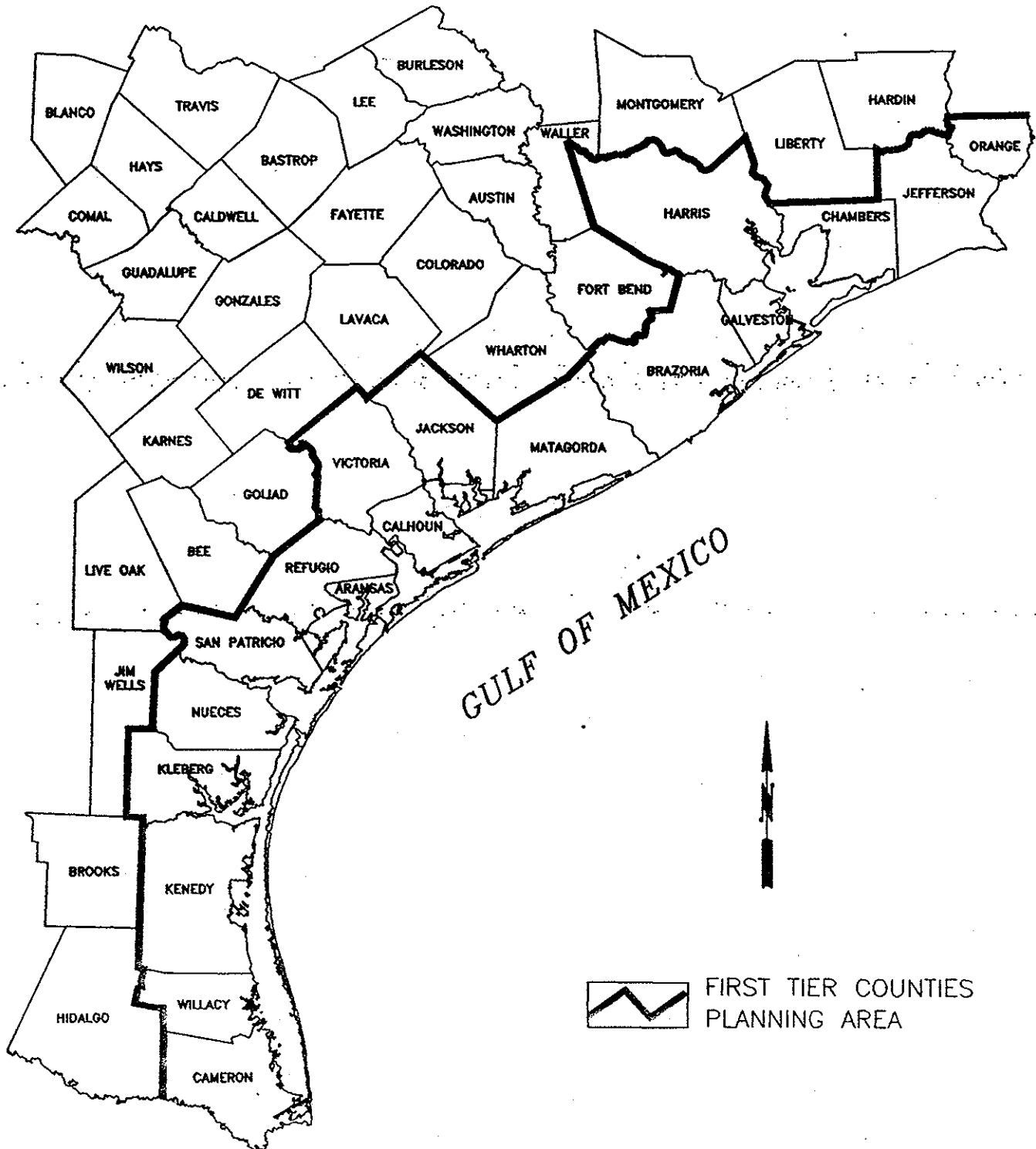
1. Adopt a planning area and study area for boundary assessment. This step was completed by the Coastal Coordination Council on November 5, 1992.

2. Develop criteria for coastal area boundary options within the planning and study area, and demonstrate how various boundary options satisfy or fail to satisfy the criteria. This step was initiated with the establishment of an interagency review group and a boundary information collection center within the GLO.

3. Establish a mechanism for determining boundaries. This will include state, federal, and local interagency evaluation and review of coastal boundary area options. This step will begin in January, 1993.

4. Present the coastal area boundary proposed by the CCC for public review and comment. This step will take place in June, 1993.

TEXAS COASTAL MANAGEMENT PROGRAM PLANNING AREA



Information for Evaluation of CMP Boundary Options

Government Jurisdictions

- County boundaries and city limits
- Local management/government jurisdictions
- GLO/TWC oil spill response jurisdictional boundary
- TPWD coastal fisheries boundary
- U.S. Army Corps of Engineers Galveston District boundary
- State subdivision boundaries

Natural Resources

- Wetlands
- Tidally influenced waters
- Beaches
- Dunes
- Transitional and intertidal areas
- Endangered species and habitats
- Historical and archaeological areas
- Migratory waterfowl habitats

Watershed Characteristics and Boundaries

Population Demographics

- Age
- Race
- Occupation
- Industry

Pollution Loads

- Point-source pollution assessments
- Nonpoint-source pollution assessments
- Water quality non-attainment segments
- MUD-package plants
- Non-attainment areas for air quality
- Per capita assessments for solid waste and wastewater
- Projected industrial waste discharge increases (water/air)
- Projected solid waste increases

Water Use and Supply

- Sources/intakes on rivers and lakes
- Irrigation
- Industry
- Municipal
- Projections of future water use and supply

Infrastructure

- Projected infrastructure needs
- Transportation
- Flood control
- Emergency service

Special Award Condition #9
Status Report

HOW USES WILL BE MANAGED

Uses that may be subject to management under the Texas Coastal Management Program (CMP) have been identified in the "Draft List of Uses Subject to the CMP." This status report explains how some of these uses may be managed under the CMP based on potential impacts to important coastal resources.

