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**Planning and design for tourism in Puerto Peñasco, Sonora,  
Mexico**

**Bodenchuk, Donna Lee, M.L.Arch.**

**The University of Arizona, 1993**

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PLANNING AND DESIGN FOR TOURISM IN  
PUERTO PEÑASCO, SONORA, MEXICO

by

Donna Lee Bodenchuk

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A Thesis Submitted to the Faculty of the  
SCHOOL OF RENEWABLE NATURAL RESOURCES  
In Partial Fulfillment of the Requirements  
For the Degree of  
MASTER OF LANDSCAPE ARCHITECTURE  
In the Graduate College  
THE UNIVERSITY OF ARIZONA

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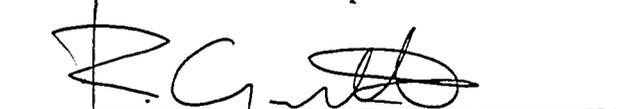
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## ABSTRACT

Puerto Peñasco is a small Mexican town (pop. 26,141) located on the Sonora coast 65 miles from the U.S. border at Lukeville, Arizona. In recent years, over-fishing in the Gulf of California has resulted in a sharp decline in Puerto Peñasco's fishing industry. Tourism is an economic alternative which holds potential for revitalizing the local economy, if planning and design for tourism is carefully conceived and executed. Review of international tourism and examination of economic, socio-cultural, and environmental impacts of tourism indicate that traditional forms of large-scale mass tourism may not be appropriate for Puerto Peñasco. An alternative, integrated form of tourism is proposed for Puerto Peñasco that respects local landscapes as well as local culture and heritage. Revitalization of the historic Old Town and the Harbor areas is proposed to attract tourists to existing urban areas while preserving natural open space along the coast.

## INTRODUCTION

Research Problem. Puerto Peñasco, also known as "Rocky Point", is a small Mexican town located on the Sonora coast about 65 miles from the U.S. border at Lukeville (Figure I-1). Settled originally as a fishing village in the early 1920s, Puerto Peñasco soon became a major port for the Sonora fishing fleet, supporting up to 250 shrimp trawlers in the late 1980s. The fishing industry supported a bustling local economy for many years and provided a number of modern amenities for residents. In recent years, however, there has been a marked decline in the shrimp catch which is attributed to over-fishing and the use of fishing methods that destroy habitat and breeding grounds. In 1993, only about 40 boats remain active, and many Puerto Peñascoans are out of work, struggling to find new ways to support their families.

Many people, including Mexico's President Salinas, are looking to tourism as a way to salvage the local economy and bring in additional foreign capital. According to Inskip (1988:360): "Tourism has comprised about 5 percent of world trade for several years and is second only to oil and oil products as the largest item of international trade." Tourism is a natural in Puerto Peñasco. For major population centers like Phoenix and Tucson, Arizona, this Sonora coast offers the closest available beach. The climate is mild and sunny much of the year, the beaches are sandy and wide, and the local people have welcomed tourists, for the most part. Tourists have been a part of the local scene from the

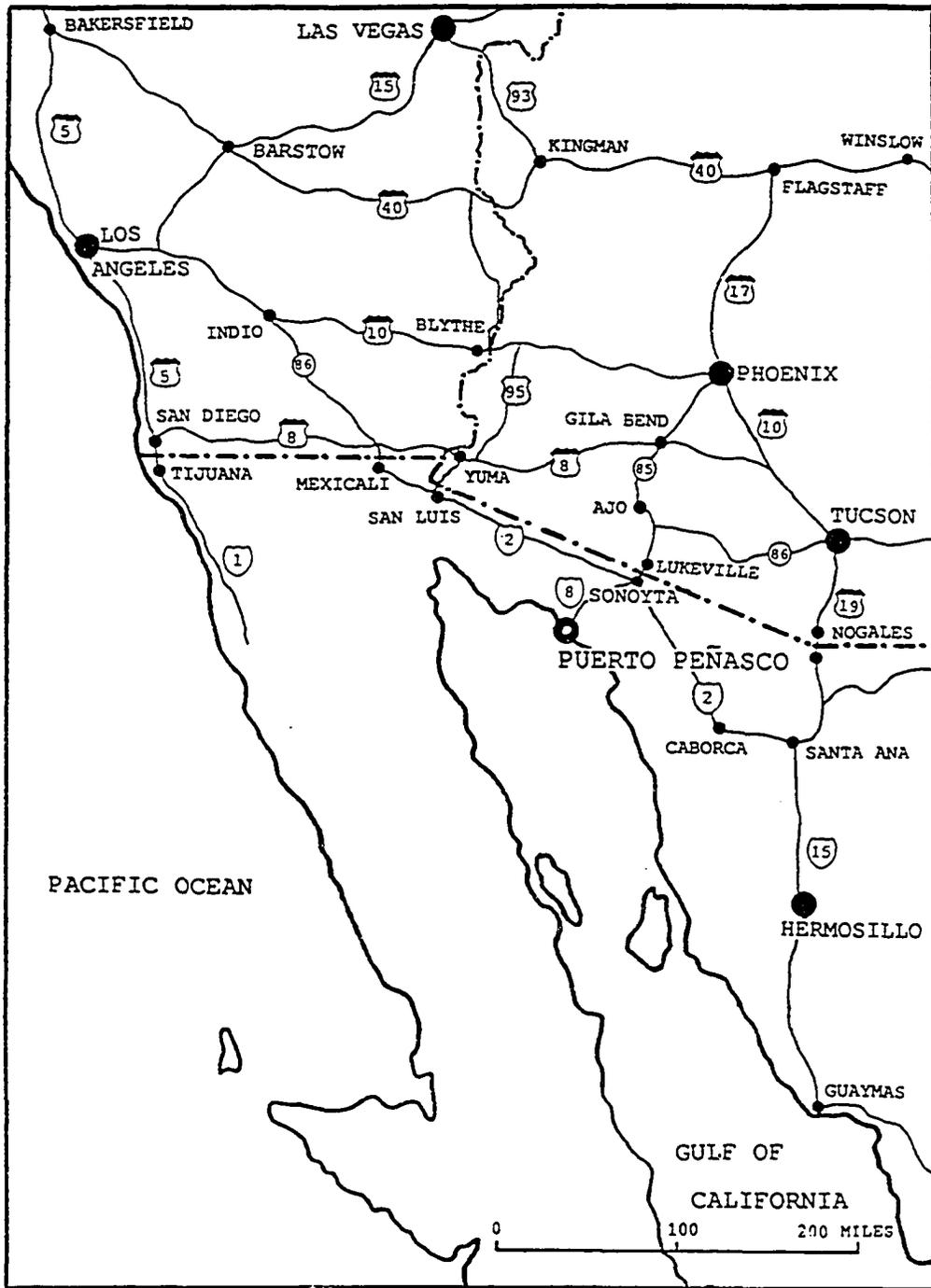


Figure I-1.  
Regional location map (Ewert, 1990).

very beginning, when the American John Richardson opened the first, although short-lived hotel near the Cerro (hill) de Peñasco in the 1920s. During the early years, tourist numbers were small and visitors stayed with friends or in a few small hotels. But in the late 1970s and early 1980s, the local economy and the U.S. economy both were booming. Access to Puerto Peñasco had been improved by paving Highway 8, and Americans had more leisure time and more money to spend. The adventure of Mexico and the pristine beaches began attracting large numbers of tourists, often double the population of the town (1990 pop. 26,141) during peak season months.

Puerto Peñasco was not prepared to handle this influx of tourists. Police and medical facilities and personnel are stretched beyond their limits during peak season. Services such as electricity and city water are unable to meet demand. An inadequate sewer system and lack of waste water treatment pose threats to the environment. Developers, both foreign and Mexican, exacerbated these problems by promoting beach front lots for vacation homes and RV trailers, in effect creating American "suburbs" which draw on the town's resources without giving back much in return. Although there is a significant income from tourism for local residents, the potential remains unrealized when tourists spend most of their time in outlying enclaves.

Without a good plan for development or tourism, Puerto Peñascoans have begun to experience some of the more negative aspects of tourism in recent years. The best beaches have been acquired for tourism, with linear development

limiting public access and damaging fragile dune habitats. Off-road vehicle use and littering are also destroying beaches and dunes. The naturally friendly nature of the local people and long-term seasonal visitors is being severely tested by the public drunkenness, theft and vandalism that has become associated with the spring break college crowd (Elling, 1993c).

The increasing numbers of tourists to the Puerto Peñasco area have not gone unnoticed by developers. Local ejiditarios—a term used to describe groups who are recipients of federal land grants—are anxious to develop their beach front properties in order to profit from the tourist demand. Investors and developers in Mexico, the U.S., Canada, and other countries have expressed interest in creating tourist resorts in the area, particularly at Sandy Beach and the Estero Morua (Joseph, 1993). FONATUR (National Tourism Development Trust) and the Mexican federal government have also taken an interest in developing the tourist industry in Puerto Peñasco (Carmona, 1993; Lowe, 1993), and the recent formation of Biosphere Reserves to the north should attract even more tourists to the area in the future.

In the fall of 1992, several professors and graduate students in Landscape Architecture, University of Arizona, had the opportunity to meet (in Tucson) with Stephen Joseph, director of urban planning for the state of Sonora, Mexico. Mr. Joseph expressed his concern for future development along the coastline of Sonora and his interest in exploring alternative forms of development. In recent years, his office has been inundated with development proposals to build hotels,

resorts, and golf courses. Proposals have been made to subdivide much of the coastal zone into lots for vacation homes, like those existing at Las Conchas. Some of the proposals are in environmentally sensitive areas, such as the estuaries, which are important habitats for juvenile marine life forms, especially shrimp. Linear development on the primary sand dunes along the coast is a problem because stabilizing vegetation and wildlife habitat is being destroyed. In addition, public access to the beach is gradually being cut off. Finally, none of the plans submitted to Mr. Joseph's office make provision for preservation of open space.

During a November 1992 field trip to the area, we had the opportunity to view first hand some of the existing and potential development problems along the Sonora coast in the vicinity of Puerto Peñasco. At this time, it became apparent that the town itself, the urban area of Puerto Peñasco, was a critical element to consider in any future economic development. One problem mentioned by Mr. Joseph was that American tourists generally bring their own food and other amenities with them. They camp out on the beach or rent condominiums and homes—from foreign owners—in the "American suburbs" outside of town. These tourists come to Mexico to enjoy the beach, but they don't spend much time in the town and they contribute very little to the local economy.

A visit to the Old Town area of Puerto Peñasco seemed to provide at least a partial explanation for this situation. Other than the fish market, a few

shops selling tourist trinkets, and a handful of restaurants, there is not much in Old Town to keep tourists for any length of time after their initial curiosity is satisfied. There is not much there for tourists to do, or see, or spend money on. At the same time, there appears to be a great deal of potential. The Old Town in particular has a great deal of charm, as an authentic 1920s Mexican fishing village. It is the original townsite for Puerto Peñasco and the historical heart of the modern city. The physical site itself is unique because of the landmark Rocky Point, which rises a few hundred feet above the flat desert/coastal landscape. The site offers great views, a waterfront location with cooling sea breezes, and the experience of an authentic working-class Mexican neighborhood. Perhaps by revitalizing Old Town and the Harbor area, more tourists and tourist dollars could be drawn into the local economy. Perhaps by revitalizing the existing urban area and preserving its identity and sense of place, in-fill development would be encouraged in an area of existing infrastructure and more open space along the coast would be preserved.

Purpose, Objectives, and Scope. The purpose of this thesis is to develop and illustrate a process which uses tourism as a method of revitalizing Puerto Peñasco. The objectives are as follows: 1) to explore alternative forms of tourism for Puerto Peñasco—alternatives to large-scale mass tourism, characterized by linear strips of foreign-owned luxury hotels; 2) to examine economic, socio-cultural, and environmental impacts of tourism; 3) to create a more integrated approach to tourism in arid coastal regions of Mexico, both physically and

culturally, that respects local landscapes as well as local culture and heritage; 4) to examine the potential of a revitalization strategy for Old Town and the Harbor area to attract tourists back into the historic heart of the city.

This thesis focuses mainly on the older urban areas of Puerto Peñasco—Old Town and the Harbor area. The outlying tourist areas of Cholla Bay, Sandy Beach, and Las Conchas are discussed in less detail, and some suggestions are given for appropriate forms of tourism development that would complement the concepts proposed by this thesis for Old Town and the Harbor. The New Town area is explored for insight into local culture, but is not viewed as an area where tourism should be developed. Although this thesis attempts to balance economic, socio-cultural, and environmental objectives and concerns, it has evolved with a greater emphasis on socio-cultural concerns. Historically, socio-cultural objectives have been the last to be considered (or not considered at all) in traditional tourist developments or in the planning processes. Tourism is not the only economic option for revitalization of Puerto Peñasco's economy. Alternatives such as shrimp farming, halophyte farming, and maquiladoras are also getting some attention. While beyond the scope of this thesis, these and other economic alternatives must eventually be developed concurrently with tourism in a comprehensive plan for the area, in order to maintain a well-balanced, diversified economy.

Research Methods. The research methods employed in this thesis consist largely of literature review, supplemented by unstructured interviews, site visits,

and non-participant observation. Historical and modern accounts of Puerto Peñasco written in English are generally limited to a few pages in larger texts on broader topics, or to travel articles in magazines and newspapers. Several texts dealing specifically with Puerto Peñasco were obtained in Spanish. Translations were obtained through the efforts of graduate student Elisa Del Bono, and by this researcher with the computer programs WordPerfect Spanish and Spanish Assist 5. The general literature on tourism is extensive, if somewhat scattered among tourism, anthropology, sociology, environmental, economic, marketing, planning, design, and other disciplines. Much of this thesis is devoted to studying the literature on international tourism in order to: 1) identify issues which should be addressed by tourism planning and design in Puerto Peñasco; and, 2) offset some of the limitations imposed by this researcher's rudimentary Spanish language skills, and limited opportunities to visit the site. Site visits consisted of 3 days in November 1992 and 4 days in May 1993, augmented by a data-gathering trip to Hermosillo in February 1993.

Chapter 1 describes Puerto Peñasco's natural, historic, and modern settings including the existing nature of tourism, and the regional and local water supply. In Chapter 2, broader issues on a global level, such as types of tourism, types of tourists, tourist's motivations, and preferences are investigated. The impacts of tourism are discussed in terms of environmental, socio-economic, and socio-cultural considerations and case studies of tourism in Mexico are used as illustrations. Finally, the current status of tourism theory is examined in alternative

forms of tourism. Chapter 3 is concerned with the physical expression of tourist development in the landscape, and with the planning and design processes involved in tourism development. Chapter 4 analyzes tourism in Puerto Peñasco in light of knowledge gained during this process, and presents conceptual plans for an alternative form of tourism based on suggested objectives and policies.

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## CHAPTER 1: PUERTO PEÑASCO—PAST AND PRESENT

### History

The name "Rocky Point" was first bestowed on the landmark volcanic hill by a British sailor by the name of Robert Hardy (Ewert, 1990:18). Although he left this legacy behind in 1826, Hardy was just passing through the area in search of gold and pearls. Nomadic fishermen also passed through the area in the years that followed, and made note of the good fishing available in the surrounding gulf waters.

The first permanent settlers to the Puerto Peñasco area began arriving between 1920 and 1926 (Ewert, 1990:19; Verdugo Fimbres, 1985:2). These early settlers were drawn by the fishing opportunities available in the northern Gulf of California. They arrived mainly by boat, originating largely from other fishing villages along the Gulf like Puerto Lobos, Puerto Libertad, Bahía de Kino, and Guaymas, although some people also came from interior cities such as Caborca and Sonoyta. A few foreigners from North America and Yugoslavia also came to participate in the new community.

Prohibition laws in the United States during the 1920s prompted the development of drinking and gambling establishments along many border areas with Mexico, and Puerto Peñasco was no exception. An American named John Richardson (also known as "Johnny Stone") arrived in the area around 1920, dug a well and built the first permanent structure—a hotel constructed out of the

black volcanic rock. Richardson obtained permission from the Governor of Sonora to fly in American guests for drinking, gambling, fishing and hunting. His main business however, was smuggling rum and tequila into the United States (Ewert, 1990:32). Known for a violent temper, Richardson soon alienated residents and government officials. In 1931, as the story goes, some local fishermen tried to gain entrance to the hotel in search of amusement, but were turned away. Shortly thereafter, Richardson's license was revoked. According to historian Memo Munro (KUAT, 1988), "Stone" burned his hotel and dynamited the well before he left, leaving the people without a local source of water. Following this, water had to be trucked in from Sonoyta. (The location of the old hotel is shown in Figure 1-3.

Another American, Thomas Childs, arrived in 1929 accompanied by a two Mexicans about whom little is known (Ewert, 1990:33). Childs, who was a fish buyer, and several Mexican fishermen who followed soon after, were interested in the potential of the area as a fishing center. During the early days, the most sought after fish was the totoaba, a large fish weighing up to 100-kilos (220-lbs.) and reaching up to 6 meters (19.7-feet) in length (Verdugo Fimbres, 1985:2). The market for the totoaba included Arizona, California, Chicago and New York in the United States. The fishing camp was established in the area presently occupied by the naval sector and part of the Port District. The existing estuary was deepened to allow access to the sea and to shelter the fishing boats. A mixed residential and business area known today as "Old Town" was

established at the base of the rocky point.

During the 1920s and '30s, living conditions were very harsh due to the limited availability of water and the isolation of the camp. Water was purchased and trucked in from Sonoyta, or supplied by a couple of artesian wells that were constructed in the area. Food and supplies had to be trucked in from cities in Arizona (Phoenix, Tucson and Ajo) via Sonoyta. Fish buyers provided an important connection to the outside world. After delivering fresh fish to markets in Arizona, the fish buyers obtained ice, food and clothing to bring back to Sonoyta and Puerto Peñasco. The dirt road between Sonoyta and Puerto Peñasco was occasionally flooded and frequently wiped out by the winds and shifting sand, making the 12-hour journey through the desert a very risky undertaking.

In 1931, the Cabildo (council) of Caborca created the territory or Commissariat of Sonoyta. "Punta de Piedra" was placed under the jurisdiction of Sonoyta and renamed Puerto Peñasco in 1932. Puerto Peñasco had a population of 35 fishermen in 1933 and Sonoyta was approaching 300 people (Verdugo Fimbres, 1985:8). By 1941, Puerto Peñasco had grown to a population of 187 people involved in the fishing and railroad industries (Monografía, 1992).

During the 1930s, the Japanese received permission from the Mexican government to fish in the Gulf of California and had a great influence on the fishermen of Puerto Peñasco, as well as other ports in the Gulf. The Japanese fishermen came to harvest shrimp, introducing demand for this product to the area. The relationship between the Japanese and Mexican fishermen was

apparently quite congenial. The Japanese taught the Peñascan many of their fishing techniques, including, as reported by West (1993:122) "...dredging the sea bottom, scooping up tons of shrimp and other marine life, but saving only the former for processing; the bycatch, which consisted of dead or dying fish, was dumped over board." The Japanese trawlers were large and contained freezing compartments to store shrimp. Prior to this time, the Peñascan fishermen operated out of pangas (small boats with outboard motors), canoes or small sail boats. The local population was frequently employed by the Japanese to clean the shrimp. Verdugo Fimbres (1985:5) points out that the influence of the Japanese is evident today by Peñascan names like Enrique Vanh and Raul Hirata. The start of World War II and the wasteful fishing techniques prompted the Mexican government to ban the Japanese trawlers from the Gulf in the early 1940's (West, 1993:122; Verdugo Fimbres, 1985:9).

Between 1928 and 1940, the most common means of transportation in the region was provided by "diligencias" or stagecoaches. The stagecoaches were independently owned and operated automobiles which carried passengers between Puerto Peñasco and Nogales, Santa Ana, Sonoyta, or Caborca. A variety of vehicles were used, including Buicks, Dodges, Cadillacs and a Hudson Super Six (Verdugo Fimbres, 1985:27).

Completion of the railroad in 1940, reduced the need for the "diligencias" and ended Puerto Peñasco's isolation from the rest of Mexico. The first phase of construction connected Puerto Peñasco with Sonoyta, as well as

with Mexicali and San Felipe in Baja California. The second stage, completed in 1947, expanded the rail system between Puerto Peñasco and Benjamin Hill in central Sonora (Verdugo Fimbres, 1985:19). The two-lane highway between Puerto Peñasco and Ajo, via Sonoyta, was paved in 1946 (Ives, 1989:129). The highway was paved by the U.S. Army Corp of Engineers as part of a contingency plan for possible invasion of the U.S. west coast by the Japanese during World War II. In addition to the highway, the U.S. constructed a dock facility in the harbor to supply the Pacific Fleet if the need arose (Ewert, 1990:20). These new "routes of communication" enabled fishermen to get their product to market much more quickly and efficiently.

The construction of the railroad and the new highway in the 1940s helped set off Puerto Peñasco's first significant economic and population expansion. Many new people ventured into the region, including railroad workers, migrant farm workers traveling to the U.S., new settlers and businessmen. This new wave of immigrants originated largely from Mexico's interior—from Jalisco, Chihuahua, Sinaloa, Guanajuato, Baja California and Tobasco. By 1950, the population of the town had increased to 2,500 people (Ives, 1989:135).

Ives (1989:129) described the Puerto Peñasco of 1950 as "...a modern city of hope on the western bastion of the arid and unproductive Sonoran Desert...Population growth is rapid, market demand for refrigerated fish exceeds the current supply, ship building and repair work is in demand, and conditions are improving rapidly." There was virtually no unemployment; about 800 men

were employed, mainly in the transportation and fishing industries. A breakwater and a small harbor or anchorage had been constructed on the south side of the bay. About 50 boats of various sizes were actively fishing the Gulf waters near Puerto Peñasco, hauling their catch to a "medium-sized modern processing plant" that had been built on the south shore. The markets served included Los Angeles, California and Phoenix, Arizona, as well as inland cities of Mexico.

Ives (1989:138) provides the following description of some of the social aspects of Puerto Peñasco in 1950:

"Although Puerto Peñasco is a new and rapidly growing community, having many of the economic aspects of a boom town, it does not suffer from the lawlessness and disorder characteristic of such communities in the early days of the settlement of the United States. The inhabitants of Puerto Peñasco are busy, orderly, and polite. The culture is definitely northern Mexican, even though as many as ten different languages may be heard in the course of a day, and features and complexions indicate many racial origins. Perhaps the age and economic status of the inhabitants influence the nature of the community. In contrast to the young single men who established many of the cities of the western United States, many inhabitants of Puerto Peñasco are middle-aged, married, and financially stable, having attained some economic success in some other community before moving to the new seaport. Some of the residents are grandparents... Business is conducted in a businesslike manner, most stores having standard prices for standard items. Stocks of merchandise are quite good, and service is excellent... business ethics are high."

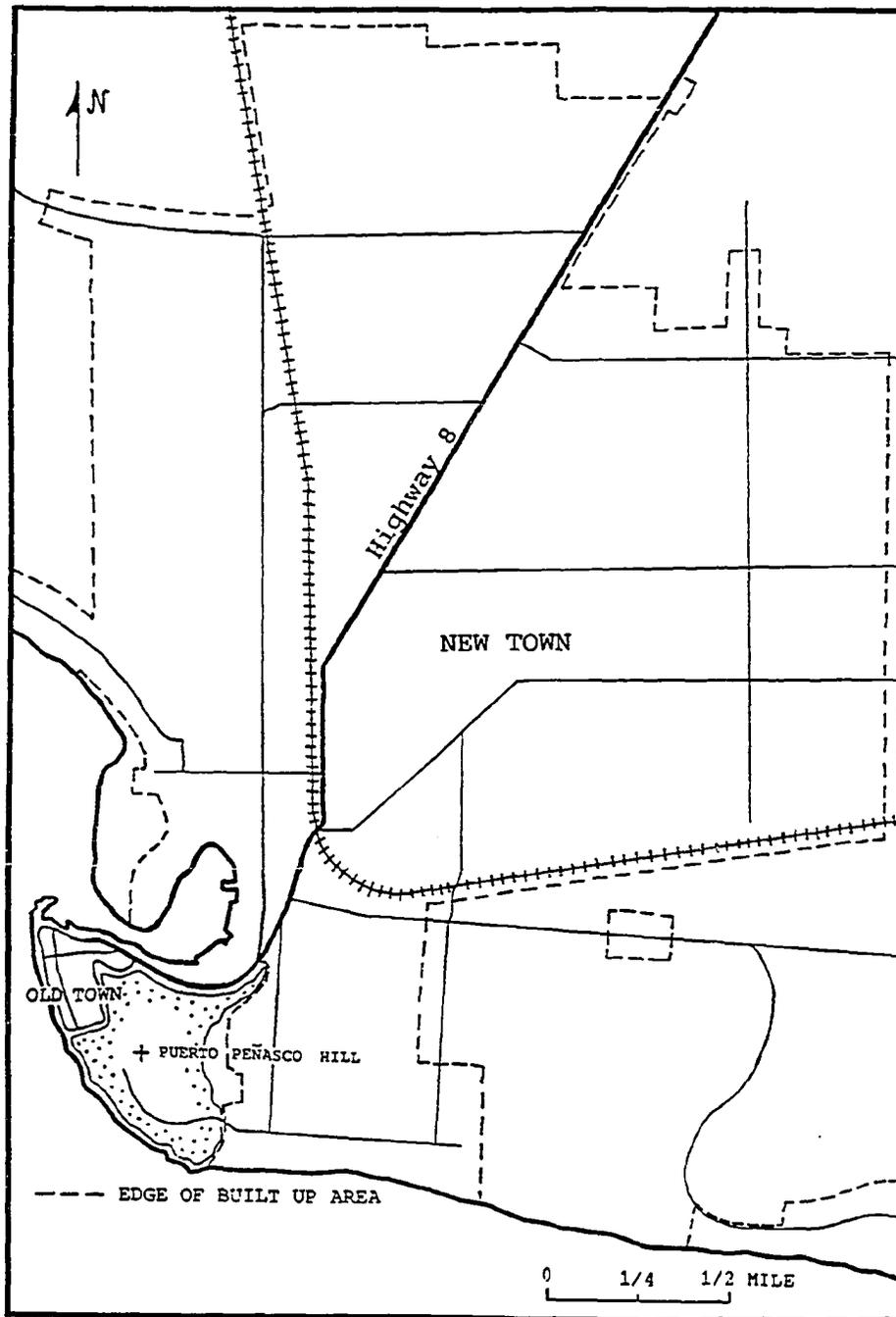
In addition, Ives found that the quality of education and municipal health were high. Forms of amusement, although few, included occasional films imported from central Mexico and Los Angeles, and radios which could be tuned in to stations on both sides of the border. Local saloons, with drinks, food and

music, served as gathering spots, which Ives compared to "the English public house".

The municipality of Puerto Peñasco was created in 1952 by legislation that separated it from the larger municipality of Caborca (Monografía, 1992).

Sonoyta and Cholla Bay were included in the new municipality. Puerto Peñasco was allowed to hold its first elections in 1955, because it had demonstrated self-sufficiency and had acquired the necessary size for becoming a self-governing municipality (Verdugo Fimbres, 1985:28). The new city's first mayor was also one of its original founders, Victor Estrella Bustamante (Ewert, 1990:22).

The original townsite for Puerto Peñasco, located on the beach northwest of Cerro Peñasco, was locally known as "Fishing Town". By 1950, the population had outgrown this site and the city had expanded outward into the desert (Figure 1-1). Ives (1989:133) described several early nodes of development which helped to shape the town's present layout. Construction of Highway 8 to Sonoyta facilitated the need for motels and supporting facilities on the east side of the road, which came to be known as "Motel Town". When the railroad was completed, "Railroad Town" sprang up around the station with its maintenance facilities. Houses were beginning to appear along the road to the airport at this time, pointing toward the potential development of an "Airport Town". Gradually, these development nodes coalesced to form the town as it presently exists, and Old Town began to lose some of its importance as an administrative and commercial center.



**Figure 1-1.**  
Old Town and New Town, Puerto Peñasco (modified from Ewert, 1990).

During the early 1960s, the worldwide price of shrimp rose dramatically and Puerto Peñasco embarked on another period of growth (Ewert, 1990:22). Immigrants from all over Mexico poured into Puerto Peñasco to participate in the booming shrimp business. Puerto Peñasco's rise to prominence as the center of the fishing fleet and the strains of its burgeoning population were soon recognized by the federal government. The combined efforts of the federal, state and local governments provided many needed improvements during the 1970s. Inland water wells were dug in 1974 to provide a piped-water and sewer system, replacing the need for truck deliveries. Water is currently pumped to the top of the Cerro de Peñasco into large masonry water tanks to supply the city via a gravity-feed pipe system. Electricity was provided to the city by 1979 and some of the main roads were paved.

Many improvements were also made in the harbor area during the 1970s. First the harbor was dredged and deepened in order to maintain connection to the sea at low tide. The excavated earth was used to create the large flat area on the west side of the harbor (Figure 1-2) known as the "Explanada" (Ewert, 1990:47). The Explanada is the site for "Punta Dorada"—a tourist development planned by a Mexican developer. The edges of the harbor and new infill area were built up with volcanic rock taken from a quarry on the north side of Cerro de Peñasco, opposite the fuel storage area. Concrete docks and piers were also constructed.

During the 1980s, Puerto Peñasco experienced yet another economic

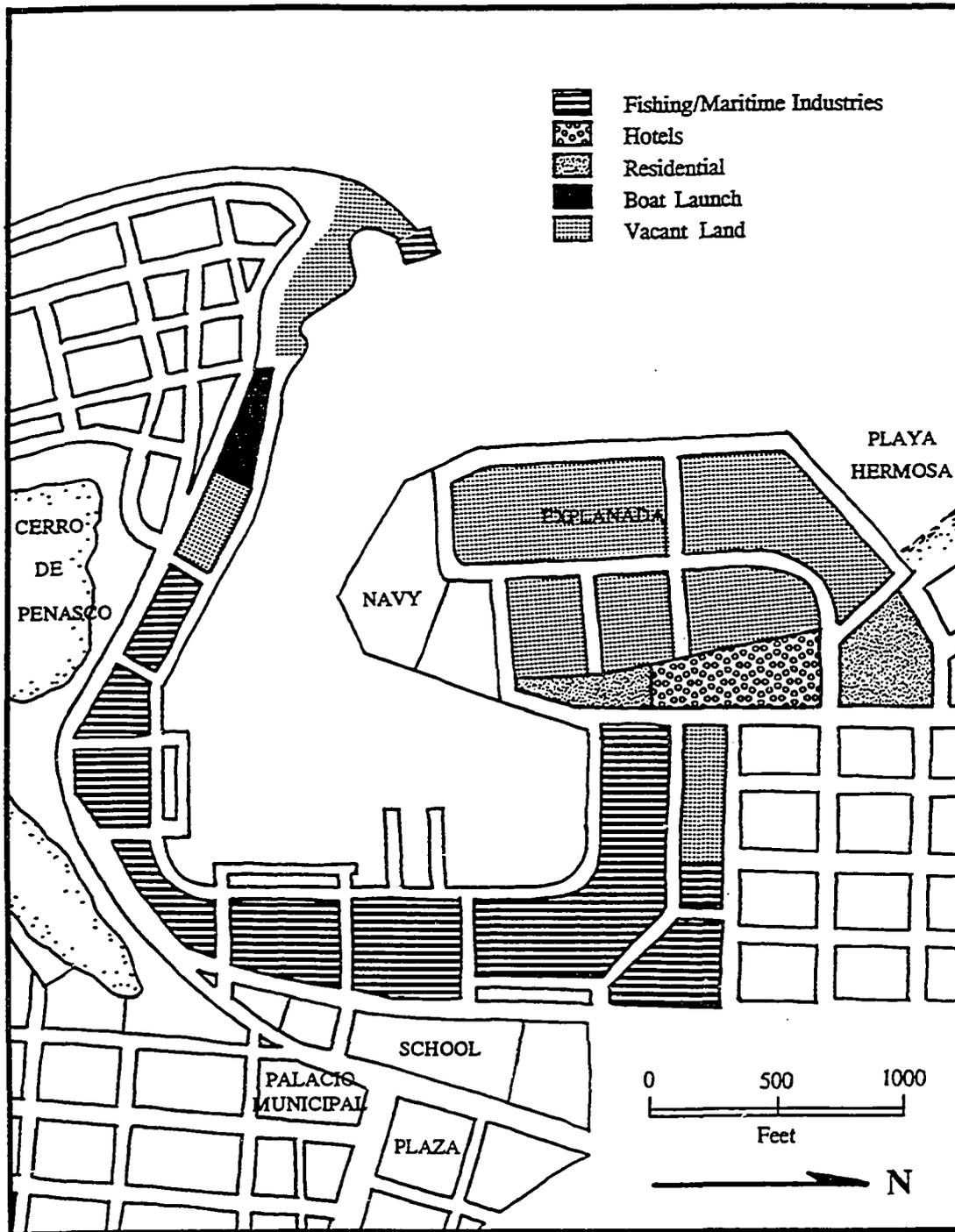


Figure 1-2.  
Existing land use in the Harbor and Explanada areas.

boom, this time in the form of tourism. Tourists—especially American tourists—have always been present, but in recent years the numbers have skyrocketed, due in part perhaps to the improved water and electric services provided in the 1970s. Puerto Peñasco has benefitted economically from the tourist boom, but has also begun to recognize some problems resulting from the rapid and haphazard development of tourism. Tourism in Puerto Peñasco will be addressed at greater length later in this chapter.

#### Decline of the Fishing Industry

In 1940, the first fishing cooperative—Punta Peñasco—was formed. The Bahía Adair cooperative was formed in 1951, followed by the Adolfo Ruiz Cortines and many others during the 1950s (Verdugo Fimbres, 1985:29). The cooperatives owned their own ships and constructed ships on a minor scale. The greater economic efficiency of these larger organizations, supported by federal legislation favoring them, facilitated a decline in the number of independent fishermen. In 1990 there were seventeen fishing cooperatives active in Puerto Peñasco (Ewert, 1990:49).

The normal fishing season runs from October through May. In the open waters of the Gulf, trawlers search for the small shrimp Penaeus californiensis. The large blue shrimp, P. stylirostris, is found in the coastal lagoons and estuaries (West, 1993:123). In addition to shrimp, the fishermen's objectives also include lenguado (flounder), cazon (dog fish or small shark), corvina (white sea bass), angelito, and mojarra (Monografía, 1992). Almost 90% of the catch ends up in

North American markets, transported mainly by refrigerated trucks (Ewert, 1990:50).

Puerto Peñasco's harbor has two concrete fueling docks and two concrete piers, one of which is equipped with winches for unloading fish from the boats. A large shipyard dominates the northeast corner of the harbor, providing repair and maintenance services. Additional supporting industries include four ice manufacturers, and nine modern packing plants that clean, freeze and package the fish for market (Ewert, 1990:48).

Until fairly recently, fishing and its supporting industries were the backbone of a thriving Puerto Peñasco economy. In the early 1980s, the fishing fleet of the state of Sonora included 717 shrimp trawlers, with 265 shrimp trawlers belonging to the cooperative societies and 452 trawlers in the private sector. Puerto Peñasco was home to 230 shrimp trawlers, with 48 belonging to the cooperatives and 182 in the private sector. Small boats operating out of Puerto Peñasco totaled 382. Table 1-1 shows the distribution of the state's fleet among the ports in the Gulf of California in the early 1980s.

The state of Sonora led the nation in total fish production in 1982 with a catch of 402,761-tons (Verdugo Fimbres, 1985:31). Baja California produced 300,937 tons. Within the state of Sonora, Puerto Peñasco produced the third largest fish catch (10,157-tons) behind Guaymas (267,877-tons) and Huatabampo (116,457-tons).

**Table 1-1.**  
The distribution of the fleet of the state of Sonora, early 1980's.

Port or Community	SHRIMP BOATS		MINOR BOATS	
	Social Sector	Private Sector	Social Sector	Private Sector
Guaymas	184	270	829	425
Puerto Peñasco	48	182	202	180
Yavaros	25	—	598	170
Gulf of Santa Clara	8	—	56	40
Bahia Kino	—	—	51	20
Other Communities	—	—	264	100
<b>TOTAL</b>	<b>265</b>	<b>452</b>	<b>2,000</b>	<b>935</b>

Source: Verdugo Fimbres, 1985.

\* Social or Public sector refers to ships owned by the cooperative fishing societies.

\*\* Minor refers to pangas—small boats of wood or fiberglass, with outboard motors.

Over-fishing has significantly affected the local and regional economies through the years. The totoaba (Totoaba macdonaldi), which was the prized catch of the early fishing camp, was declared off-limits for fishing by the Mexican government in 1975. Both the totoaba fish and the vaquita (Phocoena sinus)—the smallest known porpoise—are found only in the northern Gulf of California. In 1991, the totoaba and the vaquita were placed on the list of endangered species. The fate of these two marine animals is closely linked by their habitat and migration requirements. Although the vaquita is not a desired catch, it is often caught in fishermen's nets and drowns. According to Boyer (1993), there is no evidence today, after almost 20 years, that the totoaba population is recovering in the Gulf. Although no one knows exactly why recovery has failed

to date, potential reasons may include: 1) habitat destruction due to the lack of fresh water coming into the Gulf from the Colorado river; 2) illegal fishing of this large, tasty fish, and 3) the possibility that the over-fishing of the totoaba has been so severe that recovery is impossible.

Beginning in the early 1980s, the effect of over 50 years of trolling for shrimp began to be felt in the rapidly shrinking shrimp production. Between the 1980-81 season and the 1990-91 season, Puerto Peñasco's shrimp catch decreased 80%, from 6,400-tons to about 1,300-tons (Lowe, 1993).

