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Measuring the Economic Impact of Park and Recreation Services

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Measuring the Economic Impact of Park and Recreation Services

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Executive Summary

Tourism depends on attractions. Rarely do people travel because they enjoy the car or airplane ride or because they want to stay in a particular hotel or dine at a restaurant in a different city. The desire to go to another place is stimulated by attractions. In most communities, primary attractions are sports tournaments, festivals, parks, and major recreation facilities operated by park and recreation departments. However, most stakeholders remain unaware of park and recreation departments' role in tourism.

Park and recreation departments frequently are viewed as relatively high-cost centers in cities' annual budgets because operational costs exceed revenues. However, this narrow perspective is incomplete because it fails to recognize that money invested in park and recreation department services does not belong to the city council, rather it belongs to the city's residents. The purpose of economic impact studies is to measure the economic return that residents (rather than the city council) receive on their investments. For example, a representative illustration in this monograph shows that residents in a city who invested $24 million in a new sports facility will get their money back on this investment in approximately 13 years from income they receive as a consequence of spending by visitors attracted to the community by that facility.

This monograph provides a hands-on guide for professionals so they can do economic impact studies that measure the economic return residents receive on park and recreation department investments. These studies are relatively simple to do, and they do not require hiring external consultants. Park and recreation department personnel can do these studies in house at nominal cost in time and resources. A one-page questionnaire used to collect the data is provided. Examples of how to effectively present the information to stakeholders are given.

The economic impact of visitor spending is estimated by the formula: number of visitors x average spending per visitor x multiplier. This formula indicates there are four steps involved: (1) define who qualifies as a visitor; (2) estimate the number of visitors attracted to the community by the park and recreation event or facility; (3) estimate the average level of spending of visitors in the local area; and (4) determine the ripple effects of this new money through the community by applying appropriate multipliers.

The monograph guides professionals through these stages. Economic impact studies are used widely in contexts such as economic development, tourism, housing development, and professional sports stadia. Unfortunately, there has been a growing tendency to adopt inappropriate procedures and assumptions in many of these studies to generate high economic impact numbers that "legitimize" a particular advocacy position. These failings are discussed in the monograph and direction on how to avoid them is presented.

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The numbers emerging from an economic impact study represent only the gross economic impact. However, community stakeholders are likely to be more concerned with net economic benefit, meaning that costs associated with the facility and event must be identified and deducted. The four types of costs and the nature and implications of each are described: event costs, infrastructure costs, displacement costs, and opportunity costs.

Finally, the monograph reports the results of more than 100 economic impact analyses undertaken by the author's research team in the past decade at sports tournaments, special events, recreation facilities, and park facilities. Patterns in these results that illustrate generalizable principles are described. The economic impact of events and facilities will differ widely because of differences in local contexts. Nevertheless, in communities where managers have no empirical data but are required by stakeholders to give estimates of visitors' expenditures and economic impact, the results of these case studies suggest parameters for providing "intelligent guesses."

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Chapter 1

Why Economic Impact Studies Are a Key to a Viable Future

This chapter explains the conceptual rationale for economic impact studies. An understanding of this is critical because it is the "shared ground" between professionals and policy makers that enables them to arrive at a mutual understanding of the core point. They then become partners on a common journey to see how the research evidence speaks to the issue. A conceptual understanding of the principles results in the scientific evidence being much more understandable and acceptable to elected officials.

The subsequent chapters are "hands on." They describe the fundamental principles of economic impact studies, provide a step-by-step guide for professionals on how to collect visitor expenditure information, discuss the use and abuse of multipliers, and consider economic costs. The final chapter offers a synopsis of results from completed economic impact studies, and it suggests generalizations of the likely magnitude of economic impact associated with various kinds of park and recreation facilities, events, and services.

The Rationale for Economic Impact Studies

When the park and recreation department in city A reported the financial consequences of hosting a national softball championship tournament, it reported a loss of $38,347. When the convention and visitors bureau, which was responsible for promoting tourism in that community, reported the consequences of hosting the same event, it reported an economic gain to the community of $3.7 million. It is obvious which of these two agencies was likely to be viewed most positively by elected officials and taxpayers.

Why did two agencies report such disparate data from the same event? The answer: they used different approaches for demonstrating accountability for their public funds.

Park and recreation agencies traditionally have provided *financial* reports, while the tradition in the tourism field has been to provide *economic* reports. The different reporting methods have resulted in the two types of agencies occupying very different positions in the minds of public officials. By using economic reports, many convention and visitor bureaus have persuaded elected officials and decision makers that they are central contributors to their communities' economic health. In contrast, park and recreation agencies generally have not been successful in creating a similar central position in decision makers' minds regarding the economic contribution of their services because they have used only financial reports. In a climate of fiscal conservatism, park and recreation agencies are mistakenly perceived to be "black hats" whose services have to be subsidized by tax funds and result in net economic losses to the community, while convention and visitor bureaus have established themselves as "white hats" because they bring new money into the community.

These perspectives are fallacious. To change the perspectives and to reposition park and recreation agencies more favorably, these agencies must emulate the methods used by tourism agencies and identify the economic impact that is attributable to the facilities and services they provide.

The conceptual reasoning for commissioning economic-impact studies is illustrated in **Exhibit 1-1**, p. 6. It shows that residents and visitors in a community "give" funds to the city council in the form of taxes. The city council uses a proportion of these funds to subsidize programs, special events, promotions, activities, or facilities that attract out-of-town visitors who spend money in the local community. This new money from outside the community creates income and jobs for residents, completing the virtuous cycle of economic development. Community residents, aided by visitors' bed and sales taxes, are responsible for providing the initial funds, and residents receive a return on their investment in the form of new jobs and more household income.

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Exhibit 1-1

The Conceptual Rationale For Undertaking Economic Impact Studies

Exhibit 1-1 shows that a proportion of the tax funds invested in a park and recreation agency's programs and facilities serves as seed money that leverages substantial economic gains for the community. If public sector resources are not used to financially underwrite the cost of constructing facilities or staging events, then the consequent economic benefits to the local community will not accrue. Private enterprises are unlikely to commit funds to organizing such events because none of those individual businesses is likely to capture a large enough proportion of the money spent by participants to obtain a satisfactory return on their investment.

The traditional financial balance sheet presented by park and recreation agencies assumes that the cycle shown in Exhibit 1-1 starts and ends with the city council, rather than with a community's residents. This leads to a narrow definition of economic impact because it includes only the taxes and revenues that accrue to local government from the event or facility. Such a narrow definition suggests that concern should be focused on income accruing to the council from lease fees, admission revenues, increased sales tax revenues, or the like. However, this approach is flawed conceptually because the money invested does not belong to the council; the money belongs to the city's residents. Although it is efficient for a resident's investment to be funneled through the council, the return that residents receive is what is important, not merely the proportion of the total return that filters back to the council. The purpose of economic impact studies is to measure the economic return to residents.

The difference between the financial and economic approaches is illustrated in **Exhibit 1-2**, p. 7. The park and recreation department's financial balance sheet shows a net loss of $38,347 from the tournament. However, if the agency used an economic balance sheet as tourism agencies do, then it would show a net return of $2.0 million, $3.69 million, or $1.12 million depending on whether economic impact was reported in terms of direct expenditures, sales impact, or impact on personal incomes. (These figures were calculated by taking the gross amounts shown and subtracting from them the $38,347 net cost to the city for hosting the event.)

The capital cost of the softball complex was approximately $12 million, which means that, if the personal income measurement of economic impact was used (the reasons for preferring this measurement are given in Chapter 4 which discusses multipliers), then the investment would pay for itself after approximately 10 similar tournaments. How many other investments is a jurisdiction likely to have that pay for themselves in three to four years (assuming three to four similar tournaments per year) and that continue to contribute $3 to $4 million to residents annually for the next 20 years?

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Exhibit 1-2

A Comparison of the Financial and Economic Returns to a City from an Amateur Softball Association Girls 18 & Under Class A National Softball Championship Tournament.

Context

1,810 players on 133 teams participated in the tournament. All were from out-of-town. Because it was an elimination tournament, the length of time the teams stayed in the community varied from 4 to 7 nights. 697 players' parents were interviewed.

Financial Data	$
Income: Entry fees $300 x 133	39,900
Gate Admission fees	74, 843
Concessions/Souvenirs % of gross	32,395
Hotel rebate	4,650
Social fee	5,683
Programs	1,440
Total	158,911
Tournament costs and staff time	197,258
Net loss	(38,347)

Economic Data	
Total expenditures in the local area by the 1,810 players and their family/friends	2,039,000
Economic impact on sales	3,731,000
Economic impact on income	1,162,000

Return on Investment

For each dollar invested, residents' income increased by $30.30 (1,162,000 /38,347).
Facility cost $12 million; payback period to residents is approximately 10 tournaments of this size.

Agencies that present these kinds of data in the form of an economic balance sheet to their stakeholders, demonstrating their contribution to economic development, are likely to reposition themselves favorably in the minds of legislators and the general public. Indeed, in the formative years of this field, the economic impact of parks on local communities was central to justifying and positioning them as facilities in which governments should invest tax funds.