Coastal Wetlands

Uses affecting coastal wetlands will be managed under the Critical Area Program (CAP) of the CMP primarily by networking and strengthening existing state and local authorities. The core tools that will be used to manage wetlands are the 401 Certification/Water Quality Standards programs of the Texas Water Commission (TWC) and the Railroad Commission of Texas (RRC), other state and local program authorities (e.g., the General Land Office's public lands leasing and permitting programs), mitigation policy to be adopted by the Coastal Coordination Council (CCC), and state and federal consistency review.

A working group composed of representatives from the CCC member agencies has been established to develop the CAP. This working group will make recommendations to the CCC and its Executive Committee regarding the definition of critical areas, which will include wetlands; the delineation of the CAP boundary; and policies for managing resources and activities within critical areas.

A more detailed description of how wetland uses will be managed is given in the "Critical Area Program" description.

Dunes and Beaches

S.B. 1053, enacted by the 72nd Texas Legislature in 1991, amended the Texas Open Beaches Act and the Dune Protection Act to increase local government authority over activities affecting the beach/dune system and place the Texas General Land Office (GLO) in an oversight role. As part of this role, the GLO is required to adopt rules for local governments to follow in managing the beach/dune system. These rules must be certified by the Attorney General's Office as consistent with the Open Beaches Act.

The GLO published proposed rules for management of the beach/dune system in the Texas Register on September 18, 1992. The rules are based on the initiatives of local governments and on comments received from coastal citizens in workshops and hearings held by the GLO over the past two years.

Important aspects of the rules include:

- o Dune protection and beach access will be addressed for each coastal county and municipality on an individual basis.
- o Each coastal county or municipality will develop its own plan in accordance with the uniform set of rules proposed by the GLO and SB 1053.
- o Local governments will establish a dune protection line for the purpose of preserving sand dunes. The line may be located no farther than 1000 feet landward of the mean high tide line of the Gulf of Mexico.
- o Two types of permits can be issued by a local government--a dune protection permit and a beachfront construction certificate. A dune protection permit is required for proposed activities located within dunes seaward of the local dune protection line. A beachfront construction certificate is required only if the proposed construction is located adjacent to and landward of the public beach or adjacent to a public beach access way. Both permits can be issued simultaneously.
- o A local government may approve a dune protection permit if it finds that the proposed project will not materially weaken or damage any dune or dune vegetation, or reduce the effectiveness of any dune as a means of protection from erosion and high wind and water.
- o Permittees are required to avoid damage to dunes or dune vegetation.
- o If damage cannot be avoided, then the activity may be permitted with conditions requiring the permittee to minimize damage.
- o All damage will be compensated for by repair of the damaged dunes and dune vegetation, construction of new dunes using sand and indigenous vegetation, or enhancement of existing dunes or existing vegetation.
- o The public's right to the use of the beaches will be protected through maintenance and, whenever practicable, enhancement of public access.
- o Upon approval of its beach access plan, a local government may charge beach users a fee in exchange for providing beach services. The fee will be approved by the state as necessary to cover any beach-related expenses.

Areas of Particular Concern

In the management of Areas of Particular Concern (APCs), the GLO will act as facilitator in interagency, intergovernmental, and public efforts to protect areas for their priority use(s).

Several areas that will be considered for designation as APCs are already managed by cooperative interagency, intergovernmental, and public efforts. For example, the GLO and the Texas Parks and Wildlife Department (TPWD) cooperate in coordinating the Texas Coastal Preserve Program with other state and federal agencies as well as the interested public to protect unique and fragile coastal areas.

More than 15,000 acres of state-owned coastal islands and sand flats are leased to the Audubon Society for management as bird sanctuaries. The GLO is currently working with the Houston Audubon Society to have one of these sanctuaries, Bolivar Flats, designated as a Western Hemispheric Shorebird Reserve Network site.

The state also participates in the EPA's Galveston Bay National Estuary Program and will be participating in the Corpus Christi Bay National Estuary Program.

Four categories of APCs are being considered: recreation areas, conservation areas, natural hazard areas, and special management areas. The following is a breakdown of these categories with definitions and areas that may be considered for designation under each category.

Recreation Areas - Areas within the Texas Coastal Management boundary that are of substantial recreational value and/or opportunity.

- State parks
- County and local parks
- National parks and seashores
- Public beaches
- Artificial reefs

Conservation Areas - Areas within the Texas Coastal Management boundary that are unique, scarce, fragile, or vulnerable natural habitat; that have historical significance, cultural value or scenic importance; and/or that have high natural productivity or essential habitat for living resources, including fish, wildlife, and endangered species as well as the various trophic levels in the food web critical to their well-being.