Mongrafia (1992) reported that the number of shrimp trawlers currently operating out of Puerto Peñasco was 192, compared to 230 trawlers roughly 10 years ago (Table 1-1). The distribution of the fleet in Puerto Peñasco as of 1992 is shown in Table 1-2.

Peggy Turk Boyer, in an interview with Hardie (1993b) revealed that: "In 1989, 220 shrimp boats were in operation, but by the end of 1992, 30 boats were fishing for shrimp...The decline was due partially to a lack of shrimp caused by overfishing and the bank seizures of the boats of shrimp fishermen who were unable to pay off loans because they could not harvest enough shrimp." Elling (1993c) reported that forty boats were active in 1993.

To survive and thrive in the years to come, the citizens of Puerto Peñasco must address these fundamental changes that are occurring in their traditional fishing-based economy. Peñascons are faced with making some potentially difficult and painful decisions in order to prevent further degradation of their

**Table 1-2.**  
The fleet in Puerto Peñasco, as of 1992.

Port	SHRIMP BOATS		MINOR BOATS	
	Social Sector	Private Sector	Social Sector	Private Sector
Puerto Peñasco	141	51	80	40

Source: Monografía (1992:16).

\* Public sector refers to ships owned by the cooperative fishing societies.

\*\* Minor refers to pangas—small boats of wood or fiberglass, with outboard motors.

natural marine resources. Consideration must be given to new ventures and opportunities for infusing new life and diversity into the struggling economy. One of the major alternatives recognized for the Puerto Peñasco area is tourism, and more specifically eco-tourism. Other possibilities involve aquaculture—the farming of shrimp, oysters and halophytes (salt-tolerant plants).

### Puerto Peñasco Today

#### Natural Setting

Dunn (1981:22) describes the Sonora coastline as a beach barrier island-dune-estero-tidal flat system. Broad stretches of calcareous sand beaches and dunes are interrupted infrequently by volcanic hills—Cerro de Peñasco, 330 ft.—or granitic peaks—Cerro de Choya, 660 ft. Estuaries and tidal flats, like those at Cholla Bay and Estero Morua, are described as negative estuaries because the lack of freshwater from now dry rivers and high evaporation rates contribute to high salinities in these shallow basins (Ewert, 1990:13).

Puerto Peñasco is located in a land of extremes. The coastal zone of

Sonora is characterized by the juxtaposition of the driest part of the Sonoran Desert with a large body of water—the Sea of Cortez, also known as the Gulf of California. The northern Gulf is a unique environment because of the seasonal fluctuations in water temperature, its high salinity, and the extreme changes in the tides (Boyer, 1993). West of Puerto Peñasco the Gulf is relatively shallow, averaging about 200 feet deep. Surface water temperatures range from the 50°Fs in winter and to the 90°Fs in summer. The vertical range between high and low tides at Puerto Peñasco has been measured as high as 24 feet. The horizontal distance between tides can approach 3 miles in some areas of the northern Gulf, due to the gentle slope of the beach. This fluctuation in the tidal zone is the second highest found in North America (Dunn, 1981; KUAT, 1988, 1992).

Taken together, these variables are significant in shaping the plant and animal life found in the sea and along the coast. In contrast to the adjacent desert, the "wet edges" are full of life. Most obvious are the abundant varieties of shorebirds, including seagulls, dowagers, sandpipers, terns, willets, skimmers, frigate birds, herons, pelicans and many, many more. During winter months the Sonora coast is an important feeding area for a number of migrating species. Tide pools along the coast south of Puerto Peñasco function as "a window to the sea", providing habitat for a diversity of marine life (KUAT, 1992).

Because of extremely low precipitation rates, the surrounding dunes and alluvial plains support only sparse populations of small drought-tolerant shrubs.

Rainfall averages 3.7 inches (9.3 cm) annually, with large year-to-year variations. Late summer thunderstorms account for much of the precipitation, while winters are characterized by a few "quiet drizzles". Humidity is highest during the summer months, averaging 58.1 percent in August, falling off to an average 33.8 percent in November (Dunn, 1981:14). Average temperatures range from 52°F (11.3°C) in January to 86°F (30°C) in August. Winter lows hover around 30° to 32°F with high temperatures reported from 110°F to 130°F (Ewert, 1990:16; Ives, 1989:131).

#### New Biosphere Reserves in the Northern Gulf of California

On June 10, 1993, President Carlos Salinas de Gortari paid a visit to Puerto Peñasco to announce the creation of new "biosphere preserves" in northern Sonora. Four million acres of land and sea will be protected in the new preserves. The uppermost Gulf and Colorado river delta will be designated as a 384,000-acre Nuclear Zone, a highly restricted zone where only educational and research activities will be allowed. A 1.8 million acre Buffer Zone extends southward from the Nuclear Zone to an imaginary line drawn from Puerto Peñasco to San Felipe, Baja California. Also designated as biosphere preserves are the Pinacate volcanic area and the Grand Altar Desert which borders the Organ Pipe National Monument of the United States. (Lowe, 1993; Hardie, 1993).

Within the Buffer Zone, fishing with gill nets will be allowed for three more years, but restrictions will be placed on the mesh size of the nets. The three-year grace period for fishing is intended "...to allow fishermen time to find other

means of making a living [or]...to find alternative fishing methods that are less harmful to the environment..." (Hardie, 1993a;1993b). No foreign boats will be allowed to fish the Buffer Zone and limits (or possibly a ban) will be established for shrimp trolling. The formation of the preserve is necessary to protect the endangered totoaba fish and the vaquita porpoise, as well as to facilitate the recovery of the shrimp population.

In addition to the protection of Sonora's natural resources, Mexican officials hope that the new preserve will draw more American tourists to the area, providing a more diversified economy and more jobs for local people displaced from the fishing industry. The plan for the area includes construction of a marina, a hotel and an international airport for tourism, as well as loans from the federal government to help fishermen develop new businesses in the field of aquaculture. Consideration is also being given to training local fishermen as tour group leaders and organizers to ensure their participation in the budding eco-tourism industry (Lowe, 1993; Hardie 1993a).

#### The City and its People

According to West (1993), the population of Sonora has been growing at an annual rate of 3.5 to 4.0 percent, compared to the national annual average of less than 3 percent, during the period from 1950 to 1990. The population of Puerto Peñasco increased by 8,475 people, or 48%, between 1980 and 1990, for an annual growth rate of 4.8% (INEGI, 1980 & 1990). Monografía (1992) reported that the average growth rate for the city over the last 5 years

was 3.39%.

The municipality of Puerto Peñasco is situated on 5,639 sq. km. in northwest Sonora, Mexico and shares a border with the United States (Monografía, 1992). When it was originally created in 1952, the municipality was much larger—9,774 sq. km.—and included the town of Sonoyta. But in 1989, its territory was reduced in order to create the new municipality of General Plutarco Elias Calles centered around the town of Sonoyta. Due to this change in the geographical area of the Puerto Peñasco municipality, much of the municipality-level census data from 1990 cannot be compared to surveys from earlier years.

The 1990 census of Sonora was conducted by Instituto Nacional de Estadística Geografía e Informática (INEGI). Much of the information is reported by municipality, a division similar to counties in the United States, but sometimes the information is further subdivided by "localidad"—location, town, settlement or ejido. Data on the localidades may still be compared between census years, but this level of detail is only available for the total population of the towns and a few other categories. Most of the information reported here refers to the entire municipality. Since the population of the city of Puerto Peñasco comprises 98% of the municipality's population in 1990, it is assumed that the municipality-level data is also representative of the city. This assumption cannot be made however for earlier censuses because of the inclusion of Sonoyta in the municipality-level data.

In 1980 the city of Puerto Peñasco was the largest population center in its municipality with 17,666 people, followed by Sonoyta with a population of 5,430 (INEGI, 1983). In 1990, the municipality had a total population of 26,625, with the city of Puerto Peñasco accounting for 26,141 (98%) of the inhabitants (INEGI, 1991). Today, the city of Puerto Peñasco is the capital as well as the largest city within its municipality, occupying about 900 hectares (SIUE). The population of the city is almost evenly split between men (51%) and women (49%).

Within the municipality there are 35 additional "localidades", including La Choya and Las Conchas, with most of them having fewer than 100 residents. Amazingly, 65% of the 1990 residents were born in the municipality. Of the 22,946 residents who are 5 years of age or older, 91% (20,836) were living in the municipality in 1985. In other words, there was a migration rate of 9% into the municipality between 1986 and 1990. The largest sources of immigrants were Sinaloa, Baja California, Jalisco, and Distrito Federal.

The Catholic religion is practiced by 88% of the people, while 5% are Protestant or Evangelical and 4% claim no religion. About 90% of the school-age and adult population is literate. Although 17 different indigenous languages are represented in the municipality, these native languages are spoken by less than one percent of the population. Marital statistics are reported for people who are 12 years or older. Of this group, 44% are married, 38% are single, 13% are living together outside of marriage, 3% are widowed, and 2% are separated or

divorced. The average number of children (born alive) is 4.0 children per woman.<sup>1</sup>

Nearly 100% of city residents live in a single-family dwelling. In 1990, 5,593 single-family dwellings existed with an average of 4.65 occupants per dwelling. 76% of the dwellings are owned by the occupants. Construction materials are substandard in about 22% of homes, consisting of cardboard (lamina de carton) or waste materials (materiales de desecho), and 7% of dwellings have only an earthen floor. Ewert (1990:74) reported that 55% of the homes are constructed of concrete block and 34% of wood. City water is piped (agua entubada) to 92% of dwellings while 70% are connected to a sewer system (con drenaje). Electricity is connected to 91% of the dwellings. The city is spread out over an area of 900 hectares although about 27% of the urban land is vacant (SIUE). The employment structure is shown in Table 1-3.

#### Old Town and the Harbor Area

The character and physical layout observed in Puerto Peñasco today is a "hybrid landscape" resulting from influences from central Mexico and the American Southwest (Ewert, 1990:26). Dominated by the Cerro de Peñasco, Old Town is the city's "historical core." The street pattern is a rough grid laid out a little bit west of north to make the most efficient use of available land around the hill. The narrow streets were paved in 1948, using a durable

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<sup>1</sup>This figure is derived by dividing 22,934 children by 5,712 women; the figure of average 2.6 children reported in INEGI (1990), Cuadro no. 24, p. 528 appears to be in error.

**Table 1-3.**  
Puerto Peñasco's employment structure.

PERCENTAGE	TYPE OF EMPLOYMENT
35	FISHING: shrimp boat crew members, dock workers, cannery persons, ice plant crews, drivers, etc.
18	COMMERCE: both tourist and local.
15	TOURISM: hotels, restaurants, rental properties, charter boats, etc.
10	CONSTRUCTION: both tourist and local.
16	OTHER
6	INDUSTRY: block and brick factories, ship building.

Source: Ewert, 1990:116.

aggregate of crushed sea shells. Small one- and two-story homes with shared walls front the streets with little or no setback, giving the impression of row houses. Many of the earliest structures remain, built of volcanic rock, plastered adobe and crude brick. Newer homes are constructed with concrete block.

Residences and businesses are mixed throughout, as shown on Figure 1-3. Neighborhood bakeries, drugstores and markets serve both locals and visitors. The southern end of the Malecon Fundadores is anchored by two of the city's largest hotels and a few restaurants. A commercial area centering around the fish market occupies the northwest section near the harbor. Old Town—and especially Malecon Fundadores (Founder's Levee)—is an important tourist attraction. In the fish market, tourists mingle with Peñascan businessmen and shop for imported tourist items including T-shirts, ironwood carvings, blankets



and jewelry. A 14-foot wide sidewalk and a few struggling palm trees set in 6-foot square seawall planters, span the seaward edge of the malecon for those who like to stroll along the waterfront. Along the seaward edge of the sidewalk, a near vertical drop off of about 8 feet exists, unprotected by railings, down to a rough, rock-covered "beach". Beyond the fish market, there is little activity along the malecon except for parking of vehicles, and the pedestrian path dead ends at the Vina Del Mar hotel. However, in recent months at least one residence has been converted into an attractive restaurant (with parking available only along the street). Between the two hotels the road makes a sharp turn, leading abruptly into residential areas and turning in front of an elementary school. This juxtaposition of residential and tourist zones creates a safety hazard for the school children.

Puerto Peñasco's namesake and major landmark—the Rocky Point—rises to an elevation of 330 feet above sea level near the Vina del Mar hotel. This important landmark is gradually being destroyed both visually and physically. Physical destruction has occurred due to expansion of the Vina del Mar hotel. The owners have dynamited away portions of the hill in order to facilitate the expansion. In addition, a dump site has developed on the Vina del Mar site on the seaward side of the hill. Historically, the rocky point has been an important source of building materials for homes, businesses and harbor construction. Today, however, most homes are constructed out of concrete block and wood. The significance of the point as a natural monument to Puerto Peñasco's history

and heritage, as well as its potential as a tourist attraction should far outweigh its value as quarry material or private property.

Over the years, the Cerro de Peñasco has been subdivided into residential lots and several homes have been built or are under construction. Above-ground water lines running down the north side of the Cerro are highly visible to tourists along the entry road to Old Town. The most glaring visual intrusion is as recent as 1993—a large, two-story pink building on the very top of the hill, which is intended as a restaurant for the Vina del Mar hotel. As private interests continue to develop the hill, public access will eventually be restricted or denied, and this unique natural resource has the potential of becoming an embarrassment to the community.

### New Town

With the completion of the railroad and the old U.S. Army Corps highway in the early 1940s, Puerto Peñasco entered a boom cycle and soon outgrew its original town site. Early development followed the northeast-southwest Highway 8 corridor, an important economic link to the outside world. Today, the highway is called Boulevard Juarez within the city limits and it functions as the "commercial heart" of the city. Along a 3-mile strip, about 500 businesses within a block or two of the boulevard serve local residents as well as tourists.

The north-south grid system of streets serving largely residential areas was probably laid out in the 1950's, around the time that Puerto Peñasco became a municipality. Roads are wide, unpaved and dusty. Many of the nicer homes are

located within a few blocks of the business district, but Puerto Peñasco has not developed an elite residential sector and "elegant homes and shacks are likely to be neighbors" (Ewert, 1990:71).

Most homes in the new town are single story. The costlier homes are stand-alone structures constructed of brick, cinder block, stone and plaster and feature garages and fenced, landscaped courtyards. Farther back from the commercial strip, more modest homes are built from cinder block and wood. Ewert (1990:72) observed that: "These residential areas show signs of transition from rudimentary shelter to permanent structures...As homeowners garner better wages or job security, they make improvements by adding new rooms, planting trees or completing roughed out additions. Cement mixers, unpainted walls and twisted reinforcing bar poking from foundations are common sights in these sections of Puerto Peñasco." On the edges of the built-up areas, the poorest residents and recent migrants have established various forms of shelter out of scavenged materials. These areas are not served by city water, sewer or electricity and residents must use outhouses and cook on open fires (Ewert, 1990:73).

Puerto Peñasco's grid street pattern is a feature that Ewert believes is "rooted in traditional Mexican forms" that were first prescribed in the "Laws of the Indies" from 1523 to 1656 to guide Spanish conquerors in the development of new towns. Puerto Peñasco's central plaza, shown in Figure 1-4, also reflects many design elements that were dictated by the "Laws". The plaza is located

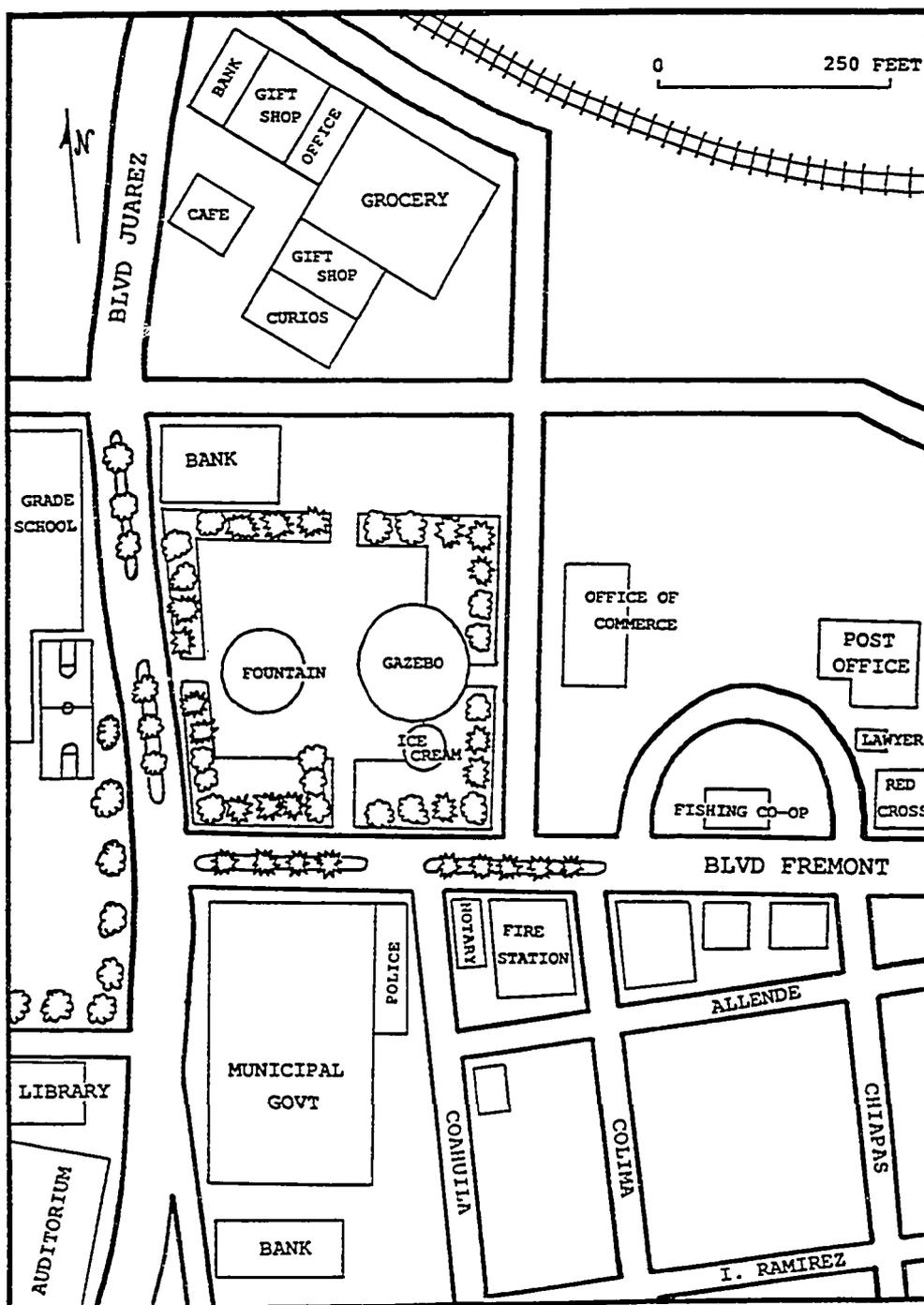


Figure 1-4.  
Puerto Peñasco's central plaza area (Ewert, 1990).

near the harbor, is rectangular in shape with parallel streets aligned in the cardinal directions of the compass, and is surrounded by some of the city's most important buildings (a school, bank, fire and police stations, and city government offices). An important missing element however, is the Catholic church, which is located in Old Town.

Some of Puerto Peñasco's uniquely Mexican attributes, as identified by Ewert include: the strange-shaped buildings, lots, and intersections resulting from the grid and diagonal street patterns; the presence of street vendors; advertising on the sides of buildings; the leisurely pace of street life; the use of bright colors in residential and commercial buildings; fencing in front of houses; small stores ("abarrotes") scattered throughout residential neighborhoods; and a busy central business district around the central plaza that does not close down after working hours.

American influences in Puerto Peñasco include: a new mini-mall with several commercial ventures under one roof, located north of the central plaza; a landscape of signs in both Spanish and English; the abundance of older model American cars; American-style, low-fenced front yards; American products in local grocery stores; American designed, built and marketed tourist developments; American building materials, especially in Cholla Bay; large, expensive homes in Las Conchas; and tourists in general.

### Tourism and Corresponding Development in Puerto Peñasco

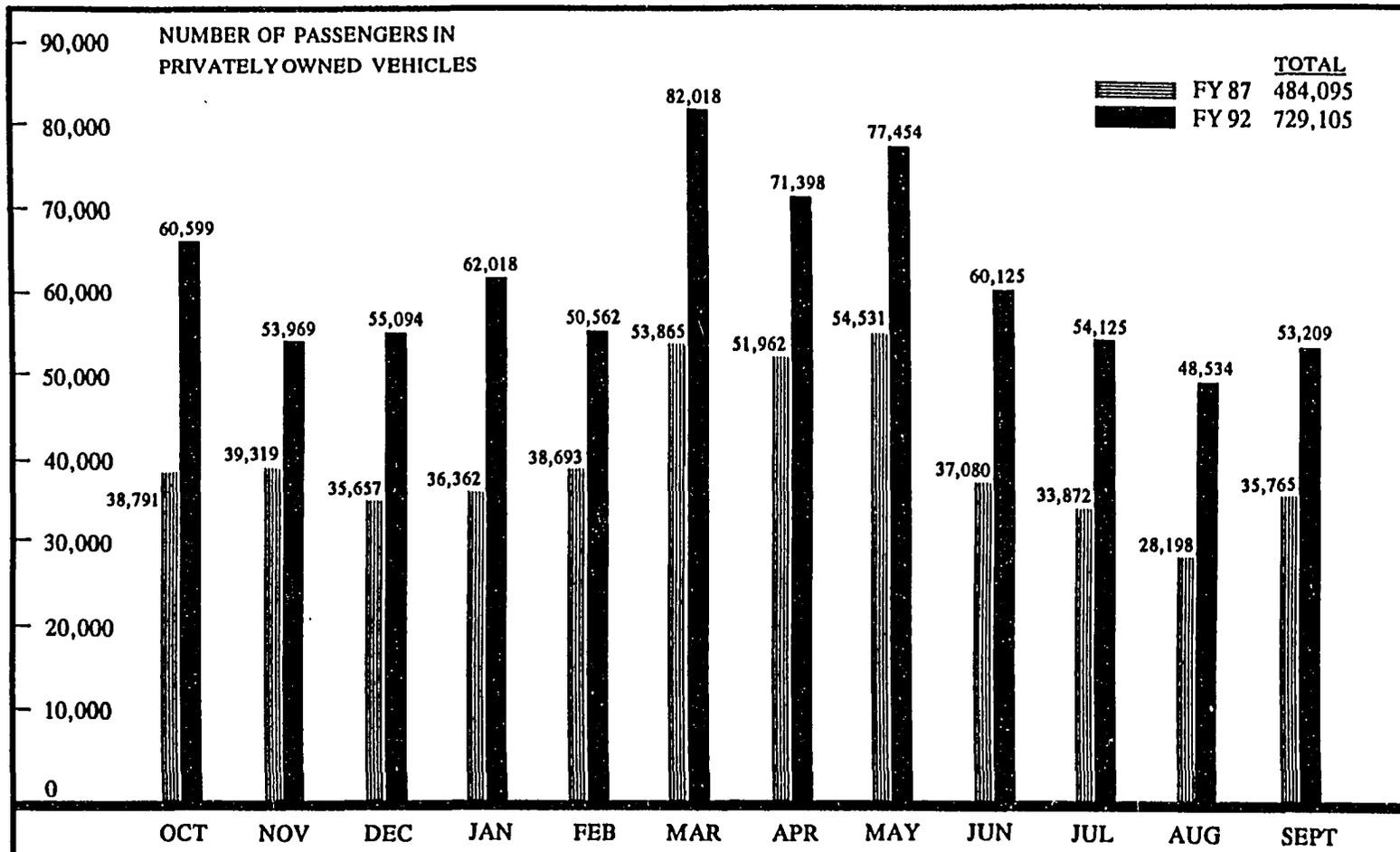
Puerto Peñasco has a legacy of tourism going back many years. Beginning with the first short-lived hotel, built in the 1920s, Americans and a few other foreigners have enjoyed the low-key nature of tourism along Puerto Peñasco's coastline. Many of the existing hotels were built within the last ten years, so in earlier days, tourists either camped or stayed with Mexican friends and families. Turk Boyer (1993), recalls that Americans who visited Puerto Peñasco 13 years ago were of a very "adventuresome" nature. Today, tourists require the "comforts of home". Many tourists are repeat visitors, coming back on a yearly basis. This group of tourists has developed very friendly relations with the Peñascons and tend to get involved with the local community. According to Turk Boyer, American and Mexican families often "adopt" each other, visiting and watching out for each other, as relatives of any family might do.

In the early 1980s, Americans from Arizona and California discovered Puerto Peñasco in large numbers, initiating a tourist boom that continues today (KUAT, 1988). For cities in Arizona like Tucson and Phoenix, the Gulf of California is the closest beach available. Rocky Point soon gained a reputation as a "poor man's vacation spot for college students and others on a budget who wanted to enjoy the sea" (Elling, 1993a).

The number of tourists visiting Puerto Peñasco in recent years varies depending on the source. For the year 1987, SIUE (1992) reported that the total number of Mexican and foreign tourists to Puerto Peñasco was 546,287. If

the number of visitors was consistent from month to month, this would average out to 45,524 tourists a month. According to historian Memo Munro (KUAT, 1988), 240,000 Americans were expected to visit Puerto Peñasco in 1988. This figure translates into a monthly average of 20,000 tourists to a city with a 1990 population of 26,141 (INEGI, 1991).

Studying the number of border crossings at Lukeville, as shown in Figure 1-5, can give some indication as to the numbers of American tourists, since these crossings can be largely attributed to U.S. citizens returning home via the most direct route from Puerto Peñasco. For fiscal year 1992, the total number of passengers in private vehicles crossing from Mexico to the U.S. at Lukeville was 729,105 people, or an average of 60,759 people per month. During the peak months of March, April and May, the average number of passengers in private vehicles was 76,957 (U.S. Customs Service). Some of this activity is due to crossings by Mexican citizens from Sonoyta and Puerto Peñasco, and to through traffic on Mexico's Highway 2. The amount of this activity is not known however, since U.S. Customs does not record the destination or citizenship of people crossing the border, only total numbers. If we assume, conservatively, that 75% of the people crossing were home-bound U.S. tourists, we can determine that Puerto Peñasco receives about 60,000 tourists a month from the United States during peak season, compared to the town's population of 26,141. In addition to private vehicles, between 10 and 13 tour buses from the U.S. bring visitors to Puerto Peñasco every month.



**Figure 1-5.**  
 Comparison of Fiscal Years 1987 and 1992: border crossings into the United States at Lukeville, Arizona. (Source of data: U.S. Customs, Nogales, Arizona).

Boyer (1993) estimated that the Intercultural Center for the Study of Deserts and Oceans (CEDO) had 3,500 visitors on their tours during the month of March 1993, which is one of their peak months. This does not include people who drive up at all hours of the day and night to look at the whale skeleton on display outside. The regular tour schedule offers one tour on Tuesdays and one on Saturdays. However, extra tours were added to the schedule in March and April of this year, due to the demand from tour bus operators who recently "discovered" CEDO.

Carmona (1993) estimates that the number of tourists visiting the coastal area between Cholla Bay and Punta La Salina will exceed 924,000 people in 1993. Tourism is expected to provide 394 jobs within this area. Depending on the level of tourism development that occurs, between 1.2 and 1.7 million tourists might be expected by the year 2,000.

Table 1-4 is a list of hotels, motels, and RV campgrounds in Puerto Peñasco, compiled from tourist maps distributed by hotels and auto insurance agents. In 1990, Ewert (p.94) reported that Puerto Peñasco had less than 400 hotel rooms distributed among 15 hotels; three hotels were observed to be under construction at that time. SIUE (1992) reported that there were 268 hotel rooms and 716 RV trailer spaces available, and that these units met only 66% of the tourist demand, based on the 1987 count of 546,287 visitors. If these numbers are accurate, the unmet 34% of tourist demand translates into 91 hotel rooms and 243 additional trailer spaces needed to meet current demand.

**Table 1-4.**  
Hotels, motels and RV parks in the Puerto Peñasco area.  
(Additional rental units—condos, cottages and private homes—  
are not listed here).

<u>Between Rocky Point and Estero Morua</u>	<u>Between Rocky Point and Cholla Bay</u>
Pithaya Hotel	Playa Bonita Motel
Fiesta de Cortez	Playa Hermosa Hotel
Inn Suites	Playa Bonita RV Park
Granada del Mar	Playa Hermosa RV Park
Manny's Beach Club	Peñasco Beach and Tennis Club
San Rafael RV Park	Sandy Beach Trailer Park and Campground
Playa Miramar RV Park	
Clomar RV Park	<u>New Town</u>
Playa de Oro RV Park	Hotel or Motel Seniorial
Playa Elegante RV Park	Faro Motel
	Mar y Sol Hotel
<u>Old Town</u>	Posada del Leon
Vina Del Mar Hotel	Villa Granada
Costa Brava Hotel	Motel El Cid
<u>Cholla Bay</u>	
Vista del Mar Motel	

Table 1-5 is a list of tourist user groups observed in Puerto Peñasco. Presently, there are no statistics available delineating the size or economic importance of each group. Ewert (1990:93), however, believes that the American snowbirds and "their RV parks may be the fastest growing faction of Puerto Peñasco's tourist areas."

During the winter months, the tourist who comes to Puerto Peñasco tends to be a retired senior citizen often traveling in a recreational vehicle (RV). Elling (1993b), reports that RV parks are full in February with "snowbirds" from

**Table 1-5.**  
Tourist user groups in Puerto Peñasco.

American tourists	Hotel/motel users
Mexican tourists	Rental home, condo, cottage users
Puerto Peñasco residents	Vacation/retirement home owners
College students	Tent and truck campers
Spring Break crowd	RV campers
Senior citizens	Off-road vehicle users
Families with children	
Long term visitors, weekly to seasonal	
Short term visitors, long weekends	

Alaska, Washington, Oregon, Canada and many other places. In a survey of 554 RV park visitors in March 1989, Ewert (1990:92) found that 33.9% came from Arizona, followed by 19.7% from California—as illustrated in Figure 1-6. The retirees are generally long-term (often repeat) visitors, staying anywhere from a weekend to four or five months, relaxing in one spot or traveling up and down the coast. They tend to be a very sociable group, spending days bicycling around town or on chartered fishing boats, returning in the evenings for happy hour at the hotels or cookouts on the beach. The city is relatively quiet and peaceful during the winter tourist season.

The spring weather brings bigger crowds and a party atmosphere. College students on spring break vacations overwhelm the town in March. Tourists can choose from about 16 hotels, several RV parks (Table 1-4), numerous rental homes in Las Conchas and Cholla Bay, or camp on the beach. Campers at Sandy Beach, generally speaking, are short-time visitors staying only 3 to 4 days.

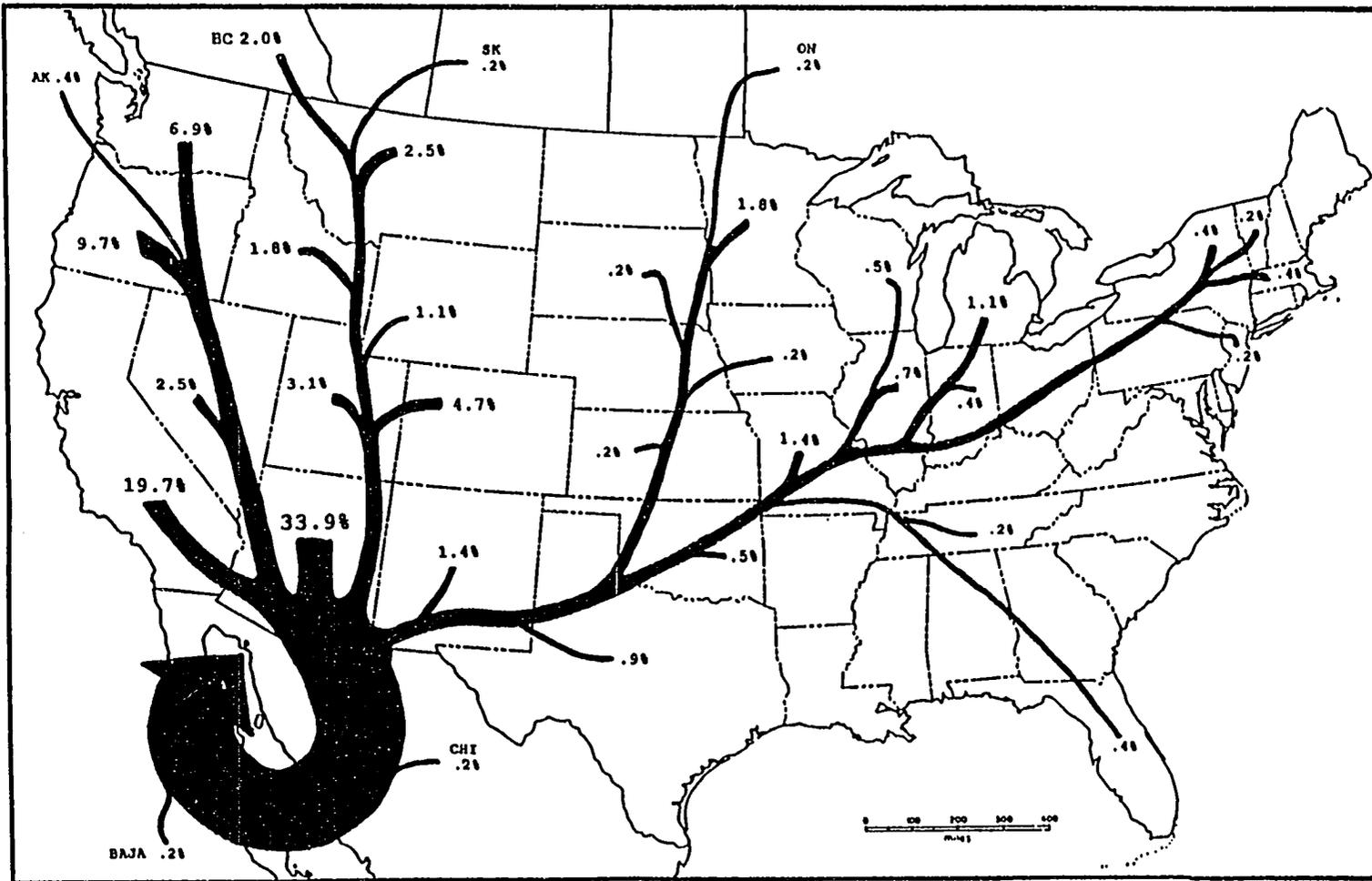


Figure 1-6.  
Where RV park users come from (Ewert, 1990).

These visitors bring off-road vehicles (ATVs), sailboats, catamarans, rafts, and sailboards; they play volleyball and horseshoes, listen to music from portable stereos, set off fire-works, consume lots of alcohol, and socialize around large fire pits dug in the sand (Ewert, 1990:100).

The perception among residents is that the city's population doubles during the peak tourist season (Turk Boyer, 1993). The tremendous increase in population taxes city services in many ways. The water distribution system that currently serves the city is inadequate to meet the needs of the city during the tourist season (Turk Boyer, 1993; personal experience). City water service typically is unavailable for a couple of hours each day during the demanding tourist season. When repairs are required on the pumps or pipelines, the city may be without running water for days at a time, as recently demonstrated during a 3-day period in the spring of 1993, causing the premature departure of some tourists (Turk Boyer, 1993). Many residences and businesses have installed reserve tanks to tide them over during periods when city water is not available. Some areas, like Cholla Bay, are completely dependent on water delivered by trucks.

A sewer system serves the majority of the city, but is inadequate due to the placement of the oxidation lake which is intended to receive the waste material. The elevation of the oxidation lake is higher than that of the densest urban and tourist areas along the coast, preventing the use of gravity to carry sewage to the lake. Instead, much of the sewage from coastal developments is

discharged directly into the sea (Carmona, 1993). Tourist areas like Las Conchas and Cholla Bay do not have sewer systems, relying mainly on septic systems for waste disposal.

American tourists have introduced the recreational use of off-road vehicles like the ATV 3-wheelers to the Puerto Peñasco area. When sensibly used these vehicles can provide great sport as well as practical transportation around town. However, problems with these vehicles (and their drivers) have become increasingly evident over the years. Indiscriminate riding over sand dunes and in the estuaries damages fragile plants and wildlife breeding grounds. Riding on crowded beaches poses safety hazards for pedestrians and sunbathers.

Some tourists who come to Mexico with the perception that they are "entering a country without laws" tend to behave less responsibly than they would at home, causing trouble for themselves as well as for local authorities. The party atmosphere on weekends and especially during spring break is typically accompanied by large amounts of alcohol. One perception among residents is that 80 percent of the people driving the roads on Saturday night, including both Americans and Mexicans, are drunk. Police seem to enforce public drunkenness and drunk driving laws more strictly for the local population. Tourists are treated with more leniency for fear of running them off and hurting the tourist business (Turk Boyer, 1993). For Comandante de Policia Ruben Soto, "excessive consumption of alcohol is a problem and results in many driving accidents" (KUAT, 1988). Accidents and injuries keep police and medical personnel

stretched to their limits during the tourist season.

According to KUAT (1988), many Peñascoans are reluctant to admit that tourists cause any problems. Tourism brings in much needed foreign capital, benefiting local businesses and the local people. The jobs that tourism provides are especially important today, as the decline in the fishing industry is increasingly reflected in the local economy.

Outside of fishing, boating, swimming, sunbathing, and a little shopping, activities available to tourists are limited. Tour companies and tour bus operators generally take their clients to the fish market/harbor area and then to "Cholla Bay Mall", a tourist shopping area along the entrance of the road to Cholla Bay. As noted earlier, tour operators recently "discovered" the educational tours available at CEDO and began bringing large numbers of tourists to the facility.