The city of Medford, Oregon, adopted this approach for sports tournaments held at its 132-acre U.S. Cellular Community Park that opened in May 2008. **Exhibit 1-3** is a table showing the cumulative economic impact of the facility since it opened. This is especially useful because, following the logic described in exhibit 1-2, it makes transparent and explicit the length of the payback period for the original investment in the sports facilities. The capital cost of the park was $24 million. In its first full year of operation, residents received $1.88 million in income. This is the return on their investment. If this annual return remains consistent, then the payback period is approximately 13 years. The economic balance sheet for 2009 is shown in **Exhibit 1-4**, p. 8.

Exhibit 1-3

Annual USCCP Economic Impact Analysis

Year	Tourneys	Teams	Visitor Spending	Total Spending	Personal Income	Estimated Sales	Jobs Created
2008	26	388	$1,389,706	$1,674,419	$647,990	$3,030,698	17.76
2009	37	707	$2,896,322	$3,590,541	$1,882,609	$6,498,749	79.40
Totals	63	1,095	$4,286,028	$5,264,960	$2,530,599	$9,529,447	97.16

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Exhibit 1-4

2009 U.S. Cellular Community Park Economic Impact Report

Date	Description	Event Name	Teams	Games	Days	# Local	# Visiting	Local Spending	Visitor Spending	Visitor Lodging	Total Spending	Sales
Jan. 24-25	Adult Softball	USSSA Qualifier	8	20	2	6	2	$ 18,396	$ 5,432	$ 4,032	$ 27,860	$ 50,426
Feb. 21-22	Adult Softball	USSSA Qualifier	8	20	2	4	4	$ 12,264	$ 10,864	$ 8,064	$ 31,192	$ 56,457
Feb. 25-28	Fastpitch	Southern Oregon University Invitational	7	21	3	1	6	$ 4,155	$ 19,728	$ 12,840	$ 36,723	$ 66,468
March	Fastpitch	High school softball games		3			2	$ 2,500	$ 3,300	$ -	$ 5,800	$ 10,498
March 7-8	Youth Baseball	Southern Oregon Classic	10	20	2	6	4	$ 4,302	$ 10,544	$ 8,100	$ 22,946	$ 41,532
March 21-22	Adult Softball	USSSA National Invitational Tournament	24	61	2	10	14	$ 30,660	$ 38,024	$ 28,224	$ 96,908	$ 175,403
March 23-24	Fastpitch	North Medford Invitational	31	65	2	6	25	$ 5,109	$ 155,625	$ 51,220	$ 212,954	$ 385,446
April	Fastpitch	High school softball games		13			8	$ 13,166	$ 14,300	$ -	$ 27,466	$ 49,713
April 4-5	Youth Baseball	April Fools Showdown	16	31	2	7	9	$ 5,016	$ 24,525	$ 18,144	$ 47,685	$ 86,309
April 11-12	Adult Softball	USSSA Qualifier	14	33	2	10	4	$ 18,640	$ 10,864	$ 8,064	$ 37,568	$ 67,998
April 18-19	Adult Softball	Mixed Classic	4	5	1	4	0	$ 2,540	$ -	$ -	$ 2,540	$ 4,597
April 25-26	Adult Softball	Bear Creek Lock & Safe Tournament	28	84	2	20	8	$ 61,320	$ 21,728	$ 16,128	$ 99,176	$ 179,508
May	Fastpitch	High school softball games		18			10	$ 17,410	$ 16,300	$ -	$ 33,710	$ 61,015
May	Adult Soccer	Fuego professional soccer games		2			2	$ 7,500	$ 3,050	$ -	$ 10,550	$ 19,095
May 9-10	Adult Softball	Senior Travel League	20	100	4	4	16	$ 4,805	$ 75,200	$ 32,256	$ 112,261	$ 203,192
May 16-17	Various	USCCP Phase 3 Grand Opening Events	62	35	2	53	9	$ 106,265	$ 28,845	$ -	$ 135,110	$ 244,549
May 16-17	Adult Softball	Tune-Up Tournament	20	62	2	17	3	$ 30,600	$ 7,948	$ 5,848	$ 44,396	$ 80,356
May 23-25	Youth Soccer	Rogue Valley Cup	54	70	3	19	35	$ 39,550	$ 234,500	$ 99,655	$ 373,705	$ 676,406
May 23-25	Youth Baseball	Memorial Day Showcase	37	103	3	9	28	$ 9,675	$ 170,184	$ 79,724	$ 259,583	$ 469,845
June	Adult Soccer	Fuego professional soccer games		2			2	$ 7,500	$ 3,050	$ -	$ 10,550	$ 19,095
June 6-7	Adult Soccer	ASA State Qualifier	10	28	2	10	0	$ 6,350	$ -	$ -	$ 6,350	$ 11,493
June 13-14	Youth Baseball	Summer Sizzler	31	60	2	12	19	$ 8,660	$ 96,988	$ 38,304	$ 143,952	$ 260,553
June 27-28	Adult Softball	USSSA Qualifier	13	39	2	10	3	$ 8,140	$ 8,148	$ 6,048	$ 22,336	$ 40,428
July	Adult Soccer	Fuego professional soccer games		2			2	$ 7,500	$ 3,500	$ -	$ 11,000	$ 19,910
July 3-5	Youth Baseball	July 4th Showdown	18	72	3	5	11	$ 5,375	$ 96,858	$ 42,176	$ 144,409	$ 261,380
July 10-12	Fastpitch	ASA U16 Girls State Championship	16	64	2	2	14	$ 4,322	$ 95,092	$ 38,224	$ 137,638	$ 249,124
July 18-19	Adult Softball	City League Tournament of Champions	13	32	2	13	0	$ 8,255	$ -	$ -	$ 8,255	$ 14,941
July 23-26	Youth Baseball	Cal Ripken Regional Tournament	16	64	3	2	14	$ 4,150	$ 149,540	$ 58,448	$ 212,138	$ 383,969
Aug. 1-2	Youth Baseball	West Coast Nationals	15	39	3	5	10	$ 5,025	$ 69,470	$ 45,240	$ 119,735	$ 216,720
Aug. 8-9	Adult Softball	USSSA State Tournament	13	29	2	7	6	$ 21,175	$ 16,296	$ 12,096	$ 49,567	$ 89,716
Aug. 22-23	Adult Softball	Hot August Hits	14	32	2	11	3	$ 25,875	$ 8,148	$ 6,048	$ 40,071	$ 72,528
Aug. 29-30	Youth Baseball	Hot August Hits	20	33	2	10	10	$ 30,250	$ 27,160	$ 20,160	$ 77,570	$ 140,293
Sept	Youth Soccer	High school soccer games		7			7	$ 8,166	$ 12,512	$ 1,635	$ 22,313	$ 40,386
Sept	Football	High school football games		1			1	$ 500	$ 1,100	$ -	$ 1,600	$ 2,896
Sept	Youth Soccer	Rogue Valley Soccer Club competitive games		4			4	$ 4,665	$ 11,360	$ 4,500	$ 20,525	$ 37,150
Sept. 4	Youth Soccer	Skyline Conference Jamboree	24	36	1	9	15	$ 2,000	$ 21,750	$ -	$ 23,750	$ 42,987
Sept. 5	Youth Soccer	Southwest Conference Jamboree	8	8	1	8	0	$ 1,500	$ -	$ -	$ 1,500	$ 2,715
Sept. 12-13	Adult Softball	USSSA World "E" Tournament	13	28	2	6	7	$ 5,358	$ 21,091	$ 14,112	$ 40,561	$ 73,415
Sept. 17-20	Adult Softball	Rogue Valley Senior Softball Fall Classic	44	110	4	6	38	$ 22,146	$ 231,040	$ 72,200	$ 325,386	$ 588,948
Sept. 26-27	Youth Baseball	Fall Brawl Tournament	6	9	2	4	2	$ 10,808	$ 5,680	$ 2,640	$ 19,128	$ 34,621
Oct.	Youth Soccer	High school soccer games		20			7	$ 23,331	$ 12,512	$ -	$ 35,843	$ 64,875
Oct.	Football	High school football games		5			3	$ 2,500	$ 3,300	$ -	$ 5,800	$ 10,498
Oct.	Youth Soccer	Rogue Valley Soccer Club competitive games		7			7	$ 8,163	$ 19,880	$ 7,875	$ 35,918	$ 65,011
Oct. 10-11	Fastpitch	ASA Fall Showcase	13	52	2	5	8	$ 11,050	$ 21,728	$ 16,128	$ 48,906	$ 88,519
Oct. 17-18	Youth Baseball	City of Medford Tournament	10	14	2	5	5	$ 8,190	$ 13,580	$ 10,080	$ 31,850	$ 57,648
Oct. 31-Nov. 1	Adult Softball	USSSA Halloween Scream	11	36	2	8	3	$ 12,650	$ 12,805	$ 6,048	$ 31,503	$ 57,020
Nov.	Youth Soccer	High school soccer games		6			6	$ 6,990	$ 10,725	$ 6,540	$ 24,255	$ 43,901
Nov.	Football	High school football games		1			1	$ 500	$ 1,100	$ -	$ 1,600	$ 2,896
Nov.	Youth Soccer	Rogue Valley Soccer Club competitive games		7			7	$ 8,163	$ 19,880	$ 7,875	$ 35,918	$ 65,011
Nov. 7-8	Adult Softball	USSSA Fall Championships	16	38	2	6	10	$ 9,487	$ 30,130	$ 20,160	$ 59,777	$ 108,196
Nov. 14-15	Youth Baseball	Turkey Bash	4	7	2	2	2	$ 3,276	$ 5,432	$ 4,032	$ 12,740	$ 23,059
Nov. 21-22	Youth Soccer	Fred Meyer President's Cup	36	27	2	4	32	$ 8,326	$ 141,504	$ 60,134	$ 209,964	$ 380,034
TOTALS			**707**	**1685**	**81**	**326**	**448**	**$ 694,219**	**$ 2,023,320**	**$ 873,002**	**$ 3,590,541**	**$ 6,498,749**
										$ 2,896,322		

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The Central Role of Economic Impact in the Formative Era of Park Development

In 1864, the federal government gave a grant to the state of California for it to acquire and manage Yosemite Valley and the nearby Mariposa Grove of big trees as a park for the public's "use, resort, and recreation." The state commissioned Frederick Law Olmsted to advise on how it should proceed.

