

The Economic Role of America's National Parks: Moving Beyond a Tourist Perspective

Introduction

Typically, when the words "economic" and "national parks" are linked together, it is tourist impacts on the local economy that are the focus. The National Park Service (NPS) itself links economics and national parks primarily in this manner. When budget conflicts led to most national parks being shut down in 1995-1996, NPS had economists estimate the "economic impact" of the shutdown by studying the impact of the decline in visitor spending on communities adjacent to the affected national parks. NPS uses an economic model called the Money Generation Model that allows any given national park to use a small amount of park-specific data to estimate the contribution that park visitation makes to the local economy. Both the introduction of wolves into Yellowstone as well as the flood damage to Yosemite have been analyzed by NPS economists in these terms. The economic role of parks is, in general, the local tourist impact attributable to the national park. As will be discussed below, this is a terribly incomplete way of looking at the economic role of America's national parks.

The Economic Consequences of a National Park

The existence of a national park and the visitation it supports have a broad range of economic consequences that confer net benefits on various economic actors. There are at least three important but quite different sets of such economic benefits. First, there are the benefits enjoyed by those who actively make use of the national park or the environment it creates or protects. It is the direct benefit to the visitor, not the visitor's spending, that is the focus for this economic value. Second, there is the set of impacts that the existence of the park has on the economic opportunities (employment, earnings, invest-

ments, etc.) available in adjacent communities. It is in this category that visitor spending would fall. A third set of economic consequences are the economic benefits enjoyed by citizens because of the existence of the park that are not associated with the direct *use* of the park by anyone. These values have been labeled intrinsic, passive use, or non-use values by economists. The evidence for the existence of this class of economic values is the willingness of Americans to make sacrifices to create and protect parks that they never expect to visit.

The tourist approach to national park economic values focuses on *part* of the second set of economic conse-

quences while not directly dealing with either the first or third sets. It is important to understand the economic limitations of this particular focus. The primary objective for establishing the national parks was not usually the stimulation of local economic activity in particular communities. Rather, they were established to allow citizens to enjoy the benefits of visiting unique natural and cultural. In addition, they were established to protect the intrinsic values associated with those sites, values that are independent of actual visitation—preservation values, if you will. Both of these dominant public policy purposes of the national parks *could* be given expression, at least partially, as economic values. That is what the first and third set of economic consequences discussed above represent. The tourist approach, however, focuses elsewhere. In doing so, some very important, if not dominant, economic consequences of the national parks are ignored. But that is not all that gets ignored. One of the most important local economic impacts gets ignored too.

Non-Visitor Impacts of National Parks on the Local Economy

The tourist approach to national park economics focuses upon the impact that visitation to the park has on local spending, earnings, employment, and tax revenues. These are clearly economic impacts of considerable interest to communities adjacent to national parks. Visitor spending, however, is not the only

way in which the existence of national parks affects the range and intensity of commercial economic activity in the local area. To the extent that the national park provides ongoing protection to the flow of valued environmental goods and services to local residents, national parks may draw new residents to adjacent areas and the economic activity that supports them. The scenic beauty, outdoor recreation, wildlife, water quality, etc. associated with protected natural areas such as national parks may stimulate local economic activity by attracting new permanent residents as opposed to or in addition to temporary visitors.

Population growth in counties adjacent to national parks reflects this attractive role of the amenities protected by the parks. For the last half-century, growth in national park counties has been two to three times that found in metropolitan counties and three to six times the growth found in nonmetropolitan counties in general (Rudzitis 1994; Harmon 1995). Statistical analysis of residential real estate activity also indicates that national parks serve as “magnets” for new economic activity in the Northern Rockies (Jackson and Wall 1995).

The tourist approach focuses only upon *non-resident* users drawn to an area. Implicitly it dismisses as “derivative” or “secondary” all resident-related economic activity. This is both a conceptual and empirical error that distorts the economic discussion of national parks and usually

leads to a significant understatement of the impact of the existence of the national park on the local economy. Temporary visitors' spending is not the only way the national park stimulates the local economy.

The Full Range of National Park Economic Values

The establishment and protection of national parks is usually defended in ethical or aesthetic terms against claims that those preservation efforts are in some sense "anti-economic" because they purposely ban most commercial activities. When an economic response is offered, it is in terms of the positive tourist impacts. As argued above, this is seriously incomplete. Lands with national park qualities are a relatively scarce resource that have significant alternative uses that satisfy important human needs and desires. In that sense the creation of national parks represents a "classic" economic decision to allocate scarce resources to the pursuit of important human objectives. national parks provide a broad range of benefits that make the lives of people more satisfying and fulfilling in at least the same way that people's purchases in commercial markets do. One way of looking at those positive benefits of parkland preservation is outlined in Figure 1.