Although Puerto Peñasco attracts large numbers of tourists, the economic impact to the local economy is weakened by the nature of available lodging facilities. Income from rental homes, condos, and cottages goes to individual American owners and some Mexican owners. Most tourists arrive in Puerto Peñasco by car. These tourists, who rent accommodations with kitchens, or camp in RV parks and on the beach, generally bring most of their own food and other supplies with them and do not contribute much to the local economy.

#### Tourist Developments

Las Conchas. Las Conchas is a development of relatively attractive, high quality homes along the beach east of Cerro de Peñasco (Figure 1-7). It is, in

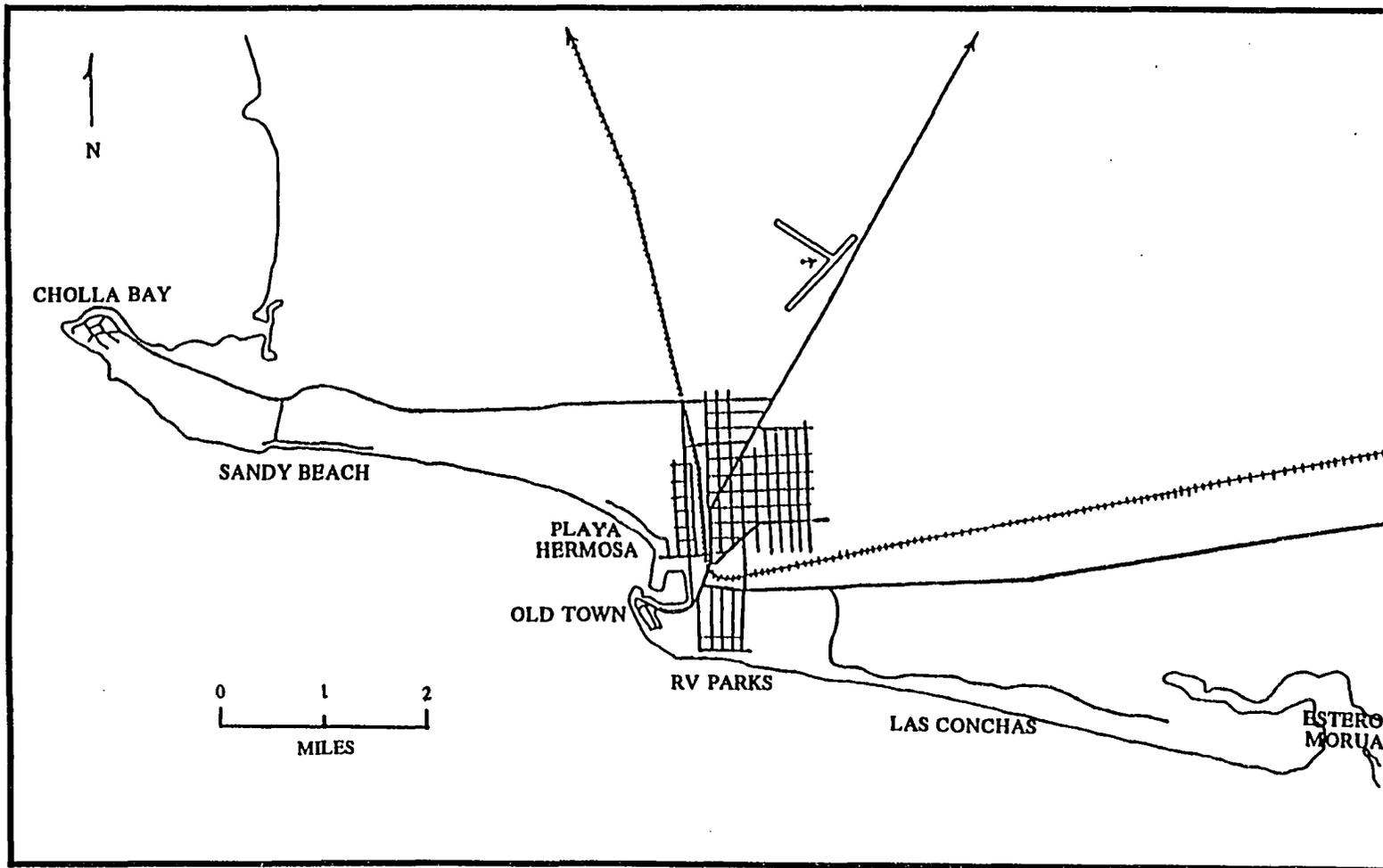


Figure 1-7.  
Tourist areas in and around Puerto Peñasco.

essence, an American community in a foreign land. Developed originally by an American, Las Conchas has strict building guidelines and a homeowner's association that vigilantly enforces regulations concerning noise, access, and off-road vehicles. The one- and two-story modern homes are white stucco, with red tile roofs evoking images of Spanish Colonial and Mediterranean styles of architecture. About 320 homes have been built so far, and it is estimated that 50% are rental homes, while the other 50% are occupied by residents on a year-round basis (Clifton, 1993). The homes are served by city water and electricity, but rely on septic systems for waste disposal.

The subdivision features three rows of building lots running parallel to the seashore for a distance of 4 miles along the coast. Beach front lots begin at \$45,000, while third row lots range from \$10,000 to \$5,000 (Ewing, 1990:88). Most homes built to date are on the beach front lots, so that the development forms an almost continuous line of expensive homes along the beach. Rental homes, cottages, and condominiums in Las Conchas start at about \$125 per night in season, or \$450 for 3 days, and range up to about \$650 for a full week (Elling, 1993a).

For locals and tourists alike, there is limited access to the beach along this stretch. A few vacant lots allow easy access currently, but this situation will not last. The only other access is through narrow alleys between homes which have the appearance of private property rather than public pathways. Many homeowners have constructed gates and fences to block these paths. Parking is

limited to the dirt roads in front of private homes.

The problem of linear beach development and restricted access is not limited to the Las Conchas development. Where Las Conchas ends not far from Estero Morua, a new project—Paz del Mar—is currently being advertised in the area on billboards, in English. This new development of residential lots starts up where Las Conchas ends and continues eastward down the beach toward the estuary.

Puerto Peñasco RV Parks. Puerto Peñasco has eight RV parks, located near Playa Hermosa, and between Cerro Peñasco and Las Conchas (Figure 1-7). A full service RV park like Playa Bonita charges \$13 to \$16 per day for a space and provides amenities such as water, power, TV, showers, a laundromat, recreation room and small bar with a pool table (Elling, 1993b). Weekly rates for a beach front space start in the low \$70s, while the monthly rate starts at \$240 (Ewert, 1990:90).

Old Town. Only two hotels—Vina del Mar and Costa Brava—are located in Old Town. They are considered medium-priced hotels with rooms ranging from \$50-55 a night, and suites with kitchenettes for \$115 (Elling, 1993a). These hotels are at somewhat of a disadvantage because there is no sand beach in this area of Old Town. Tourist attractions in Old Town include the fish market, a few restaurants, and outdoor souvenir stands.

Cholla Bay. Cholla Bay (Figure 1-7) is an unplanned and largely unregulated development that was marketed as a "poor man's paradise" by

Chihuahuan native Gustavo Brown (Ewert, 1990:83). Americans flocked to this picturesque peninsula beginning in the 1950s in Airstream trailers that still remain in places today. Beach cottages are crowded together on small lots, haphazardly constructed from a variety of materials, and many do not have electricity. Water is brought in by truck and stored in roof-top tanks, and residents rely on septic systems. In 1989 there were about 600 homes in Cholla Bay, but only 70 residences were occupied on a year round basis.

Sandy Beach. The Sandy Beach Trailer Park and campground is located on a beautiful stretch of white sandy beach and is accessed from the road leading to Cholla Bay (Figure 1-7). Self-sufficient campers can park on Sandy Beach for \$3 a night (Elling, 1993b). Facilities are limited to an entry building, a few outhouses, a shower building, beer and food stands, and an ATC rental area. Litter is a serious problem after a busy weekend; it is common to encounter broken glass, trash and remains of campfires throughout the beach.

Playa Hermosa. Playa Hermosa (Figure 1-7) is the beach currently favored by local residents, especially on Sunday afternoons. Puerto Peñasquans access this beach along the northeast corner of the vacant Explanada where parking is presently available along the paved roads. Beneath palapa shade structures, families and friends cook-out, socialize, and enjoy the beach setting. Behind this beach, the Las Gaviotas condominiums have been terraced into the dunes. These units are priced from \$95,000 to \$100,000 (SIUE, 1992). A medium-priced hotel (Playa Bonita), another trailer park/campground, and

condominiums under construction are also located along Playa Hermosa.

Explanada. A new tourist wharf called Punta Dorada is planned by a Mexican developer for the Explanada (Figure 1-7). The first stage, scheduled for 1992 but not yet begun, is to include construction of a hotel, townhouses, a marina, time-share units, a shopping mall, restaurants, bars, tennis club and swimming pool. The plan provides for 208 units of tourist lodging and 150 yacht landings (SIUE, 1992).

### Local and Regional Sources of Water

The availability of fresh water—or lack of it—in the deserts of northwest Sonora has had a great influence on human settlement patterns and economic development in the region. The Pinacatenos Indians (Sand Papagos) were hunters and gathers, traveling to take advantage of seasonal game and edible plants. Within the arid Gran Desierto de Altar, the Pinacatenos were dependent on two main sources for water: 1) rainwater that collected in the "tinajas" or mountain water holes in the Pinacate mountains, and 2) pozos, or shallow wells dug into the sand dunes along the coast to collect rainwater. Ives (1989:89) uses the term "archaeologically sterile" to describe the area of the lower Sonoyta River valley... "from Batamote water hole [roughly half-way between Sonoyta and Puerto Peñasco] downstream to within a few hundred yards of the Gulf of California..." This area was rarely occupied or frequented by Indians, mainly due to the absence of fresh water.

Human settlement in the Puerto Peñasco area started relatively late, in the 1920s, due in large part to the lack of fresh water available (Boyer, 1993). The early fishing camp at Puerto Peñasco depended on water trucked in from Sonoyta for the most part. A well constructed by the American John Richardson, supplied fresh water to locals and tourists for a brief time in the late 1920s and early 1930s (Verdugo Fimbres, 1985; KUAT, 1988). Information on the depth and water quality of this well is difficult to find, but there is no indication that a significant freshwater aquifer exists in Puerto Peñasco. The more likely scenario is that rainwater runoff from the Cerro Peñasco was channeled into a limited (seasonal?) aquifer sufficient to supply the very small population at that time.

According to Dunn (1981:55), freshwater is (or was) also available at Espinosa's Camp "...a resort community about 2.5 km [1.5 mi.] east of the mouth of Estero Marua [sic]. Two shallow, hand-dug supply wells for the community yield water with a salinity of 5 to 7.5 ppt [parts per thousand]...These wells are located just south of an inland swamp where freshwater plants have been identified...and about 150-m north of the shore...[it has been] postulated that the swamp and nearby ground water are recharged by intermittent flows down the Rio Sonoyta." An intermittent source of water such as this may be adequate for the present small population, but probably would not support much additional growth in the area. A fresh water aquifer located this close to the coast is at great risk of contamination by seawater.

Aside from a few rare freshwater "oases", groundwater in the immediate vicinity of Puerto Peñasco is saline and unsuitable for drinking. According to Dunn (1981:36), "...freshwater recharge to the ground-water system is negligible..." in the Puerto Peñasco area because rainfall is "...far exceeded by potential evapotranspiration." In the 1970's, researchers from the University of Arizona identified two coastal (saline) aquifers along the coast east of Cerro de Peñasco: 1) the Coquina Bedrock that parallels the shoreline between Estero Morua and Cerro de Peñasco, and at Playa Hermosa and Estero La Cholla; and 2) the Estuary Sand that underlies the Coquina Beachrock and replaces it in the landward direction. Existing and new wells were evaluated for potential sources of saline water needed for experimental shrimp farming and aquaculture projects. Figure 1-8 shows that the salinity of the coastal aquifers ranges from 36 to 80 ppt in the University of Arizona study area.

Drinking water for the city is presently supplied by two wells located 20 km and 50 km to the northeast, in the Rio Sonoyta (SIUE, 1992; Dunn, 1981). Even in 1950, it was recognized that the lack of a potable water supply was the most critical obstacle standing in the way of the city's growth (Ives, 1989). At that time, Puerto Peñasco was served by one fresh water well in Colonia Comargo, whose source was believed to be sub-surface flow of the Sonoyta River. From this site along Highway 8, water was trucked about 12 miles (approx. 20 km) south to Puerto Peñasco. When the pumps broke down, water had to be hauled from Sonoyta, a distance of about 65 miles. Ives (1989:141) reported

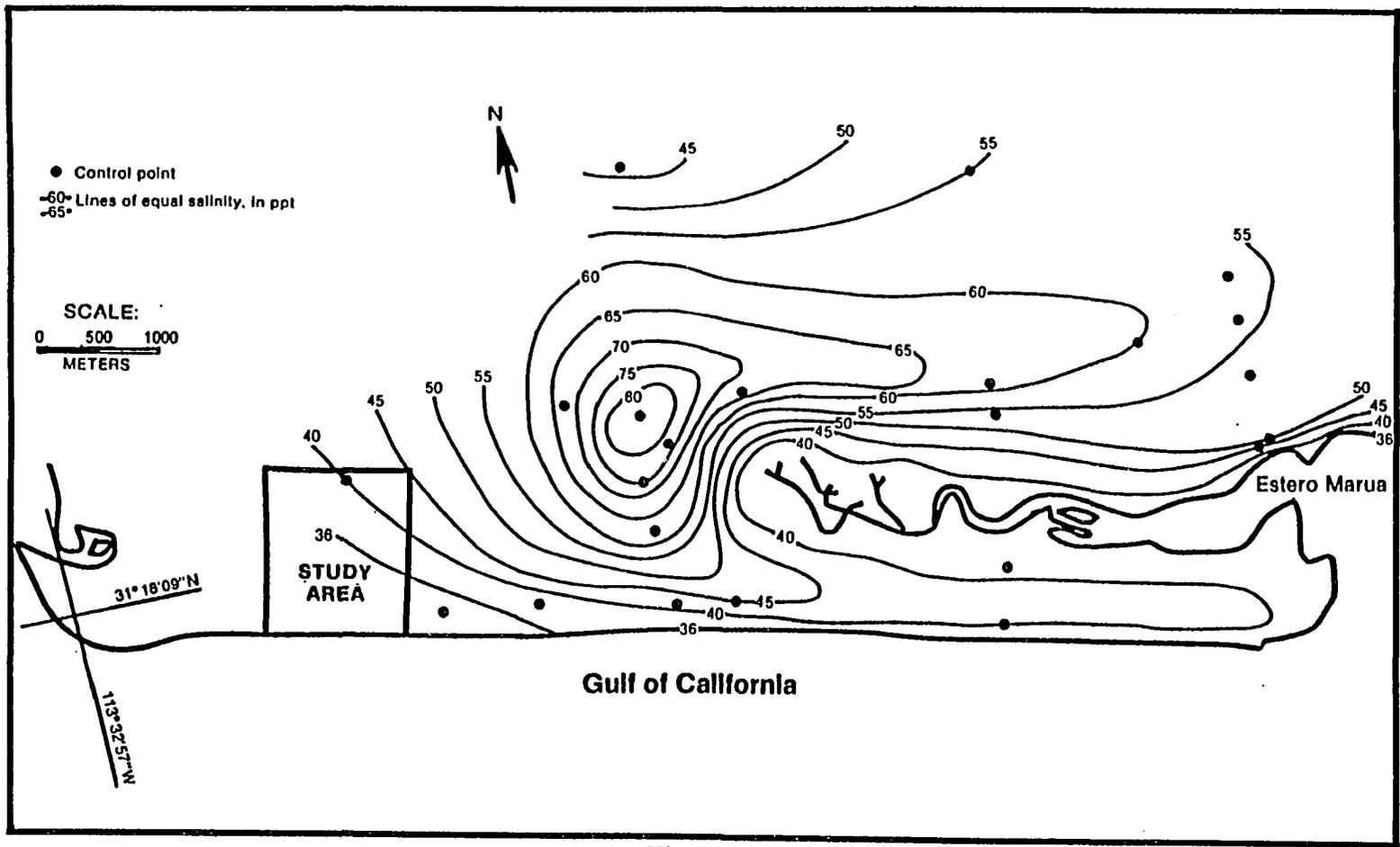


Figure 1-8.  
 Salinity of coastal aquifers near Las Conchas (Dunn, 1981).

that "...per capita water consumption in Puerto Peñasco [in 1950] is approximately five gallons per day, according to water haulers...[and in comparison]...in most cities where water is piped to the houses, per capita consumption exceeds 200 gallons per day."

The northwest-trending Sonoyta Valley straddles the border over a length of about 45 miles. Its width varies along the way between 4 to 10 miles (Brown, 1991). The sub-surface Rio Sonoyta is the source of water for both Puerto Peñasco and Sonoyta. The surface course of the river experiences intermittent flow through the Sonoyta Valley, flowing to an area about 25 km northwest of Sonoyta, where the streambed takes a turn to the southwest and continues its mostly dry journey to the Sea of Cortez near Puerto Peñasco. The river cuts a course across small sediment-filled structural basins that generally parallel the U.S-Mexico border. The hydrologic connection between the basins and the depth and lateral extent of the Rio Sonoyta aquifer is not well defined at this time.

Groundwater from the Rio Sonoyta aquifer in the Sonoyta Valley has been utilized in increasing amounts for agriculture. During the late 1960's the Mexican government initiated a program to develop land and water resources in northern Sonora. This program is administered by the Secretaria de Agricultura y Recursos Hydraulicos (SARH). By 1988, 165 wells had been drilled in the Sonoyta Valley for agricultural use and about 20,000 acres were being planted annually with traditional field crops like cotton, alfalfa and wheat. Through 1978, the amount of water withdrawn from the aquifer each year was in balance

with the amount recharged by the annual average 201 mm of rainfall (7.9 inches/year).

By 1987, the aquifer was being overdrawn by an estimated 55,025 to 70,500 acre-feet per year (Brown, 1991). The average depth to water in the western Sonoyta valley was 287 feet (static level). A shift from high water-using field crops to high-yield crops like fruit trees, vegetables and nuts is beginning as cheap water becomes more scarce. Brown estimates that the current ratio of 80% field crops to 20% fruits and vegetables must be reversed to 20% field crops and 80% fruits and vegetables before groundwater withdrawal and recharge rates will again be in balance, a shift that could take many years to achieve.

This experience in the Sonoyta Valley points out the importance of recognizing that the Rio Sonoyta aquifer does not hold an unlimited supply of water and that this supply is also being used by others farther upstream. Regional coordination, conservation and development of alternative sources of water must be included in any plans for economic development—especially tourism development—in the Puerto Peñasco area.

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## CHAPTER 2: INTERNATIONAL TOURISM

In the years following, World War II, the tourism industry, like many other industries, experienced explosive rates of growth. Increases in leisure time and expendable income, combined with improved infrastructure and the mobility afforded by the automobile, all contributed to this increasing wanderlust. Smith et al. (1992:5) credit the first passenger jet service in 1958 with inaugurating modern mass and charter tourism. Destination development—"the directed planning, developing, and marketing of tourism destinations"—came into its own (Miller, et al, 1986:9).

Serious scientific research on tourism is a relatively recent but growing area of study, especially among social scientists (Crick, 1989:310; Smith et al., 1992:xiii). Social scientists have come to recognize tourism as a "significant social institution." Tourism is a form of economic development and a form of modernization, albeit often an accelerated form of modernization. As such, tourism is a force for change. The study of tourism is critical to the efforts of planners and designers in developing tourist areas.

"Tourism can be studied: it has a history and a literature; it has an internal structure with operating principles; it waxes and wanes and is highly sensitive to external influences including natural and cultural events; and it can be analyzed in terms of economic and social transactions. In short, tourism is a suitable topic for scholarly inquiry." (Smith et al, 1992:xiii)

During the 1960s tourism was enthusiastically promoted, largely in terms of its potential for growth and economic development for developing countries,

with the promise of solving all our problems. Experience has shown, however, that traditional tourism is seldom the panacea we envisioned. We have learned instead, that haphazard or poorly planned tourism can have some unexpected and undesirable social, environmental and economic consequences. This chapter explores the promise and the problems of international tourism with the intent of applying lessons learned to future tourism development in Puerto Peñasco, Sonora, Mexico.

### Types of Tourism

Tourism can exist in many different forms, with many different purposes, and oftentimes a given destination will host more than one type of tourism in varying degrees. Smith (1977:2-3) discussed a typology consisting of ethnic tourism, cultural tourism, historical tourism, environmental tourism, and recreational tourism.

Recreational tourism, characterized by "sand, sea, and sex", is probably the most prevalent type of tourism existing in Puerto Peñasco and many other coastal tourist areas presently. The emphasis is on relaxation, escapism, and for some—hedonism. Away from the structure and confines of their normal community, tourists feel freer to "indulge in a new morality." They seek good food, entertainment, sporting activities, spas, and sunbathing.

Ethnic tourism takes place at a considerable distance off the "beaten path" where an indigenous, often exotic people become objects of examination. The

numbers of these tourists are limited, so their impact on the host society is minimal compared to other types of tourism. The attraction for the ethnic tourist, as described by Parris (1984:26) is "submergence...into the total life experience of the host culture." According to Smith (1977:2) the ethnic tourist seeks to visit native homes and villages, observe dances and ceremonies, and shop for primitive wares or curios.

Parris recognized that cultural tourism, as described by Smith, has many similarities to ethnic tourism. The main differences revolve around the numbers of tourists and the accessibility of the host culture. Cultural tourism typically develops when a tourist resort is located in close proximity to a rural peasant area where a certain nostalgia is perceived by tourists for a vanishing way of life. Crafts and tools are still made by hand, horses and oxen are still used to plow the land, and picturesque, old-style architecture persists. Smith described large numbers of tourists seeking to photograph and observe, and to experience meals in rustic inns, costumed festivals, and folklore entertainment.

Recognizing that cultural and ethnic tourism can become intrusive and disruptive as tourist numbers increase, Parris (1984:26-27) prescribed model culture tourism "...a planned recreation of a historical or ethnic environment, designed especially for tourist consumption, so that the visitors may observe and experience the particular culture without disruptive effects on the everyday lives of the people whose culture is under scrutiny; or else the model culture seeks to portray a way of life that no longer exists." Examples cited include the colonial-

era recreation at Williamsburg, Virginia, Hawaii's Polynesian Cultural Center, and the numerous folk museums throughout Europe.

Historical tourism - "...the Museum-Cathedral circuit that stresses the glories of the Past..." attracts many education-oriented tourists (Smith, 1977:3). Typically, historical tourism occurs in the form of organized, guided tours of easily accessible monuments and ruins. Educational tourism is often recognized in the literature informally, and may be considered as an element of some other types of tourism such as cultural, ethnic and environmental tourism.

Environmental tourism is a relatively broad term, which has evolved to incorporate several variations on the theme. The definitive character of environmental tourism is its geographic basis. Smith's view of environmental tourism in 1977 was one of "elite" tourists who travel to remote places to "experience a truly alien scene" or to observe "man-land relationships". A close association with ethnic tourism is mentioned. However, Smith's original description failed to recognize an emerging interest in observation of nature and ecological relationships.

Science tourism as described by Farrell and Runyan (1991:33) is similar to nature tourism in that natural systems are the main attraction. The difference between these types of tourism is in the approach and purpose. Nature tourism revolves around "intimate" experiences with nature, while the science tourist travels for the purpose of conducting scientific research within a specific natural ecosystem. Science tourism combines both scientific and tourist motivations and

is evident in places like Costa Rica where a "welcoming environment" and the provision of research facilities are of equal importance. In Puerto Peñasco, CEDO promotes scientific and cultural research, while providing lodging for researchers who frequently participate as tourists during their stay.

Nature tourism and ecotourism are lumped together by some and differentiated by others. Boo (1990) and Leones, et al. (n.d.) do not differentiate between the two and basically define nature tourism as "visitation of natural areas that involves no consumptive use of those areas" (Leones et al.). Farrell and Runyan (1991:34), on the other hand, are rather adamant that the two can be distinguished:

"When the saving of an endangered species, a rain forest, or a wetland can be aided by cooperative strategies, this is ecotourism. It is a subset of nature tourism taken a step farther, with nature and tourism considered equal partners... Ecotourism is more exclusively purposeful and focused on the enhancement or maintenance of natural systems through tourism."

A recent study of nature-based tourism (Crandall, et al., 1992; Leones, et al.) is significant because it shows quantitatively that conserving natural areas for recreational use can compete economically with revenue from traditional rural land uses such as farming, forestry and mining. In southeastern Arizona, visitors to the Ramsey Canyon Preserve and the San Pedro Riparian National Conservation Area (RNCA) were surveyed regarding the amount of money they spent in the nearby community of Sierra Vista. Results indicate that nature visitors to Ramsey Canyon and San Pedro RNCA spent between \$50 and \$63

per day in Sierra Vista. These figures include hotel and motel lodging, RV and campground facilities, groceries, meals in restaurants, gas, tour fees and retail purchases. Overall, lodging was the largest expenditure, averaging 36% of total expenses. Visitors on day trips, in contrast, spent only about \$7 per day in Sierra Vista. The estimated annual expenditures in Sierra Vista by nature visitors totaled \$1.2 million.

Bird-watching was singled out as an especially desirable form of nature-based tourism that has potential to bring in higher revenues. This type of activity typically attracts tourists who are older and well-educated, with time and discretionary income to spend. Because birding is an activity that takes place during early morning and late afternoon hours, these tourists prefer to find lodging fairly close to the birding area. In southeast Arizona, where the peak tourist season is during the winter months, visitors to Ramsey Canyon give the area an economic boost when they turn out in August to observe late summer nesting of several bird species.

An important new trend is the fragmentation of tourist markets into special interest tourism (Inskeep, 1988:361). In recent years there has been a proliferation of organized special interest tours centered on a great variety of themes having appeal to specific market segments. Sports, recreation, ecology, culture, music, art, theater, and a variety of professional and avocational interests serve as the basis for a vacation trip. Business travel as well as convention and conference travel should not be overlooked as types of tourism, since these

travelers frequently combine pleasure travel with business.

### Types of Tourists

The most frequently cited typology of tourists was developed by Smith (1977:9) and is shown in Table 2-1. The explorer functions much like an anthropologist, getting off the beaten track to observe, study, and live with the indigenous people for an extended period of time. The elite tourist is well-traveled and adventuresome, typically spending hefty sums to hire guides for travel to remote areas; but, he is definitely "touring" as opposed to studying. The offbeat tourist seeks to avoid the crowds and do something a little different. The unusual tourist travels as part of an organized group that seeks out relatively unique tours to small villages and outlying areas. The incipient mass tourist travels alone or in groups to areas that attract larger crowds, where hotels cater

**Table 2-1.**  
Frequency of types of tourists and their adaptations to local norms.

TYPE OF TOURIST	NUMBERS OF TOURISTS	ADAPTATIONS TO LOCAL NORMS
Explorer	Very limited	Accepts fully
Elite	Rarely seen	Adapts fully
Off-beat	Uncommon but seen	Adapts well
Unusual	Occasional	Adapts somewhat
Incipient Mass	Steady flow	Seeks Western amenities
Mass	Continuous influx	Expects Western amenities
Charter	Massive arrivals	Demands Western amenities

Source: Smith (1977:9).

to a mix of business and pleasure travelers.

The mass tourist tends to "inundate" resort areas with the expectation of finding Western standards of food, lodging and entertainment as well as the presence of a bi-lingual staff to make most of the arrangements. Smith (1977:10) states that: "Mass tourism is built upon middle-class income and values..." Typically, a package deal is purchased including air fare, lodging, and varying amounts of food, transportation and tourist attractions, but tourists have a considerable degree of independence to set their own itinerary once arrived.

The charter tourist participates in a fully organized tour and travels almost exclusively with the group, following a well-defined itinerary. Evans (1976:191) makes the point that mass tourism works well for the elderly, the physically handicapped, and inexperienced travelers.

In a typology that covers some of the same ground as Table 2-1, Evans (1976:192) included a description of the resident as another tourist type. The resident lives for extended periods in a foreign country, either in the form of regular annual vacations, or in the form of season-long visits for retired people. While the resident may not perceive of himself as a tourist, he may not be fully accepted by the local community either.

Another technique for defining types of tourists is practiced in the field of marketing. Based largely on demographics and statistics on tourist spending, travel habits and so on, tourists are described in terms of market segments, such as the youth market, senior citizen market, the budget traveler, etc. (Table 2-9

describes tourists in terms of market segments).

### Motivations and Behavior—What do Tourists Want?

What do tourists want, how do they spend their time, and what do they actually do? In an attempt to answer such questions, Pearce (1988) undertook a time-budget study—"a systematic record of a person's use of time over a given period" using diaries, questionnaires, or interviews. Based on his work in Vanuatu, South Pacific and the pioneering work of a handful of others, Pearce reported on some of the current insights we have into tourist behavior.

In two coastal resort areas studied, tourists spent only one-fifth to one-quarter of their time on the beach, as shown in Table 2-2. Additional research indicated that the second and third days of a trip were spent primarily on sightseeing, and that tourists tended to visit the largest, most important sites first. In a resort setting offering a full activity schedule, tourists began to initiate their own activities on the fourth and fifth days. A daily pattern also emerged, consisting of: shopping and visiting the market in the morning; sightseeing, sports or beach activities in the early afternoon; relaxation in the late afternoon; and, dining, generally away from the hotel, in the early evening.

Although structured scientific research studies on tourist motivations are few and far between, philosophical discussions about tourists are plentiful. Similar recurring themes include the idea that tourists are seeking the "promise of contrast", both physical and mental (Miller, et al, 1986:11; Passariello, 1983);

**Table 2-2.**  
Tourists' allocation of non-sleeping time.

GAVIRÍA STUDY, SPAIN	
Time spent at the beach	26 %
Time spent in and around accommodations	30 %
Time spent on the streets (including sidewalk cafes)	22 %
Time spent in places of entertainment	14 %
PEARCE STUDY, SOUTH PACIFIC	
Time spent on water sports, swimming and sunbathing	20 %
Time spent sightseeing	20 %
Time spent drinking and dining	29 %
Time spent relaxing	9 %
Time spent shopping and going to the market	8 %

Source: D. G. Pearce, 1988:111.

and the ideas of escapism, regression, and avoidance of adult responsibilities (Crick, 1989:327; Crompton, 1979:417). Crick suggested that both personality and economic situation determine whether a tourist chooses to achieve his escape through independent travel to remote areas or through the purchase of a package trip where the stress of decision-making is reduced.

In a qualitative study consisting of 39 unstructured interviews, Crompton (1979) attempted to gain insight into the motivations influencing the type of

vacation and the destination choices made by travelers. The resulting "socio-psychological" and "cultural" motives are described below:

#### Socio-psychological Motivations

Escape from a perceived mundane environment. Respondents sought a temporary change of scenery, with the main requirement being that the vacation destination be "physically and socially different" from their normal environment. Most potential destinations would satisfy this criteria.

Exploration and evaluation of self. Respondents expressed a desire to get away from familiar surroundings and learn more about themselves by discovering how they might react in or handle new and challenging situations and people.

Relaxation. Mental relaxation was the concern of most respondents. Taking a vacation meant having time not normally available to pursue activities of interest, even if they were exhausting activities.

Prestige. Respondents recognized prestige as a potential factor motivating some people in their destination choices, but for people who traveled frequently, prestige was not a motivation.

Regression. Respondents identified two types of regression motives. The first involves vacations that allow one to indulge in immature, irrational and irresponsible behavior that would not be acceptable within the confines of daily life. The second form of regressive behavior incorporates a "nostalgia factor" - or a "search for the life style of a previous era" that is simpler and less stressful.

Enhancement of kinship relationships. Vacations were viewed as important

breaks from routine for the entire family, and as special time for attention to family relationships not normally available in the day-to-day routines.

Facilitation of social interaction. Respondents sought out vacations that would allow them to meet new people. A convenient way of achieving this for some was through an organized tour, which can also be viewed as "taking some of their home social environment with them to a different location" (p. 419). While some respondents indicated interest in meeting the local people, this was often difficult to do, and they felt they had more in common with other tourists than with the locals.

#### Cultural Motivations

Novelty. The desire for new experiences, adventure, and something different underlies the novelty motivation, and the preference was for visiting a location that the respondent had never been to before. At the same time, some respondents felt somewhat threatened by new and different experiences. "One respondent, who was a travel agent, pointed out that for some people, it was a fearful experience to go into an unknown situation in a country where the people did not speak your language. These people would like to go away from home but they also have the desire to be taken care of. That is why you get tours and tour conductors, because it is a security blanket." (Crompton, 1979:420)

Education. Concerns for the education of their children and for becoming well-rounded individuals were addressed by this motivation.

Crompton concluded that the socio-psychological motives were not related

to destination attributes. Respondents seeking to escape, explore, relax and so on could travel to any number of vacation spots and achieve their objectives. The cultural motives, on the other hand, were found to be at least partially dependent on the particular qualities of a destination.

### Preferences and Behavior of U.S. Tourists Bound for Mexico

With the intent of improving competitive marketing strategies, Rao et al. (1992) recently completed a survey of American pleasure travelers identifying activities, amenities and locational factors that are important in the selection of a destination, and methods used for trip planning. Because the tourism industry in Puerto Peñasco depends to a large degree on tourists from the United States, planners and designers may benefit greatly by studying what American travelers seek in a tourist destination.

Travelers from the United States spent \$28.1 billion on international travel in 1985. Mexico attracts a significant number—about 32%—of the U.S. outbound travel market, compared to Canada (33%), Europe (16%), and the Caribbean and Central America (11%). In 1987, about 10 million U.S. pleasure travelers visited Mexico, and the expectation was for 12.5 million tourists in 1992 (Rao, et al., 1992:3-4).

On average, the U.S. traveler takes 3.6 four-day vacations annually. Table 2-3 shows the relative importance of activity preferences for resort trips, touring trips, city trips, outdoor trips and cruise trips. Table 2-4 reveals what

trip types U.S. travelers are considering in the near future, and Table 2-5 examines trip-planning behavior of U.S. travelers bound for Mexico.

Table 2-4 shows that many U.S. travelers tend to think of Mexico as a destination for resort vacations. To Rao, et al. (1992:11) this suggests the existence of a rather narrow target segment that warrants a focused marketing strategy. Based on data from Table 2-4, the researchers suggest that "trip packages to Mexican resorts could be designed to emphasize Mexico's culinary variety, predictable weather, proximity to the ocean, and sunshine-related outdoors activities."

Resort and cruise vacations tend to offer the highest levels of Western standards that some tourists demand, as well as a large degree of isolation/protection from the host culture. One wonders why Touring and Outdoor trips are relatively unpopular for visitors to Mexico, while accounting for a great deal of activity in Canada, given the spectacular natural resources in both countries. Language and cultural differences may be part of the reason; if U.S. travelers perceive greater cultural similarities between Americans and Canadians, they may feel more comfortable embarking on more adventurous types of vacations there. Furthermore, the condition of infrastructure, particularly roads, may have a significant impact on travel choices by land, sea and air.

**Table 2-3.**  
The relative importance of activity preferences for five trip types,  
for U.S. pleasure travelers bound for Mexico.

ACTIVITY PREFERENCES	RESORT TRIP	TOURING TRIP	CITY TRIP	OUTDOOR TRIP	CRUISE TRIP
Dining at a variety of restaurants	1	5	1	--	7
Having predictable weather	2	1	4	1	1
Walking or strolling about	3	4	7	6	--
Being by the ocean	4	10	11	9	2
Sampling the local cuisine	5	2	5	15	10
Sunbathing	6	20	15	13	4
Swimming	7	18	--	9	8
Being by a lake	8	12	--	2	--
Dining\elegant, sophisticated restaurants	9	--	9	--	2
Shopping	10	19	3	--	--
Being close to the mountains	10	7	--	3	--
Staying in first-class hotels	12	15	6	--	--
Seeing wildlife I don't usually see	13	6	--	8	--
Having budget accommodations	14	9	2	7	10
Shopping for arts and crafts of area	15	--	--	--	5
Exploring wilderness areas	16	10	--	3	--
Taking guided tours	17	12	--	--	12
Going to nightclubs or discos	18	--	16	--	--
Going to live concerts of live theater	19	--	9	--	--
Attending ethnic festivals or events	20	--	13	--	6

Continued on following page.

**Table 2-3, continued.**  
 The relative importance of activity preferences for five trip types,  
 for U.S. pleasure travelers bound for Mexico.

ACTIVITY PREFERENCES	RESORT TRIP	TOURING TRIP	CITY TRIP	OUTDOOR TRIP	CRUISE TRIP
Attending sports events	21	--	14	--	--
Indoor activities such as reading or cards	21	--	--	--	--
Sailing	21	--	--	--	--
Fresh-water fishing	24	--	--	11	--
Taking rides (at amusement parks)	25	--	--	--	--
Visiting natural parks	--	3	--	5	--
Visiting small towns and villages	--	8	--	14	--
Visiting big cities	--	14	7	--	--
Going to zoo or wildlife exhibits	--	16	17	--	--
Viewing science exhibits	--	16	--	--	--
Visiting museums and galleries	--	--	12	--	9
Hiking or backpacking	--	--	--	12	--

Data source: Rao, et al, 1992. Compilation of data from tables 1-5.

The activity preference lists given to respondents varied in length and content for each trip type, based on lists developed in focus group meetings. The absence of data in this table (--) indicates: 1) the activity was not included in the list for the indicated trip type; or 2) the activity was not among the most important preferences, and was therefore excluded from analysis.

The average importance scores (means) of the activity statements for each trip type were calculated, but are not presented here. Importance scores were ranked to indicate how important each activity statement was judged to be relative to the others. The higher the rank, the more important the statement to respondents.

**Table 2-4.**  
Percent of U.S. travelers who intend to visit a given destination in the next two years for pleasure purposes.