The extracts from his report to the state of California in **Exhibit 1-5**, show that Olmsted addressed the potential economic impact of Yosemite by drawing on his observations from traveling in Switzerland.

Exhibit 1-5

Extracts from Fredrick Law Olmsted's *Yosemite and the Mariposa Grove: A Preliminary Report, 1865*

There is an obvious pecuniary advantage which comes to a commonwealth from the fact that it possesses objects that are attractive to travelers….To illustrate this it is simply necessary to refer to certain cantons of the Republic of Switzerland, a commonwealth of the most industrious and frugal people in Europe. The results of all the ingenuity and labor of this people applied to the resources of wealth which they hold in common with the people of other lands has become of insignificant value compared with that which they derive from the price which travelers gladly pay for being allowed to share with them the enjoyment of the natural scenery of their mountains. These travelers alone have caused hundreds of the best inns in the world to be established and maintained among them, have given the farmers their best and almost the only market they have for their surplus products, have spread a network of rail roads and superb carriage roads, steamboat routes and telegraphic lines over the country, have contributed directly and indirectly for many years the larger part of the state revenues, and all this without the exportation or abstraction from the country of anything of the slightest value to the people (pp. 9-10).

...When it shall have become more accessible the Yosemite will prove an attraction of a similar character and a similar source of wealth to the whole community, not only of California but of the United States, there can be no doubt. It is a significant fact that visitors have already come from Europe expressly to see it, and that a member of the Alpine Club of London having seen it in summer was not content with a single visit but returned again and spent several months in it during the inclement season of the year for the express purpose of enjoying its Winter aspect. Other foreigners and visitors from the Atlantic States have done the same.

The first class of consideration referred to them as likely to have influenced the action of Congress is that of the direct pecuniary advantage to the commonwealth which under proper administration will grow out of the possession of the Yosemite, advantages which, as will hereafter be shown, might easily be lost or greatly restricted without such action (p.11).

…It is but sixteen years since the Yosemite was first seen by a white man. Several visitors have since made a journey of thousand miles at large cost to see it, and not-withstanding the difficulties which now interpose, hundreds resort to it annually. Before many years, if proper facilities are offered, these hundreds will become thousands and in a century the whole number of visitors will be counted by millions.

The report is remarkably prescient in its vision, noting that while "hundreds" currently visited Yosemite, if it retained its integrity as a public park that number would increase to "millions" in the future (Olmsted, 1865).

Recognition of the economic benefits stemming from parks was crucial in the establishment of other early national parks. Indeed, a prominent historian concluded: "The history of the early national parks era suggests that a practical interest in recreational tourism in America's grand scenic areas triggered the park movement and perpetuated it" (Sellers, 1997, p. 26). The Northern Pacific Railroad exerted a central

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influence on the establishment of Yellowstone as a park in 1871 through its aggressive lobbying. In addition to the Northern Pacific, the Southern Pacific, and Great Northern Railroad lobbied strongly for national parks: "Like Yellowstone, parks such as Sequoia, Yosemite, Mount Rainer, and Glacier were to a large degree the result of the railroads[7] political pressure" (Sellers, 1997, p. 12.)

The railroads recognized that because they controlled access into these parks for visitors, they had a monopoly, so the parks effectively became an appendage of the railroads. By preventing private ownership of these spectacular scenic areas, they were preserved and the federal government absorbed the costs of managing them. The president of the Great Northern Railroad stated, "Every passenger to the national parks represents practically a net earning" (Foresta, 1984, p. 24).

The first general superintendent and landscape designer for the national parks, Mark Daniels, recognized the complementarity of the parks and tourism fields in 1915 when he commented that the parks

> "cannot get a sufficient appropriation at present from Congress to develop…plans and put them on the ground as they should be, therefore we are working for an increase in attendance which will give us a justification for a demand on Congress to increase the appropriations that are necessary to enable us to complete these things." Daniels' comments suggested a kind of perpetual motion that would become a significant aspect of national park management, where tourism and development would sustain and energize each other through their interdependence. (Sellers, 1997, p. 21)

When Stephen Mather became the first director of the National Park Service, he cultivated public and political support by emphasizing tourism. Mather recognized that emphasizing economic impact from visitors was crucial in overcoming the objections from other interests who argued for these lands to be economically exploited for timber, minerals, and agriculture:

> Mather pointed out to businessmen the great profits to be made in expanding facilities in national park concessions. He formed close working relationships with western tourism organizations and with western railroads. At the same time, he coordinated the publicity campaigns of private industry with those of the National Park Service. He even approved a tire company's billboard advertising, which linked the beauties of Yellowstone with virtues of their tires… Seventeen western railroads contributed to the publication and wide distribution of the National Parks Portfolio, a glossy publicity portfolio that Mather sponsored and promoted. The western tourist industry, largely through their National Park Highway Association, worked with the Park Service to improve access to the parks, mostly by lobbying for the construction and upgrading of roads connecting the parks to major highways. (Conrad, 1997, p. 24)

In his address to the first National Conference on State Parks, which he was responsible for convening in 1921, Mather emphasized the importance of "development of motor tourist travel" when championing state parks. A year later, he proposed a goal of establishing a state park every 100 miles from coast to coast in order to stimulate tourism (Conrad, 1997).

Support for state parks in their formative years frequently was predicated on their economic impact on the state and on proximate communities. This sentiment was captured by the widely reported remark from a discussion of parks in a southern state: "Every tourist is worth a bale of cotton, and he is twice as easy to pick."

In Texas, Governor Pat Neff and David E. Colp, the long-time first chairman of the Texas State Parks Board (1923-1935), successfully encouraged local communities to acquire land and donate it to the state for a state park. The main criterion was that the land had to be close to a main state highway to ensure it would encourage tourism in the state, which in turn, would stimulate the economies of local communities that donated the land. In Missouri, Governor Arthur Hyde envisioned a chain of parks that would attract tourists to drive Missouri's new highway system.

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The role of economic impact in justifying investments in public parks and recreation in the field's formative years was central. It has remained pervasive throughout the intervening decades to contemporary times. For example, the economic impact of parks on local economies was vividly demonstrated in the shutdown of the federal government at the end of 1995 that was brought about by a budget impasse between Congress and the President. One consequence of this was a 26-day closure of all national parks. The negative impact on the economies of gateway communities to the parks was acute, and the outcry from them was arguably more influential than any other consequence in hastening a resolution of the budget stalemate.

In the last decade at the local level, economic impact has been the driving force behind what is sometimes termed "an arms race" in the development of youth athletic complexes. There has been a shift from viewing these facilities as amenities to viewing them as money-generating tourism magnets. Consequently, many cities have invested $10 to $30 million on such complexes. The data in Exhibit 1-2 and Exhibit 1-4 illustrate the potential economic return.

The Central Role of Economics in Launching Public Recreation

The initial rationale underlying the investment of public funds into municipal recreation programs and facilities that proliferated in the 1920s was a conviction that recreation reduced juvenile delinquency. Thus in 1912, the president of the Juvenile Protection Association observed, "Recreation is the antitoxin of delinquency and the sooner it is administered the milder will be the disease and the better it will be for all the children" (Crompton and Witt, 1999). The link between delinquency and economics was widely recognized. In 1925, it was expressed in these terms:

> There were 59,000 murders in the United States in a recent seven-year period. Three billion dollars represents our loss from stealing alone. It is said that $500 million is invested in our prisons and that their annual costs of maintenance is $200 million; also that our total bill for dealing with crime is close to $200 million. It costs a state around $600 per year to care for one juvenile in a reformatory; on the other hand, one city recreation department reports that it can and does provide recreation for seven and one-third cents per person per year. (Crompton and Witt, 1999)

Similarly, *The New York Times* on March 9, 1930, editorialized:

> The cost of maintaining a juvenile delinquent upon whom the prison "shades" of a reformatory have closed is $439, whereas that amount provides a year's municipal recreation—play under leadership—for scores of children. (Crompton and Witt, 1999)

Scores of articles were written on this theme by such prestigious newspapers as *The New York Times, Chicago Tribune, San Francisco Chronicle,* and *Christian Science Monitor.* Extracts from these news stories have been published in Crompton and Witt (1999).

Contemporary researchers will quickly point out that some of the data cited in these articles are suspect, amounting to little more than testimonials. Nevertheless, there was widespread conviction of the legitimacy of the mantra, "pay now or pay later," and this was the initial justification in many communities for investing tax dollars into public recreation.