The figure divides the economic values associated with national parks into several categories:

- on-site vs. off-site values
- use vs. non-use (or passive use) values

- recreational vs. non-recreational value
- dollar expenditures vs. non-market economic values
- present vs. future values

Each of these distinctions is important in evaluating the economics of national park protection. Often, most of these values are ignored in economic discussions of parklands. When economic analysts do consider positive economic values for parklands, they tend to focus exclusively upon the expenditures associated with non-resident visitor spending. As the figure suggests, this represents a relatively small part of the "on-site" "use" values and an even smaller part of the total set of values that need to be considered.

The Source of the Problem: How We Think About the Local Economy

The focus upon tourism in economic discussions of the role of national parks is the direct result of the widespread use of a misleading approach to thinking about the local economy: the economic base approach. This way of thinking about the local economy assumes that the only economic activities that really matter are those that inject income into the local economy. This income is seen as being spent and re-spent within the local economy, putting people to work in locally oriented economic activities. Without that income being injected into the local economy from the outside, no one would be able to live in the local area

Non-Use Values

Use Values

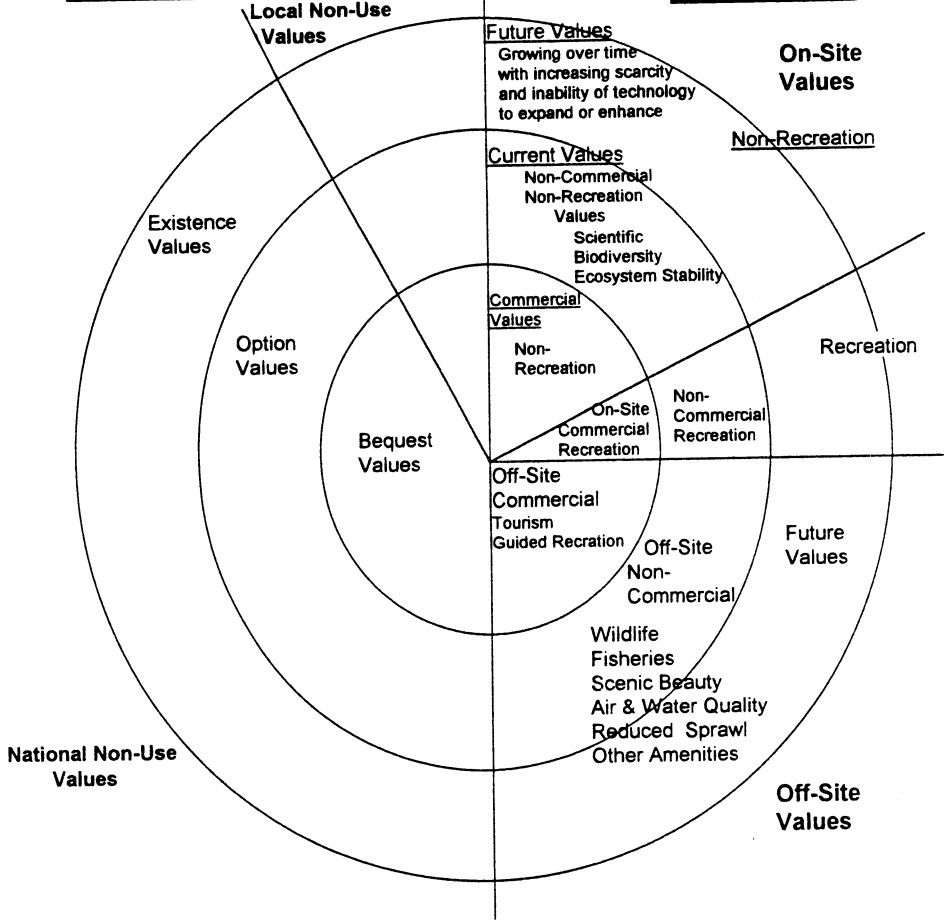
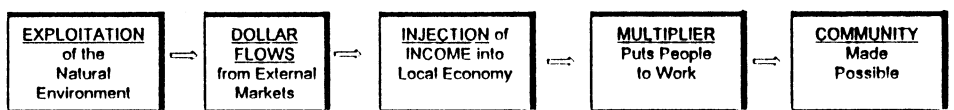


Figure 1. National park economic values



Natural environment as a warehouse of commercially exploitable resources

Natural Resource industries are what drive the whole economy.