TRIP TYPE INTENDED	MEXICO N = 256	CANADA N = 793	CARIBBEAN ISLANDS N = 310	EUROPE N = 673
Resort	42	8	27	11
Touring	17	30	9	58
City	8	20	2	19
Outdoor	8	24	3	5
Cruise	21	2	58	5
Theme Park	4	16	1	2

Source: Rao, et al, (1992:10) presented data in actual numbers (not percent) of responses to an unaided question. Percents have been calculated for comparison of data in this table.

**Table 2-5.**  
Trip-planning behavior of the U.S. outbound market to Mexico.

PLANNING VARIABLES	% RESPONSES
<b>PLANNING HORIZON</b>	
More than one year	3.8
6 to 11 months	9.3
3 to 5 months	13.2
1 to 2 months	25.7
Less than 1 month	48.0
<b>INFORMATION SOURCE</b>	
<u>Personal contacts</u>	
Recommendations of friends	75.0
Travel agents	25.2
<u>Print and broadcast media</u>	
Newspaper	35.9
Magazines in general	4.2
Travel magazines	10.9
TV/radio	6.6
<u>Other</u>	
Tourist office, airline, films, books	13.8

Source: adapted from Rao, et al (1992:10).

Finally, there is the "chicken-or-the-egg" question. Are resort facilities the only vacation destinations readily available or promoted in Mexico, due to the large resort development programs of the Mexican government in recent years (Mexico's perception of what tourists want)? Or, do resort vacation facilities predominate because this is what Western tourists expect and demand?

### Attitudes and Travel Habits of Mexican Travelers

While a large percentage of tourists in Puerto Peñasco hail from the United States, there is some indication that Mexican tourists are also present. According to Monografía (1992:17) Mexican tourists come from Mexicali, Caborca, Nogales, and Hermosillo, Sonora as well as from the state of Chihuahua. Because one objective of this thesis is to promote a tourist destination that equally welcomes both foreign and domestic tourists, it is important to study the motivations, attitudes and habits of Mexican travelers.

Market Facts of Canada (1989) conducted personal interviews with 2,000 (total) Mexican citizens residing in six different cities: Mexico City, Guadalajara, Monterrey, Hermosillo, Merida and Juarez. The sample population was defined as being over 18 years of age, and as having taken a vacation trip of four nights or longer outside of Mexico within the previous three years.

Although the emphasis of this study was on the motivations and habits of Mexican travelers seeking destinations outside of Mexico, some useful information was also obtained regarding domestic travel. In addition to international

destinations, 88% of the respondents had also taken more than one pleasure trip within Mexico in the last three years. These vacationers took an average of 6.1 trips inside Mexico during this period.

On the following pages, tables 2-6 through 2-8 summarize some of the data obtained on Mexican international travelers. Table 2-9 presents a classification or segmentation of the data into traveler types. Each traveler type was then given a descriptive profile based on demographics, and the implications of marketing strategies for each segment were discussed. These tables provide information on travel attitudes and philosophies, motivations for traveling and experiences desired, and the importance of various activities, amenities and features of a vacation destination. Since these international travelers also travel extensively inside Mexico (6.1 trips per year), it is assumed that most of the information can be applied in Puerto Peñasco.

Table 2-6.

Reasons for traveling and experiences sought by Mexican vacation travelers.

IMPORTANCE OF BENEFIT STATEMENTS - MEAN SCORES (Maximum possible = 4.0, minimum possible = 1.0)			
Having fun/being entertained	3.9	Being free to act the way I feel	3.1
Learning new things/increasing knowledge	3.8	Experiencing a simpler lifestyle	3.1
Seeing as much as possible in time avail.	3.8	Visiting friends and relatives	3.1
Seeing/experiencing a foreign destination	3.7	Finding thrills and excitement	3.0
Escaping from the ordinary	3.6	Talking about trip after I return home	3.0
Traveling to places important in history	3.6	Visiting places family came from	3.0
Experiencing new/different lifestyles	3.5	Rediscovering myself	2.9
Getting a change from a busy job	3.5	Reliving past good times	2.9
Being physically active	3.5	Getting away from the demands of home	2.8
Traveling to places feel safe and secure	3.5	Watching sports events	2.7
Being together as a family	3.5	Being daring and adventuresome	2.6
Trying new foods	3.4	Participating in sports	2.5
Feeling at home away from home	3.4	Going places friends haven't been	2.5
Meeting people with similar interests	3.3	Roughing it	2.4

Source: Market Facts of Canada Ltd., 1989:96.

Based on survey data of 2,000 international Mexican pleasure travelers.

**Table 2-7.**  
Travel attitudes and philosophies of Mexican vacation travelers.

AGREEMENT WITH TRAVEL PHILOSOPHY STATEMENTS — MEAN SCORES (Maximum possible = 4.0, minimum possible = 1.0)			
Like arrangements made before leaving	3.8	Important that people speak my language	2.9
Like to stay put at destination	3.8	Usually choose places been to before	2.7
Money on travel is well spent	3.7	Usually travel on reduced fares	2.7
Value for vacation money is important	3.6	Don't have to travel to enjoy vacation	2.5
Like to make arrangements as go along	3.6	Worth paying for luxuries	2.4
Take short pleasure trips whenever can	3.5	Usually buy vacation packages	2.4
Rather travel place to place than stay put	3.5	Usually travel on all-inclusive packages	2.4
Enjoy making own arrangements	3.5	Prefer guided tours	2.4
Like to go to different places each trip	3.4	Use travel agent to choose destination	2.3
Don't have to spend lots to enjoy vacation	3.3	Prefer to leave organizing to co-traveler	2.2
Inexpensive travel to destination is important	3.2	Just as soon spend on things other than travel	2.0
Often choose places friends have been	2.9	Arrangements such a bother rather not travel	2.0
Prefer a number of short trips over one long trip	2.9		

Market Facts of Canada Ltd., 1989:73.

Based on survey data of 2,000 international Mexican pleasure travelers.

**Table 2-8.**  
**Importance to Mexican travelers of various activities, features**  
**and amenities of a vacation destination.**

IMPORTANCE OF BENEFIT STATEMENTS - MEAN SCORES (Maximum possible = 4.0, minimum possible = 1.0)			
Opportunities to increase knowledge	3.7	Budget accommodation	3.4
Hygiene and cleanliness	3.7	National parks and forests	3.3
Personal safety	3.7	Inexpensive travel in destination	3.3
Outstanding scenery	3.5	Historic old cities	3.3
Interesting and friendly local people	3.5	Museums and art galleries	3.3
Environmental quality of air, water, soil	3.5	Warm, sunny climate	3.2
Public transportation	3.5	Interesting smaller towns and villages	3.2
Manageable size to see	3.5	Local cuisine	3.2
Wilderness and nature	3.4	Wide open spaces	3.2
Culture different from own	3.4	Good shopping	3.2
Reliable weather	3.4	Historical, archeological, or military sites	3.2
Wildlife or birds	3.4	Amusement or theme parks	3.2
Warm welcome for tourists	3.4	Good beaches for swimming and sunning	3.1

Continued on following page.

**Table 2-8, continued.**  
 Importance to Mexican travelers of various activities, features  
 and amenities of a vacation destination.

IMPORTANCE OF BENEFIT STATEMENTS - MEAN SCORES (Maximum possible = 4.0, minimum possible = 1.0)			
Lakes and rivers	3.1	Nightlife and entertainment	2.7
Local crafts	3.1	Fast food restaurants	2.7
Local festivals	3.1	Spectator sporting events	2.7
Resort areas	3.1	Cruises of one or more nights	2.7
Live theater and concerts	3.1	Exotic atmosphere	2.6
Big modern cities	3.1	Outdoor activities such as hiking	2.5
Seaside	3.0	Water sports	2.4
Inexpensive restaurants	3.0	Campgrounds and trailer parks	2.2
First class hotels	3.0	Snow skiing	2.2
Variety of short guided tours	2.9	Casinos and gambling	2.2
Mountainous areas	2.8	Good fishing	2.2
Unique cultural groups	2.7	Good hunting	2.1
High quality restaurants	2.7	Golf and tennis	2.0

Source: Market Facts of Canada Ltd., 1989:122.

Based on survey data of 2,000 international Mexican pleasure travelers.

**Table 2-9.**  
A classification of Mexican vacation travelers.

TRAVEL PHILOSOPHY SEGMENTS		BENEFIT SEGMENTS		PRODUCT SEGMENTS	
Premium Package Traveler	28 %	Sports & Adventure Traveler	35 %	Entertainment & Sports Traveler	32 %
Budget Package Traveler	25 %	Adventure Traveler	25 %	Budget Conscious Traveler	20 %
Independent Traveler	24 %	Social Getaway Traveler	24 %	Outdoor Sports Traveler	20 %
Reluctant Traveler	23 %	Family Traveler	17 %	History & Culture Traveler	15 %
				Rural Culture Traveler	14 %

Source: Market Facts of Canada Limited, 1989:66. 89, 112.

Based on survey data of 2,000 international Mexican pleasure travelers.

### Mexican Tourists at the Beach

In a fascinating "micro-ethnographic" study of middle-class Mexican tourists, Passariello (1983) related tourist behavior to historical and cultural background. The study area was a small village (identified with a pseudonym) with a population of 406 located on the Pacific Coast of the state of Chiapas, Mexico, which supported a small seasonal resort business between Christmas and Easter. During "Semana Santa" or Easter Week, a traditional Mexican family holiday, between 10,000 to 50,000 Mexican tourists crowded into the village for the long weekend. While the Mexican tourists visited the beach only on weekends, the area was also frequented by a small number of middle-class foreign

tourists (mainly from the U.S. and Canada) on long-term, often repeat trips who were present throughout the week.

The resort area was characterized by "lackadaisical architecture"—a complex mix of private and public sleeping and eating areas, open air palapas (palm-thatched structures), cement toilets, an open well, crude "solar-heated" public showers, and tourist cabanas with cement floors, mud and stick walls, and thatched roofs. Passariello (1983:114) further described the atmosphere as follows:

"...it is rustic, colorful, tropical, and noisy—típico as the Mexican tourists say, which translates literally as typical, regional, or quaint but which most often connotes Indian-ness (i.e., hand-woven Indian blankets are "típicos"), thus raising the complex issue of Indian and class identities in Mexico. Indians and all things típico are generally considered "low class" in Mexico and yet are recognized as a unique part of Mexican identity. In the same way, [the village], a rustic, beach village, is seen as típico, in the sense that it appears as quaint, simple, and low class to the middle-class visitors, though it is not particularly "Indian." At first glance, the attractiveness of the low-class "tipismo" of [the village] to the Mexican middle class may not be apparent, but a deeper look exposes the complex love-hate or attraction-denial which Mexicans seem to feel toward their cultural and racial origins. This complicated issue merits more consideration elsewhere. For the purposes of this description, it simply can be noted that the dirt floor, primitive toilets, and barefoot demeanor of [the hotel] are sought out equally with the sea breezes."

"Both the Mexican and foreign tourists...are seeking perhaps what Smith (1977) has labeled "ethnic tourism," where the attraction of a tourist site depends on its romantically perceived rustic, cultural setting, with a touch also of "nature tourism," focusing on the attractiveness of a natural setting." (p. 119)

In comparing and contrasting the behavior of Mexican and foreign tourists, Passariello found that although the reasons for seeking a beach vacation were

often similar, the expression or form of relaxation was very different. For Mexican tourists the beach vacation was a large family gathering where normal rules of life in the city were suspended, replaced by "generalized overindulgence by all of the Mexican tourists in terms of noise, food, laziness, and even sloth" (Passariello, 1983:118). The major activities were eating, drinking, and partying well into the night. Even though prices were 30-50% higher for food and drink at the beach, the Mexican tourists spent lavishly on sodas, beer, coconuts, shrimp, fish, bread, tortillas and assorted sweets for "meals" that were continuous throughout the day. The custom was to keep all the bottles on the tables until the end of the day "both as a way to compute the final bill and perhaps as an indicator or display of the wealth and/or healthy appetites of the drinkers" (p. 115). The noise level was considerable, as the hotel piped music over loud-speakers and tourists supplied their own radios and tape-recorders. Other activities included playing and wading in the shallow water, dancing, swinging in hammocks, driving vehicles (and frequently getting stuck) on the beach, short walks and quasi-soccer games. No effort was made to dispose of garbage and the beach was quickly covered with litter.

In comparison, the foreign tourists were a thrifty bunch, searching out bargains, cooking their own meals and walking into town to buy cheaper, colder drinks. Beach activities included swimming, body surfing, jogging and long walks. Their vacation time was spent in generally calmer, quieter pursuits, and they frequently complained about the noise and disruptive activities of the weekenders.

Gathering in a few restaurants that catered to them, the foreign tourists kept to themselves "perhaps because of their ignorance of Spanish or their xenophobic fear of Mexicans or their wish to maintain their illusions about the pristine qualities of "their" beach paradise" (Passariello, 1983:118).

Sunset on Sunday symbolized the differences between the two groups. Mexican families packed up in a quick, businesslike manner, and departed "en masse", recognizing the end of an intense, non-ordinary period. Foreigners gathered quietly to watch and reflect on the sunset, waiting until morning to leave.

"If asked what the beach represents to them, the Mexicans most often say that it is natural, healthy and tranquilo - quiet and peaceful compared to life in the city. Of course, in reality, [the resort] roars on weekends with a round-the-clock excess that breaks all daily routines: night is turned into day and vice versa, work and industriousness are replaced by play and slothfulness. The peace found at the beach is perhaps peace from the stresses and rigidities of the weekly, workaday world. Relaxation seems to be culturally defined for these Mexicans as relaxation of ordinary daily rules..."  
(p. 120)

Passariello compares the behavior of Mexican tourists in the 1980s to that of American tourists in the post-Victorian era. In reaction to the strict morality and work ethic of this period, beach vacations became very popular because of their informality, relaxed atmosphere and comparatively "liberated social settings." Especially on the French Riviera of the 1920s, a rather artistic, elite class of American vacationers behaved in ways intended to shock conventional society. Passariello suggests that Mexico may be in "full reaction against the repressions of

its own post-Revolutionary 'Victorian era'..." (p. 120) and that there may be "an evolution of tourist behaviors characteristic of the historical situation of the national home cultures of the tourists" (p. 109). The implication is also made that American tourists no longer feel the need to shock with their wild ways; rather the foreign tourists in the village may represent the beginnings of a "new cultural order" or a "New Puritanism" seeking leisure activities that edify, enlighten and renew.

While it is likely true that tourist behavior may be an expression of cultural and historical variables that shape a country and its people, some of the behaviors observed in Passariello's study are not necessarily limited by culture. During spring break at Cholla Bay and Puerto Peñasco, the middle-class Mexican tourists in this study could be easily confused with the American college students who descend on the small town to cut loose. Part of the contrast between Mexican and foreign tourists in Passariello's study may be more a function of the types of tourism they represent. Based on Smith's (1977) typology of tourists (Table 2-1), the Mexicans probably represent the Unusual to Mass tourist, while the foreigners in this case fall somewhere between Explorers and Off-beat tourists. These different types of tourists are seeking different experiences through their travels, experiences which may be in conflict as illustrated in Passariello's study.

## Tourism—"The Good, the Bad, and the Ugly"

Traditional tourism development, characterized by mass tourism, control by multinational corporations, and large-scale facilities, has given tourism a negative image among some social scientists and environmentalists who have documented its impacts. In this section, the positive and negative impacts of tourism are explored in terms of environmental, socio-economic, and socio-cultural considerations.

### Environmental Considerations

There is no shortage in the literature of examples of environmental degradation resulting from tourists and tourist developments. Cohen (1978:228) explains the critical relationship between tourism and environment.

"...the aggregate environmental impact of tourism is probably smaller than that of any extractive or heavy industry developed on a similar scale. But the importance of the impact of tourism on the environment lies in the fact that it often touches upon the most interesting, most attractive and most valuable parts of the natural, cultural or historical environment of an area."

In coastal environments, construction of hotels, marinas, vacation homes, and tourist attractions can cause erosion, resulting in the loss of beaches and dunes in some locations and increased sedimentation in other locations. Construction frequently encroaches on the most sensitive marine habitats, such as the lagoons in Cancun, Mexico which were dredged for fill, which was then relocated to other areas of the lagoons to accommodate condominiums. Clearing land for new highways and airports also alters the landscape.

Water pollution is perhaps the most widespread problem facing tourist areas in developing countries. Rapid urban growth and lack of funding for solid waste and waste water treatment facilities commonly results in direct dumping into lakes, rivers, and oceans. Surface and subsurface drinking water sources are at great risk of contamination. Even a small hotel can have a devastating impact on the environment if facilities are poorly planned, as demonstrated at Cobá (Yucatan peninsula), where disposal of waste into a lake contaminated the local drinking water supply (Daltauit, et al., 1990:12). Acapulco, which for many years relied on an open canal running through the city to carry untreated sewage to the Bay, is typical of many unplanned tourist destinations. Increasing industry and automobile traffic produce large-scale emissions of carbon monoxide, particulates and other pollutants. The resulting pollution poses health threats to humans, wildlife, and the marine environment.

Recreational activities of tourists can also have detrimental effects on the natural environment (Pearce, 1989:237; Boo, 1990:25). "Trampling effects" of off-road vehicles and large numbers of hikers or walkers in concentrated areas can destroy fragile vegetation and wildlife habitat. Littering becomes an increasing problem both in terms of aesthetics and health hazards. Souvenir-taking can have highly destructive impacts on natural resources, such as Australia's Great Barrier Reef, as well as on cultural and historical resources such as the ancient Mayan ruins on the Yucatan peninsula.

Increasingly, however, tourism is recognized as an opportunity to protect

threatened environmental resources. Well-planned tourism development can result in better managed wildlife habitat and sensitive ecosystems which thrive because of the value tourists place on these resources. As Pigram (1980:554) states: "The viability of tourism, rather than conflicting with environmental conservation, actually demands it, otherwise visitor satisfaction will be reduced as the inherent appeal of the tourism setting is eroded."

The concept of tourist carrying capacity, although extremely difficult to quantify, is widely recognized as crucial for the co-existence of tourism and environment (deKadt, 1992:58; Wilkinson, 1989:162; Pigram, 1980:56; Cohen, 1978). The concept hinges on the idea that there is a "threshold" of human activity, either in terms of numbers or intensity of activity, that can be accommodated in or absorbed by a given site or ecosystem. Beyond this threshold environmental degradation will occur.

Cohen (1978:220) lists four factors that influence the environmental impact of tourism in any given location: 1) the intensity of tourist site-use and development; 2) the resiliency of the ecosystem; 3) the time-perspective of the tourist developer; and 4) the transformational character of tourist development. Approaches for managing and protecting the environment in tourist areas generally fall into two categories. General protective measures, which include establishing parks, preserves and endangered species lists, are characterized by Cohen (1978:229) as "protecting the environment for tourism." In contrast, management through regulation and control of tourist development protects the

environment from tourism.

### Socio-Economic Considerations

Developing countries, including Mexico, tend to place a high value on tourism as a form of economic development and as a means of providing employment for rapidly growing populations (Cobb, 1981:188). For some countries, particularly small Caribbean islands, tourism may be the only viable form of economic growth due to a lack of natural resources capable of supporting alternative industries (Wilkinson, 1989:160). Tourism development is valued as a means of attracting foreign capital and investment, providing employment, increasing personal income and the standard of living, and increasing tax collections.

According to Jud and Krause (1976:6): "The tourist industry in Mexico has had no rival as an earner of foreign exchange." Gross receipts based on foreign exchange earnings are often quite impressive. When net receipts are examined however, it becomes obvious that "leakage" of tourism revenue can significantly depress the benefits to the local people and to the host country (Crick, 1989:315; Britton, 1982:345; Pearce, 1989:194-98). Where tourism is big business, it is typically dominated and controlled by large multi-national companies that own hotels, airlines, rental cars, and travel companies. Rather than reinvesting in the host country, international hotel chains tend to import food, drink, furniture and restaurant equipment. Arrangements by international travel companies for package tours, transportation and ticketing are generally

made outside of the destination area, thus preventing a large source of tourism dollars from ever entering the host country. However, Jud and Krause (1976:4) point out that in Mexico "very little of the food, furniture, and fixtures used in major hotels is imported. The difference, of course, results not only from the more diversified nature of the Mexican economy but also from Mexico's conscious policy of import substitution."

Employment can be subdivided into direct employment (in hotels, restaurants, curio shops, airports), indirect employment (supplying goods and services to tourist businesses), and investment-related employment (in construction, real estate, development). (deKadt, 1979b:36). The major criticisms of tourism industry employment revolve around the types of jobs provided, low wages, and lack of advancement potential. While highly-paid management positions are frequently filled by expatriate employees of the multinational companies, the low-wage, unskilled positions (room maids, waiters, kitchen help, gardeners, etc.) go to the local people.

Jud and Krause (1976:5-6) argue that these jobs, although low-wage, still have a significant impact on economic development because: 1) the positions are suitable to the largely unskilled, uneducated pool of laborers available (especially rural, migrant agricultural workers); and 2) a family's living standard improves as more family members are able to obtain first-time jobs or work second jobs. The tourism industry, with its expanding service sector, was credited with absorbing a great deal of Mexico's surplus agriculture labor between 1950 and 1970, thus

preventing large-scale unemployment in the cities. However, the problem of upward mobility remains for unskilled workers. Further criticism of employment provided by tourism stems from the seasonal nature of the work (Pearce, 1989:200). This disadvantage may be offset in areas where tourism jobs provide higher wages compared to other industries or where other types of seasonal work are available in the non-tourist season. Tourism, however, does not differ greatly from other traditional employment sectors such as fishing and farming, especially in rural areas, which are also seasonal.

Many researchers point out that whether the local population benefits materially from tourism depends on the distribution of wealth, which is a function of the host country's class, social and political structure (deKadt, 1979a:38; Jud and Krause, 1976:8). In addition to the drain of tourism profits by foreign interests, the wealthy upper class of the host country may derive greater benefits from tourism at the expense of the poor. In Mexico, Jud and Krause found that tourism had "...not created a large new indigenous middle class..." due to the prevalence of large-scale enterprise and the trend of channeling tourists into large destination resorts. The financial and technical means necessary to compete in this environment are rarely available to the average entrepreneur, thus preventing entry into the lucrative tourism market.

DeKadt (1979b:48) recognized the potential of training and education in the tourism industry for helping to create a "middle-level income group where previously there were only the rich and poor." Parris (1984:19) found that in

the Caribbean, tourism increased the demand for education because of its requirement for a literate, skilled and educated work force. Unlike unskilled agriculture work, jobs in the tourist industry bring employees into close contact with tourists from all over the world who expect efficient service and effortless communication with hotel staff. In addition to this demand for education, tourism provides the financial resources to invest in educational facilities and the incorporation of technical and vocational training into local schools. In 1981, Cobb noted that Mexico had over 220 schools that specialized in tourism industry career training.

In addition to educational benefits, luxury tourism commonly requires foreign and/or national investment in infrastructure in and near the destination area. The indigenous population potentially benefits from improvements in potable water systems, sewer systems, improved health facilities, and construction or expansion of roads and airports. However, where these investments are made in isolated enclave tourist developments, the benefits to the local people are few and far between.

#### Socio-Cultural Considerations

Few researchers recognize many socio-cultural benefits arising from tourism. Tourism acts as a catalyst for social change and is frequently difficult to distinguish from other catalysts such as urbanization and modernization (Crick, 1989:335). Tourism, however, has the added impact of bringing diverse cultures and different economic classes into contact (conflict?), generally without

**Table 2-10.**  
Social and cultural impacts of tourism.

<p><b>IMPACT ON POPULATION STRUCTURE</b></p> <ul style="list-style-type: none"> <li>▪ size of population</li> <li>▪ age/sex composition</li> <li>▪ modification of family size</li> <li>▪ rural → urban transformation of population</li> </ul>
<p><b>TRANSFORMATION OF FORMS AND TYPES OF OCCUPATION</b></p> <ul style="list-style-type: none"> <li>▪ impact on/of language and qualification levels</li> <li>▪ impact on occupational distribution by sector</li> <li>▪ demand for female labor</li> <li>▪ increase in seasonality of employment</li> </ul>
<p><b>TRANSFORMATION OF VALUES</b></p> <ul style="list-style-type: none"> <li>▪ political</li> <li>▪ social</li> <li>▪ religious</li> <li>▪ moral</li> </ul>
<p><b>INFLUENCE ON TRADITIONAL WAY OF LIFE</b></p> <ul style="list-style-type: none"> <li>▪ on art, music and folklore</li> <li>▪ on habits and customs</li> <li>▪ on daily living</li> </ul>
<p><b>MODIFICATION OF CONSUMPTION PATTERNS</b></p> <ul style="list-style-type: none"> <li>▪ qualitative alterations</li> <li>▪ quantitative alterations</li> </ul>
<p><b>BENEFITS TO THE TOURIST</b></p> <ul style="list-style-type: none"> <li>▪ relaxation, recuperation, recreation</li> <li>▪ change of environment</li> <li>▪ widening of horizons</li> <li>▪ social contact</li> </ul>

Source: Pearce, (1989:218), quoting Figuerola, M. (1976). Turismo de masa y sociología: el caso Español, Travel Research Jour., 25-38.

much consideration for the consequences of these contacts. The growing pains associated with most tourism provide a wealth of material for study. Table 2-10 is a summary of the many social and cultural impacts of tourism, mainly on the host culture.

At its best, tourism can be a positive force that reinforces cultural

traditions and ethnic identity. The interest by tourists in local arts, crafts and ceremonies can ensure that these traditions will live on while providing a source of income at the same time. Tourism can also be the impetus for preservation and restoration of historic structures and indigenous architecture. At its worst, tourism can destroy the cultural meaning of centuries old traditions, as in the oft-cited example of the Alarde in Fuenterrabia, Spain—an annual recreation of a military battle victory that the townspeople essentially abandoned after it was turned into a tourist attraction (Greenwood, 1977).

As noted earlier, one of the greatest benefits tourism provides is an increase in employment opportunities and personal income. Researchers have noted, however, that the distribution of jobs may have disruptive impacts on family relations as traditional roles change in Third World countries (Parris, 1984:15). In the development stage of a destination area, construction jobs are filled largely by men. When the construction phase ends however, the major beneficiaries of tourism employment opportunities, particularly in the hotels, are young people and women (deKadt, 1979b:43). In traditional or paternal societies, the weakening of authoritarian roles and redistribution of finances within the family can be sources of stress.

"Cultural diffusion" (Parris, 1984:22)—the process of borrowing or adopting cultural traits of other countries—although inevitable when different cultures come into contact, can be a source of tension between older, more traditional family members and younger, more impressionable children. The

youth of the host culture may experience a great deal of confusion and internal conflict, being pressured by their elders to dress, speak and behave in ways respectful to their indigenous culture, while at the same time observing the comparatively "loose" behavior, immodest attire, and material wealth of western tourists.

As tourist development grows in a destination area, the local people eventually develop a strategy of adjustment to cope with psychological tensions caused by the many changes in their lives. These strategies, outlined by Doğan (1989), are: resistance, retreatism, boundary maintenance, revitalization, and adoption. One or more strategies may be utilized, depending on the level of tourist development and on the characteristics of the host society.

Resistance, with its underlying hostility, is often manifested in aggression towards tourists. Doğan (1989:221) states that "...every region has a threshold for touristic development. When this level is exceeded, negative feelings toward tourism and tourists become wide-spread among the local population." He continues by listing several conditions that may help generate hostile feelings toward tourists: 1) the existence of a large number of tourists and the fact that the inhabitants have to share facilities and services with them; 2) the apparent material superiority of the tourists which may lead to feelings of envy and resentment among the inhabitants; 3) facilities managed by foreigners who receive superior salaries; 4) the increase of tourist facilities which local people are not allowed to utilize; 5) the weakening of traditional institutions under the

impact of tourism; 6) conflicting norms of dress, speech, and behavior (lifestyle).

Knox (1982) provided a particularly thorough description of factors which may contribute to resistance and hostile feelings toward tourists, including: overcrowding, xenophobia, invasion of privacy, competition for recreational and economic resources, competition for public transportation, lack of local control over tourism development, tourist contempt or disrespect for residents, sexual conflicts, resident attitudes toward service and servility, working conditions and philosophies, and stereotypes of tourists.

Retreatism, as opposed to active resistance, is a strategy amounting to complete avoidance of contact with the tourists. The boundary maintenance strategy allows the local people to accept and economically benefit from tourism, while minimizing the effects of, or intrusions by, foreigners on the local culture. This is achieved by controlling the form and amount of traditional culture presented to the tourist, similar to Parris' model culture tourism described earlier in this chapter.

Revitalization strategy is also accepting of tourism—as a means of preserving traditional culture. As Doğan (1989:223) puts it: "Tourism contributes to the revitalization of traditional cultures, because the need to preserve, display, adorn, and boast of the cultural resources arises only when there is an opportunity to exhibit these resources to others." The adoption strategy is typically followed by the youth and educated people in developing countries. Those who choose this strategy are not particularly concerned about

preserving cultural traditions and are supportive of tourism as a form of modernization.

As noted by both Knox and Doğan, local people may find themselves in competition with tourists for amenities and natural resources such as parks, restaurants and beaches. In traditional coastal development, hotels and vacation homes commonly create a continuous barrier along the beach, preventing views of the ocean as well as access to the beach. Farrell (1986:120) speaks of both physical and psychological barriers that effectively exclude local people from the beaches. Even if residents are not physically or legally restricted from frequenting tourist areas, the perception that they do not belong there may be enough to prevent them from utilizing these "public" areas.

It has been noted that local attitudes toward tourists change over time as the numbers and types of tourists change (Knox, 1982:76). This concept goes hand in hand with the tourist typology developed by Smith (Table 2-1 of this thesis). When tourists are present in relatively small numbers the local people are able to "see" and interact with them as individuals. In addition, these tourists tend to be more adventurous, more outgoing, and more interested in getting to know their hosts, so that these early encounters are friendly and enthusiastic. As low-key tourism gives way to mass tourism, the numbers simply overwhelm and interactions become impersonal; the opportunities for and interest in true cultural exchange are diminished. Language differences, the length of the tourist's stay, and physical isolation in "tourist ghettos" are additional factors that influence the

nature of host-guest interaction.

Carrying capacity, as discussed earlier, can also be viewed in terms of "social carrying capacity" (Wilkinson, 1989:163; Farrell and Runyan, 1991:31, Pigram, 1980:563). From the perspective of the tourist, a social carrying capacity threshold may be reached when overcrowding or conflicting recreational activities begin to have a negative impact on the quality of the tourist experience.

From the local perspective:

"A significant measure of tourism may be the hypothesis that there is an inverse relationship between population and the positive impacts of tourism. In other words, the smaller the local population and the greater the number of tourists, the more risk there is of negative impacts because of the local system's inability to absorb the consequences or to control the nature of tourism development...One indicator of such a hypothetical relationship may occur when the annual number of tourists exceeds the total local population." (Wilkinson, 1989:159).

In Puerto Peñasco, the monthly number of tourists exceeds the total local population, let alone the annual number that Wilkinson suggests above. If one accepts Wilkinson's indicator, Puerto Peñasco might be described as having a significant case of overload in terms of social carrying capacity, at least during peak tourist season. Consideration of "the good, the bad and the ugly" aspects of tourism points out the numerous challenges tourism planners are faced with. Another important approach for understanding the complexities of tourism is to study existing situations and their development histories.

### Tourist Development in Mexico—Case Studies

Until the late 1960s, tourist development in Mexico, as in many other parts of the world, was spontaneous and often ill-conceived in terms of its collective effects on natural and human resources. As a result, some of Mexico's traditional resort areas began to suffer serious problems from pollution, overcrowding, and crime against tourists; officials began to notice that the rate of tourist growth was leveling off or declining.

Largely in response to these problems, a federal level agency—Fondo Nacional de Fomento al Turismo (FONATUR—or the National Tourism Development Trust)—was created in 1969 to improve existing tourist areas and create new resort centers. A frequently stated objective was to avoid replication of the situation in Acapulco as well as to attract tourists away from these overburdened areas. Financing for FONATUR's projects came from entities like the Inter-American Development Bank and the World Bank, which require that their projects also benefit the local people (Bosselman, 1978:39).

This influence is apparent in some of FONATUR's planning criteria for site selection (Collins, 1979:354):

- "1. New tourist centers should develop new sources of employment in areas with tourist potential. These areas should be located near important rural centers with low incomes and few alternatives to develop other productive activities in the near future."
- "2. New resorts should spur regional development with new agriculture, industrial, and handicraft activities in the zone."

With these objectives and policies in mind, FONATUR conducted a two-year study of Mexico's coastlines and identified potential areas for development.

Detailed statistical evaluations emphasizing cost, physical amenities, and social need helped to prioritize the sites under consideration.

FONATUR utilized a three-phase Master Planning process for creating tourist centers (Reyes Rodriguez, 1980:73-74):

- "Phase 1. Setting a general strategy for tourism development of a particular zone or area, based on its feasibility.
- Phase 2. Studies on topics such as transportation, sanitation, power, telephone, urbanization, recreational areas, community services, and hotel construction, incorporating the following steps:
  - (a) problem analysis, goal identification, and policy formulation;
  - (b) data collection, identification of supply and demand of tourism facilities;
  - (c) data analysis, modeling, and summary characteristics for each site;
  - (d) establishment of concepts, conclusions, and advanced Master Plan design;
  - (e) results evaluation of preliminary version of the Master plan, economic and financial analysis, comparison with original goals.
- Phase 3. Final project formulation and approval by the Secretaries involved in infrastructure and tourism facilities building."

Several examples of planned and unplanned tourism development in Mexico are presented on the following pages. Acapulco, Puerto Vallarta, and Teacapán are traditional, spontaneously-developed resort areas, prior to the formation of FONATUR, while Cancun and Ixtapa-Zihuatanejo are examples of contemporary tourism planning, design, and development in Mexico.

### Acapulco

Following the construction of a highway in 1928, Acapulco functioned as an inexpensive tropical hideaway sought out by adventurous travelers willing to risk the rough drive through the mountains from Mexico City. The area was discovered by developers as well as growing numbers of tourists after World War II, setting off a building boom of hotels and other tourist facilities. High-rise luxury hotels were packed in along the beach, eventually overwhelming the landscape, and obscuring views of the exquisite Bay of Acapulco. The steep jungle-covered slopes were scarred by construction and left to erode away. By 1972, Acapulco was visited by about 1.5 million people annually, two-thirds of whom were Mexican citizens (Bosselman, 1978:37,46).

At the same time, the population of the small fishing village soared to 300,000. No provision was made by developers or local authorities for the rural laborers who migrated to the growing city seeking work. The rapid growth and overcrowding resulted in numerous squatter settlements covering the hillsides—settlements without running water, sewers, electricity, schools or health facilities. Waste water was routed through the town in an open canal that emptied into the Bay.

In the 1970s, the growth rate of tourism began to level off in Acapulco prompting Mexican officials to take a closer look. "Plan Acapulco" was formulated to address the problems of sewage treatment, transportation, infrastructure, low-income housing, and training for tourist industry workers.

However, as Bosselman (1978:39) points out, attempting to retrofit the existing city with these badly needed services was extremely expensive and disruptive at this late date.

In a discussion of "tourist ghettos"—a reference to the tourist enclaves or "the islands of foreign affluence" that characterize many resort areas—Collins (1979:353) used Acapulco as a perfect example of the tourist ghettoed city:

"Tourist ghettos burden their host cities with a common set of problems. For example, none of the traditional Mexican resort cities originated as a tourist-serving center and consequently their public service systems of transportation, water, and sewerage frequently fail to meet the combined resident-tourist demand. Each city is also the focus of heavy national migration drawn by the prospect of employment in the tourism sector, a hope that few migrants realize. Ultimately, each of these cities has evolved dual cultures and economies, one traditional and one foreign, to the detriment of most Mexican residents."

During the 1970s, Acapulco was experiencing an annual growth rate on the order of 15%. Residents were squeezed economically by rising prices for many basic goods and services; the prices that the foreign-owned hotels and tourists were willing to pay quickly translated into higher costs for residents also. Residents were also aware of (and resentful of) the unequal allocation of local resources that resulted in better beaches, streets, lighting, transportation, and other amenities in the tourist enclaves (Collins, 1979:353).

### Puerto Vallarta

Puerto Vallarta was settled in 1851 by fishermen and farmers and is located on Banderas Bay on the Pacific coast of Jalisco. Between 1930 and

1960, tourists to the area could be classified as "drifters" and "explorers" who arrived by boat, small airplane or by traveling over a rough, seasonal road from central Mexico (Evans, 1976:194). Several small hotels accommodated both domestic and foreign visitors in slowly, but steadily increasing numbers. Toward the end of this stage, retired Americans ("more individualistic than wealthy") began to build homes in an area known as "Gringo Gulch" and became year-round or winter-season residents. The relations between these tourists and the Vallartans were warm and friendly, largely because the Americans made efforts to learn Spanish and to become a part of the community. Americans invested in local businesses, gave English lessons, and helped to organize efforts to build schools, a museum, a library, and a hospital. By 1965, there were several hundred American-owned homes and apartments, and a few hotels (Evans, 1979:308).

Beginning in the 1960s, tourism experienced a surge of growth that can be attributed to several factors: 1) the installation of electricity in 1958 by the federal government; 2) completion of a paved highway in 1970; 3) construction of an international airport and aggressive marketing by a Mexican airline; 4) the filming of a major American movie, starring Elizabeth Taylor; 5) production of a prize-winning documentary of Puerto Vallarta in 1968 that was circulated to travel agents; 6) and, the construction of a deep-water dock and boat marina.

The population of Puerto Vallarta was 12,000 in 1965. Fifteen hotels, including one luxury, first-class hotel north of town, provided 500 hotel rooms.