Positioning Park and Recreation Agencies as Engines of Tourism

In many communities, tourism has successfully positioned itself as a substantial economic engine, a remarkable accomplishment for a relatively recent phenomenon. The conceptualization of tourism as an integrated "industry" is a post 1970 phenomenon. It lacks the long and distinguished pedigree of the park and recreation field. Nevertheless, in the eyes of elected officials in many communities, it has surpassed this field in importance. **Exhibit 1-6**, p. 12, describes how the tourism field achieved this position.

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Exhibit 1-6

Positioning Tourism as an Economic Engine

Three major strategies have been used to position tourism in the public consciousness as an economic engine. First, it positioned itself as an "industry," even though tourism is not recognized as an official industry in the Census Bureau's North American Industry Classification System (NAICS). The Classification recognizes hotel, restaurant, airline, automobile, shipping, retail, and advertising industries, along with many others that are involved in meeting the needs and desires of various types of travelers, but it does not include tourism as an industry. The inappropriateness of using the term "tourism industry" has been explained in the following terms:

> Although it is common to hear or read references to the "tourism industry," such a phrase is problematic because tourism is not an industry in the conventional sense. It is not an industry because its components (individual businesses) do not provide a common product or service and they do not use the same fundamental technology. (Smith and Wilton, 1997)

The tourism "industry" is a generic umbrella term that advocates derive by aggregating the outputs from an arbitrary combination of dozens of recognized industries. From an economist's perspective, treating tourism as a distinctive industry causes double-counting, because the outputs of those businesses that advocates subsume under the tourism industry are already officially allocated to different industries. Such "industry" data are contrived and meaningless.

The obvious advantage of this strategy to tourism advocates is that when dozens of recognized NAICS industry classes are aggregated to create the artifact of a tourism industry, that artifact's associated numbers in terms of jobs, wages, economic activity and so forth are correspondingly large. In the public consciousness this equates to a high level of importance in the economy. It enables the perceived importance of "tourism" to leapfrog over many other community industries which accurately represent themselves and do not aggregate to create artifacts.

The tourism "industry's" second positioning strategy was to expand its reach. Scientific research in tourism essentially began in the 1970s. In 1974, Erik Cohen, perhaps the most respected researcher in the tourism field in the 1970s and 1980s, developed a definition that became widely accepted: "A tourist is a voluntary temporary traveler, travelling in the expectation of pleasure from the novelty and change experienced on a relatively long and non-recurrent round-trip" (Cohen, 1974, p.533). He emphasized, "The tourist is a traveler, the purpose of whose trip is *non-instrumental*; that is, his trip is not a means to another goal (unlike a business trip) but an end in itself" (Cohen, 1974, p. 532).

At the same time he observed, "Tourism is a fuzzy concept—the boundaries between the universe of tourist and non-tourist roles are vague and there exist many intermediate categories. Such fuzziness has caused considerable conceptual confusion and empirical distortion" (Cohen, 1974, p. 547). This observation in 1974 remains appropriate 35 years later.

The popular contemporary definition of tourism as expressed in most of the major dictionaries confines it to pleasure travel. For example, Webster's definition is, "The activity or practice of touring especially for pleasure" (*Webster's Encyclopedia Unabridged Dictionary of the English Language*, 1996). However, those in the tourism "industry" have successfully expanded the definition beyond pleasure travel (that is, the shaded part of Exhibit 1-7). This effort started in 1963 at the U.N. Conference on International Travel and Tourism meeting in Rome which proposed the following definition for international tourists:

> ….temporary visitors staying at least 24 hours in the country visited and the purpose of whose journey can be classified under one of the following headings:
>
> (i) Leisure (recreation, holiday, health, study, religion, sport)
>
> (ii) business, family, mission, meeting (Cohen, 1974).

Subsequently, this comprehensive definition was adapted by local tourism agencies which simply replaced "country" with community.

The rationale for extending the definition of a tourist was to enable tourism advocates to embrace more visitors and so expand the "industry's" economic value. The result of this expanded definition is enhanced stature and visibility of those in a community who are associated with tourism, enabling them to position the "industry" more favorably in the psyche of both the general public and legislators.

Tourism's third repositioning strategy has been to use accountability benchmarks that attribute all the positive economic effects from tourism to the effectiveness of the tourism agency. Hence, at the end of a financial year, a tourism agency typically reports to the city council that the (say) $500,000 which was invested in its operation (usually from a bed tax) was responsible for an economic impact of (say) $30 million which the jurisdiction received from tourism. The agency director is likely to conclude her presentation to the council by stating, "For every $1 you invest in us, the community received $60 in return." Such claims are rarely challenged and the apparent high return on the investment is widely accepted by legislators, the media, and the general public.

There are three conceptual fallacies with such benchmarks. First, a substantial proportion of the claimed tourism economic impact is likely to be attributable to business travel and to visiting friends and relatives, even though a tourism agency is unlikely to have made any meaningful contribution to increasing visitation in those two segments. Second, as Exhibit 1-8 shows, tourism is dependent on attractions. Without them, there are no tourists! Hence, the economic impact from tourism is primarily attributable to the presence of attractions. Exhibit 1-8 recognizes the importance of promotion and information dissemination in the tourism system, but it is an auxiliary support role, not a primary role. Third, tourism research consistently reports that the dominant source of information for tourists is word of mouth. The materials disseminated by tourism agencies contribute to tourists' information assimilation but, again, theirs is not a primary role.

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Many regard tourism as a commercial phenomenon concerned with economic development that is rooted in the private domain. In contrast, parks and recreation typically is viewed as being concerned with social and resource issues and being rooted in the public domain. However, this conceptualization of parks and recreation is truncated and myopic. **Exhibit 1-7**, confirms the field's social service role, but it also shows its role in attracting visitors to a community, which is, the imperative that was so critical in justifying facilities in the field's formative years.

Exhibit 1-7

Segments of Travel and Their Inter-relationship with Parks and Recreation

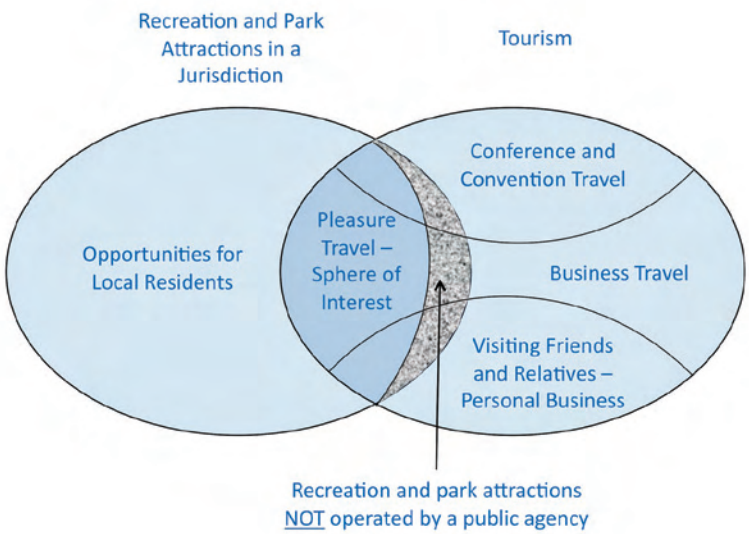

Exhibit 1-7 shows that park and recreation agencies provide opportunities for both local residents and visitors. It recognizes that four major segments are widely recognized in the tourism field. One of them, pleasure travel, is primarily stimulated by opportunities provided by park and recreation agencies.

The complementary role of the two agencies is highlighted in **Exhibit 1-8**, p. 14, which shows a simplified model of a tourism system. It indicates that visitors use some mode of transportation (e.g., automobile or airplane) to leave their homes and travel to attractions, which are supported by various kinds of services (e.g., hotels/motels, restaurants, retailing). The attractions and support services provide information and promote their offerings to target groups whom they have identified as potential visitors.

This tourism system is activated by attractions. Only in rare cases do people leave their home milieu and travel some distance by automobile, airplane, or ship because they want to stay in a particular hotel or dine at a particular restaurant in a different locale. The desire to go to a destination on a pleasure trip is stimulated by attractions.

A taxonomy of attractions that is likely to activate pleasure travel is shown in **Exhibit 1-9**, p. 14. A perusal of this list of tourist attractions leads to the conclusion that almost all of them are developed, and in most cases operated, by the public sector or by nonprofit organizations. A large proportion of them are likely to be the responsibility of park and recreation agencies. This leads to the conclusion that **in most communities, pleasure travel is a business that the public and non-profit sectors drive, and park and recreation agencies are central to that business**. In most communities, park and recreation agencies are the engines of tourism.