Natural Resources are the only reliable source of income for the community.

Locally-oriented businesses are derivative or secondary.

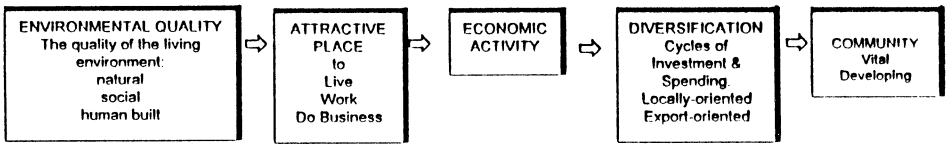
Without Natural Resources we wouldn't be living here.

Figure 2. The economic base view of the economic role of national parks

because there would be no income available to support them. See Figure 2.

Despite its popularity, the problem with this approach is that it assumes that economic forces operate only in selected, narrow ways: businesses locate at sites where natural resources are available and people follow these businesses, moving to where the jobs are. Although these assumptions may sound plausible, they are not. Stated slightly differently, they assume that people do not care where they live and businesses do not care where people choose to reside. But we know that people *do* care where they live and act on those preferences (taking costs into account). We also know that businesses pay close attention to where people choose to live because that is what determines the location of both the labor supply and markets for products.

When we recognize these aspects of economic reality, a quite different picture of the forces driving the local economy emerge. The ability of an area to attract and hold residents is central to its economic vitality. In that context, those locally specific qualities that make a particular area an attractive place to live, work, and do business are not just of aesthetic interest, they are part of the local area's economic base. High-quality living environments attract and hold people and businesses. That in turn triggers a series of dynamic changes that supports ongoing local economic vitality. The quality of the social and natural environments have profound economic implications. For that reason, I have labeled this set of economic forces the "environmental model" of the local economy (Power 1996a, 1996b). See Figure 3.



Natural environment
 Recreation Opportunities
 Cultural Richness
 Cost of Living
 Community/Neighborhood
 Security
 Quality of Public Services

Seeking to Live & Work
 Enhanced Labor Force
 high quality
 lower cost
 attracts business
 Retirement Income

On-going Economic
 Development

Figure 3. An environmental view of the economy

Natural and social environments *do* play an important role in the ongoing transformation of our non-metropolitan economies, but that role is *not* primarily through tourism. Tourism is just *one* of the economic links between natural and social amenities and the new economic vitality found through much of non-metropolitan America. Those amenities contribute to local economic well-being in three ways:

- Those amenities contribute directly to the well-being of existing local residents because they are directly enjoyed by them.
- Those amenities tend to attract new residents and businesses and the economic activity they stimulate.
- Those amenities can be the basis for a wide variety of “tourist” businesses. Mass “industrial-grade” tourism is just one potential. Adventure recreation, ecotourism, working ranches, cultural tourism, and so forth represent visitor-oriented businesses that may have quite different impacts.

Note that tourism is purposely put third in the list and the variety of different types of travel industry activities is emphasized. This is important if distorted economic analysis is going to be avoided.

Looking Beyond Commercial Recreation and Tourism

The impact of landscapes preserved in their natural state by national parks extends far beyond the physical boundaries of those areas

and far beyond the commercial recreation that may take place there. Natural landscapes tend to define the character and quality of the surrounding physical and social environment. This is clear when natural area preservation protects water quality that then supports off-site fisheries or protects habitat that then supports off-site wildlife populations. But the range of influence is greater than this. Protected natural areas preserve the landscape that influences everything from scenic vistas to recreational patterns to patterns of human settlement.

This can be put very directly: People care where they live. They care about the qualities of the natural and social environment that make up the living environment. They are willing to make sacrifices to obtain access to these natural amenities. High-quality natural environments draw people and businesses to areas even when economic opportunities are otherwise quite limited (Power 1996a, 1996b).

This is not an insupportable sweeping generalization. It is a fact that has had a dramatic impact on the pattern of settlement and economic activity in this country. If, for instance, one looks at the pattern of economic change in nonmetropolitan America over the last decade, one finds natural amenities playing a very positive role. During the 1980s, the only group of nonmetropolitan counties that had above-average population growth rates were “amenity” counties in which the nat-

ural and social environments supported both recreation and retirement development. During the 1990s, the fastest growth was also found in these amenity counties (Deavers 1989; Beale and Fuguitt 1990; Cook and Mizer 1994; Johnson and Beale 1995).