The first-class hotel was welcomed by the local people because it provided extensive training, including English, and rapid advancement for local workers to management positions. Waiter positions were filled exclusively by men, who earned above average wages because of tips. The tourist industry also provided jobs in the taxi business, on charter fishing boats, guided jungle tours, souvenir shops, handicrafts, and mariachi bands. Cruise ships began making one-day stops, although about 70 percent of tourists came by air and 23 percent by road (Evans, 1979:310-11).

By 1970, the population of the city had almost doubled to 23,843. Tourists during Easter Week were estimated at 50,000 visitors, staying in hotels and camping on the beach. The number of hotels had also doubled during the five-year period and a luxury hotel strip had developed several kilometers north of town. The hotels on the strip were basically self-sufficient and tourists could conceivably spend their entire visit there. However, Evans (1979:310) indicated that the original, main tourist beach—with its older hotels, restaurants and shops—continued to be the "in" place to meet.

The rapid growth in Puerto Vallarta soon overwhelmed the existing supplies of potable water and electricity as well as the capacity of the sewage treatment plant. According to Evans (1979:312), three serious problems were recognized by officials: 1) the growth rate and rapid expansion of the tourist trade necessitated modern and expensive infrastructure; 2) foreigners were illegally buying and speculating on Vallarta land; and, 3) urban corporations were

investing in ejido land and individual enterprises unrestricted by local control. To combat these problems, a federal agency known as the Fideicomiso Puerto Vallarta was created in 1973 to regularize the ejido and foreign-"owned" land, and design and install the infrastructure to support the tourism industry. The complexities of regularizing more than 8,000 lots, and the limitations imposed on land use and individual rights did not make the Fideicomiso a popular institution. Some of the positive aspects that Puerto Vallartans did recognize however, were the role of the Fideicomiso in providing a community hospital, low-cost housing for the working class, and the general infrastructure improvements that facilitated the modernization of their city.

Evans (1979:317) stated that: "There is a long tradition of active local participation—even by newcomers—in providing medical, educational, and cultural facilities..." There are many service-oriented businessmen and civic organizations and a general pride in their city. Business groups such as the Hotel and Restaurant Association have been formed that meet regularly to address local issues and concerns. One problem recognized by Evans (1979:318) is the lack of a "local system of taxation providing the revenue necessary for maintenance and repair..."

In 1975, the population of Puerto Vallarta was conservatively estimated at 50,000 people. The number of first- and second-class hotels had increased to 42, with 5,000 beds. Of the 350,437 registered hotel guests in 1974, about half were foreigners and half were tourists from Mexico. An estimated 70,000

of these tourists made their visit during Easter Week. The traditional winter tourist season, from December 15 to April 30, was supplemented by an increase in both foreign and national visitors in the summer. Lower summer rates tended to attract foreign students and teachers as well as Mexican government employees on paid vacations or low-cost union-organized tours.

Although Puerto Vallartans appreciated the economic benefits of tourism, mass tourism imposed some difficulties in their daily lives. Some resentment was evident from the fact that resort hotels and some expensive residential areas were built on previously public beaches that eventually became inaccessible to the local people. Vallartans had to learn to avoid the business and shopping areas in the mornings when tour groups were herded through. Many of the "hippy" Americans were considered bad influences on local children, and marijuana use became a local problem. For the most part, however, Vallartans learned to adapt to tourism. Evans (1976:197) concluded that: "The kind and amount of cross-cultural interaction between tourists and members of the host culture can influence local attitudes toward change and innovation, particularly when early visiting patterns are developed slowly and informally..."

### Teacapán

Beginning in 1971, McGoodwin (1986) paid the first of several visits to the small, semi-isolated fishing village of Teacapán, hoping to study traditional folk culture. Instead, he found a culture that had experienced rapid social changes due to improvement of the road connecting it with the urban center of

Mazatlán to the north in 1967, and the subsequent influx of tourists.

Teacapán had about 2,500 inhabitants in 1971. Most of the village had no running water, housing was substandard, diseases were a problem due to poor sanitary conditions, and the infant mortality rate was high. Small-scale commercial fishing and shrimping in the estuaries supported most of these rural people, while others engaged in agriculture. However, the fish catch had been declining for many years and unemployment was high.

The villagers welcomed the paving of the old road because it was needed for transporting shrimp and farm crops to market. The first tourists who ventured over the new road came in campers and recreational vehicles and congregated on the beach in front of the town. They were Mexican nationals as well as foreigners from the United States and Canada. Before long, tourists began to "purchase" lots along the beach and build vacation homes.

One of the earliest and quickest social changes to occur, as noted by McGoodwin, was the alteration or complete abandonment of traditional community festivals. Prior to 1967, the festivals were very important events in the community because they involved everyone, raised money for the church and local charities, celebrated their folkloric traditions, and reinforced cultural values and customs.

The growing tourism in Teacapán attracted Mexican and foreign entrepreneurs who built trailer parks and other facilities for tourists. These investors also noted the attraction of the local festivals for the tourists, and began

to supplement the local activities with their own concessions, carnival rides and souvenir booths. These festivals which had once been free for all the local people were transformed into money-making events that effectively excluded the poorest villagers. The local societies in charge of organizing the festivals were forced to disband because they could not compete with the commercial enterprises, and many people in the community chose to spend their money on the new attractions rather than contribute to the local festival groups. The result was a net loss to the village as resources formerly kept within the community flowed to outsiders.

In addition to commercialization, festivals were affected in other ways. A festival for the patron saint of Teacapán was dropped completely, and a Christmas-New Year festival was relegated to a small event celebrated in private homes. The Holy Week (Easter) celebration was turned into a carnival on the beach that lasted from March through May. Celebrated in May, the Festival of the Fisherman lost its main focal point, a shrine on the beach called the Holy Cross of the Fishermen, as villagers lost interest in decorating with flowers, lighting candles and joining the local priest in the blessing of the fleet. New events, such as the crowning of a Queen and King of the festival were introduced, backed by outsiders and excluding the villagers.

McGoodwin viewed Teacapán as a "community cut adrift" when it lost its festivals and the Catholic societies that organized them. The youth in the village were highly affected by the wealthy lifestyles and the "taboo" behaviors they

observed. Some youths participated in this behavior, including drugs, causing many conflicts with their parents. McGoodwin (1986:142) observed that: "Underneath their characteristic courtesy and reserve, many Teacapanenos harbor hostile feelings toward the tourists. Many of the adults resent the tourists for the bad influence they feel they exert on their children. Then too, many youths resent the tourists out of envy and because they feel many of the tourists treat them as social inferiors."

As Teacapán moved into the 1980s, a reputation for unhealthy conditions and "ramshackle" facilities due to lack of sewers and running water slowed the pace of tourism. Although the community began to refocus its attention on local concerns, McGoodwin believes that much of the loss of traditional folklore and tradition is irretrievable.

### Cancun

Cancun, which means 'pot of gold' in the Mayan language, is located on the Yucatan peninsula in the state of Quintana Roo (Bosselman, 1978). The development is actually composed of two cities. Cancun City is the "service city" located on the mainland and designed to eventually accommodate 70,000 inhabitants. Cancun, the resort, is located on a narrow, 15-mile long barrier island, separated from the mainland by two lagoons. The site was particularly attractive to FONATURs planners because it allowed them to start from scratch and build a model resort benefiting tourists and locals alike. Prior to the start of construction in 1971, a small fishing village with 426 residents existed on the

mainland site (Daltabuit, et al., 1990:10) and the island was inhabited by 170 squatters (Bosselman, 1978:41).

The 25-year development plan for Cancun was divided into three phases. Phase 1, from 1970 to 1975, required public investment of \$47 million, roughly half of which was a loan from the Inter-American Development Bank (Pearce, 1989:970). During this phase, a \$10,000,000 airport and a conference center were constructed. For the service city on the mainland, basic infrastructure such as roads, water and sewer systems was installed for a planned 70,000 inhabitants. On Cancun island, an eight-mile strip was developed with infrastructure to serve a hotel zone and a residential zone. Phase 1 for the residential zone provided 200 tourist homes and condominiums. In the hotel zone, sites were prepared for about 24 hotels, the first of two 18-hole golf courses, tennis, nightclubs, and shopping areas. A sewage treatment plant was to be located at the golf course, and secondary effluent would be used to water the turf (Bosselman, 1978:44). According to Pearce (1989:98): "The actual development of various hotels...has been left mainly to the private sector, with 80 percent of the private investment estimated to be Mexican in origin. Hotels owned and operated by Mexican chains are complemented by hotels built by Mexican investors and managed by international chains."

In 1976, FONATUR acquired another bank loan of \$20 million to cover roughly 50% of the cost of Phase 2 (Pearce, 1989:95). This phase included the extension of facilities on Cancun island and the provision of an additional 4,000

hotels rooms. Phase 3 allowed for construction of another 10,000 hotel rooms and was scheduled for completion in the early 1990s (Bosselman, 1978:45).

The plan for Cancun City indicates that planners devoted much attention and economic resources to the situation of the local residents. Quality of facilities and construction was comparable to the resort district, the only difference being scale and function. Peripheral roads were designed around the community, to lessen the impact of automobiles, noise and dust on the neighborhoods. The plan also incorporated green zones in order to "refresh the air" (Bosselman, 1978:50).

In spite of all good intentions, the first several years were difficult for Cancun City residents. Construction of housing and infrastructure could not keep up with the rapid influx of laborers. The cost of housing, what little was available, went out of sight. To the embarrassment of FONATUR, a squatters town grew up around the fringes of Cancun City. In 1975, an estimated 30,000 squatters lived in the shacks of Puerto Juarez, serviced by potable water, but lacking paved streets and sewage treatment facilities. However, as conditions in Cancun City improved, the population of the squatters town declined, although there were still a few occupants in 1977 (Bosselman, 1978:49-50).

Construction jobs in the early phases of development were filled largely by Mayan Indians from the interior of the Yucatan peninsula, some of whom did not speak Spanish. As development continued, the public schools offered 3-month training courses for low-skilled tourism industry positions (clerks, maids, waiters,

cooks) as well as English classes and basic reading and writing for adults. Three technical schools were built by the government. The ejidos in the area formed small businesses to supply the resort district with local products such as chickens, eggs, and building materials.

As the need for highly skilled workers emerged, Cancun began to attract people with experience in the tourist business from other resort areas all over Mexico, especially Acapulco; these professionals ended up with most of the better jobs. Many of the Mayans, it seems, migrated back to their villages in the interior. Bosselman (1978:48) speaks of the historical resistance of the Mayans to Spanish conquest, and their general "reluctance to adopt Mexican values." For the Mayans who stayed on as residents, teams of anthropologists were on hand to help reduce the "culture shock" (Collins, 1979:359).

Some criticism has been directed toward FONATUR for its lack of regard for the natural environment of the site. Two existing wildlife sanctuaries on Cancun island were appropriated for hotel sites. Construction of the airport necessitated excavation of large quarries and dredging of the lagoons and the sea floor for fill. Mangrove forests on the island were cut down, and portions of the lagoons were filled in for condominiums. Rich topsoil for the golf course and gardens was obtained by indiscriminate scrapping in the jungle. Delays in the construction of the sewage treatment facility resulted in raw sewage flowing into the lagoons for some time. The larger lagoon was apparently able to absorb the pollution, but the smaller lagoon was troubled by localized algae blooms

(Bosselman, 1978:52).

In an effort to avoid the Miami Beach look and scale, FONATUR created land-use zones and devised standards for building heights, construction materials and density requirements, setbacks, parking spaces, and landscaping. The resulting architecture and landscape has a "coordinated" or "cumulative visual effect" with a style that combines elements of Mayan, Spanish/American, and Mediterranean cultural traditions. FONATUR focused on a strong beach theme and promoted the image of Cancun and the Yucatan coast as "the Mexican Caribbean" in an effort to compete with the existing tourist industry in the Caribbean islands. The Caribbean image was perpetuated by planting palm trees, both imported and native varieties, along the beaches and boulevards. Landscaping efforts, using many local species, extended to residential neighborhoods, streets and parks, as well as the hotel and business districts.

Collins (1979:361-62) noted that:

"Cancun's image is a composite. In the aggregate, the sensible impact is conveyed by the mass of whitewashed structures set by the sea. The image evoked is strongly, and purposefully, Mediterranean, an impression that is heightened by the use of red tile or flat form roofs. Thatch roofs, on the other hand, produce an unmistakably tropical effect. What the planners have created in Cancun is an image perceptually attuned to tourist demand, an image that may best be described as a "tropical seaside ambiance." Cancun is what tourists, in their mind's eye, think a tropical resort should look like." (emphasis added)

Cancun is a new city, designed to avoid the poverty, pollution, and haphazard development associated with Mexico's traditional resort areas.

Bosselman (1978:53) reported that tourists generally gave high marks to Cancun's beaches but felt that the resort itself lacked character, evoking a rather "sterile" image. Collins (1979:357) observed that: "Cancun lacks the colonial charm of older Mexican cities but compensates for this with its architectural coordination and attention to landscaping of hotels, businesses, and residences." On a visit to the resort in 1982, this author observed that shops and nightclubs on the island were virtually deserted, and many tourists gravitated to Cancun City on the mainland in search of the "real" Mexico.

With all its imperfections, this initial effort by FONATUR is given generally high marks for comprehensive planning and implementation of a tourist resort that considers the needs of both tourists and residents. Water, power and sewer facilities have proved to be dependable. Pollution and congestion due to automobile traffic has been avoided by providing an efficient bus system and because, according to Collins (1979:357) "...planners eschewed the traditional Spanish town square and grid street pattern."

Economically, the local population has benefitted from higher than normal wages (somewhat offset by higher prices), a 75% employment rate, stimulation of local industries such as agriculture and handicrafts. FONATUR is particularly proud of the fact that "virtually all jobs are being filled by Mexican citizens", precluding the need for foreign workers (Bosselman, 1978:52).

Collins (1979:354) called Cancun a "...planned tourist ghetto [enclave] ...the traditional tourist ghetto in Mexico shows no inclination toward integration

or disappearance and so dispersion to controlled new tourist ghettos is the accepted planning strategy." Daltabuit, et al. (1990:9) remind us that: "The touristic model in vogue at the time (early 1970s) was the integrally planned beach resort, a self-contained entity so "international" in flavor that one development was very much like another...this, fundamentally, is the Cancun phenomenon."

Cancun has proven popular with both Mexican and foreign tourists, but an unexplained decline in the proportions was noted between 1975 and 1980. In 1975, 75% of the 100,000 tourists were Mexicans, while only about 50% of the 460,000 tourists in 1980 were Mexicans. Foreign tourists tend to visit Cancun during the winter months followed by Mexican tourists during the summer months, resulting in year-round flow of tourists to the resort (Pearce, 1989:98). By 1988, more than 2 million tourists were flocking to Cancun's beaches annually (Agardy, 1991:206). Accommodations today include 40 major hotels with 16,805 units supported by 300,000 residents in Cancun City (Daltabuit, et al., 1990:10).

The localized resorts at Cancun, however, are not the end of the story. Beyond the apparent control of FONATUR is the development of tourism throughout the Yucatan peninsula and especially the 900 km of coastline in the state of Quintana Roo. South of Cancun, the Sian Káan Biosphere Reserve is being threatened by "insensitive development" which is polluting the coastal ecosystem and destroying the interdependent reef, mangrove forest and seagrass

habitats (Agardy, 1991:207). "Soft-path" or "archeotourism" is attracting mass numbers of tourists to ancient Mayan sites like Tulum, Koba, and Chichen Itza, where there are currently no deterrents to climbing on the pyramids and souvenir-taking. A regional eco-tourism project, "La Ruta Maya" is a 1,500-mile route planned to provide access to ancient Maya sites in five countries in Central America—Belize, El Salvador, Guatemala, Honduras, and Mexico. Intended as an alternative to Cancun-style developments, the Maya Route plan envisions modest facilities, jobs, participation and local ownership by the Maya, and preservation of archeological resources. However, the vast scale of this enterprise and its potential impact on the relatively isolated Maya society and the heretofore pristine environment has generated some skepticism (Daltabuit, et al., 1990).

#### Ixtapa-Zihuatanejo

Around the same time that Cancun was being developed on the Yucatan peninsula, FONATUR also began implementing plans for tourism development in the state of Guerrero on Mexico's Pacific coast. The small fishing village of Zihuatanejo, located about 200 km north of Acapulco, was selected as a service center for the proposed Ixtapa resort complex which was to be erected on an uninhabited stretch of beach 5 km up the coast. Reynosos y Valle (1979:133) recognized two components of tourism: 1) Tourism infrastructure during the construction phase, and 2) in actual operation, the economic activity known as "tourism" and the provision of tourism services. The following discussion focuses on the first component—or the "growing pains" experienced by the residents of

Zihuatanejo during preparations for the activity of tourism.

Prior to the 1950s, Zihuatanejo was an isolated fishing village, accessible only by sea. The village had streets of dirt and lacked running water, sewer and many other modern conveniences. Following the construction of a new highway to Acapulco and a small airstrip, the village began to attract a few foreign visitors. In 1970, Zihuatanejo had a population of less than 5,000 and played host to between 12,000 and 15,000 tourists annually. An estimated two-thirds of these tourists were from Mexico. (Reynosos y Valle, 1979:114; Bosselman, 1978:176)

FONATUR's 1971 plan for Zihuatanejo was basically an urban renewal and expansion plan. The village would function as a secondary, lower-key resort area as well as a service city for Ixtapa. All homes would be provided with running water, sewer connections, power and telephone lines. The winding streets would be straightened and paved. New housing would be constructed and squatters shacks on the hillsides would be demolished, following relocation of the residents. The fishermen would get a new marina. Health facilities, a public laundry and schools (including hotel training) would be provided. Phase one was planned for 20,000 residents, with eventual expansion to accommodate 50,000 to 80,000 people (Reynosos y Valle, 1979:115; Bosselman, 1978:177).

One thing FONATUR did not count on was objections from the villagers to the original master plan for Zihuatanejo, forcing them to produce a revised plan in 1975 (Bosselman, 1978:177). Residents insisted that the new roads

follow the existing winding roads, and that many houses be renovated rather than replaced. They also demanded that the existing squatters shacks be allowed to remain on the hillsides (out of reach of the new utilities), but agreed that no new settlers would be allowed.

Another thing that FONATUR did not plan on was the complex, time-consuming nature of the land acquisition and regularization process, which began in 1972. About 60% of the project area in Zihuatanejo was owned by three ejidos who were entitled to certain compensations for their land under the federal Agrarian Reform laws. Ejidatarios and family members depending on the ejidos for their incomes totaled 30% of Zihuatanejo's population. The remaining villagers were called *avecindados* (settlers), many of whom were illegally occupying a 22-hectare tract of nationally owned land.

After two years of negotiations, characterized by high tensions, the ejidos reached a settlement on their lands. As the law provided, each ejidatario received two prime urban lots of 600 sq meters each, as well as compensation for buildings and improvements on ejido land. Equity interest in the tourist development, stipulated for the ejidos under the reform laws, was renegotiated for \$9,000 cash up front for each ejidatario, because most of them did not want to wait 20 years or more for profits from the resorts (Bosselman, 1978:177).

The *avecindados* did not have the same legal protections as the ejidos, and as a whole they fared much worse. Many of the squatters on the national land could not afford to buy their homesites from the government. For those who

could afford this purchase, there was the additional burden of paying taxes and utility bills. The ejidatarios were also faced with paying taxes for the first time, and the shift in land ownership and collective decision-making power eroded the status of the ejidos as a class. Although some ejidatarios built homes or businesses on their urban lots and made good investments, many simply squandered their fortunes, being "ill-prepared to handle these sums of money" (Reynosos y Valle, 1979:122).

Construction in Zihuatanejo was delayed for two years, until completion of the land acquisition process in late 1974. At the Ixtapa site, however, construction had been underway since September 1972 and two new hotels with 527 rooms were near completion. For Zihuatanejans, this meant an influx of workers that could not be accommodated by existing systems and a general deterioration of living conditions for everyone. During the peak of construction 6,000 transient workers were living in makeshift camps near the village. Suffering from boredom and poor living conditions, the workers indulged in alcohol, fighting and prostitutes. The villagers suffered the loss of their streets and recreation areas on weekends.

Reynosos y Valle (1979:129) noted the following temporary, but annoying, deficiencies early in the project: 1) a shortage of schools for about one year; 2) a shortage of clinics in the first years; 3) a chronic problem of a weak municipal administration without a budget adequate to provide community services; 4) a shortage of drinking water because the old water supply network

was obsolete, while the new one was not yet functioning; 5) inadequate sewers; 6) a critical housing shortage with a disproportionate rise in rents; and 7) a serious parking problem.

Recognizing that the transformation of Zihuatanejo from a rural fishing village to an urban tourist destination would require many social adjustments for the villagers, FONATUR created the Community Development team composed of a director and ten young professionals—sociologists, lawyers, psychologist, social workers and tourism specialists.

"The Community Development team was given a broad mandate to minimize the problems of development...The team has tried to interpret its role to be that of helping people adjust to the rapid transition from a rural to an urban way of life... Of necessity, however, the team was caught up in the difficulties of land tenure. On the one hand, it helped the ejidatarios establish eligibility for indemnification and helped *avecindados* establish clear titles of the land they occupied. On the other hand, the team helped the authorities execute the urban plan, relocating people, negotiating compensation, and enforcing the new regulations." (Reynosos y Valle, 1979:123)

In addition to a geographic area of responsibility, each team member helped out in other areas, such as health services, tourist-host encounters, tourist-industry training classes, English classes, camps for construction workers, housing, employment, organizing neighborhood clubs, food cooperatives and a quarry cooperative. An Annual Tourism Week was initiated to help promote positive encounters between locals and tourists. Activities included painting workshops for local and visiting children, and a neighborhood open house where tourists were invited to share a meal with local residents.

The urbanization of Zihuatanejo had a noticeable effect on the women of the community. Some women were forced into the workforce for the first time in order to help their families meet the new cash demands of monthly utility payments and taxes. Reynosos y Valle (1979:130) indicated that this is "challenging the traditional machismo for the Mexican male." Many well-paying jobs opened up for women in the tourist industry that would not normally be available to them. In the new hotels in Ixtapa, women occupied up to 29% of the jobs, mostly as maids and secretaries. In Zihuatanejo, women comprised over 50% of the hotel staffs, and were more likely to be managers or owners of these older hotels. In both resort areas, women held 64% of restaurant positions, but only men worked as waiters in the first class restaurants. Outside of the tourist business, women held 10% of the government jobs, 36% of primary-school teaching positions, and 6 to 30% of jobs in other businesses.

By the end of the 1970s, the population of Zihuatanejo had reached 10,000. The rapidly growing resort complex in Ixtapa lured many highly educated people to the area to open new businesses. As happened in Cancun, the new tourist industry's urgent need for highly skilled employees could not be met solely by training the local people initially. Many of the best jobs went to professionals from Acapulco with experience in tourism.

Reynosos y Valle (1979:133) made the following conclusions based on observations at Zihuatanejo:

- "1. It is important to conduct base-line studies of population characteristics and values if one wishes to monitor the changes taking place.
2. The activities generated by the construction of a tourism project will have a significant effect on the community long before tourists begin to arrive in numbers.
3. The people who come to build the infrastructure, and the installations that result, will bring about such far-reaching social changes that it may be almost impossible to observe the specific impact of tourism thereafter, much less to measure it.
4. Although the original inhabitants of Zihuatanejo were not initially involved in the project, they have gradually adjusted to the changes introduced by tourism and have become integrated into the new social setup. It is therefore likely that tourism itself will eventually become an integrating force rather than a disruptive one."

### Alternative Forms of Tourism

In August 1989, the first meeting of the newly formed International Academy for the Study of Tourism was held in Zakopane, Poland (Smith, et al., 1992). Much of the discussion centered on the emerging concept of "alternative tourism" and its many forms and definitions. After recognizing that tourism takes many forms, with each form being dependent on the countries, environments and players involved, the academy members pointed to the futility of forming a single definition of "alternative tourism" and recommended instead that research should emphasize "alternative forms of tourism". By describing existing tourist destinations in terms of their operational tourist process and tourist system, comparisons of processes and systems can then be made, and impacts anticipated.

Whatever one's definition of alternative tourism or alternative forms of tourism, the motivation seems to be a general reaction against, and disillusion-

ment with, traditional tourism or mass tourism. Smith, et al. (1992:6) observe that: "By the 1990s, there is a sense that the public has become 'tired' of the crowds, weary of jet lag, awakened to the evidences of pollution, and in search of something 'new'." Although the literature on alternatives to traditional tourism reflects a variety of concepts and forms, clearly there are many common threads that serve to classify them as alternatives. As described by deKadt (1992:50):

"Alternative Tourism is applied to tourism which does not damage the environment, is ecologically sound, and avoids the negative impacts of many large-scale tourism developments...is thought to consist of smaller developments, or attractions for tourists which are set in and organized by villages or communities. These are seen as having fewer negative effects, social or cultural, and a better chance of being acceptable to the local people than mass tourism... Certain kinds of tourism are called alternative because they are not 'exploitative' of local people, because the benefits flow to local residents...and does not damage the culture of the host community."

Alternative forms of tourism have been couched in terms of physical scale and in terms of socio-cultural issues. As an "alternative to the skyscraper hotel atmosphere of mass tourism..." Niewiaroski (1975:68) proposed that developing countries create a Small Hotel Corporation (SHC). The SHC was envisioned as a partnership between the host country, foreign investors and a major international hotel chain that would feature local ownership of small hotel franchises, with technical support provided in the areas of management, marketing, and reservation services. These low- to medium-priced hotels would provide local employment and utilize local suppliers to a large degree. Most importantly, however, the small hotel would reflect the "ambiance" and "indigenous charm"

of the local culture through the preservation of local styles, foods, entertainment, and architecture.

In Dernoï's (1981) concept of Alternative Tourism (AT), tourist lodging is made available in the homes of local residents. Table 2-11 is a comparison of AT and conventional tourism. Conceivably, AT provides advantages for almost everyone, starting at the individual or family level and progressing through the local community, host country, originating/industrialized country, and the international relations level. Locally, the greatest advantage is economic, with revenue passing directly to individuals and the local economy. Conversely, this means that less revenue is realized by state and national governments or foreign investors. For the community, AT ensures that local housing conditions improve as hosts upgrade their homes to make the accommodations more attractive to tourists. Financial assistance in the form of home improvement loans or grants would be required to help local entrepreneurs. The kinds of tourists that would likely be attracted to Dernoï's (1981:255) concept of AT are those who "prefer close contacts with local people...[and/or] are highly cost conscious" (students are specifically mentioned, but retirees on fixed incomes and middle-class families with children are additional market segments). In surveying the international scene, Dernoï found that several countries, most notably Bulgaria, hosted forms of tourism closely approaching his Alternative Tourism.

The concept of small hotels versus large hotels will be investigated further in Chapter 3 under the subject of Physical Scale of Development. Similarly,

Table 2-11.  
Comparison of conventional tourism and alternative tourism.

CONVENTIONAL/COMMERCIAL TOURISM	ALTERNATIVE TOURISM
Generally between 10 and 100 rooms, often a few hundred	Generally one or two units, rarely over six offered (except for camping places)
Rarely a family enterprise, mostly a manager system	Mostly a family business
By its nature, rather centralized: units immediately together	Units are generally dispersed in the community or region
Needs major investments, often public expenses for infrastructure	Needs smaller investments, mainly on an individual basis
Needs land planning, layout design, tends to interfere with the environment and with local ways and tradition; changes landscape	Fits into existing settlement pattern, no need for layout or landscape alteration; by its nature, has to adapt more to local habits
Generally offers high-cost accommodation and services, with a higher level of comfort, thus excluding tourists with lower revenue	Offers low-cost services; facilities often lack comfort; can accommodate low income groups
Revenue enters the commercial business circuit; slow, ineffective filtering-down to the general population. Profit often leaves the locality, even the country	Income goes directly to the inhabitants, stays there locally
By concentration of its units, tends to isolate tourists from "locals"	Automatically prevents or reduces tourist "apartheid".
May create tension between tourists and locals	Could promote better understanding

Source: adapted from Dernoï (1981).

Jenkins' (1982) concepts of enclave development and integrated tourist development have relevance in discussions of both alternative forms of tourism as well as scale of development, and will be examined in Chapter 3.

Murphy's (1985:36) concept of "community-oriented" tourism also functions as a planning strategy for achieving the "community tourism product"

(see Figure 3-5). In contrast to the traditional mass tourism product which is developed mainly by outsiders with an emphasis on business interests, the community tourism product "is one which the community, as a whole, wishes to present to the tourism market."

"The [tourist] industry possesses great potential for social and economic benefits if planning can be redirected from a pure business and development approach to a more open and community-oriented approach which views tourism as a local resource. The management of this resource for the common good and future generations should become the goal and criterion by which the industry is judged. This will involve focusing on the ecological and human qualities of a destination area in addition to business considerations." (1985:37).

Along a similar vein, Farrell (1986:127) described the concept of "cooperative tourism—a joint venture in which all parties bear individual and collective responsibility." The substance of cooperative tourism is a community council or advisory committee that works closely with government and tourist industry personnel to help plan and manage tourism. Although good examples of cooperative tourism are not documented, Farrell notes that the concept could be particularly beneficial to developers who want to avoid expensive delays in projects due to protests and hostility from local residents.

"The New Tourism" of Rosenow and Pulsipher (1979:41) is defined by the following set of principles: 1) sensitivity to unique heritage and environmental resources; 2) preservation, protection, and improvement of major tourist attractions; 3) development of surrounding tourist attractions in a complementary manner, respecting local roots and attributes; 4) balancing of

economic opportunities with cultural and social enrichment; 5) development that does not exceed environmental carrying capacities or adversely affect the quality of community life; and, 6) development that conserves energy resources.

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## CHAPTER 3: PLANNING AND DESIGN FOR TOURISM

The previous chapter on international tourism reviewed some of the positive and negative aspects of traditional tourism as well as case studies of both spontaneous and extensively planned tourist developments. Table 3-1 is a generalized scenario of what can happen when there is no broad-scale planning, or when inadequate planning efforts are based solely on economic objectives. Even where tourist projects have been sensitively planned and designed, such as the Cancun example, we have learned through implementation that we still have much to learn. Planning and design for tourism is a dynamic and evolving science that must somehow integrate a variety of potentially conflicting social, environmental and economic issues, as previous chapters have illustrated. This chapter emphasizes the more physical aspects of tourism planning and design, followed by a review of planning and design processes.

### Beach Resort Morphology and Development

One of the earliest studies of beach resort morphology was conducted by J.A. Barrett in a 1958 unpublished doctoral thesis, "The Seaside Resort Towns of England and Wales," from the University of London. A model of seaside resort morphology developed by Barrett is presented in Figure 3-1. Pigram (1977:525-26) summarizes the significance of Barrett's work as follows:

"...[Barrett] noted the significance of the seafront in the structure and location of the commercial core, a distinct zonation of

**Table 3-1.**  
 Typical sequence of tourism development when  
 there is no broad-scale planning.

PHASE 1	<ul style="list-style-type: none"> <li>▪ Governmental incentives for development</li> <li>▪ Promiscuous location of projects</li> <li>▪ No identification of land qualities requiring protection</li> <li>▪ Highly optimistic feasibilities</li> </ul>
PHASE 2	<ul style="list-style-type: none"> <li>▪ Short-run success</li> <li>▪ "A halcyon (happy, idyllic) period for all concerned (that) may last five to ten years"</li> </ul>
PHASE 3	<ul style="list-style-type: none"> <li>▪ Reality sets in</li> <li>▪ Less economic impact than anticipated</li> <li>▪ Labor unrest, local resistance</li> <li>▪ Environmental errors</li> </ul>
PHASE 4	<ul style="list-style-type: none"> <li>▪ Tourism recession</li> <li>▪ Overbuilding</li> <li>▪ High labor costs</li> <li>▪ Backlash due to poor service</li> </ul>
PHASE 5	<ul style="list-style-type: none"> <li>▪ Local conflict</li> <li>▪ Erosion of natural and cultural resources</li> <li>▪ Further decline in visitor popularity</li> </ul>
PHASE 6	<ul style="list-style-type: none"> <li>▪ A reflective phase</li> <li>▪ Investors, developers, managers, local society and political leadership reassess the entire tourism development pattern and</li> </ul> <p style="text-align: center;"><b>WISH THEY HAD PLANNED</b></p>

Source: adapted from Gunn, 1979:20-21.

vacation accommodation and residential areas and an elongation of settlement parallel to the coast. In Barrett's study, the core shopping and business district had a year-round function and frequently marked the junction of residential and seasonal accommodation zones so as to serve both. Typically, its location was offset symmetrically to a frontal seasonal trading and accommodation strip which was the focus of resort activities...The 'front' was functionally and socioeconomically distinct from the rest of the town...All these features, Barrett suggested, were subject to modification by specific site considerations and the pre-resort transport and land-use pattern and settlement function."

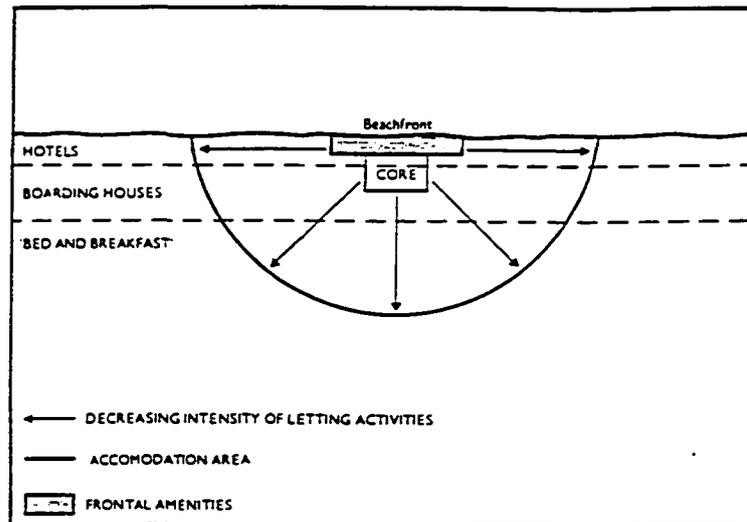


Figure 3-1. Theoretical zoning of accommodation in a seaside resort. (Source: Pigram, 1977:526, after J. A. Barrett, 1958).

Stansfield (1970) defined a feature unique to resort areas, the Recreational Business District (RBD). In contrast with previously recognized types of business districts such as the Central Business District (CBD), Shopping Thoroughfare, Neighborhood Business District and Isolated Retail Node, the RBD "...is characterized by a distinctive array of pedestrian, tourist-oriented retail facilities and is separated spatially as well as functionally from the other business districts" (Stansfield 1970:213). In a coastal resort, the center of the RBD develops where the main access routes converge on the tourist attraction (the seashore) and then expands in a linear fashion along the beach front. The RBD operates on a seasonal basis and often occupies a position between the beach front and the CBD which serves the year-round residents of the resort city.

Pedestrian promenades are also characteristic of many seaside RBD, dating back to the introduction of the boardwalk in Atlantic City, New Jersey, USA. With its specialty food stands, restaurants, novelty and souvenir shops, boardwalks and piers, the RBD meets the special needs of recreational visitors. Leisurely strolling, site-seeing, and shopping within the RBD fulfills social as well as economic needs and functions as a source of entertainment for the tourist.

Pigram (1977) studied the urban morphology and functional zonation of several seaside resorts on the Queensland Gold Coast of eastern Australia. Generally speaking, development of the seaside resorts followed linear and vertical patterns of expansion because the seashore was the "fundamental" attraction of the resorts, major roads and rail access routes were located adjacent to and parallel with the beach front, and because expansion was precluded in varying degrees along the perpendicular axes. As one might expect, land use zones also paralleled the seashore. The frontal beach strip was the location of the highest density tourist accommodations, typically in the form of high-rise hotels and apartments. A linear Recreational Business District was recognizable behind the frontal accommodation zone and a Central Business District commonly developed along the main access corridor at right angles to the beach front. Further back from the beach, a zone of medium and lower-density tourist accommodation might be found, followed by a largely residential zone. In at least one case, the location of the residential zone had migrated significantly inland from its original location near the present-day resort core due to increasing

land values. Resort morphology was also greatly influenced or restricted by physical features such as river inlets and coastal morphology, and by historical features such as railroads and border fences. Finally, Pigram described the phenomenon of "paired beach resorts" where adjacent towns may gradually develop different but complimentary tourist and business functions.

In a Tentative Beach Resort Model (TBRM), Smith (1992) identified eight phases of development, described in Table 3-2, that characterize the transformation of a natural beach into an urbanized beach. Many similarities are evident when compared with Gunn's sequence of tourism development (Table 3-1); however, Smith's concern is largely with developing a model for the physical expression of growth associated with increasing numbers of tourists, illustrated in Figure 3-2.

Based on observations and experience mainly in the Asian Pacific, Smith concluded that increasing growth and urbanization in the unplanned resort area generally resulted in a deterioration in quality. "As beach resorts mature, resort ambience deteriorates, pollution levels climb, negative social impacts increase, and questions of equity (the distribution of the economic benefits) arise" (Smith, 1992:304). In testing his own model against an existing resort at Pattaya, Thailand, Smith identified ten inconsistencies, leading to the recognition that resort cycle processes are complex and that the TBRM needs some fine tuning before it can be used as a definitive model.

**Table 3-2.**  
**Tentative Beach Resort Model (TBRM):**  
 the evolution of contemporary beach resorts  
 from natural beach to urban beach.