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Exhibit 1-8

A Simplified Model of a Tourism System

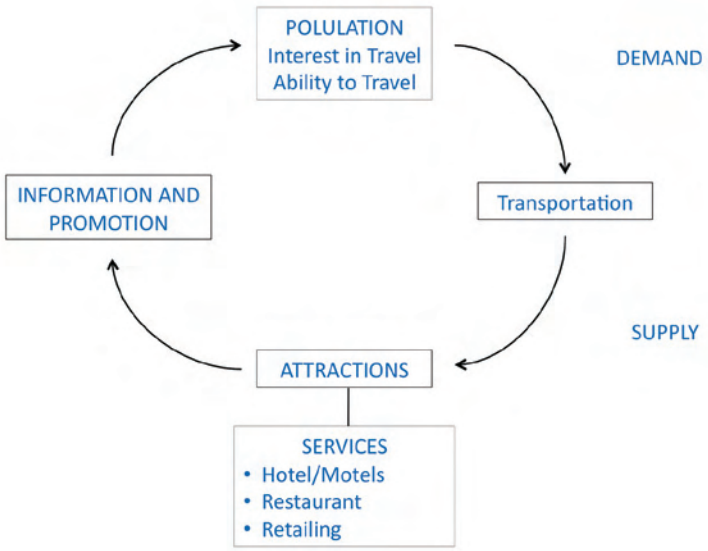

Exhibit 1-9

A Taxonomy of Tourist Attractions

Arts	Theaters, art galleries, museums, performing groups, music concerts
Heritage Places	Ethnic cultural places, shrines/churches, historical sites and structures, educational institutions, industry factory tours
Parks	National, state, regional, local, beaches, theme parks
Recreation	Events and festivals, aquatic and coastal areas, outdoor recreations (e.g., camping, fishing, hunting), sports (e.g., golf, tennis skiing, sailing, softball), fitness and wellness center
Arenas	College sports, professional franchises, concerts, exhibitions
Other	Gambling places, cruise ships

This central role in tourism is not part of the position that most park and recreation agencies occupy in stakeholders' minds. Indeed, it is the antithesis of the general public's and tourism field's conventional wisdom. Most people are under the misconception that tourism is the almost exclusive preserve of the commercial sector. The commercial sector offers essential transportation; support services, such as accommodations, restaurants, and retailing; and information and promotion dissemination. However, in most communities the public sector is the primary provider of the attractions that activate pleasure travel.

The popular perception of tourist attractions is dominated by glamorous, large-scale, commercial developments such as Disney World, Disneyland, other theme parks, cruise ships, casinos, Las Vegas,

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and all-inclusive resort hotels. However, in terms of annual visitor days, such attractions account for only a small percentage of pleasure travel in the United States. Disney World and Disneyland together attract more than 31 million visitors per year, and the top 20 theme parks in the United States attract almost 120 million visitors (Themed Entertainment Association and Economic Research Associates, 2009). However, these attendances pale alongside the annual attendances at federal park sites that include Corps of Engineer (372 million), National Park Service (274 million), U.S. Forest Service (176 million), Bureau of Land Management (55 million), and U.S. Fish and Wildlife (35 million). In addition, the annual number of visitors to state parks is approximately 730 million, and this number, in turn, is minuscule when compared with the number of visitors to regional, county, and local parks and beaches.

Very few communities have large-scale commercial tourist attractions. Despite their absence, most jurisdictions recognize the importance of tourism to economic development and establish convention and visitor bureaus or similar agencies, whose primary mission is to attract visitors. They invariably rely on the park and recreation agency to create attractions that will persuade visitors to come to the community and spend money there. Indeed, park and recreation agencies are one of the few "businesses" in a community that is likely to bring in "new money." Most businesses, especially small businesses, simply recycle existing money.

The extent to which the parks and recreation agency constitutes the engine of tourism in any particular community can be ascertained by listing all the programs, festivals, tournaments, competitions, and facilities operated or cosponsored by the park and recreation department that attract pleasure travelers to the community from out of town. Similar lists should be developed for nonprofit organizations and for commercial attractions. In most communities, the commercial attractions list will be the shortest. In such cases, this exercise will show the relative insignificance of commercial enterprises in attracting visitors to the community when compared with the public sector attractions. The dissemination of such comparative lists may make an effective contribution to repositioning parks and recreation as being central to tourism in the minds of stakeholders.

Clearly, the roles of park and recreation and tourism agencies are interdependent. Special events, tournaments, and facilities are usually the responsibility of park and recreation agencies. This makes their role in tourism central, since without any attraction "products" there is no tourism. Elected officials are reluctant to allocate funds to park and recreation agencies for promotion. In most cases there is no tradition of this and typically funding for that agency comes out of property taxes and the general fund, so such budget allocations are frequently regarded as costs rather than investments.

For the most part, the role of tourism agencies is limited to promoting attractions, not producing them. In contrast to park and recreation agencies, they tend to be funded from a dedicated bed tax and their *raison d'être* is to invest their resources into promotion and information dissemination.

Tourism agencies have effectively positioned themselves as being central to communities' economic development. Their success appears to have usurped awareness of the economic contributions of parks and recreation that were traditionally ensconced in the public consciousness. The economic gains accruing to a community from the overlapping area in Exhibit 1-7 are invariably credited to the tourism agency, while the costs associated with providing the "product" are attributed to the park and recreation agency.

Those who work in tourism focus on the economic potential of events and facilities for attracting new money into a community from visitors. This resonates with elected officials who often are more impressed with economic data than with the more nebulous arguments relating to quality of life. Further, tourism is funded from a dedicated bed tax, rather than out of the general fund. These factors have resulted in a tendency for tourism budgets to grow, while those in parks and recreation often have fared less well.

Using Economic Impact Studies to Reposition the Field

The provision of park and recreation opportunities for their own sake lacks political clout. Many taxpayers are not frequent users of these opportunities and, thus, have difficulty understanding why they should support them. Elected officials and taxpayers typically regard park and recreation services as

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discretionary: "they are nice to have if we can afford them after we have budgeted for the core services." The field's future viability depends on its ability to reposition itself as being central to alleviating a community's problems and addressing issues that are of primary concern in the community.

In most communities, economic development is a political priority because it is viewed as a means of enlarging the tax base. The enlargement provides more tax revenues that governments can use either to improve the community's infrastructure, facilities, and services, or to reduce the level of taxes paid by existing residents. It is seen also as a source of jobs and income that enable residents to improve their quality of life.

Park and recreation services are usually viewed as a relatively high-cost item in a city's annual budget because the financial balance sheet shows that operational costs are much greater than the revenues that accrue. Exhibit 1-1 provided the rationale for developing an economic balance sheet to supplement the financial balance sheet. This captures all revenues brought into a jurisdiction by out-of-town visitors, rather than only the small proportion of those revenues that accrue directly to the city.

The intent of economic impact studies is to position parks and recreation in the minds of taxpayers and elected officials as being a key element in a community's economy. The potential effectiveness of this strategy is illustrated in **Exhibit 1-10**, p. 17 & 18, and **Exhibit 1-11**, p. 18.

The conceptual rationale for economic impact studies is sound and their function in highlighting the field's contributions to community residents' prosperity is legitimate. However, this legitimacy is predicated on the studies being undertaken with integrity. Because the motivation undergirding them is to demonstrate the field's economic case, the temptation to engage in mischievous practices designed to enhance and exaggerate that case is substantial. In some cases, the practices are the result of ignorance and are inadvertent, but on occasions they are deliberate and enacted with intent to mislead and distort.

Subsequent chapters provide information that is intended to equip park and recreation managers to undertake economic impact studies that are done with integrity and to recognize the fallacies in mischievous studies undertaken by others.

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Exhibit 1-10

Using Economic Impact Studies to Reposition State Parks as Economic Engines in Texas

The Texas state legislature meets from January through May every second year. When it assembled in January 2003, it was confronted with a projected budget deficit of $10 billion for the next biennium. Given that the discretionary components of the budget totaled $60 billion and that the political climate would not tolerate any tax increase, it was obvious that major cuts in state-agency budgets were inevitable.

State parks' supporters were aware in early 2002 that such a scenario was probable. To minimize the adverse impact, a nonprofit lobbying organization, the Texas Coalition for Conservation, commissioned economic impact studies to be undertaken at 37 state parks. Parks were selected that were located in the districts of key legislators. The intent was to demonstrate that state parks were economic engines, especially in rural areas, because they attracted visitors from outside the community who spent money in the local community.

Almost all of the state's 100 or so parks had a net operating loss. Hence, the temptation was strong for legislators either to close some of them or to reduce their opening hours and services substantially. The purpose of the economic impact studies was to demonstrate that looking at net operating deficits was a myopic perspective, and the most important data were those showing the impact of the parks on the local economy.

For example, Mustang Island State Park's net operating loss was more than $52,000. However, the economic impact studies revealed that visitors from outside the county in which it was located spent $1.51 million in the county which created $2.58 million in total sales, over $1.4 million in income for county residents and 47 jobs. Those were substantial contributions to the economy of the relatively small county.

It was pointed out to the local legislators that the annual cost to the state of the 47 jobs was approximately $1,100 per job ($52,000/47). In the context of economic development, this is relatively inexpensive job generation. Further, each $1 net investment in the park by the state generated $27 in income for local residents ($1.4 million/$52,000). These were impressive statistics.

Finally, local legislators were made aware of the analogy between a park and a retail store. Like a store, the park is merely a shell. The success of a store depends more on quality of the goods, amenities, and services within it than on its physical structure. Similarly, the higher the quality and greater the quantity of services and amenities included in the park: (1) the more people will be attracted, (2) the longer people will stay in the park, (3) the more money people will spend in the community, and (4) the more income and jobs people will create for local residents. This contention was supported by an analysis of Florida State Parks which concluded:

"Those parks which are fully developed can sustain high attendance and have the largest direct economic impact on the local economy" (Florida Department of Environmental Protection, 1999, p 2).