This assertion that the quality of the living environment is important in the economic development of a local area is neither new nor should it be controversial. Clearly the climate and desert environment of Arizona has been important in attracting and holding population. In fact, the use of the term "amenity" to capture the role played by local environmental qualities in economic development was first coined by an economist seeking to explain the rapid growth of desert Southern California in the 1950s (Ullmann 1954, 1955). As with Arizona, people were moving to where there was no obvious "industry" in the pursuit of particular environmental qualities, and then industry was following the population. The shift of our urban populations from center cities to suburbs also can only be explained in terms of the pursuit of higher quality living environment than urban centers were capable of providing. In fact, the distribution of attractive natural qualities across the landscape is a major determinant of the distribution of residential development across that landscape (Mueller-Wille 1990). The point is that people care where they live and make location decisions on the basis of those preferences for living envi-

ronments.

This is important to the future development of our nonmetropolitan areas. In the competition to attract both new residents and new businesses, the quality of the natural and social environment are going to be important. Landscape preservation such as that associated with the creation and protection of national parks, by granting protection to those landscapes that are most unique in a region, can be seen as an integral part of such an economic development strategy *not* because it attracts tourists but because it attracts new permanent residents and supportive economic activity. This view of the economic role of national parks allows us to move beyond a dangerously exploitative commercial tourism emphasis. It also allows us to begin to incorporate into the economic discussion the ways in which natural landscapes directly support our well-being by protecting the flow of environmental services that sustain and enrich our lives, making them satisfying, challenging, and inspirational. This type of economic analysis is far more appropriate to the purposes for which our national parks were created.

Of course, the amenity-driven economic development that is taking place within previously minimally developed natural landscapes is not necessarily a good thing for those natural landscapes. Increasing populations living adjacent to the national parks and wilderness areas directly add pressure on the very nat-

ural systems we are trying to protect. They do this in two ways. First, the intensity of use of the parks themselves may be greater among residents who were attracted by the high-quality natural environment protected by the park. Second, the new residences, commercial and public infrastructure supporting them, and the additional human activity tend to cut off the parks from the surrounding natural landscapes and increase the parks' "island" characteristics. These negative impacts of economic development around the parks should not be ignored. It should be noted, however, that *any* economic development in gateway communities and the surrounding area will have this impact, whether it is tied to park tourism or to permanent residents drawn by the existence of the park. In that sense this is a problem implicit in the NPS's "bragging" about the positive economic impact it has on the local community. To the extent that the park commits itself to supporting ongoing economic development in the region surrounding the park, it may ultimately be putting the park's natural integrity at risk.

Implications for Park Managers

National park managers, like almost all public officials, regularly face decisions that are cast in an "economics versus the environment" form. For park managers the dilemma is presented in a way that suggests that actions to protect the park will have a negative impact on the local

economy because those actions will constrain commercially related recreation opportunities. To the extent that the national parks have depicted their economic value in terms of the support the parks provide to local businesses, the national parks will have painted themselves into a corner from which it will be hard to extract themselves without compromising their preservation mission.

This is a fairly common dilemma for the national parks: Yellowstone with snowmobiles, Grand Canyon with scenic over-flights, Yosemite and Glacier with traffic management. If the national parks are going to protect themselves against these commercial pressures as they try to pursue their joint missions of protecting unique natural landscapes and allowing public access, the parks are going to have to be more sophisticated about how they describe the economic aspects of the values they create and preserve. For instance, to the extent that the national parks have articulated the economic role they play in protecting the quality of life and economic vitality within geographic areas far larger than the parks themselves and their gateway communities, the national parks will have reached out to a constituency far larger than the local chambers of commerce. That will provide an important counter-balance to the narrow commercial pressures which constantly demand unconstrained access. To the extent that the national parks include in their economic analysis the direct value of the visitor's

experience (not just the visitor's spending) and the non-use values enjoyed by all Americans, the economic analysis will help support preservation efforts rather than undermining them.

The National Park Service has employed the Money Generation Model in order to pursue political support from business interests for park operations. That economic approach, however, is so narrow that it

ultimately is quite dangerous to the agency's long-run mission. It is very important for the NPS to move well beyond this type of primitive, commercially oriented, economic analysis and employ instead the type of analysis that modern economics would recommend. That is the only way to try to safely harness economic analysis in the support of the Park Service's full mission.

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