<p align="center"><b>PHASE A:</b>  <b>PREDEVELOPMENT</b>  <b>DATUM</b></p>	<ul style="list-style-type: none"> <li>▪ No tourists are present</li> <li>▪ A small settlement or village exists</li> </ul>
<p align="center"><b>PHASE B:</b>  <b>EXPLORATIVE</b>  <b>TOURISM</b></p>	<ul style="list-style-type: none"> <li>▪ Independent tourists who seek close contact with the culture visited</li> <li>▪ The settlement is expanded to accommodate visitors</li> <li>▪ High contact between tourists and residents results in major negative social impact</li> </ul>
<p align="center"><b>PHASE C:</b>  <b>FIRSTHOTEL</b></p>	<ul style="list-style-type: none"> <li>▪ Accessibility of area is improved</li> <li>▪ A high-class tourist hotel signals the beginning of large-scale tourism</li> <li>▪ Organized tourism</li> <li>▪ High-budget travelers</li> </ul>
<p align="center"><b>PHASE D:</b>  <b>STRIP</b>  <b>DEVELOPMENT</b></p>	<ul style="list-style-type: none"> <li>▪ More hotels are built, fronting the sea</li> <li>▪ More business open to serve hotels</li> <li>▪ Employment opportunities for residents</li> </ul>
<p align="center"><b>PHASE E:</b>  <b>BUSINESS CENTER</b>  <b>ESTABLISHED</b></p>	<ul style="list-style-type: none"> <li>▪ Residents are displaced away from the beach front, to previously unsettled locations</li> <li>▪ Access to beach is restricted</li> <li>▪ The former village business area is expanded and dominated by tourism interests</li> <li>▪ Pollution is a problem</li> <li>▪ Ambience of the resort begins to deteriorate</li> <li>▪ Local government is established for the resort</li> </ul>
<p align="center"><b>PHASE F:</b>  <b>HOTELS AWAY FROM</b>  <b>BEACH</b></p> <p align="center">(continued)</p>	<ul style="list-style-type: none"> <li>▪ Land adjacent to beach is no longer available</li> <li>▪ Concentrated development results in loss of natural environment and aquatic life</li> <li>▪ Resort is totally tourism oriented</li> <li>▪ Number of jobs steadily expands</li> <li>▪ Government realizes that development is uncontrolled, and environment and other problems threaten the future viability of the resort</li> <li>▪ A resort MASTER PLAN is prepared in an attempt to resolve these difficulties</li> </ul>

Table 3-2, continued.

<p><b>PHASE G: SECOND ROAD</b></p>	<ul style="list-style-type: none"> <li>▪ Access to land away from beach is improved, businesses and lower-grade hotels open here</li> <li>▪ Resort is now urbanized</li> <li>▪ Centralized sewers are constructed</li> <li>▪ Package tourists dominate, spending declines</li> <li>▪ Local government is unable to cope as the resort continues to grow</li> </ul>
<p><b>PHASE H: SEPARATION OF CBD AND RBD</b></p>	<ul style="list-style-type: none"> <li>▪ Mature phase, resort has become a city</li> <li>▪ Clear separation of recreation business district and commercial business district</li> <li>▪ The beach is severely polluted and little used</li> <li>▪ The local government fails to manage the resort and earlier master planning is seen to have failed</li> </ul>

Source: Adapted from Smith (1992:306-308).

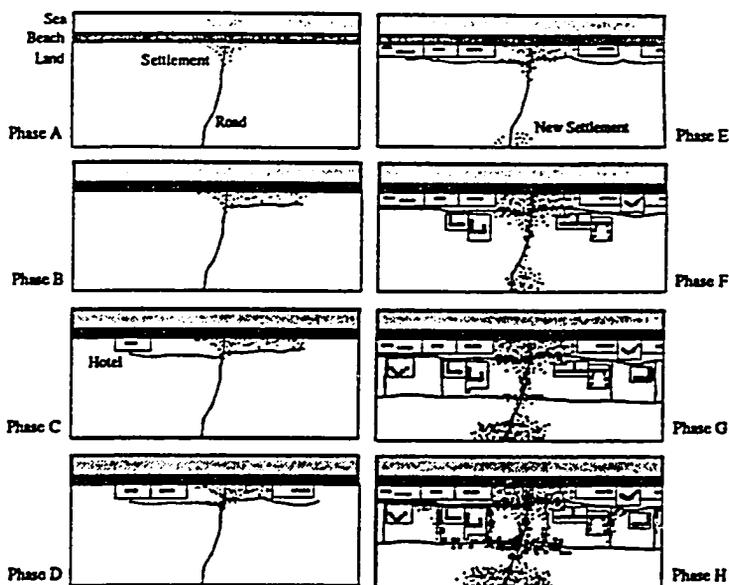


Figure 3-2. Tentative Beach Resort Model.  
(Source: Smith, 1992:307).

Pearce (1989:270) identified a number of problems arising from traditional beach front morphology, described by Stansfield (1969) and others:

"This parallel structure now presents several disadvantages. Firstly, the first line of buildings, which are often high-rise in order to support the higher land prices, may constitute a barrier, both visual and real, between the interior residential zones and the beach or port. Secondly, the flow of pedestrians from these zones to the beach is disrupted by the automobile traffic of the intervening road, particularly if this happens to be a regional highway. Moreover, such a structure encourages linear or ribbon development, which is often not only aesthetically displeasing but also environmentally degrading..."

Several resorts located along the Languedoc-Roussillon and Aquitaine coastlines in France are praised by Pearce for innovation and solutions offered to problems outlined above. Port Grimaud and the Marines de Cogolin are specialized resorts emphasizing recreational boating and yachting. Among other things, they are noted for limiting vehicle access into resort interiors and for restricting hotels to two and three stories in order to afford maximum views while respecting the low-lying character of the landscape. La Grande Motte, shown in Figure 3-3, is a large (43,000-beds) and more diverse resort which avoids the linear development of traditional beach resorts. While the main access road does parallel the beach, its location 200 m back from the shoreline helps to solve traffic congestion problems. Secondary roads lead into the resort perpendicular to the beach in what Pearce calls a "comb" or "glove" system. A system of pedestrian footpaths allows residents in any section of the resort to reach the sea within 10 to 15 minutes. A variety of tourist facilities and land uses are

combined within the resort in varying degrees of density, including high-density hotels and apartments, low-density villas, camp grounds, open spaces, parking lots, shopping and administrative centers, and a community building.

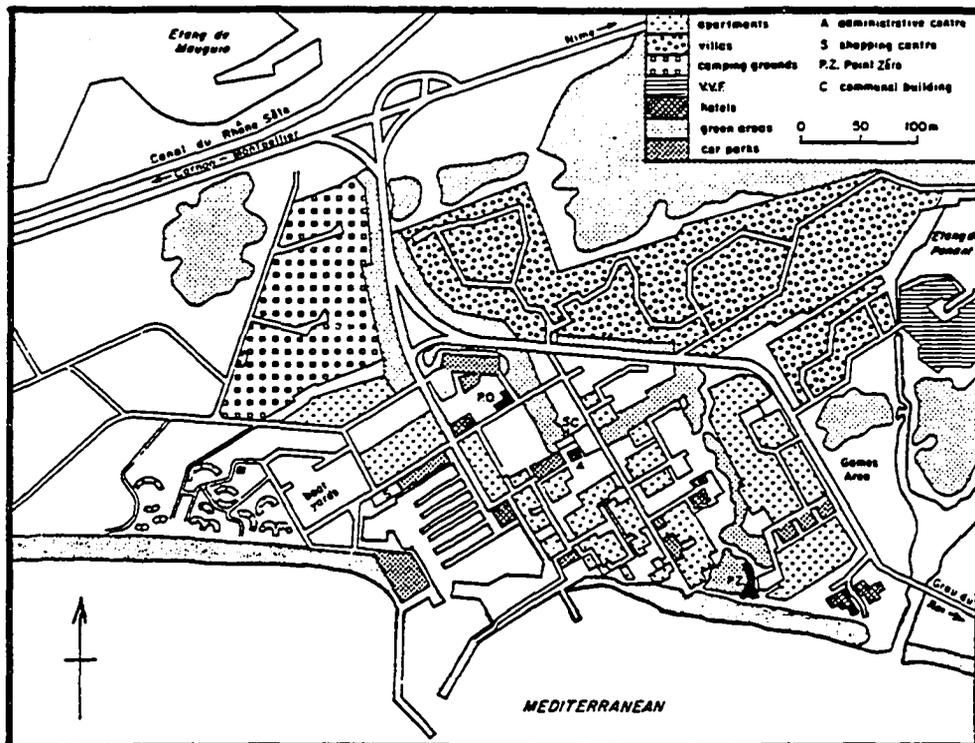


Figure 3-3. La Grande Motte (Source: Pearce, 1989:274).

### The Life Cycle of Tourist Areas

Tourism planning that addresses only one point in time while failing to recognize the dynamic nature of tourism is not likely to be successful. Tourist areas evolve and change over time as the kinds of tourists change, as tourist facilities deteriorate, as tourist attractions change or even disappear, and as new tourist areas compete with established areas. The dynamic nature of tourism can be described using the classical product life cycle associated with the field of marketing management, shown in Figure 3-4a, which describes a product in terms of its introduction, growth, maturity, and decline. Based on this approach, Butler (1980) has proposed an evolutionary cycle for tourist areas, shown in Figure 3-4b, which progresses through the stages of exploration, involvement, development, consolidation, stagnation, and decline or rejuvenation. This evolutionary cycle shares many similarities with the development phases described earlier by Smith.

Richardson (1986) used the product life cycle approach to document the history and potential revitalization of the urban waterfront in Galveston, Texas. After some years of neglect, city leaders in the 1980s began to recognize the importance of preserving historic and cultural resources along the waterfront. Although tourism had always been a part of Galveston's economy, citizens began to examine the costs and benefits of the existing tourism as described by Richardson (1986:370):

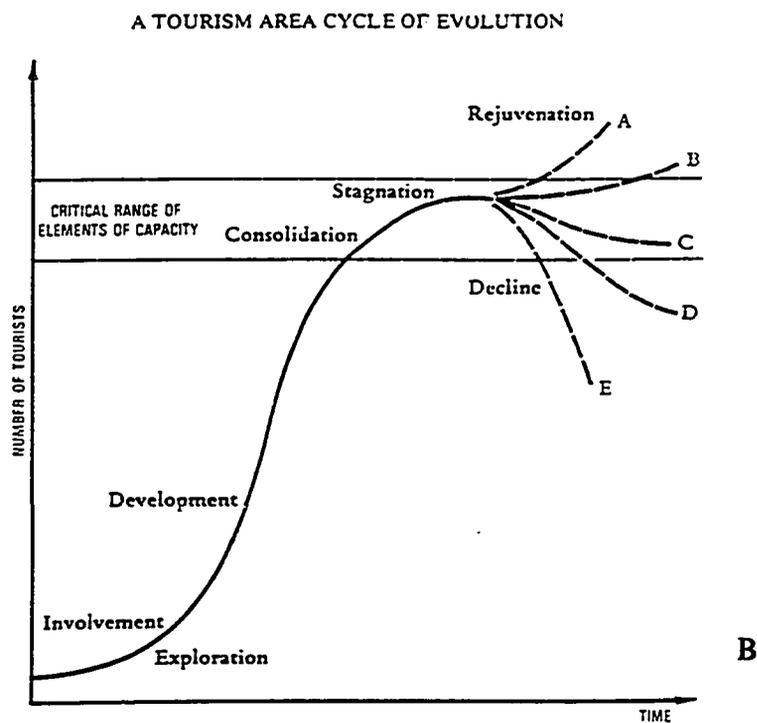
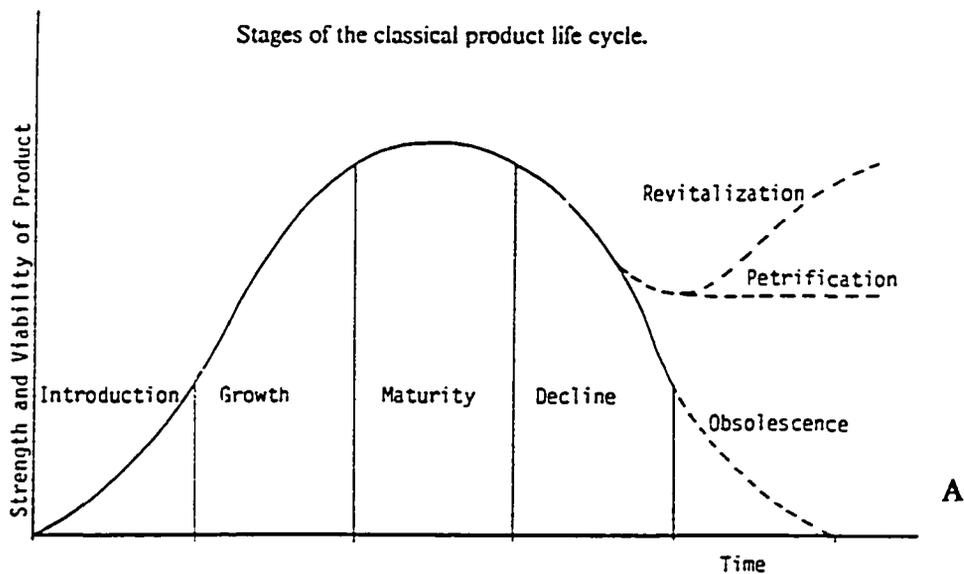


Figure 3-4. A. Stages of the classical product life cycle (source: Richardson, 1986:23); B. Hypothetical evolution of a tourist area (source: Butler, 1980:7).

"Currently, more than one-half of Galveston's visitors come from Houston, do not stay overnight, and arrive for the primary purpose of enjoying Galveston's beaches. Referred to by Galvestonians as the 'six-pack and tank of gas' market (the extent of their expenditures in Galveston), these visitors are perceived to stress Galveston's municipal services...In contrast, the 'new breed of tourist' sought by Galvestonians is one who will appreciate the cultural and educational component of Galveston's historic resources, will remain several days and contribute substantially more to the local economy..."

Revitalization may be viewed as a response to the changing economic and social needs or demands of a tourist area. An existing economy may be strengthened or a new economy may be developed, but the result of revitalization is that a new life cycle is initiated. Rejuvenation as described by Butler (1980:9) requires "a complete change in the attractions on which tourism is based." These changes can be realized by the addition of man-made attractions, such as a Disneyland or SeaWorld, or through the creative use of previously untapped natural resources. In the case of the historic Strand district in Galveston, avoiding historic caricatures and maintaining the authenticity of the waterfront development was seen as crucial to its success and long life. This was accomplished over time as individual owners restored their buildings, thus maintaining "the diversity of facades and uses naturally and historically associated with urban waterfronts" (Richardson, 1986:35).

### Physical Scale of Development

Small-scale versus large-scale tourism development is a dilemma recognized by many researchers (deKadt, 1979a; Pearce, 1992:22; Murrell, 1984; Jenkins, 1982; Rodenburg, 1980). The question of scale can be considered from a variety of angles including environmental impacts, enclave versus integrated development, aesthetics, marketing and management approaches, cost of accommodations, amenities and standards, types of tourists, impacts on the local economy, and impacts on the host culture.

The negative environmental impacts of tourist facilities will generally increase as the size of the facility increases, especially in terms of the amount of land cleared, damage to vegetation and wildlife, and erosion. Pearce (1992:22) however, wonders whether "the deleterious effects of tourism, such as water pollution through the discharge of inadequately treated sewage, are much less in a large planned resort than with smaller scale spontaneous developments lacking appropriate infrastructure" (emphasis added). The critical variable for the extent of environmental impacts would appear to be the absence or presence of planning, more so than size of a hotel or tourist area.

A comparison of large hotels, small hotels and guest house accommodations is shown in Table 3-3. Large hotels of "international standard" (100+ rooms) have many competitive advantages over smaller facilities. Large hotel chains have established standards and amenities which travel agents and tourists are familiar with. They have a vast support system, better access to

**Table 3-3.**  
Variables used to classify large hotels, small hotels, and guest houses.

LARGE HOTEL	SMALL HOTEL	GUEST HOUSE
Over 100 rooms	Less than 100 rooms	Less than 10 rooms
Complete facilities on site to satisfy the needs of guests; very little variability in service and facilities	Wide variability in standards of facilities; air conditioning, and bars may be present or absent	Variations in amenities are small
Corporate structure; either owned and operated or managed by a multinational corporation	Normally locally owned and operated	Local ownership
Requires large amounts of foreign exchange for efficient operation	Requires less foreign exchange for construction and for operations	Entry cost is small; minimal foreign exchange required
Employees function within a bureaucratic personnel structure	Informal management/employee relations; more intimate relationship between guests and staff	Informal management/employee relations; more intimate relationship between guests/staff
Very high percentage of guests (65-80%) come from retailers (travel agents, tour operators)	More than 2/3 of foreign guests are independent	Less than 20% of guests come from groups or package tours
Excellent communication and trade links with intermediaries within the industry	Requires more personal contact with travel agents to market facility	Services are marketed directly to guests
International name recognition	No international name recognition	No international name recognition

Source: Murrell, 1984; Rodenburg, 1980.

airlines and travel agents, bigger budgets for promotion, and centralized departments to handle marketing and reservations. As noted, in Chapter 3, however, the local economy may reap somewhat limited financial benefits due to the leakage of tourism dollars to foreign (or national) investors and suppliers. Another drawback to large hotel chains and enclave developments is that the very

standards developed to ensure their first class status and corporate image may result in cookie-cutter design. These tourist accommodations fail to reflect the local culture or landscape and pride themselves on providing everything the tourist could possibly need, so that guests do not have to venture outside of the enclave if they so desire. In short, these hotels and enclaves could be located anywhere and risk becoming "interchangeable in the minds of travelers" (Ayala, 1991b:39).

According to Ayala (1991b) a few multi-national hotel corporations have successfully managed to create a distinctive niche or sense of "placeness" in selected locations. Some of the *parador* hotels in Spain and the *hacienda* hotels in Mexico are owned by large hotel chains such as Stouffers and Camino Real. These hotels are self-contained resorts developed by recycling ancient, unique, and historical buildings and landscapes; the pre-existing sense of place that is inherent in the architecture has been enhanced and packaged for tourism. Ayala (1991b:39) identified the following three traits that these distinctive hotels have in common: 1) their development philosophy links the past, present, and future of the site, nurturing ties to the culture, geography, fantasy, and aspirations of the place; 2) the standard of service, cuisine, and amenities that they maintain is high; and 3) their interpretation, enhancement, and sensitive commercialization of local, often historical attractions is an investment that pays back substantial dividends.

While these efforts by hotel corporations to respect local character and

history are commendable, the challenge of creating sensitive large-scale resorts on virgin territory would appear to remain largely unmet. Ayala (1991a:570) observed that one trend in international resorts is acquisition of large areas of land, from acres to square miles, in order to develop self-contained enclaves with special themes. For a successful resort development "...the one-of-a-kind quality called placeness, which connotes distinctiveness inherent in places and is very difficult to replicate, will have to be addressed by a hotel masterplan..." (Ayala, 1991a:571). The hotel landscape becomes an important tool in designing for a sense of place in these "mega" resorts. Sensitivity to several themes can help to develop appropriate landscape concepts: 1) heritage preservation and interpretation; 2) contrast, continuity, and spatial dimension of the landscape experience; 3) evocation of the geographical context; and 4) the lure and symbolism of water. Loew's Ventana Canyon Resort in Tucson, Arizona is often cited as an outstanding example of ecological sensitivity to its desert environment (Ayala, 1991a; Phillips, 1986).

Large-scale development is believed by some to be an inevitable consequence of catering to the mass tourists who demand Western-style amenities, due to the "external economies of scale and market structures in international tourism" (Jenkins, 1982:229). While expressing this view, Jenkins also recognized that different scales of tourist development may co-exist, and in fact, may be interdependent. A good example of co-existing resort scales is found on the island of Maui in Hawaii, where a high-density resort with medium-

**Table 3-4.**  
Basic characteristics of enclave and integrated tourist development.

ENCLAVE DEVELOPMENT	INTEGRATED DEVELOPMENT
Infrastructure is not intended to directly benefit the resident-indigenous community; any "spill-over" effect is purely gratuitous.	The unit scale of facilities would be smaller and are more easily absorbed by an existing community. Where new infrastructure is required, it spills over to the community.
The site location is physically separate from an existing community; the facility will be operated with minimum trading and social links with the existing community.	The relatively small scale of development attracts more indigenous capital and management; barriers to entry are lower.
The facility is used almost exclusively by foreign tourists; a level of demands and services will be generated which the indigenous community can not afford to buy.	As this type of facility tends to emerge <u>from</u> the indigenous community rather than being imposed <u>on</u> it, tourist acceptance by hosts may be less a problem.

Source: adapted from Jenkins (1982).

rise hotels and a low-density, low-profile resort with more open space both play apparently compatible roles in tourism development (Inskip, 1988:366).

Table 3-4 summarizes some characteristics of large-scale enclave tourism and smaller-scale integrated tourist development. Enclave development usually implies a physical separation or isolation from the host community (structural enclavism), but distance can also be imposed through price enclavism—by pricing out of reach of local residents. In some instances, enclave development is preferred by the host society in order to prevent the "cultural pollution" that accompanies mass tourism. Integrated tourist development is planned on a scale that more closely approaches existing community norms. In order to compete with the larger hotels, Jenkins suggested a cooperative group approach to

marketing, promotion and training.

In a study of Bali, Indonesia, Rodenburg (1980) described three existing scales of tourist accommodation: large industrial tourism, small industrial tourism, and craft tourism (Table 3-3). Significant differences were noted in the types of tourists who were attracted to different scales of development. Group and package tourists accounted for up to 80% of large industrial tourism, and their length of stay was the shortest, averaging 4.18 days. About two-thirds of foreign guests in economy class hotels were independent tourists; only one-third were package tourists. The independent tourists who frequented the small hotels and craft level (guest house) accommodations typically stayed 5.57 days. Each scale of tourism was recognized as being capable of meeting various economic objectives. Several objectives for tourism development, identified by the Indonesian tourism department, were evaluated by Rodenburg in order to determine the appropriate scale of development for Bali. He concluded:

"The objectives of development are not best met by the development of large industrial tourism. In Bali, craft and small industrial tourism are more appropriate scales to achieve those objectives...Smaller scale enterprises offer a greater opportunity for profit and control to local people than do enterprises on a larger scale. Craft tourism is an indigenous adaptation to the tourist resource and as such is congruent with traditional social relationships and values. Small industrial tourism...accommodates traditional social relationships and values. Large industrial tourism imposes industrial relationships and values, ignoring the traditional." (p. 194)

In the Caribbean, tourism is a major economic activity. Increasing local participation through the ownership of small hotels and guest houses has been

identified as an important economic objective. Murrell (1984) described numerous strategies to support and encourage this objective. Recognizing the importance of establishing and maintaining minimum standards of cleanliness and service, Murrell suggested that a classification or grading system be established. The first step would be to create a hotel licensing board to solicit industry input, establish criteria, set up an inspection system, and provide for a systems of appeals. Both hotel owners and tourists would benefit from such a program because minimum standards would be assured and comprehensive information on accommodations would be readily available to travel agents. Such a system would also encourage local owners to make improvements in the facilities and services they offer.

Marketing is an area where small hotels are initially at a disadvantage. Murrell (1984:13) specified two basic types of marketing information that should be gathered: data to identify the target market, and data to help improve the quality of services. This last is particularly important, because the small entrepreneur may be able to gain a competitive edge over larger hotels by providing a high standard of personal service. Small hotels would need professional and financial assistance in the beginning stages of their marketing programs. Murrell cites the example of the "Small Inns of Jamaica" program sponsored by the Jamaica Tourist Board to help small hotel owners in their marketing efforts. This program calls for the government to cover all marketing costs during the first year, with gradual financial reductions in the following years

to be met by increasing contributions from participating hoteliers. (Aspects of this program are also reviewed by Fletcher, 1984).

Success cannot be achieved, however, with effective marketing and high standards alone. Good management is crucial, and as Murrell (1984:18) points out: "incompetence stemming from a lack of business experience and management training is the cause of failure in over 90 percent of small businesses..." Good hotel management includes the practice of basic accounting principles, understanding the break-even point, and budgeting for seasonal cash flow shortages. Training and certification of hotel managers is the best solution to reducing small business failures. Murrell (1984:24) makes the innovative suggestion of establishing a "...tourism extension service similar to the agricultural extension service that operates in most countries (whose agents) would visit hotel owners/operators and advise them on their methods of operation for the purpose of increasing their efficiency." This technology transfer approach would help small business owners keep abreast of the latest trends and methodology within the hotel industry, allowing them to compete with the large hotels.

In addition to weighing the pros and cons of the physical size of a tourist development, a few researchers have recognized the effect that time or rate of growth may have. In a study of tourism development in three North Carolina, USA coastal towns, Peck and Lepie (1977) related physical rates of growth to rates of cultural change induced by tourism and to the controlling regulatory powers associated with slow versus rapid growth. They concluded that: "Power,

both economic and political, emerged as the central differentiating factor in the impact of tourism. A strong local power base tended to direct the development [slower growth] toward compatibility with the local community and tended to foster integration of newcomers..." (p. 171) DeKadt (1979a:42) and Inskeep (1988:370; 1991:173) both recognized that moderate or gradual development of tourism is more beneficial to the local community, because a controlled rate of growth allows sufficient time for residents to adapt to tourism and to maintain an interest (financial or otherwise) in tourism. A controlled rate of growth is also critical for matching infrastructure development with demand, providing facilities such as housing for employees, as well as allowing time for the training of local citizens for tourist-industry positions, especially for management positions. Furthermore, Inskeep suggests that "the scale of tourism should remain at a level that allows the society to cope with it."

To resolve the question of scale in reference to tourism development, as well as many other questions, government and/or planning authorities must first decide what the goals and objectives of tourism development are. The process of preparing a comprehensive plan for tourism development, guided by tourism objectives, will help to mitigate potential adverse environmental and socio-economic impacts of tourism.

### Review of the Literature on Planning and Design for Tourism

Approaches to tourism planning have evolved as the size and the complexity of the tourism industry have grown, especially in the years following World War II. Early tourism plans were driven by business and economic growth objectives and typically included very basic marketing research and overly optimistic projections. Site specific design quickly followed, with little consideration given to impacts, whether social, economic or environmental, beyond the site boundaries. Emphasis was on promotion, advertising, and the development of the individual site, and the main planning vehicle was the master plan. As Gunn (1979:217) points out, the project or master plan approach has its origins in landscape architecture where it was applied to projects with finite deadlines for completion. The master plan approach, if it stands alone, is rejected by tourism planners today as being too rigid and static to address the long-term changing nature of tourism development (Baud-Bovy 1977:138; Murphy 1985:160; Inskip 1991:29).

Gradually, planners recognized the need for a more comprehensive, integrated, and flexible approach to the planning process for tourism. Today, most processes utilize a "systems planning" approach "where the process is a continual one aimed at partial development, constant monitoring, and revisions" (Murphy 1985:160). Tourism is viewed as an ecological system composed of many interrelated parts which must be integrated compatibly so that the entity as a whole functions smoothly. The concept of planning as a continuous, ongoing

process is cognizant of the dynamic nature of tourism and the need to maintain flexibility in order to adjust to ever changing circumstances. In systems planning, the roles of monitoring, feedback, and re-planning to produce new tourist products are greatly emphasized (Baud-Bovy, et al, 1977:143; Murphy 1985:164). These concepts find many parallels in Butler's (1980) concept of the life cycles of tourism described earlier in this chapter.

Some of the initial attempts at systems planning for tourism may seem somewhat lacking today because of their under-developed environmental and social components. Baud-Bovy et al. and Gunn recognized the importance of environmental features—as resources to be utilized as tourist attractions and therefore protected for a successful tourism endeavor. The PASOLP approach of Baud-Bovy et al. (1977:141) includes brief consideration of environmental and socio-economic impacts, but not until the very last phase of the process. Gunn's (1979:192) approach is anchored by three goals of tourism planning: providing satisfaction to users, rewards to owners and developers, and protection of environmental resource assets. On the whole, these planning processes remain predominantly business oriented and the environmental and social impacts of tourism are addressed largely in terms of effects on visitors, with limited mention of tourism's impacts on the host community.

In 1980, the World Tourism Organization (WTO) published an inventory of 1,600 specific tourism plans from various countries around the world, but noted that only about two-thirds of the plans had actually been implemented.

According to Pearce (1989:276) "...few plans integrated tourism within the broader socio-economic development objectives while 'tourism plans whose social aspects have priority over direct profitability are even more exceptional'. Few examples were also found of plans that made firm and specific provision for protecting the environment."

Murphy (1985) provided one of the first truly balanced and integrated approaches to tourism planning through his community-oriented tourism strategy, shown in Figure 3-5, which gives equal weight to business, management, social, and environmental considerations. Murphy takes an ecological and systems planning approach that emphasizes public participation in the planning process. A successful tourism industry, in this view, must be "planned and managed as a renewable resource industry" (p. 153; emphasis added).

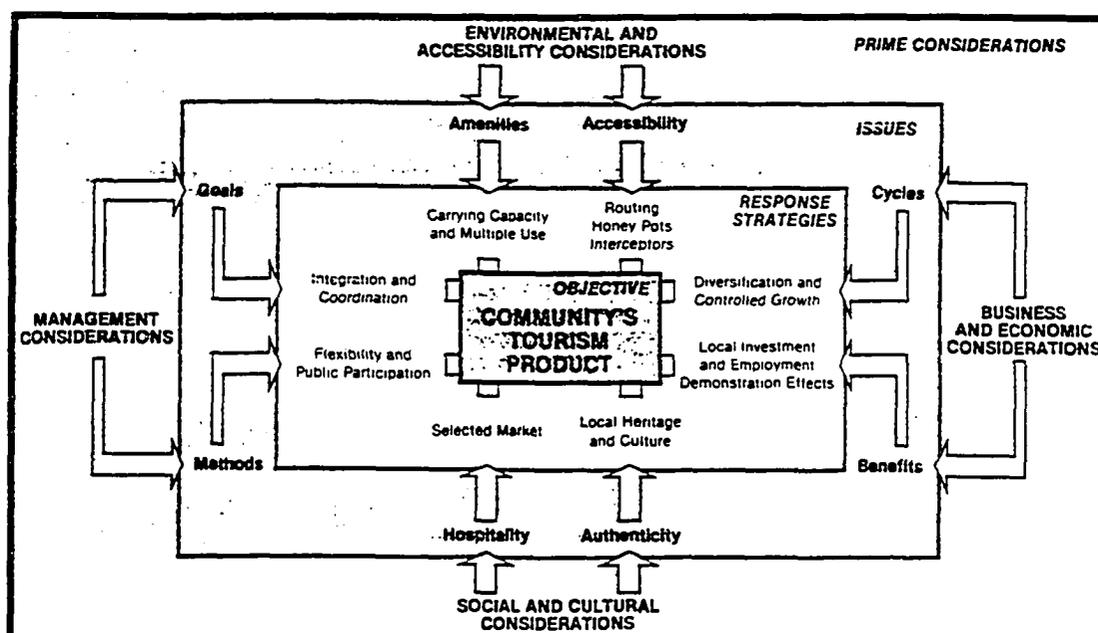


Figure 3-5. Murphy's community-oriented tourism strategy (1985:37).

Perhaps the most user-friendly, comprehensive planning process for the development of a tourism plan was introduced by Inskeep (1988:364), who describes tourism planning as "an emerging specialization" in the field of development planning. Table 3-5 is a list of tourism's major components that should be considered in the planning process and Figure 3-6 is Inskeep's regional level planning process, illustrating the complex nature of tourism in the 1990s.

**Table 3-5.**  
Basic components of tourism development to consider  
in the planning process.

PHYSICAL COMPONENTS
<ul style="list-style-type: none"> <li>▪ Tourist attractions and activities</li> <li>▪ Accommodation facilities and services</li> <li>▪ Other tourist facilities and services, such as:               <ul style="list-style-type: none"> <li>—tour and travel operations</li> <li>—tourist information</li> <li>—restaurants and retail shopping</li> <li>—banking and money exchange</li> <li>—medical care and public safety</li> </ul> </li> <li>▪ Transportation facilities and services</li> <li>▪ Other infrastructure including:               <ul style="list-style-type: none"> <li>—water supply</li> <li>—electric power</li> <li>—sewage and solid waste disposal</li> <li>—drainage</li> <li>—telecommunications</li> </ul> </li> </ul>
INSTITUTIONAL COMPONENTS
<ul style="list-style-type: none"> <li>▪ Marketing programs</li> <li>▪ Education and training</li> <li>▪ Legislation and regulations</li> <li>▪ Public and private sector investment policies</li> <li>▪ Public and private organizational structures</li> <li>▪ Environmental and socio-economic programs</li> </ul>

Source: adapted from Inskeep, 1988:363.

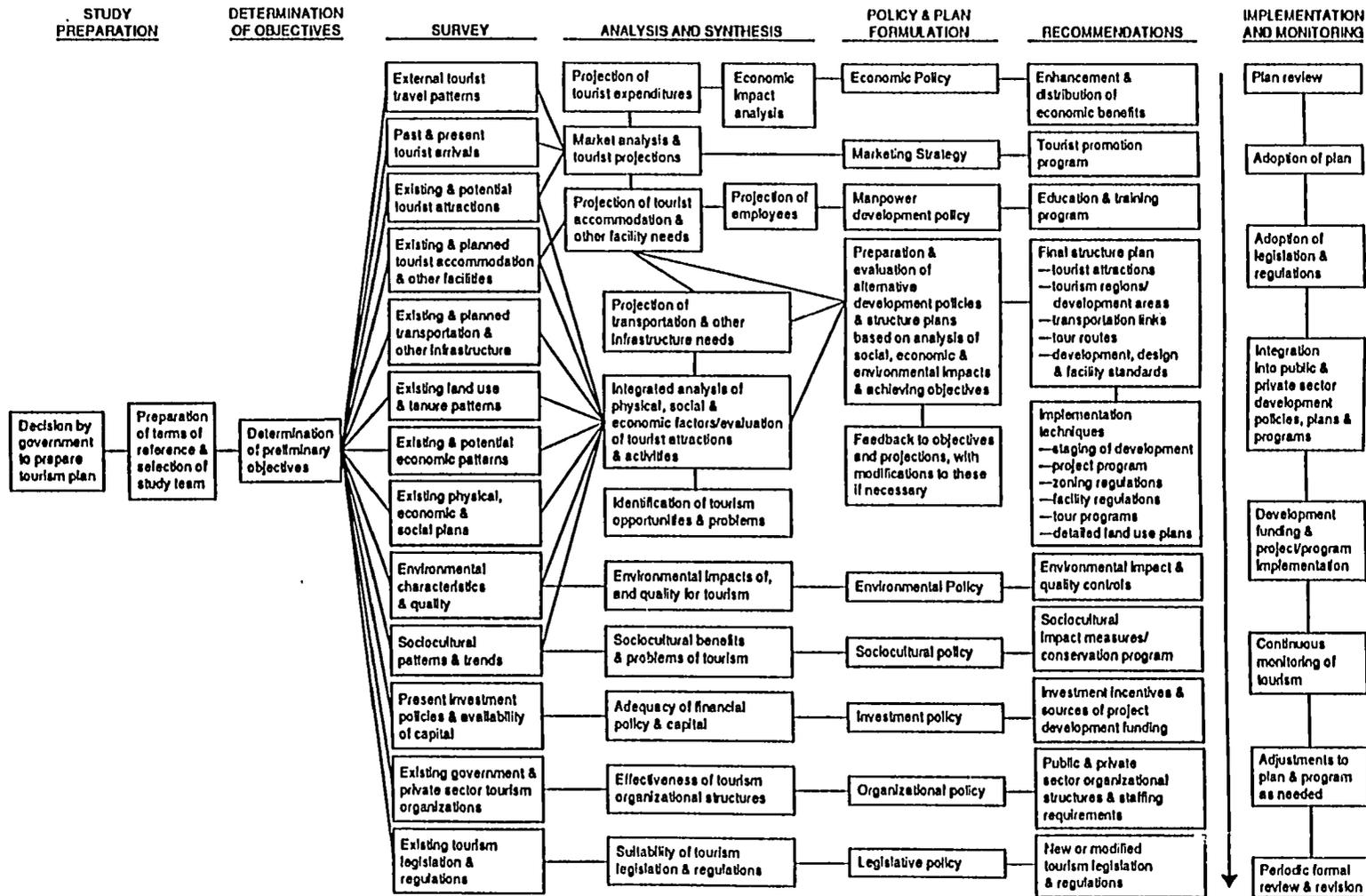


Figure 3.6. Process for preparing a comprehensive tourism development plan (Inskeep, 1988).

In describing this planning process, Inkseep (1991:29) states that: "emphasis is placed on the concepts of planning being continuous and incremental, systems-oriented, comprehensive, integrated, and environmental, with the focus on achieving sustainable development and community involvement."

Inskseep's process incorporates seven basic development planning steps: study preparation, determination of objectives, survey, analysis and synthesis, policy and plan formulation, recommendations, and implementation and monitoring. As a tourism planner and currently a consultant to the WTO in Madrid, Spain, Inskseep notes that he has utilized the process successfully on several planning projects and suggests that individual elements in the chart may be modified to accommodate most types of tourism studies. An important aspect of the study preparation stage is the formation of the multi-disciplinary planning team. Table 3-6 lists some of the desirable expertise for planning teams.

**Table 3-6.**  
A multi-disciplinary team approach to tourism planning.

TEAM MEMBERS FOR A NATIONAL OR REGIONAL TOURISM PLAN. PROJECT	TEAM MEMBERS FOR RESORT AND TOURIST FACILITY PLANNING	SPECIALISTS AS NEEDED IN VARIOUS FIELDS
<ul style="list-style-type: none"> <li>▪ Tourism development planner</li> <li>▪ Tourism marketing specialist</li> <li>▪ Transportation planner</li> <li>▪ Tourism economist</li> <li>▪ Tourism sociologist or develop. anthropologist</li> <li>▪ Tourism manpower and training specialist</li> </ul>	<ul style="list-style-type: none"> <li>▪ Resort land use planner</li> <li>▪ Resort site planner</li> <li>▪ Resort/hotel market &amp; financial feasibility analyst</li> <li>▪ Hotel architect</li> <li>▪ Resort or hotel landscape architect</li> <li>▪ Resort or hotel infrastructure engineer</li> </ul>	<ul style="list-style-type: none"> <li>▪ Ecology</li> <li>▪ Coastal processes</li> <li>▪ Marine tourism</li> <li>▪ Golf course design</li> <li>▪ Wildlife conservation</li> <li>▪ Park and recreation planning</li> <li>▪ Historic building preservation</li> <li>▪ Museum design</li> </ul>

Source: adapted from Inskseep, 1988:365.