The economic case was convincing. The Texas state parks budget was cut by 1% when most other agencies had to absorb reductions of 10% to 15%. State parks were repositioned effectively from a nice-to-have discretionary service to economic engines whose well-being was central to sustaining local economies.

In preparation for the 2005 legislature, economic impact studies were completed at an additional 40 state parks. Progress was made in enhancing more legislators' awareness of the parks' economic role. The House leadership supported increasing the state parks' budget, but the political stars did not align. For the 2007 legislature, the economic data for all 77 parks were updated. As a result, there was a widespread support for enhanced funding. Indeed, going into the 2007 legislature session, over 120 House members and 25 Senators—overwhelming majorities—committed to supporting the proposed increases. As a result, the state parks biennium budget was increased from $120 million to $300 million!

In 2009 and 2010 the Texas economy, like the rest of the U.S. was in a recession, so a $15-$18 billion short fall was projected for the 2011 Legislative session. In other states, parks' budgets had been massively cut and many states had closed parks. In anticipation that some may suggest similarly large reductions to the Texas state parks' budget, the economic data shown in the following table (p 18) were prepared.

The $73, 940 "Caretaker amount" is for one full time and a seasonal employee, and some utility and equipment operating funds that would still be needed if a park was closed to the public in order protect its assets from being destroyed and vandalized.

The data in the table show that closing all the parks would save the state the net operating loss of $12.1 million. However, those savings would be partially offset by the $7.2 million "caretaker" costs, so the net savings would be $4.9 million. This net savings to the state would result in $191 million less in sales transactions and 4,442 fewer jobs in the local economies around the parks.

After reviewing these data, a state official observed, "Certainly, it would not appear to make sense to close parks because the savings to the state budget are minimal while the loss of revenues and loss in the local economies are substantial."

— continued

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(Exhibit 1-10 continued)

Park	Personnel and Operating Costs	FY09 Revenues	Net Operating Cost/Gain	Average Estimated Caretaker Cost	Actual Savings after revenue loss	Local Economic Sales Loss per TAMU Study	Local Job Loss per TAMU study
Abilene	$546,719	$281,307	($265,412)	$73,940	$191,472	$1,108,520	22.0
Balmorhea	$478,480	$796,984	$318,504	$73,940	($392,444)	$961,316	19.5
Bastrop	$949,102	$923,207	($25,895)	$73,940	($48,045)	$2,535,205	74.8
Blanco	$399,510	$327,164	($72,346)	$73,940	($1,594)	$763,740	20.9
Bonham	$238,310	$109,914	($128,397)	$73,940	$54,457	$609,867	11.5
Brazos Bend	$850,636	$1,045,485	$194,849	$73,940	($268,789)	$2,116,078	45.4
Caddo Lake	$491,495	$318,574	($172,921)	$73,940	$98,981	$1,793,831	37.4
Cedar Hill	$1,390,208	$1,443,077	$52,869	$73,940	($126,809)	$14,162,207	207.2
Cleburne	$364,371	$289,270	($75,101)	$73,940	$1,161	$1,030,900	24.4
Copper Breaks	$287,370	$56,134	($231,236)	$73,940	$157,296	$442,806	10.2
Sheldon Lake	$348,177	$105	($348,072)	$73,940	$274,132	No data	No data
Stephen F. Austin	$453,050	$327,874	($125,176)	$73,940	$51,236	$1,411,721	35.0
Tyler	$899,845	$890,487	($9,358)	$73,940	($64,582)	$1,804,911	30.5
Village Creek	$305,897	$82,440	($223,457)	$73,940	$149,517	$265,644	8.1
Washington on the Brazos/Barrington	$829,188	$346,653	($482,535)	$73,940	$408,595	$2,435,841	62.8
WBC-Benstsen/Rio Grande	$764,958	$143,787	($621,171)	$73,940	$547,231	$2,854,704	78.7
Wyler Aerial Tramway	$608,780	$288,833	($319,947)	$73,940	$246,007	$734,649	11.9
	$50,091,892	**$37,892,549**	**($12,199,343)**	**$7,251,420**	**$4,947,923**	**$191,113,978**	**4442.1**

Exhibit 1-11
Repositioning the Economic Status of a Festival

Cost to the council of staging the festival $400,000

Income to the council from admission fees, vendor concessions, and so forth 170,000

Net loss to the city. . . . . (230,000)

Income accruing to city residents outside the festival gates from visitor spending in the community 343,000

Net gain in income to community residents [($343,000 + $170,000)-$400,000] 113,000

Return on investment to residents on their $400,000 investment 28%

The above data were used to reposition the economic status of a festival in a community. The city was considering terminating it because its net cost to the city was $230,000 ($400,000-$170,000). However, when this investment is reconceptualized as residents' money rather than the city's money (as suggested in Exhibit 1-1) the key measure is revenue accruing to residents, not the city. This embraces expenditures by out-of-town visitors both inside the festival gates and elsewhere in the community. When this income is aggregated, it suggests residents' return on investment is 28%.

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Chapter 2

The Fundamental Principles of Economic Impact Studies

The economic impact of visitor spending typically is estimated by some variation of the following simple formula (Stynes, 2001):

*Economic Impact of Visitor Spending = Number of Visitors * Average Spending per Visitor * Multiplier*

This equation suggests four distinct steps:

1. Define who qualifies as a "visitor."
2. Estimate the number of visitors attracted to the community by the park and recreation event or facility.
3. Estimate the average level of spending of visitors in the local area.
4. Determine the ripple effects of this new money through the community by applying appropriate multipliers.

In Chapter 2, the first two of these steps are discussed. Chapters 3 and 4 address points 3 and 4, respectively.

Because economic impact studies produce quantifiable outcomes and sometimes use complex procedures, often there is a presumption in the minds of bottom line-oriented audiences who are unfamiliar with the technique that the analyses are "scientific" and, hence, the outputs are objective and unequivocal. This is fallacious. They offer a misleading guise of statistical sophistication. Economic impact analysis is an inexact process and output numbers should be regarded as a "best guess" rather than as being inviolably accurate. Indeed, if a study was undertaken by five individuals who were knowledgeable about the procedures and who strove to honor key assumptions, then it is probable that there would be five different results.

There are multiple points in an analysis where underlying assumptions have to be made that will substantially impact the final result. Unfortunately, this means there is a temptation to adopt inappropriate procedures and assumptions to generate high economic impact numbers that will position an agency more favorably in the minds of elected officials. Sometimes such errors are the result of a genuine lack of understanding of economic impact analysis and the procedure used in it, but in other instances they are committed deliberately and mischievously to generate large numbers and mislead stakeholders.

Most research projects are predicated on a search for the truth, but the goal in economic impact studies is less auspicious; the goal is to legitimize a position. Usually, they are undertaken to justify a public expenditure in quantitative dollar terms with the expectation that the results will reinforce the case for sustaining or increasing resources allocated to the service. In these circumstances, there is a temptation to manipulate the procedures to strengthen the case. Ostensibly, the people hired to conduct economic impact studies appear to be both expert and neutral. However, one commentator has characterized these individuals in the following terms:

> They are in truth the exact equivalent of an expert witness in a lawsuit who comes to testify in support of the side that is paying the expert's bill. An expert whose testimony harms his employer's case doesn't get much repeat business. (Curtis, 1993, p. 7)

The commentator goes on to state, "The fees for the study are like a religious tithe paid to a priest to come bless some endeavor" (Curtis, 1993, p. 7). This type of cynical comment about the integrity of economic impact studies is becoming increasingly pervasive because of the extravagant claims for the impact of visitor spending that many of these studies have made. Twenty years ago, a prominent researcher in the park and recreation field observed:

> The inevitable result of the misuse of economic-impact methodology has been the growth of a backlash against the idea that parks, recreation, and tourism have any role

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> to play in local economic development. Although this cynicism rarely is published in industry journals, it is expressed frequently in private conversation and sometimes even in public addresses by officials. (Smith, 1989, p. 271)

The backlash to which he referred 20 years ago has resulted in increased skepticism among some, but it does not appear to be widespread among elected officials or among the media and general public, most of whom apparently remain gullible to the mischievous use of economic impact studies. Reviewing the stream of mischievous studies masquerading under the rubric of economic impact, one is reminded of Macbeth's lament in Act V, Scene V: "It is a tale told by an idiot, full of sound and fury, signifying nothing" (Shakespeare, 1959, p. 86). However, the tales are not told by idiots; they are, for the most part, told by knowledgeable consultants who recognize that the general public and elected officials (audiences they are targeting) are frequently deficient in economic literacy.

Ultimately, doing ethical work is a personal rather than an institutional responsibility. Thus, it cannot effectively be legislated. The only practical countermeasure is to alert people to the unethical procedures that can be used in economic impact analyses and point out their potential substantial adverse implications on public policy decisions. The intent in both this and the following chapters is to arm park and recreation managers with sufficient knowledge of basic principles so they will be able to identify studies that are ethically challenged and distance themselves from them.

In this chapter, four principles central to the integrity of economic impact analysis are reviewed: accurate participation numbers; exclusion of local residents; exclusion of time-switchers and casuals; and differentiating between economic impact and economic significance studies.

Accurate Participation Numbers

If a reasonably accurate count of the number of participants is not feasible, then it is probably a waste of resources to proceed with an economic impact study. This is because reasonably accurate measurements of economic impact depend on reasonably accurate counts of visitors, since the impact estimates are derived by extrapolating from a sample or from secondary sources to a total visitation count. At gated venues that charge an admission and at tournaments where there is a list of participants, accurate counts are likely to be available from ticket sales, turnstile counts, or highway counters. However, many venues are not gated, do not charge admission, and do not have a list of participants. In these cases, attendance counts are frequently guesstimates made by the organizers who sometimes are tempted to exaggerate them. An example is given in **Exhibit 2-1**. Accuracy in doing economic impact analysis is of little use if the total attendance counts are inaccurate.

Exhibit 2-1

Attendance Hyperbole at the London Marathon

A figure of one million is often used by the media as an estimate of the number of spectators who watch the annual London marathon race. For example, it is consistently used by the BBC which provides live television coverage of the event. However, for this to be the case, spectators would need to be approximately five deep either side of the course along the entire 26.2 miles. On close examination of the television coverage this was clearly not the case. Even in the most populated areas, crowds rarely reached such levels. In addition, because of the excellent transport system in London, spectators were found to travel to different parts of the course (using the tube or bus) once the runners had gone by, which led to double counting. The Metropolitan Police Force estimated spectators at nearer 500,000, but even this figure appeared to be optimistic based on close scrutiny of the BBC television coverage. Based on the analysis of that coverage and the propensity for spectators to move around the course, 300,000 was the spectator attendance estimate used by a research team estimating the economic impact of the London marathon. (Leisure Industries Research Center, 2001)

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During the early 1990s, the Texas state parks division consistently reported 18 to 23 million annual day visits and its economic impact estimates were based on this data. The state's legislators were skeptical, and they ordered an independent verification. The visitation data were derived from traffic counters at each park entrance. A formula was applied to the axle counts that incorporated variables for non-visitor official vehicles, number of people per vehicle, visitors who entered and exited a park on multiple occasions in one day, and access to a park through multiple entrances by the same visitor on the same day. The independent study found the formula's parameters were much too high. The revised formula resulted in a revised estimate of 10 to 11 million annual day visits. Thus, on average, the economic impact estimate of the parks was halved (Kaczynski, Crompton, and Emerson, 2003). **Exhibit 2-2** illustrates the potential distortion in economic impact that may occur when different participation assumptions are adopted.

Exhibit 2-2

The Influence of Different Visitation Counts on Estimates of the Economic Impact of a Festival

A study was commissioned to estimate the economic impact of the Mardi Gras festival in Galveston, Texas, which was spread over 10 days including two weekends. Galveston is a barrier island, and the visitation numbers were derived by comparing average traffic counts on the causeway to the island on the weeks preceding and following the festival week with those of the festival week. The difference of approximately 80,000 visitors was assumed to be because of festival goers. Using these visitation numbers and spending data interpolated from studies done at similar events on the island, the impact was estimated to be approximately $2 million in income and $5.2 million in sales.

Two months after the study had been presented a copy of the local daily newspaper featured as its front-page major headline, "Mardi Gras: Impressive Cash Cow." The article reported that "the overall economic impact exceeded $85 million." The client was dissatisfied with the original $2 million personal-income (or $5.2 million sales) estimate, so the newspaper reported that another consultant was hired and given the information that 800,000 visitors attended the festival. This number (10 times that of the original study!) was derived by assuming that every person who crossed the causeway during the 10-day period of Mardi Gras was going to the festival, even though a large majority of the vehicles constituted regular commuter traffic. The hyperbolic visitation and economic impact numbers were cited consistently in the island's media and publicity materials each year at the time of the festival for the next decade.

Exclusion of Local Residents

Economic impact attributable to a park and recreation opportunity relates only to new money injected into an economy by visitors, vendors, media, sponsors, external government entities, or banks and investors from outside the community. Only those visitors who reside outside the jurisdiction and whose primary motivation for visiting is to attend the event, or who stay longer and spend more time there because of the event, should be included in an economic impact study.

Consider what economists call "the broken-window fallacy." Let's say hooligans toss a brick through a bakery window. The baker must spend money to have the window repaired. This will boost the glassmaker's income, which will add to another merchant's income, which will add to another merchant's income, and so on. The chain of spending will multiply, generating higher income and employment. But there's a catch. If the baker hadn't spent his money on window repair, he could have spent it on a new suit. Then the tailor would have new income and so on down the line. The broken window didn't create net new spending. It simply diverted spending from somewhere else, impeding economic activity that otherwise would have occurred.

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Expenditures by those who reside in the community do not contribute to an event's economic impact because these expenditures represent a recycling of money that already existed. There is no new economic growth, only a transfer of resources between sectors of the local economy. It is probable that if local residents had not spent their money at the park and recreation event, then they would have disposed of it either now or later by purchasing other goods and services in the community. Twenty dollars spent by a local family at a recreation event is likely to be 20 fewer dollars spent on movie tickets or other entertainment elsewhere in the community. Expenditures at an event by local residents are likely merely to be switched spending, offering no net economic stimulus to the community. Hence, it should not be included when estimating economic impact. **Exhibit 2-3** elaborates on this issue (Rosentraub, 1997).

Exhibit 2-3

Elaboration of the Concept of Substitute or Recycled Expenditures

How much food do people eat because of the presence of a festival? In other words, if a family eats dinner at the festival, where did they not eat their dinner that night? If they would have eaten at a restaurant near their home, then the consumption of the food as part of the festival is merely a transfer of expenditures from a restaurant near their home to the festival. This change of location for the expenditure certainly creates an impact in both areas – more spending at the festival and less in the neighborhood. But from the economy's perspective, there is no growth or increase in spending levels, merely a transfer. Further, if the family would have eaten at home instead of at a restaurant, then the transfer of expenditures takes place between the supermarket and the festival, with consumption declining at the supermarket while festival sales increase. Again, there is economic impact in the sense that the festival may gain while the supermarket suffers, but the overall change in the community or city is not one of growth but merely a transfer of activity from one vendor to another.

Many assume that because a park and recreation agency is spending money in a community, it is strengthening the community's economy. That assumption is erroneous because the government must tax Peter to pay Paul. This means that there may be no new economic impacts or new jobs, but rather the same dollars are merely shifted around different sections of the local economy. Consider a hypothetical situation in which all funds to a city's park and recreation agency are withdrawn and the agency is disbanded. There may be three alternate uses for the funds:

1. All park and recreation staff could be reassigned to dig holes for the first six months of the year and to fill them up again for the second six months. The operational money from the former agency will be used to acquire and service the equipment needed to perform these tasks efficiently.
2. The staff and operating resources formerly allocated to parks and recreation could all be redirected to the streets department.
3. Taxpayers and users could be allowed to retain the taxes and user fees that were formerly used to fund the park and recreation agency.

In all three cases, the impact on the local economy of removing funds from parks and recreation would be zero because those funds would be spent elsewhere in the community. The spending has merely been switched. The only net loss to the economy would be the lost spending from those out-of-town visitors who used the park and recreation services.

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Sometimes expenditures on capital projects are assumed to generate economic impacts. An example of this is shown in **Exhibit 2-4** (Crompton, 2006). However, if these capital facilities are designed to serve primarily local residents and if they are being paid for by property taxes, then these are substitutable expenditures that have no economic impact. If local residents did not have to pay the taxes needed to support these new park and recreation facilities, then it is probable they would spend that money on other goods and services in the local economy.

Exhibit 2-4

What is the impact on a local economy from park and recreation facilities built with general obligation funds backed by a property tax?

A study was commissioned by a park and recreation agency to measure the "economic impacts" of a proposed general obligation bond (GOB) issue of $680.3 million to construct and improve park and recreation facilities in the jurisdiction. The consultants inserted those expenditures into a multiplier model, and reported the economic impact from park and recreation general obligation bond projects would be "$1.382.2 billion and result in an average of 1,176 employment positions being created annually."

However, all of the tax funds used to service the bond debt were paid by residents living within the jurisdiction. Hence, the $680.3 million and the large cumulative interest payment of more than $1 billion that would be paid to borrow the money for 30 years will come from residents' pockets, which means this is $680.3 million (plus interest) that those residents will not have available to spend in the local community; that is, there is no net gain. Indeed, there is a high probability that the bonds will be purchased by an investment organization from outside the community, so the substantial bond interest will leak out of the local economy immediately, resulting in the capital projects having a substantial net negative economic impact on the county.

The predominant use of these facilities is likely to be by local residents. There may be some potential for attracting out-of-town spending that would offset some of these losses but this is likely to be relatively small. The consultants conclude, "the end result of the GOB investments is… a noticeable boost to economic opportunities and jobs for the jurisdiction's residents." They declare, "these estimates form a conservative **base** (floor) of economic impacts," and they inappropriately claim, "this study utilizes professionally accepted methodology."

The available evidence suggests that not only is the substitution effect likely to result in no net economic gain when the impact of construction projects in a community is measured, but often there will be no net economic gain even within the construction sector of the local economy. An economic gain would occur within that sector only if those workers employed on the capital projects would not have been otherwise employed.