Goals and objectives are terms that are often used somewhat interchangeably. Murphy (1985:156) defined goals as "...abstract and continuous concepts, intended to provide general direction rather than specific guidelines." Inskeep (1991:31) uses the term "objective" to mean "...what is expected to be achieved from the planning of tourism development." And Gunn (1979:194) believes that "...goals...provide the framework for setting more precise objectives." Inskeep does not address goal-setting as a component of his planning process; however, step two—determination of preliminary objectives—serves the parallel purpose of establishing a framework to guide the rest of the planning process. Policy, according to Inskeep (1991:170), is derived directly from the development objectives and "...is the expression of how the objectives can be achieved."

Planning for tourism occurs on several levels—international, national, regional, subregional, and community. At the national level, Pearce (1989:250) stresses that tourism planning must be guided by national development goals and objectives. National planning commonly results in the identification of regions or localities that should be developed for tourism, and formulation of policy, strategy, and implementation methods. Pearce has reviewed tourism policies and objectives from a variety of international tourist areas such as Cyprus, Malaysia, the Netherlands, the Cook Islands, Bali Thailand, and Vanuatu, South Pacific. Frequently, multiple tourism objectives were found to be partially or completely incompatible. Table 3-7 is a method for comparing the relationships between

**Table 3-7.**  
A method for comparison of possible tourism objectives.

PRIMARY OBJECTIVES	POSSIBLE OPERATIONAL OBJECTIVES				
	Maximize visitor revenue			Maximize Regional Spread	Maximize Seasonal Spread
	in total	per visit	per day		
Improving foreign exchange earnings/balance of payments	Y	(Y)	X	X	X
Raising incomes	Y	(Y)	X	X	(Y)
Redistributing incomes	X	X	X	Y	X
Maintaining employment	Y	(Y)	X	(Y)	XY
Conserving environment and heritage	XY	XY	XY	XY	(Y)
Fostering the arts, amenities and services	XY	XY	XY	XY	XY
Trade and goodwill	(Y)	X	X	(Y)	(Y)

Source: Pearce 1989:253

Y = Operational makes major contribution toward primary objective.

(Y) = Operational makes some contribution toward primary objective.

XY = Operational partly contributes to primary objective but is partly at variance with it.

X = Operational may be at variance with primary objective.

different objectives, and offers the potential of prioritizing them.

At the regional level, tourism planning takes on more detail which varies depending on the size of the region being studied. Basic concerns at this level include developing regional policies, strategies and implementation techniques, identifying regional tour patterns, tourist attractions, and specific resort sites, determining the locations of major access points, and laying out a transportation network. For selected tourist areas, the "...general type, size, and character [is] determined, a conceptual plan prepared, and a prefeasibility analysis conducted to

indicate its likely viability" (Inskeep 1991:201).

Planning for tourism at the local or community level may be characterized as a highly variable process due to the great diversity of projects and sites that may be encountered. Once the regional plan has identified tourist areas, planners and designers generate site analyses and land-use plans for specific tourist developments such as a resort. At this level, architects, landscape architects, and engineers provide detailed designs for tourist attractions, tourist accommodations, employee housing, recreation facilities and open space, marinas, circulation systems, utilities, infrastructure and many other components of the tourist complex.

The focus of this thesis, however, falls somewhere in-between the regional and community level of planning. Inskeep (1991:36) describes the sub-regional planning level as "...more specific than the regional level, but not as detailed as ...resort land use planning. The components of the sub-regional plan...typically would include tourist attraction features, general location of accommodation and other tourist facilities and services, access to the subregion, its internal transportation network and other infrastructure considerations, and relevant institutional factors."

Planning processes for tourism almost exclusively address the development of tourist facilities in previously undeveloped areas. The reality, however, is that most situations involve what is referred to here as "retrofit" tourism development, similar to what was experienced in Acapulco and what planners in Puerto Peñasco will be faced with. The special case of planning for tourism in existing resorts is

recognized briefly by Inskip (1991), Baud-Bovy et al. (1977), and Pearce (1989). Basically the planning process is similar to that for new resorts, but with the recognition that many additional constraints will be encountered. Alternative forms for new development include in-filling within the existing resort, expansion along the edges, or construction on a new site with some connection to the existing resort. One advantage to existing tourism, is the potential for surveying everyone involved to determine the strong and weak points of the existing situation.

Environmental analysis is a major component of tourism planning today. One of the most widely used approaches for conducting these studies is the Environmental Impact Assessment (EIA). The EIA method typically involves progressing through a checklist of potential environmental impacts and evaluating various impacts using a matrix technique. EIA checklists for impacts related to tourism have been developed by Inskip (1991) and Jackson (1984). Brown et al (1992) provided a list of environmental issues to be addressed by development projects in the coastal zone of Nayarit, Mexico. Some environmental and social impacts may also be assessed through the basic site analysis and survey process from Landscape Architecture, which also utilizes a checklist procedure to aid in data collection (White 1983). Environmental planning, policies, and impact control measures related to tourism are thoroughly discussed by Inskip (1987; 1991).

Checklists and processes for evaluating social impacts on residents are much more difficult to find. Dickert and Sorensen (1974) noted that coastal zone

planners in California tended to concentrate on environmental protection and economic development, while neglecting social equity issues. To counter this trend, the researchers proposed a "process for inclusion of social equity" in the planning process, and developed a checklist of socio-economic considerations. The checklist covers issues such as employment, public services, community social structure and identity, recreation, and public access, and includes the types of information needed in order to evaluate various socio-economic impacts of coastal development in general. Brown et al (1992) developed a list of social/cultural issues which should be addressed by impact assessment studies and policies for any proposed development in the coastal zone of Nayarit, Mexico. These issues include health and safety, education, housing, community and cultural organization, parks and recreation, public services, and cultural sites and traditions.

D'Amore (1983) explored the concept of social carrying capacity for tourism ("that point in the growth of tourism where local residents perceive on balance an unacceptable level of social disbenefits from tourism development" p.144) by surveying residents in several communities in British Columbia. This study identified conditions that are associated with locally appropriate and inappropriate tourism development, and offered guidelines for tourism development that respects the needs of residents. Policies and techniques for addressing socio-economic and socio-cultural impacts of tourism are described by Inskip (1991:374) and Fletcher (1984). Rosenow and Pulsipher (1979:63) proposed the "personality planning process" to help communities define their

unique qualities and establish a vision for their future. The process, which involves four steps—delineate distinctive features, plot critical zones, establish use objectives, and formulate specific action programs—could easily be incorporated into Inskip's planning process for tourism.

Design for tourism technically takes place at the site specific level, but actually occurs at all levels, interwoven throughout the planning process. Most literature on planning for tourism reviewed here also addresses design aspects, and distinguishing between these activities is frequently impossible. However, design for tourism is specifically addressed by Gunn (1972) and Gorman (1972), through discussion and illustration of design principles and concepts as they apply to tourism. Baud-Bovy (1977) presents a wealth of information for planning and design of the physical facilities that are needed in tourist areas. Photographs, master plans, floor plans and sketches accompany tables containing data on standards for hotel spaces, cottages, campgrounds, beach capacity, yachting facilities and many other entities. Although broader in scope, the site planning texts by Lynch (1984) and Untermann et al. (1977) are excellent sources for planning and design principles that can be utilized within the context of tourism.

The literature on urban waterfront development has a great deal of relevance for coastal tourism planning and design. Mann (1988) surveyed waterfront revitalization efforts in postwar North America and Europe, leading to the identification of ten current trends. Although the trends are associated with the urban waterfronts of rivers rather than coastal waterfronts, several trends may

be equally applicable. Among these emerging trends are: large-scale mixed-used development, open edge and access improvement, lessening of highway encroachment, historic restoration and imitation, blossoming of the people-place/market place, integration of environmental art and lighting, the growth of festivals and other ephemeral events, and the increase in the regulation of waterfront site development characteristics or design standards.

These trends are also echoed and illustrated by many others who have focused on the revitalization and development of urban waterfronts. Symposiums on the waterfront—National Research Council (1980), Fitzgerald (1986)—incorporate a wide variety of topics such as designing people places, commercial ports, harbor planning, recreational uses, citizen group participation, and numerous case studies of redevelopment or revitalization projects.

Wrenn (1983) and Torre (1989) concentrate on the project level of urban waterfront development. Historical perspectives on waterfront evolution are followed by discussions of project development stages and elements of successful projects. Detailed case studies include information on project development, strategies, themes, and financial aspects; projects are illustrated by numerous photographs, conceptual plans and models. Some recurring themes soon become evident in most waterfront literature. Among these are: the need to provide public access to the waterfront, to create park-like areas, people-places, and pedestrian-oriented spaces, to maintain authenticity and respect the waterfront heritage, and to obtain public consensus.

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## CHAPTER 4: SUMMARY AND RECOMMENDATIONS

### Lessons Learned

The case studies of coastal tourist areas in Mexico—Acapulco, Puerto Vallarta, Teacapán, Cancun, and Ixtapa-Zihuatanejo—reveal some recurring themes and reinforce the importance of many issues identified in the discussion of international tourism in Chapter 2. Where tourism develops spontaneously, it typically begins slowly and is but one of many economic activities characterizing a town. As new roads and airports are constructed, and existing roads are paved, the improved access naturally draws a bigger crowd. Unsuspecting residents soon find that unplanned tourism has a way of taking over and surging out of control.

City services and utilities are overwhelmed not only by the numbers of tourists, but also by the workers who migrate into the area in search of construction or hotel industry jobs. The lack of adequate and/or affordable housing for these people results in the formation of squatter settlements that may not have access to water and electricity. Pollution, especially by untreated sewage dumped into the sea, becomes a serious problem that threatens the health of residents and drives tourists away. Issues of land ownership can exacerbate the situation and cause delays to improvement programs. Ejidos, *avecindados* (settlers), foreign land "owners", and Mexican developers have various claims to the land, due to the absence of planning and local control, that must be

addressed.

Tourist developments can be sources of irritation to local residents in a number of ways. Frequently in developing countries there is a discrepancy in the quality of facilities and amenities provided to tourists compared to residents, or even a complete lack of improvements for residents. The isolation of wealthy tourists in self-sufficient enclaves only serves to reinforce the contrasts. When foreign and/or non-local Mexican investors are involved, tourist dollars spent on lodging, food, and festivals generally are not recirculated within the local economy. Commercialization of local festivals and traditions can render these important cultural institutions meaningless, and tourists frequently provide bad influences for local youth. In addition, tourists often take over the best beaches, beaches that were previously public. Public access is effectively cut off through strip development of hotels, vacation homes, and condominiums.

Despite the potential drawbacks, tourism can be a positive force within the community. In Puerto Vallarta, residents welcomed the first large, luxury-class hotel because it provided training, English lessons and upward mobility, in addition to jobs; in other words, the hotel gave something back to the local people. In Cancun and Ixtapa-Zihuatanejo the government also provided training and made sure that all jobs were filled by Mexicans, and helped ejidos start businesses to supply the tourist industry with food, building materials and other goods. These planned tourist developments also provided quality housing and infrastructure for residential neighborhoods, and recycled treated waste water on

golf courses. FONATUR recognized that the growth and modernization that would accompany tourism would also require significant social and cultural adjustments. To this end, they included Community Development teams as important elements of the planning and development processes. Concerted efforts were made to promote positive host-guest interactions.

In Puerto Vallarta, Evans (1979) observed that good, friendly relations developed naturally between tourists and residents, in part because visitors made efforts to learn Spanish and become involved with the community, and in part because visiting patterns developed slowly and informally. This atmosphere provided time for adapting to tourists, and positively influenced local attitudes toward change and innovation.

Even in planned tourist developments with the best of intentions, some lessons can only be learned by experience. By planning in apparent isolation, FONATUR initially developed a Master Plan that was not entirely compatible with the needs of residents in Zihuatanejo, requiring adjustments to the plan. Negotiating compensation for ejido lands and regularizing land ownership of land illegally occupied by locals and foreigners was found to be much more complex and time-consuming than expected. This process was accompanied by many tense and hostile moments, and resulted in fundamental changes in the social and economic composition of the town. The planned tourist enclaves on Cancun island, at Ixtapa, and on the hotel strip north of Puerto Vallarta (and probably in Acapulco, too) were designed as self-contained beach resorts "so international in

flavor that one development was very much like another" (Daltabuit et al., 1990:9). This concept was not entirely successful with tourists. Visitors to Cancun noted a lack of character and a sterile image in the new "city", that perhaps did not reveal much to them about this place called Mexico. In Puerto Vallarta, the "in" place to be was the older, historic part of town; this was also true in Zihuatanejo which attracted many tourists seeking to experience the authentic Mexico.

Just as Evans (1979) pointed out that the older, historic area of Puerto Vallarta was the "in" place for tourists to gather, most tourists to Puerto Peñasco are drawn to the Old Town at the base of Cerro de Peñasco. This picturesque development on the rocky slopes is appealing because of its integral association with the natural landmark, its feeling of history and authenticity, and the magnificent views it provides. The indigenous architecture, the human scale of the settlement, and the diversity of activities from residential to small enterprise, have the cumulative effect of creating a sense of community—that sense of a neighborhood that Americans who live in large cities are increasingly missing. To some extent, there may be a romanticized yearning for a simpler place and time, elements of ethnic and cultural tourism described by Smith (1977). Passariello (1983:119) attributed the motivation of Mexican tourists at the beach to ethnic tourism "...where the attraction of a tourist site depends on its romantically perceived rustic, cultural setting...and the attractiveness of a natural setting..."

Puerto Peñasco shares many similarities to models and case studies

reviewed in this thesis, but it also has a few features that make it unique in comparison to other international tourist destinations. Historically, Puerto Peñasco is a very young settlement of 70 some years. The original architecture is simple and functional, reflecting the industrious nature of the people and the fishing economy. Throughout its short history, Puerto Peñasco has had a great deal of contact with foreigners, especially Americans, beginning in the early 1920s with the business ventures of John Richardson and Thomas Childs. American influences were brought into the settlement in those early days when fish buyers brought back clothes, food and other items from cities in Arizona. Railroad and highway construction improved access to the U.S. border in the 1940s, promoting business and cultural exchanges. In the 1950s, Peñascoans listened to U.S. radio stations and watched American made films. Foreign visitors increased, slowly but surely. During the 1970s, as the federal government made improvements to the harbor, installed water lines, electricity, and other modern amenities, the city attracted rapidly increasing numbers of tourists and migrants from other Mexican states. In the 1980s, the town experienced two crises—an increase in tourism that overwhelmed local resources during peak season, and the decline of the fishing industry that was once the town's livelihood. This latter crisis certainly depleted any resources the town may have had for dealing with the large number of tourists.

Turk Boyer (1993) described a tourist segment existing today in Puerto Peñasco that seems to parallel the tourism described in Puerto Vallarta by Evans

(1979)—a group of repeat, long-term visitors and/or residents who make an effort to become involved with the community and get to know the local people. Other types of tourists may not be so welcome, although tolerated because their American dollars are appreciated.

The mass tourism that exists in Puerto Peñasco today is not quite the same as mass tourism described by many international tourism researchers. In terms of numbers, Puerto Peñasco can probably be described as experiencing mass tourism. However, the literature usually describes mass tourists as being involved in organized package tours, travel to the destination is by air, and lodging is in large, foreign-owned hotel chains. The nature of mass tourism in Puerto Peñasco is largely shaped by its proximity to the U.S. border and its accessibility by car. The result is mass quantities of independent travelers, many of them budget-travelers, who bring their desired Western amenities with them. This type of tourist may explain the proliferation of RV parks, campgrounds, small hotels, and individual rental units as opposed to large luxury hotels.

The absence of large hotels and foreign business investments at this stage also indicates that there is no leakage of tourist dollars through these outlets that is so typical of other international tourist destinations. In Puerto Peñasco, however, unknown amounts of tourist dollars are spent in the U.S. for the rental of foreign-owned homes, condos and cottages; these lodging fees never even pass through the Puerto Peñasco economy. Foreign-owned vacation homes and condominiums provide only a temporary contribution to the economy during the

construction phase.

Tourists are drawn to Puerto Peñasco in large part because of the beach and mild, sunny climate. This thesis would hypothesize that many tourists are also drawn to the area by the rustic charm of a Mexican fishing village and its friendly people. From the review of tourists' motivations in Chapter 2, we learned that there are numerous motivations just as there are numerous personalities involved in tourism. However, a common motivational element is the desire for contrast and change from one's normal daily life. Thus, when Americans visit Puerto Peñasco, there is a desire to experience a different culture, a different lifestyle, in addition to the attraction of the seashore. In spite of all the material possessions that Americans bring with them, and a tendency to congregate in certain areas, they come because Mexico offers contrast, both visually and experientially, to their own culture. Americans can visit the beach in America; they visit the beach in Mexico with some expectations of experiencing Mexico. The degree of experience desired will differ based on the types of tourists and their motivations, and perhaps on their length of stay. Some will feel more comfortable in larger hotels with an abundance of services and amenities provided; they may be content to venture out on a guided tour and then return to the security of the hotel. But even in this situation, the authentic Mexico is an attraction to see and experience, even if only at a distance. Other tourists will desire closer and more prolonged contact with Puerto Peñasco. These people will seek smaller-scale accommodations that are more integrated both physically and

culturally with the community. The large numbers of independent travelers who find their way to Puerto Peñasco would seem to indicate the presence of a more adventurous spirit compared to the average mass tourist on a packaged trip.

### An Alternative Form of Tourism for Puerto Peñasco

The following objectives, policies and recommendations for tourism in Puerto Peñasco are suggested as an alternative form of tourism derived from the research conducted for this thesis. They are based on many assumptions made by a researcher who is a U.S. citizen of Anglo heritage, with limited bilingual skills, who also has some education and a great interest in planning and design. Recognizing the limitations, and faced with additional limitations on time and travel funds, the emphasis on this thesis has been placed on investigating tourism at the international level. Past experiences can give a great deal of insight into the potential pitfalls of tourism. Combined with personal observations and research on Puerto Peñasco, lessons learned from the international tourism, planning, and design fields are applied here in an attempt to offer some guidance to those who will face the challenge of tourism in Puerto Peñasco. One of the biggest assumptions made here is that once a greater understanding of the tourism industry is obtained, most planners will reject traditional forms of tourism. However, investors and developers may not have such a broad perspective. Investors and developers cannot be expected to uphold socio-cultural or even environmental objectives above economic gain. Thus, it is imperative for the

Mexican government, at all levels, to define and maintain control of tourism development. The best way to achieve this is through a well-conceived Plan for Tourism that gives equal weight to economic, cultural, and environmental objectives.

Planners and local residents must reach a consensus on what forms of tourism are appropriate and what types of tourists should be targeted for Puerto Peñasco. The discussion presented here assumes that the people of Puerto Peñasco would prefer to encourage increased visitation by tourists interested in the natural and cultural resources of the area. However, because Puerto Peñasco is the closest beach available to many Arizona tourists, there will always be a significant number of weekend visitors seeking primarily a "sun and sea" vacation, with little interest in local culture. There are several existing user groups, (table \_\_ch2) that must be accommodated, in addition to new ones, such as ecotourists. The decisions made on these issues will help determine what types of tourist facilities should be developed and on what scale. Over the long term, it is expected that some user groups will become less significant. As land values increase along the beach front, open camping on the beach will become more restricted. As environmental impacts are recognized, controls on off-road vehicles and littering of the beach will be implemented, just as they are in the United States, where many activities common among American visitors to Puerto Peñasco would not be allowed.

### Objectives and Policies

At the beginning of the tourist planning and design process, it is critical to establish a set of objectives and policies describing the tourist product envisioned. By doing this, the purpose of the project is crystallized and clearly communicated to everyone involved. In addition, these parameters guide the rest of the planning process, serving to keep the project on its intended path and providing a tool for evaluating proposed tourist developments and recognizing potential conflicts. As Inskip (1991) and others have indicated however, the initial objectives and policies should be treated as preliminary. As research and analysis illuminates the opportunities and constraints, adjustments to the original parameters may well be needed. The following tables (4-1 through 4-4) present preliminary objectives and policies that are proposed for tourism in Puerto Peñasco, based on the research for this thesis.

**Table 4-1.**  
Proposed aesthetic objectives and policies for tourism in Puerto Peñasco.

<p><u>Objectives.</u> Preserve local images, identity and authenticity. Integrate tourist development into the natural, historical, and cultural landscapes.</p>
<p><u>Policies</u></p> <ul style="list-style-type: none"> <li>▪ Develop Plans for tourism and urban development that are based on the concept of preserving natural open space.</li> <li>▪ Preserve and protect natural landmarks.</li> <li>▪ Protect scenic vistas.</li> <li>▪ Promote tourist development that respects historical architectural styles.</li> <li>▪ Develop architectural and landscape design standards that emphasize sense of place and authenticity.</li> <li>▪ Provide attractive, water-conserving landscapes in parks, along streets, in tourist areas, and commercial areas.</li> <li>▪ Develop maintenance programs for landscaped areas.</li> <li>▪ Develop sign and billboard ordinances.</li> <li>▪ Require underground location for utility lines.</li> </ul>

Table 4-2.

Proposed economic objectives and policies for tourism in Puerto Peñasco.

<u>Objective.</u> Increase foreign exchange earnings for Puerto Peñasco.
<u>Policies</u>
<ul style="list-style-type: none"> <li>▪ Provide attractions and accommodations that appeal to American tourists.</li> <li>▪ Limit investment by foreign companies to reduce "leakage" of tourist dollars from the country.</li> <li>▪ Encourage investments by foreign companies that include partnerships with local people.</li> <li>▪ Encourage investments by responsible foreign companies who aspire to more than just minimum standards.</li> </ul>
<u>Objective.</u> New employment opportunities for local residents.
<u>Policies</u>
<ul style="list-style-type: none"> <li>▪ Create jobs by developing tourist industry in Puerto Peñasco.</li> <li>▪ Provide training for tourist industry and supporting positions.</li> <li>▪ Provide equal opportunities for men, women, and minority groups.</li> </ul>
<u>Objective.</u> Provide investment, ownership, and managerial opportunities for Puerto Peñasco residents.
<u>Policies</u>
<ul style="list-style-type: none"> <li>▪ Plan for a variety of tourist accommodations with an emphasis on small hotel and guest house facilities.</li> <li>▪ Provide a variety of tourist attractions and activities with an emphasis on small business opportunities for local people.</li> <li>▪ Provide low-interest loans to residents for tourist related businesses and services.</li> <li>▪ Provide start-up help and training for small business entrepreneurs and managers.</li> <li>▪ Establish minimum standards and rating systems for independently-owned guest accommodations.</li> </ul>
<u>Objective.</u> Increase local standard of living.
<u>Policies</u>
<ul style="list-style-type: none"> <li>▪ Reinvest tourism profit into local economy to provide education and infrastructure improvements.</li> <li>▪ Ensure a reasonable and competitive minimum wage.</li> <li>▪ Limit investment by non-local domestic corporations to reduce leakage of tourist dollars from the local economy.</li> </ul>
<u>Objective.</u> Increase economic stability.
<u>Policies</u>
<ul style="list-style-type: none"> <li>▪ Reduce the seasonality of existing tourism.</li> <li>▪ Revitalize Old Town area so that it can compete with new tourist areas.</li> <li>▪ Plan for long-term, sustainable development.</li> <li>▪ Promote economic diversity, recognizing that one-industry towns are extremely vulnerable to economic downturns.</li> </ul>

**Table 4-3.**  
Proposed **socio-cultural** objectives and policies  
for tourism in Puerto Peñasco.

<u>Objective.</u> Minimize adverse social and cultural effects.
<u>Policies.</u>
<ul style="list-style-type: none"> <li>▪ Preserve and protect local cultural and historical sites and traditions.</li> <li>▪ Maintain authenticity of local music, dance, arts and crafts.</li> <li>▪ Develop marketing strategies to attract tourists interested in cultural, historical, and ecotourism.</li> <li>▪ Educate residents about the tourist business, its benefits and problems.</li> <li>▪ Educate tourists about local culture, customs and behavior.</li> <li>▪ Develop programs that promote positive host-guest interactions.</li> <li>▪ Create a tourist destination that equally welcomes both foreign and domestic tourists.</li> <li>▪ Provide opportunities where tourists and residents can meet, both formally and informally.</li> <li>▪ Provide opportunities along the waterfront for residents to recreate with family and friends.</li> <li>▪ Provide facilities of equal quality for residents and tourists.</li> <li>▪ Provide adequate housing and facilities for temporary and migrant workers.</li> <li>▪ Maintain public access to the beach.</li> <li>▪ Develop tourist and recreation facilities that are easily accessible by local residents.</li> <li>▪ Incorporate dual fee systems for tourist attractions if most local residents cannot afford them.</li> <li>▪ Develop and enforce codes governing drug and alcohol use.</li> <li>▪ Incorporate community participation into planning process.</li> <li>▪ Do not exceed social carrying capacities; employ visitor use limits if necessary.</li> <li>▪ Phase the development and control rate of growth.</li> </ul>

**Table 4-4.**  
**Proposed environmental objectives and policies**  
**for tourism in Puerto Peñasco.**

<p><u>Objectives.</u> Minimize environmental impacts of tourism.          Conserve and protect natural resources and sensitive ecosystems.          Protect health, safety, and welfare of tourists and residents.</p>
<p><u>Policies</u></p> <ul style="list-style-type: none"> <li>▪ Secure a renewable source(s) of drinking water.</li> <li>▪ Provide an adequate water distribution system to all residences, businesses and tourist facilities.</li> <li>▪ Apply water conservation measures in residential, commercial, and landscape uses.</li> <li>▪ Provide sewer connections to all residences, businesses, and tourist facilities.</li> <li>▪ Construct sewer treatment plants.</li> <li>▪ Recycle effluent on landscaping and golf courses.</li> <li>▪ Construct and maintain environmentally sound landfills, and ensure that household and industrial garbage is collected and disposed of properly.</li> <li>▪ Recycle paper, plastic, glass and as many other materials as possible.</li> <li>▪ Establish composting industry to reduce material taken to dump and produce income for the city.</li> <li>▪ Promote non-polluting sources of energy such as solar energy.</li> <li>▪ Utilize energy-conserving building design and construction materials.</li> <li>▪ Pave roads to reduce air pollution due to dust.</li> <li>▪ Provide efficient public transportation to reduce traffic congestion and air pollution.</li> <li>▪ Promote infill development in existing urban areas and cluster development to preserve natural open space.</li> <li>▪ Develop land use/zoning regulations and development standards to control building setbacks, heights, and maximum densities.</li> <li>▪ Prevent linear development along beaches, especially on the primary dune.</li> <li>▪ Develop and enforce codes on littering.</li> <li>▪ Develop and enforce codes on off-road vehicle use.</li> <li>▪ Develop clean up program for harbor, including controls on ship bilge dumping, fish cleaning operations, and dumping of garbage.</li> <li>▪ Provide habitat for urban wildlife, particularly avian wildlife, through appropriate selection of vegetation for landscaping.</li> <li>▪ Improve habitats for marine life through controls on pollution and creation of artificial reefs and tide pools.</li> <li>▪ Establish proper construction techniques for boat piers, marinas, and coastal structures to avoid erosion.</li> <li>▪ Construct drainage systems to prevent flooding, direct runoff into treatment facilities, and eliminate standing water.</li> <li>▪ Do not exceed environmental carrying capacities; apply visitor use controls where necessary.</li> <li>▪ Phase the development.</li> <li>▪ Control rate of growth to allow establishment of adequate services and facilities.</li> <li>▪ Control growth rate of tourism in order to monitor and control environmental impacts.</li> </ul>

### Recommendations for Tourism in Puerto Peñasco

The most essential ingredients of a successful tourist destination are its attractions. In addition to planning and designing for tourist accommodations, close attention must be given to developing, promoting, and protecting tourist attractions. As illustrated in Figure 4-1, Puerto Peñasco's main attractions are its climate, the beaches, Old Town, and the Harbor area. American tourists are especially attracted to the area because of the close proximity of Puerto Peñasco's beaches to the U.S. border. Old Town and the Harbor are important attractions because they represent the "Mexico experience" for foreign tourists. Tourist attractions can be classified as natural, cultural, and special attractions. Table 4-5 lists some of the existing and potential attractions available in Puerto Peñasco. Up to this point, the only attractions which have been actively recognized and promoted are the beach and the climate. The discussion and recommendations that follow attempt to illustrate the potential of some additional attractions in the Puerto Peñasco area, especially in Old Town and the Harbor.

#### Old Town

As the historical heart of Puerto Peñasco, Old Town is important both in terms of tourism and in terms of the cultural identity of the city. As new tourist areas are developed on the Explanada and Sandy Beach, Old Town potentially faces further economic decline as tourists are lured away. In order to prevent this from happening, it is imperative to concentrate initial efforts on revitalizing Old Town—revitalization that maintains the indigenous charm and authenticity,

Table 4-5.  
Existing and potential tourist attractions in Puerto Peñasco.

NATURAL ATTRACTIONS	CULTURAL ATTRACTIONS	SPECIAL ATTRACTIONS
<ul style="list-style-type: none"> <li>▪ Climate</li> <li>▪ Beaches</li> <li>▪ Scenic beauty</li> <li>▪ Marine life                             <ul style="list-style-type: none"> <li>Tide Pools</li> <li>Estuaries</li> <li>Open ocean</li> </ul> </li> <li>▪ Seashore birds</li> <li>▪ Cerro de Peñasco</li> <li>▪ Biosphere Reserves</li> </ul>	<ul style="list-style-type: none"> <li>▪ Culture of Mexico</li> <li>▪ Old Town historical district</li> <li>▪ Indigenous architecture</li> <li>▪ Harbor/maritime livelihood</li> <li>▪ Fish market</li> <li>▪ Performing arts</li> <li>▪ Arts and crafts</li> <li>▪ Museums</li> <li>▪ Cuisine</li> </ul>	<ul style="list-style-type: none"> <li>▪ Promenade</li> <li>▪ Shopping</li> <li>▪ Aquarium</li> <li>▪ Special events</li> <li>▪ Conferences and conventions</li> <li>▪ Aquaculture</li> </ul>

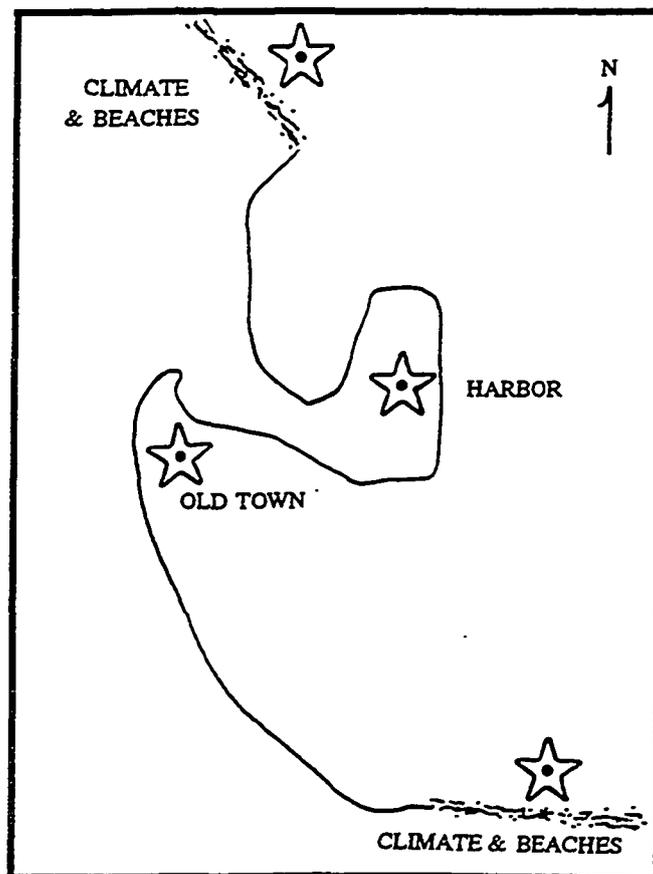


Figure 4-1.  
Puerto Peñasco's primary tourist attractions.

and reflects its historical significance as an early 20th century Mexican fishing village. Revitalization does not mean that Old Town should be turned over to tourism exclusively. The authenticity of the Mexican community can only be kept alive by maintaining the diversity of uses that currently exists. The challenge becomes one of managing large seasonal influxes of people and minimizing conflicting activities.

The Cerro de Peñasco dominates Old Town. This natural landmark and namesake should be protected and preserved as natural open space accessible by the general public. The Cerro provides an important scenic vista from all parts of Puerto Peñasco which should not be marred by inappropriate land uses and architecture that diminishes its natural beauty. From the top of the Cerro one obtains spectacular views of the harbor, Las Conchas, and the mountains at Cholla Bay. The Cerro could be sensitively developed as an observation area, with trails, picnic areas, photographic opportunities, and telescopic viewing. Tours of the lighthouse could be combined with narratives of Puerto Peñasco's maritime history.

Scale is a critical issue to consider for further development in Old Town. In order to appear integrated with the Cerro, existing structures, and the human scale of the neighborhood, new construction should be modest in scale. With the exception of the Costa Brava Hotel, buildings are one- and two-stories in Old Town, and this should also be true of future construction. New architecture and renovations should reflect existing styles and scales, or evoke historically

significant Mexican architectural styles and colors. Infill opportunities are numerous in Old Town, on vacant lots or where structures are crumbling and abandoned. Serious consideration should be given to restoring original structures if physically possible, as opposed to tearing them down and starting over. Restorations that strive for historical accuracy in styles and materials would preserve a bit of the town's history and reinforce its cultural identity. The selection of appropriate construction materials also contributes to the aesthetic appeal and historical authenticity. Wood, block, fortified adobe, and stucco are natural, "earthy" materials found in structures throughout the town. Although the black volcanic rock of the Cerro has been used in the past, it is a limited resource and is more significant as a natural landmark, than as a construction material. It may be appropriate to mine a small amount of the rock for historic restoration purposes. If so, provisions must be made to prevent visible scarring of the Cerro.

Planners will want to create development and design standards that incorporate issues mentioned here. It is important, however, that the standards allow room for individual expression—a controlled eclecticism, if you will—to avoid the "sterility" of another Cancun and the rigidity of another Las Conchas. Planners may want to educate property owners in Old Town about the importance of maintaining the spirit of Mexico; even Americans don't want to see America in Old Town (or New Town for that matter).

Revitalization of Old Town will require a partnership with the federal

government to provide low-interest loans to local people to start small tourist-related businesses. Some assistance for out-of-work fishermen is already available through Solidarity, President Salinas' social works program (Hardie, 1993a). An important advantage of developing Old Town on a modest or small scale is the opportunity for increased participation in the tourist business by Peñascans. In addition to financial assistance, entrepreneurs will need assistance and training in management and marketing skills. A Tourism Bureau might be established in Puerto Peñasco to conduct marketing research and monitor the local tourism industry.

The concept shown in Figure 4-2 concentrates tourism along the perimeter of Old Town to reduce its impacts on the interior neighborhoods. To accommodate some expansion, this concept includes the addition of a fill area paralleling Malecon Fundadores, connecting the fish market with the Vina del Mar Hotel. This addition serves several purposes. First, this stretch of the malecon has few attractions and a very low activity level. Second, there is no beach located here, only a rather treacherous rocky strand that effectively discourages walking along the waters' edge; the fill area would provide a much more aesthetically pleasing experience by bringing pedestrians in closer contact with the water. Third, a basic design and management concept— separation of pedestrian and vehicular traffic—is met. And finally, the fill area facilitates the creation of a beach front promenade which can be enhanced with a variety of small shops, cafes, and specialty food stands.

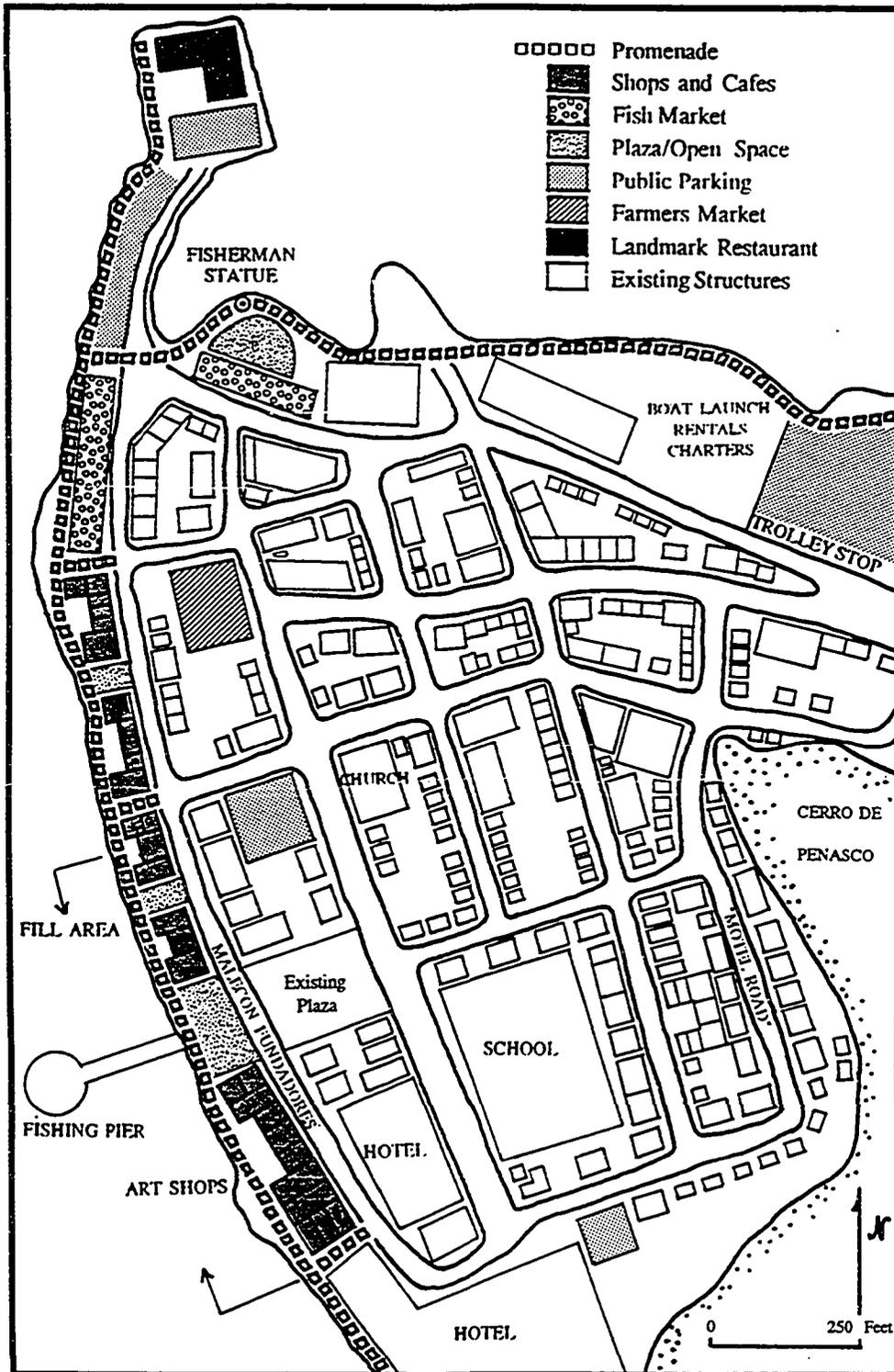


Figure 4-2.

Alternative tourism concept for Old Town (base map from Ewert, 1990).

The promenade (or boardwalk) was recognized by Stansfield (1970) as an essential ingredient for a seaside resort. The promenade is both an attraction and an activity for tourists and residents alike. The attractions are the beautiful ocean views and all the activity, and the activities include leisurely strolling, people-watching, site-seeing, shopping, socializing and eating. This concept considers the promenade as one of the most important elements for revitalizing Old Town and connecting it to other tourist areas. The promenade would extend from Old Town through the Harbor area and the Explanada. In the opposite direction, the promenade would extend all the way around the seaward edge of the Cerro de Peñasco to provide easy pedestrian or bicycle access for tourists in the RV parks and Las Conchas. This segment of the promenade would have no commercial facilities, emphasizing only the natural beauty of the sea and the Cerro. This route might be enjoyed by nature tourists as well as Americans who enjoy an exercise routine, ending with breakfast or lunch in Old Town.

Shops along the promenade should be limited to one-story in height, with numerous open spaces/plazas along the way, to maintain visual and physical access to the waterfront. The main entrances to the shops would be from the seaward side, but it is important to present an attractive facade and entrances where possible from the street side to prevent creating a dead area along the street. Vendors with carts could help make the street scene more lively in addition to shops located on the east side of the street. But the main action would occur along the promenade because of the attraction of the waterfront

scenery. Shops near the hotels at the south end of the malecon would be good locations for pricier original artworks by local artists. A large plaza on the infill area extends the open space of the existing plaza and preserves the ocean views. A fishing pier provides entertainment for tourists and others along this beachless stretch of coast. Ice and facilities for cleaning fish should be provided to prevent the accumulation of fish remains in the water along the promenade.

The promenade could also be an important draw at night if it is properly lighted. The plaza areas could be used for live entertainment and outdoor dancing both day and night. An activity committee or office might be established in Puerto Peñasco to schedule and promote a variety of events such as musical groups, traditional Mexican dance troupes, festivals, chili cook-offs, and so on, centered in the plaza.

The concept in Figure 4-2 makes some adjustments to the location of the fish market by moving about half of it to the Harbor side of the street. This move will require the relocation of three small businesses within Old Town. By relocating a portion of the fish market, more tourist shops can be concentrated along the promenade, reducing the encroachment of the tourist zone into the residential community. The location along the Harbor is appropriate for a fish market and also provides an opportunity to attract tourists from the promenade and new plaza/open space. The statue of the fisherman is lost in its present location in the fish market, and should be moved to a landscaped setting along the promenade where it is highly visible. In close proximity to the fish market,

the introduction of a farmers market could benefit local residents as well as tourists.

The land use for the point at the north end of the malecon requires careful consideration because of its prominent location at the entrance to the Harbor. One suggestion is to locate an attractive upscale restaurant/nightclub that offers indoor/outdoor dining, taking advantage of the magnificent views in all directions. The building itself must be well-designed and aesthetically attractive because it may well become another "landmark" in the area.

Additional lodging accommodations for tourists in Old Town should be on a small scale—guest houses, or small hotels with 10 units or less. Interested residents could support themselves or supplement incomes by converting existing residences, adding small cottages on their properties, or perhaps by adding a second story. Low-interest government loans and training would assist these entrepreneurs, but might be limited to owners who will live on the property, rather than "absentee" landlords. Entrepreneurs will also need assistance in the design of the guest house accommodations to ensure their appeal to tourists. For example, the architecture should reflect Mexican influences, and the layout should include small kitchens and a patio area that is attractively landscaped or offers a view of the sea. Small-scale accommodations would be especially inviting tucked in along the lower slopes of the Cerro, especially along "Hotel Road" and the entry road to Old Town.

The present shopping situation in Old Town and Puerto Peñasco in general

is extremely disappointing. Most items offered for sale to tourists are imported from other areas, and most of them are available in any border town. There is very little in terms of arts and crafts that is unique to Puerto Peñasco. As part of the revitalization effort, Puerto Peñasco should give serious consideration to developing new products for the tourist market that are produced by local artists. Any number of items might fit the need—sculpture, paintings, pottery, jewelry, textiles, etc.—as long as they are original and of high quality. Through these efforts, Puerto Peñasco should strive to create a new identity (a new life cycle) as an "artists colony" that complements its history as a fishing village and gradually begins to attract a new clientele. Use of materials such as ironwood, which is a threatened species due to its slow growth and widespread use in wood carvings, would not be appropriate next door to the newly designated Biosphere Reserves. T-shirts are a very popular item for tourists, which could easily be designed and commissioned by local artists. The use of local themes ("Save the Vaquita") would appeal to ecotourists in addition to tying the product to the Puerto Peñasco region.

Effective management of vehicular traffic will be required to make a visit to Old Town enjoyable. One goal should be the reduction of private cars on the local streets, in order to reduce air pollution and traffic congestion. A trolley or bus system that serves each stop on 15-minute intervals could help alleviate traffic problems. The trolleys would be open air vehicles, allowing quick easy access for passengers. Also to facilitate the efficiency of the system and

encourage its use, no fares should be charged to passengers; the system would be subsidized by the city's profits from the tourist industry. This transportation system would also link other parts of the city such as the Harbor area and Sandy Beach. Tourists should be encouraged to park private cars in parking lots located near the entrance to Old Town or in lots at either end of the malecon. These lots would charge hourly or daily fees and would be staffed by parking attendants. Installing parking meters along Malecon Fundadores may also encourage motorists to use the trolley and outer parking lots. Another way to alleviate traffic conflicts on the malecon would be to limit access by delivery vehicles to a few hours early in the morning when the tourist traffic is low. The existing vacant lot across from the church is used as a parking lot for churchgoers. This lot should retain its parking function, with use limited to church members on Sunday mornings, but open to tourists for a fee when not being used for church functions.

Tourist traffic destined for the hotels could be redirected by signs to take the first turnoff into Old Town (labeled "Motel Road" on Figure 4-2, to keep these vehicles away from the congested malecon area. "Motel Road" would also provide access to guest house accommodations located near the base of the Cerro. Tourist traffic may pose a safety hazard to the school children along Paseo Victor Estrella. Fortunately, the peak tourist times are on weekends when school is not in session. During the week, the road in front of the school could be closed to vehicular traffic for an hour in the morning and afternoon when children are arriving and departing; or traffic monitors stationed at intersections

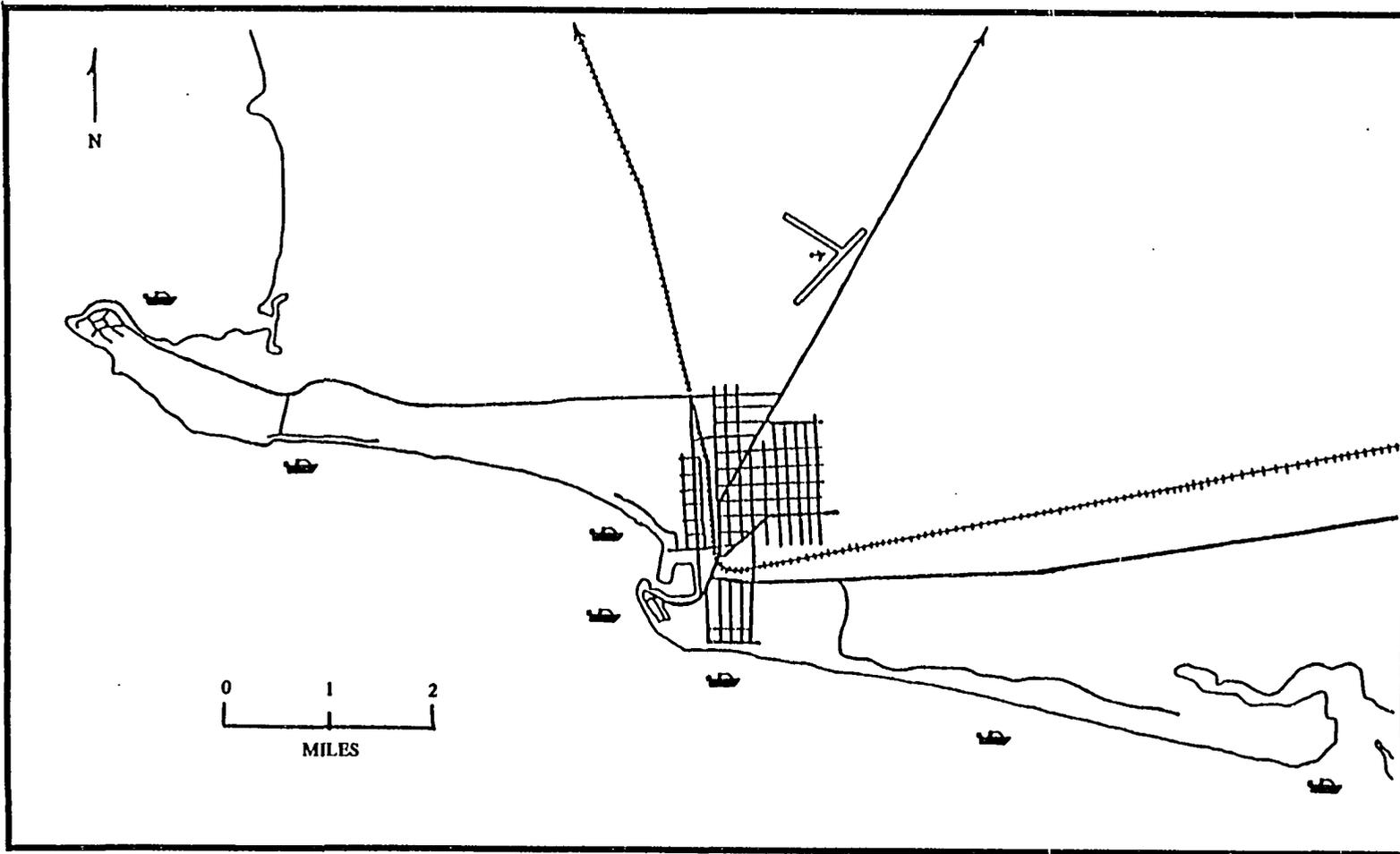


Figure 4-3.  
Water taxi service connecting tourist areas.

adjacent to the school, could direct tourists to the side streets, while allowing parents access to pick up children. Some traffic problems on land may also be offset by introducing a water taxi service (Figure 4-3) that makes frequent stops at Sandy Beach, the Explanada, Old Town, and Las Conchas.

#### The Harbor and the Explanada

While there is no denying that the Gulf waters have been severely overfished, the fishing industry in Puerto Peñasco is not entirely dead. Forty boats were still active in 1993 down from the peak of 220 to 250 a few years before (Elling, 1993c; Lowe, 1993). The creation of the Biosphere Reserves earlier this year, will restrict fishing north of Puerto Peñasco to accommodate reproduction, but will permit fishing in waters south of the port. As the shrimp population recovers and fishermen learn more about conserving this renewable natural resource, some level of fishing—as yet undefined—will be found that is sustainable. But the demand for fresh seafood continues to increase, especially in the United States. This demand will have to be met in part by the aquaculture industry—the farming of shrimp and fish—that is being promoted by many as an alternative to Puerto Peñasco's traditional fishing economy.

The fact remains that maritime-related industries may still play a significant role in Puerto Peñasco's future. This is of great importance, not only economically, but also as a part of the town's heritage. The level of fishing activity may not support as many packing plants and ice manufacturers as in earlier times, but perhaps these packing facilities may be utilized to support the

new aquaculture industry. Ice will be in demand for tourism as restaurants and guest accommodations increase. The shipyard may be revitalized as a design and construction site for pleasure boats such as tour boats, yachts, catamarans, and windsurfers.

Because the Harbor is undergoing a period of transition between traditional and new uses, it is difficult at this time to define the level of industry that can or will be maintained. But as long as maritime activities can be supported, it is important to preserve the Harbor for them, as opposed to allowing tourism to take over. Tourism seems destined to dominate many other parts of Puerto Peñasco. For local residents, it will become increasingly important to point to the Harbor as their own. The Harbor is definitively Puerto Peñasco—historically, culturally, and economically.

Tourism can and should be an important element of Harbor activities. But this concept gives priority to maritime functions. This approach benefits Puerto Peñasco and tourists alike. Tourists will naturally be drawn to the Harbor to view the boats and observe the activity of the fishermen. Many will be curious about the tough, seafaring life. The authenticity of a bustling, productive port will, in effect, become a tourist attraction.

The concept illustrated in Figure 4-4 maintains a large amount of space for industry uses while accommodating tourism and enhancing the Harbor's connection to the community. Tourists can explore the Harbor on foot along the promenade that is continuous from Old Town. This segment of the promenade

new aquaculture industry. Ice will be in demand for tourism as restaurants and guest accommodations increase. The shipyard may be revitalized as a design and construction site for pleasure boats such as tour boats, yachts, catamarans, and windsurfers.

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would take on a slightly different character however, as the attraction shifts from shopping (in Old Town) to observation of Harbor activities along a shady, tree-lined avenue. A park/picnic area with trees, grass and additional landscaping could also function to "announce" the entry into Old Town.

A large plaza with food stands, shops, sculpture, and landscaping is suggested as a potential alternative to land presently occupied by some maritime functions, a small library, and an auditorium (Figure 1-4). By opening up this space, the Municipal Building obtains a visual connection with the Harbor and overlooks an important, almost monumental public space that complements the civic functions of the city's governmental center. This concept assumes that the maritime functions can be relocated or consolidated on vacant properties along the waterfront. In addition, relocation of the library and auditorium on vacant land surrounding the town's Central Plaza would seem to be compatible with, and perhaps even reinforcing the civic function of this plaza within the community.

The school is tentatively replaced in this concept by medium-sized hotels (that do not architecturally overpower the Municipal Building). To make this an informed decision, additional information is needed regarding the significance of this school, built in 1950 as the first in the town, to the citizens of Puerto Peñasco. It is conceivable that this proposed relocation would generate protests from the community. On the other hand, if the 43-year old structure has fallen into disrepair and become overcrowded, the community might welcome a newer, more modern facility in another location. A civic tax imposed annually on the

larger hotels could be used to alleviate some relocation and construction costs. This decision also hinges on monitoring of the future demand for hotel space; the tourist-oriented developments planned for the Explanada and other areas may satisfy demand for some time to come, precluding the need for the school site.

Adjacent to the shipyard, this concept envisions an additional tourist attraction in the form of a Maritime Museum. The museum would, of course, emphasize the maritime history of Puerto Peñasco, with interpretive displays of boats, fishing equipment, fishing techniques, and the life of the fisherman; children might be given the opportunity to climb aboard and "pilot" a boat or "reel in" a fish. The museum might also serve as the starting point for tours of the harbor and shipyard operations. Additional small-scale tourist accommodations could be made available in this area if some of the repossessed fishing boats are converted into "bed-and-breakfast" facilities.

The Explanada area is occupied by the Navy on the south side, and tourist-oriented development everywhere else. The promenade takes on a character similar to that in Old Town as it enters the Explanada. The space along the waterfront is pedestrian-oriented with low-rise specialty shops, art studios, and cafes. Medium-rise hotels and supporting facilities are set back a short distance from the water, but offer outstanding views of the Harbor, Old Town, the Cerro de Peñasco, and the open ocean. A small corner of the existing shipyard may be needed for a boat launching area for hotel guests. The Explanada is anchored by a major tourist attraction—such as an Aquarium—that provides tourists and

residents close-up encounters with the marine and avian life of the Sea of Cortez. The aquarium might also support some research functions and would most certainly be a draw for ecotourists. On the north side of the Explanada, the "palapa" space is preserved for the local residents who congregate at Playa Hermosa, and this access to the beach is maintained. The concept also recognizes the need for public parking near the promenade and the beach access. An efficient trolley or bus system should service the Harbor and Explanada area, with efforts made to discourage personal auto use, especially on the Harbor road.

A general clean up of the Harbor is in order to benefit tourists and residents alike. Convenient facilities must be made available to handle waste products from the fishing boats and the pleasure boats, to prevent dumping in the Harbor or just outside the Harbor entrance. The fuel storage and distribution systems must be upgraded with state-of-the-art equipment and safety procedures to protect the public and the dock workers. Industrial yards should be cleaned up and/or screened with landscaping. This is particularly true along Paseo de los Pescadores, the entry road to Old Town.

#### Sandy Beach

The undeveloped sandy beach-dune complex that connects Puerto Peñasco and Cholla Bay provides an opportunity for planners and designers to create tourist and urban developments which benefit everyone—tourists, residents, and the environment. Planning should revolve around preservation of natural open spaces, cluster development, and protection of dune and beach environments.

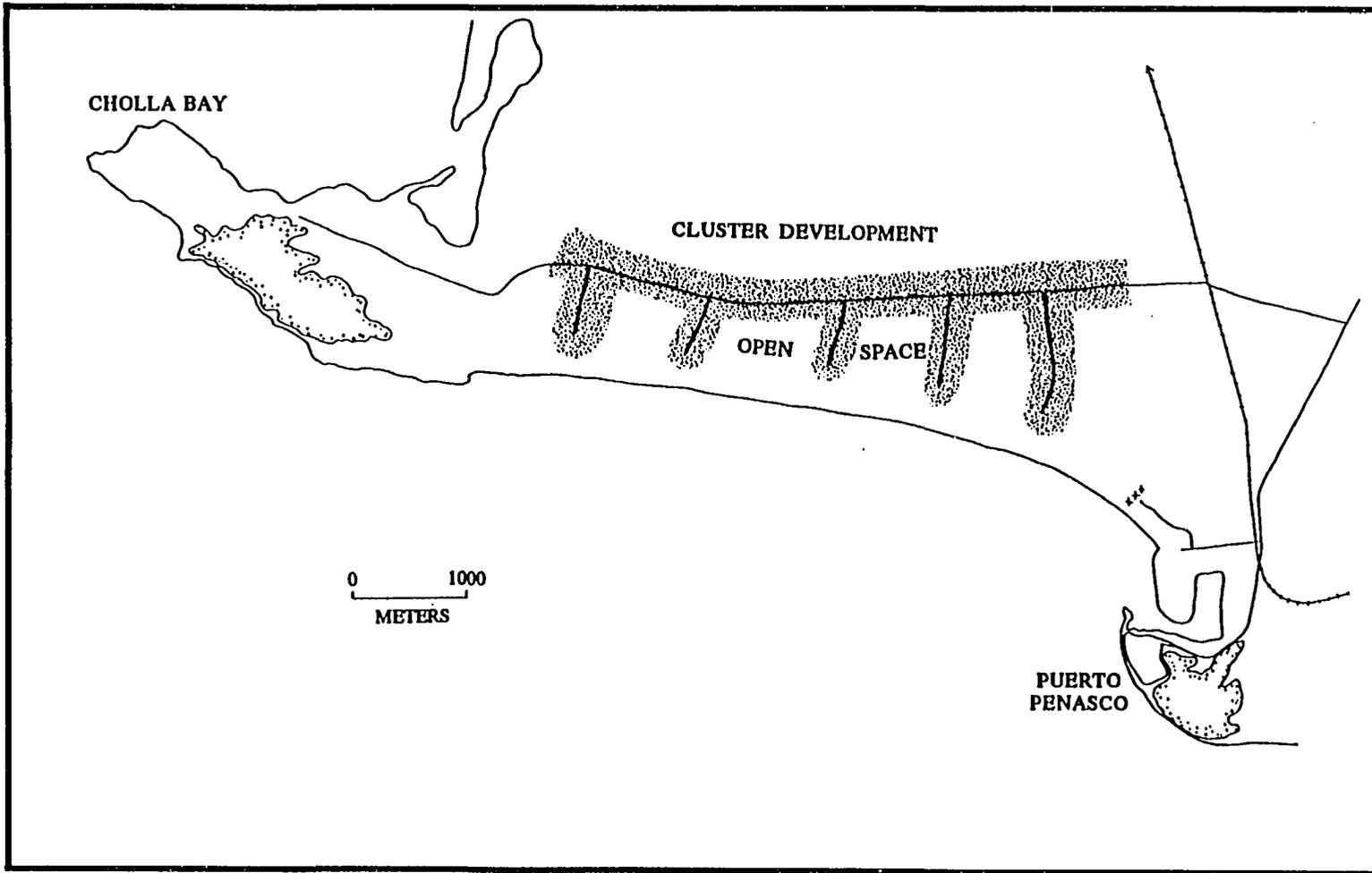


Figure 4-5.  
An alternative form of tourism development at Sandy Beach.

The example of the tourist development at La Grande Motte, shown earlier in Figure 3-3, provides a number of useful concepts for consideration at Sandy Beach. Linear development along the beach and primary dune should be avoided by preventing the continuation of the road that presently extends to the condominiums at Playa Hermosa. The existing road to Cholla Bay should function as the primary access road, with perpendicular roads leading to the beach, as shown in Figure 4-5, to preserve open space, to limit linear beach front development, and to prevent beach front traffic congestion. Cluster development along the perpendicular roads can support a variety of tourist facilities, including higher density accommodations. A series of pedestrian paths and a convenient trolley system could provide relatively quick and easy access to the beach front, minimizing the use of personal automobiles.

### Cholla Bay

The rough granitic terrain of Pelican Point and Cholla Bay is a distinctive natural resource towering above the surrounding flat landscapes of sea and sand. The uniqueness of the site makes it highly desirable to tourists as evidenced by the present "American colony". However, it may be argued that there are other uses more appropriate than or at least equal to its current use. Cholla Bay would make a dynamite site for a large tourist resort complex nestled into the natural amphitheater formed by the rocks. An advocate for local residents would point out that such a development would amount to a traditional tourist enclave, characterized by isolation and exclusivity, effectively making Cholla Bay

unaccessible to the average Puerto Peñascan.

Another approach at Cholla Bay might be to create a complex of attractions that invites visitation by both tourists and locals. The attractions might have entertainment, cultural, educational or some combination of functions. An outdoor amphitheater might feature a variety of local and imported theatrical and musical performances. An art school, established to attract top caliber Mexican and international students and teachers, could help establish another identity and a source of pride for local people, provide educational and career opportunities, and provide a supply of original artwork to be sold in the city. A museum/environmental education center might be established to focus on the natural history of the area, emphasizing the archeology and study of Indians and prehistoric visitors to the region. An arid lands garden could showcase Sonoran desert plant and wildlife. These alternatives could make Cholla Bay a valuable public amenity to be shared by residents and visitors alike.

### Las Conchas

Las Conchas and the RV parks on the east side of the Cerro de Peñasco accommodate a large number of American tourists who rent homes, condos, or RV spaces. Although some tourists come only for a long weekend, there are many who stay for weeks and months at a time. For these tourists, the extended promenade/pedestrian corridor, shown in Figure 4-6, could provide an important connection with Old Town. The corridor can be used for daily exercise, as well as for easy access to all the activities occurring in Old Town. For the local

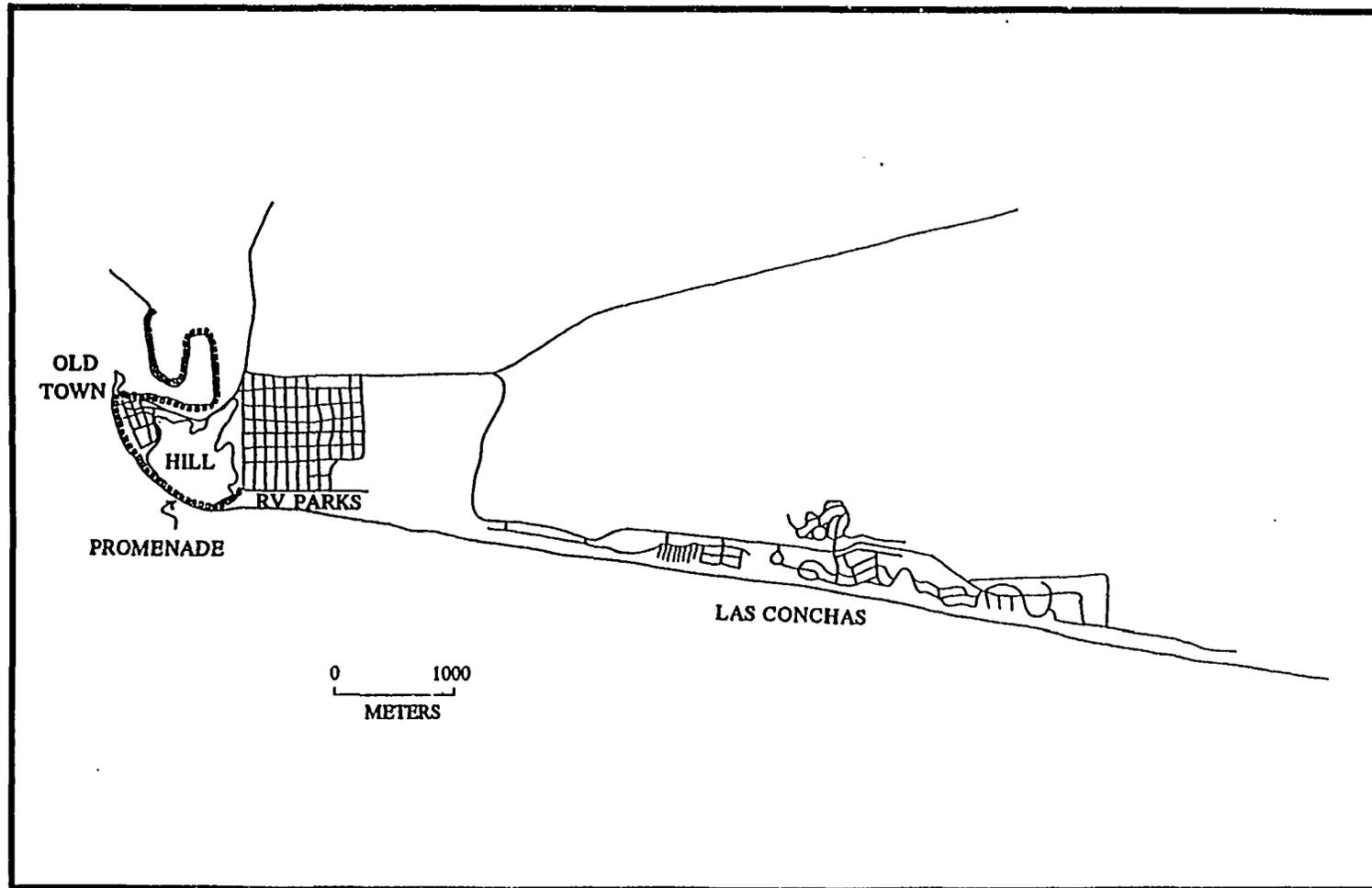


Figure 4-6.  
Promenade connection of RV Parks and Las Conchas to Old Town.

economy, this improved access is intended to encourage American tourists to visit Old Town more often, with corresponding increases in tourist expenditures.

#### Golf Courses in the Desert

Golf courses have been proposed for the Puerto Peñasco area by everyone from University of Arizona researchers at the Environmental Research Lab (KUAT, 1988) to a variety of promoters, developers and investors. Fortunately, most of these proposals recognize that limited fresh water resources are available in the desert and pledge to irrigate the golf courses with treated effluent from waste water treatment plants. In Tucson, Arizona, the state Department of Water Resources (ADWR) limits an 18-hole golf course to an annual allotment of 428.5 acre-feet/year. Typically, this amount of water will support about 90 acres of turf and 2.5 surface acres of water (ponds and water features). (Ventana Canyon Golf Course, one of the most efficient in Tucson, used only about 367 ac/ft of water in 1991 on 18 holes with about 72.5 acres of turf). Based on census data and information provided by the Pima County Waste Water Department, ADWR (1993) has calculated that a waste water treatment facility requires a "sewered population" (combined residential and non-residential/ industrial users) of 4,776 full-time residents on its system in order to produce 428.5 acre-feet of effluent annually. A 100% residential development (Saddlebrook retirement community) would require 7,492 full-time residents to produce 428.5 acre-feet of effluent annually. Pima County, with its large industrial water users, does not compare to Puerto Peñasco at this time. Based

on the figures for 100% residential development, Puerto Peñasco (pop. 26,141) might be able to support about 3.5 18-hole golf courses at the present time, if a treatment facility were available. This estimate assumes however, that the per capita water use of Puerto Peñasco residents equals the 51 GPCD (gallons per capita/day) for the Saddlebrook residential community. It should also be noted, that Tucson's humidity and rainfall (11 in./yr) are considerably different compared to Puerto Peñasco, even though both are located in the Sonoran Desert.

The availability of water is not the only consideration when planning the ifs, whens, and wheres of golf courses in the desert. Depending on their location and the types of developments surrounding them, golf courses may evoke a number of different images. Golf courses may be public or they may be private, serving gated communities and members-only Country Clubs. The course at a private Country Club is typically surrounded by expensive homes on 1-acre lots and is exclusive by nature. A private golf course in Puerto Peñasco would yield an attractive profit for the developers and owners, but would not contribute much to the community. A well-managed public course, however, would be a dependable source of revenue for the city. In addition to the financial gains, a public course could be managed based on a multiple-use concept. For example, shady lawn areas might be reserved for local residents for Sunday afternoon picnics and other recreational uses; pedestrian paths along the perimeter would allow use and enjoyment by the general public; vegetation associated with the

course could be selected and managed to attract and support urban wildlife; and, apartments and/or single family homes on small lots (townhomes, patio homes) could be built along some edges for use by local residents.

A golf course in the desert may certainly be considered a luxury. The lush expanses of exotic turf and the large quantities of water required, are considered by some to be inappropriate in an arid land setting, both visually and environmentally. Ecotourists would most likely not be attracted to golf courses in Puerto Peñasco. Others, like the "sun and sea" tourists may appreciate the "oasis" effect and relief from the hot, dry surrounding deserts. Finally, there are the golf "addicts" who simply love the game, a large number of whom seem to be senior citizens.

If further research indicates that a golf course would be a valuable economic and/or tourist asset in Puerto Peñasco, planners would benefit greatly by studying the planning and design of arid land golf courses like Ventana Canyon (Tucson). The guidelines and management plans of government entities like ADWR (1991) would also be useful. In Puerto Peñasco, golf course development should not be allowed on the sand dunes to prevent the destruction of these fragile habitats. The sandy soils and coastal climate may create special hardships for golf course construction and maintenance. The lack of organic material in the soil may require large quantities of fertilizer to maintain a green turf, and the turf grass will have to be both drought tolerant and salt tolerant. The shifting sands that are a natural phenomenon along the Puerto Peñasco coast

may result in unusually high maintenance costs for these turf areas.

#### Phasing the Development

Dividing the larger Plan for tourist development into several phases for implementation purposes has numerous advantages. Financing may be easier to obtain in relatively modest amounts spread out over time. Phasing allows for installation of infrastructure and other tourist facilities to keep up with demand, and can be used to control the rate of development. Phasing also allows for the dynamic nature of tourism as recognized by Butler (1980) and the tourism life cycle. As each phase is completed, planners can monitor the responses and reactions from tourists, keeping track of who and how many visit. This information can be used to guide future phases and may indicate that changes need to be made in original plans and projections.

In the Puerto Peñasco area, Phase One must include installation of adequate infrastructure to serve both residents and the projected number of tourists. The amount of groundwater available must be determined, and the supply system needs to be upgraded so that all structures have a reliable source of running water. Waste management is also a critical element of any development plan. Sewer connections must be made to all existing and future developments and an adequate treatment plant constructed. Construction during this phase can also be used to bury power lines and extend electricity where needed. These improvements should be concentrated in the Old Town, New Town and Harbor areas in the beginning, where the urban infrastructure is presently located. The

reasons for this include: promoting infill in the built up area, providing adequate facilities to increasing numbers of tourist industry workers (New Town may become analogous to the Service cities of Cancun City and Zihuatanejo in FONATUR's Mexican resorts), cleaning up existing and preventing potential environmental problems, revitalizing Old Town and the Harbor and adding attractions to draw existing tourists and give them a reason to spend more money.

The early phases should concentrate on providing small rental units with kitchens that will appeal to the relatively independent type of tourist that frequents Puerto Peñasco by automobile at this time. As attractions are added, higher density accommodations can be also be phased in as justified by increasing numbers of tourists. Construction of hotel rooms should be monitored closely to prevent over-building.

Development of the Sandy Beach area should also be done in phases, with early phases located closest to Puerto Peñasco to facilitate efficient installation and use of needed infrastructure. Cholla Bay would logically be a later stage due to its remoteness, the greater costs for providing water, sewer and electricity, and also due to the anticipated difficulty in regularizing land ownership.

#### Future Research

A number of questions remain unanswered about tourism in Puerto Peñasco, pointing toward the need for additional research. Much of the available information on tourist types and tourist motivations is based on perception rather

than scientific survey data. More precise marketing data on existing tourism would be of great use. Marketing studies and surveys could better define the tourist user groups identified in Table 1-5, providing information on how large each group is, how much money each group spends annually, why do they come, how long do they stay, and what they do or would like to be able to do or see in Puerto Peñasco. As tourism development proceeds, periodic surveys should be performed to monitor changes in numbers and spending patterns of these tourist user groups, in order to evaluate the effectiveness of tourism planning, design, and development. In other words, how important is each tourist group to the local economy, and which groups should be targeted in future tourism development. Local residents should also be surveyed to understand their attitudes toward tourists, in order to identify existing problems and prevent potential conflicts. These results can also be used to design educational and cultural exchange programs for both tourists and residents.

In the future, no doubt, Puerto Peñasco will attract an increasing number of visitors interested in ecotourism, due to the recent declaration of Biosphere Reserves to the north and to the growing popularity of environmental education opportunities such as those offered by CEDO. Ecotourism has been envisioned by some as a way of providing alternative work opportunities for out of work fishermen, through retraining as tour group leaders (Lowe, 1993). If Puerto Peñasco decides to target the nature tourism market, it would be highly advisable to study what these tourists look for in a destination in terms of attractions and

accommodations. The preferences of U.S. travelers bound for Mexico for resort, city, and cruise trips, reported in Table 2-3, are probably not representative of the ecotourist. The data on outdoor trips may have some applicability, but the research was not geared toward defining ecotourists. Based on a study of nature tourism in five countries, Boo (1990:xv) concluded the following:

"It is possible that nature tourists are less demanding in terms of lodging than other types of tourists and thus do not need accommodations, food, or nightlife that meet luxurious standards. The nature traveler seems more willing to accept and appreciate local conditions, customs, and foods. However, basic services and infrastructure are still required to make ecotourism a significant economic force and a sought-after activity."

Another important research question is: how much ground water is available in the Rio Sonoyta aquifer (or other regional aquifers?) to supply Puerto Peñasco. The amount of fresh water required to support proposed tourism and other forms of economic development must also be determined. Conservation and development of alternative sources of water are critical to future economic growth.

Finally, additional research is needed for the development of appropriate building and design standards. Public spaces in Puerto Peñasco must be designed to appeal to American tourists, Mexican tourists, and local residents. Cultural differences in aesthetic and activity preferences should be explored, along with past and present architectural styles in Mexico.

### Closing comments

It is hoped that the objectives, policies and recommendations presented here will be utilized as a springboard for further discussion by those who live and work in Puerto Peñasco and are responsible for its future development. Tourism has the potential to be a very positive element of the local economy and society, if the planning and design processes are carefully conceived and executed. Traditional forms of tourism and our numerous experiences with them have yielded valuable lessons that, if heeded, will strengthen our current planning efforts. It is heartening to realize that there are so many people on both sides of the border who are deeply concerned about Puerto Peñasco's welfare, and have faith that the town will survive this painful economic transition period. Alternative forms of tourism, as discussed here and by other researchers, may be just the prescription to help revitalize the local economy and initiate a new cycle, full of life, health, and wealth for Puerto Peñasco.

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