Spurious Rationales

Sometimes consultants acknowledge the inappropriateness of including local residents, then go on mischievously to provide a spurious rationale that they surely know is fallacious and appears to be designed to obfuscate and confuse the reader:

> Spending by both local area residents and travelers from outside the area are included in the measurement of economic impacts of visitors to State Parks in this report. Thus, the focus of this research is broader than that found in studies of travel and tourism impacts, which exclude spending by local area residents…The primary reason for including all visitation to State Parks is because the purpose of the State Parks is to provide recreational opportunities for local residents, as well as travelers from outside the area. While spending by travelers from outside the area can be more significant economically because it represents the injection of "new dollars" into the local economy, spending by residents within their community is not insignificant. (Crompton, 2006)

Another study completed by a well-known national firm rationalized its decision to incorporate local expenditures with this spurious rationale:

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> The substitution effect refers to the economic phenomenon whereby new or additional spending leads to reduced spending *within other sectors* of that economy, immediately or over time…We are not aware of a reliable method for determining the amount and impact of the substitution effect resulting from various economic activities. Previous attempts to quantify the substitution effect have yielded unreliable results. The substitution effect is difficult to accurately quantify and has not been included in this analysis. (Crompton, 2006)

In both cases, the only reasons for disingenuously offering these spurious rationales that seek to "justify" the inclusion of locals' expenditures is that when such expenditures were omitted, the economic impact numbers were perceived to be too small to be politically useful.

The Deflected Impact Caveat

If there is evidence to suggest that a sports tournament or festival keeps some residents at home who would otherwise leave the area for a trip, then these local expenditures could legitimately be considered as an economic impact because money has been retained in the host community that would otherwise have been spent outside it. It is usual to refer to this type of economic growth as *deflected* impact. It is deflected in the sense that instead of leaving town to participate, these individuals now spend their money in the local community.

For example, if a community is hosting a championship sports tournament, local teams that qualified for the tournament would probably have traveled to participate in it if it had been held elsewhere. Their spending elsewhere would have been a loss to the local economy. In this case, it is probably appropriate to recognize their local spending as a net gain to the economy that would not have occurred if the community was not hosting the tournament. However, expenditures by these teams are likely to be relatively small because their participants likely live in the community and most probably sleep and eat at home rather than spend additional money in the community. Excluding these participants from an economic impact analysis is likely to have no meaningful influence on the reported results.

Evidence of deflected impact is very difficult to collect. In most cases, the evidence is likely to be tenuous and the deflected impact is likely minimal, with the exception of championship sports tournaments, so the accepted convention by economists is to disregard it. However, consultants sometimes use the possibility of some deflected impact to inappropriately justify including all local residents' expenditures. For example, in a study of a state parks system, a consultant rationalized: "Spending by local area residents represents money that stays within the community rather than being spent elsewhere" (Crompton, 2006).

Inappropriate Aggregation

The distinction between who is defined as a local resident and who is defined as an out-of-area visitor is determined by where the boundaries are drawn defining the affected community. There is considerable flexibility and discretion in this decision. The geographic area of interest usually will be specified by those commissioning an economic analysis. "Local residents" could be defined as those living in a city, or by metropolitan area, county, state, or even national boundaries. Thus, for example, if local residents are defined as living within national boundaries, then out-of-area visitors would be defined as foreigners visiting from other countries.

If an analysis is intended to measure the economic impact of an event or facility on three different jurisdictions, for example, a city, county, and state, then there will be three different definitions of which respondents constitute "local residents" and which qualify as out-of-area visitors. For example, an individual living in the state but outside the county would be an out-of-area visitor in the analysis measuring the economic impact on the city and county, but would become a "local resident" when the impact of the event or facility on the state is measured. In this situation, visitors must be asked to report their expenditures in each of the three impact areas of interest.

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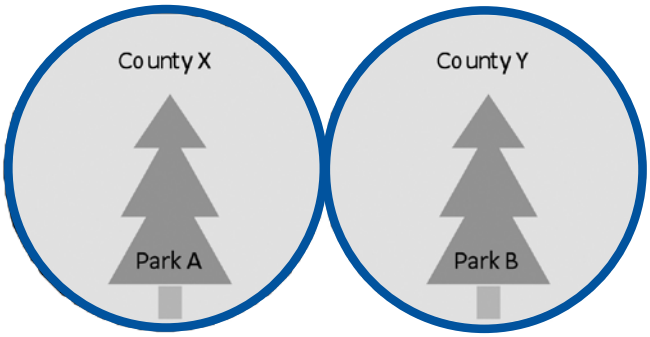
When the geographical area or government entity changes, so the definition of which participants are visitors and which are locals also changes. Care has to be taken not to inappropriately aggregate economic impact data. For example, a state parks system commissioned a study of the economic impact of each state park on the county in which it was located. These were presented, but all of the individual park results were then summated so that the first paragraph of the executive summary reported:

> The state park system had an overall direct economic impact of nearly $273 million on local economies through the state; direct economic impact is defined as the amount of new dollars spent in the local economy by non-local park visitors and park operations. Approximately $16.3 million was contributed to the general fund in the form of state sales taxes. In addition, over 8,100 jobs were generated as a result of the state parks' operations. (Crompton, 2006)

This conclusion, which was probably the only paragraph in the report that many elected officials at whom it was targeted would read, was inappropriate because the aggregation changed the definition of who were local residents and who were out-of-area visitors. In this case, the only new economic contribution to the state's sales tax comes from out-of-state visitors. This principle is illustrated in **Exhibit 2-5**.

Exhibit 2-5

The Economic Impact of Park A on County X and of Park B on County Y



- Total visitation to Park A is 70,000 with 50,000 coming from County X and 20,000 coming from County Y. The 20,000 from County Y spend $10 each in County X, so the economic impact of Park A on County X is $200,000.
- Total visitation to Park B is 100,000 with 60,000 coming from County Y and 40,000 coming from County X. The 40,000 from County X spend $8 each in County Y, so the economic impact of Park B on County Y is $320,000.

The scenario in Exhibit 2-5 shows parks A and B, located in counties X and Y, respectively, and concludes that the economic impact of parks A and B on their respective counties is $200,000 and $320,000. What is the combined impact of parks A and B on counties X and Y?

The summation approach used in the state parks study quoted above would conclude $520,000, but the correct response is $0. When the geographical unit of analysis is changed by measuring the impact of both parks on both counties, all expenditures become local because there are no visitors to the two parks from outside the two counties. When the state parks agency changes the unit of impact analysis from the individual county level to the state level, the only spending that qualifies for inclusion in an economic impact analysis is that which is expended by visitors from outside the state.

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Exclusion of Time-Switchers and Casuals

Expenditures from out-of-town visitors should be net of "time-switchers" and "casuals." Some non-local participants may have been planning a visit to the community for some time, but changed the timing of their visit to coincide with an event. The spending in the community of these *time-switchers* should not be attributed to the event since it would have occurred without the event, albeit at a different time of the year.

For major events, it is possible that prices in the community may be raised during the event, so the expenditures of time-switcher visitors may be higher at that time than if they had visited at a different time of the year. However, most economists are likely to advocate that this increment be disregarded in the analysis because of the difficulty of accurately assessing the magnitude of the increase across all sectors of the local economy. Rather, it should be recognized in the accompanying narrative as one factor contributing to the analyses measurements being conservative.

Casuals are visitors who are already in the community, attracted by other features, and who elect to go to the event instead of doing something else. For example, San Antonio is a popular convention destination because of its climate and the ambiance of the River Walk, where the convention center and major hotels are located. Studies have shown that approximately one-third of out-of-town visitors to the city's festivals and parks are likely to be casuals. If conference attendees go to a festival or park in the city, their economic impact should not be attributable to the festival or park because without it the likely scenario is that these visitors would have spent a similar amount of money at, for example, a restaurant on the River Walk. The festival or park was not the reason that brought them to San Antonio.

Expenditures by time-switchers and casuals would have occurred without the event, so income generated by their expenditures should not be attributed to it. However, if visitors who qualify as members of these two groups stay in the jurisdiction for more days than they would have done if the event had not been held, then their expenditures on those extra days should be included in the economic impact analysis.

Time-switchers and casuals can usually be disregarded when the event is a sports tournament whose economic impact is almost all contributed by the participants and family or friends traveling with them. If an agency hosts a softball tournament, for example, it is unlikely that any players on the teams that enter will be time-switchers or casuals. Their reason for visiting the community is exclusively associated with the team's tournament involvement. However, if the event is a festival, if much of its impact is generated by spectators rather than participants, or if it is the impact of a facility rather than an event that is being measured, then there may be substantial numbers of time-switchers and casuals.

Differentiating Economic Impact and Economic Significance Studies

If expenditures from local residents, time-switchers, and casuals are included in a study then it changes from being an economic impact analysis to being an economic significance analysis. *Economic impact* refers to the net economic change in a host economy that results from spending by visitors from outside the community. In contrast, *economic significance* is "a measure of the importance or significance of the project/program (rather than its impacts) within the local economy which shows the size and nature of economic activity associated with the project/program in the area" (Stynes, 2001).

A significance analysis offers no useful information that would inform the trade-offs involved in decisions on how best to invest public funds. Its primary use is for public relations because the inclusion of local residents, time-switchers, and casuals results in relatively large numbers being generated. **Exhibit 2-6** and **Exhibit 2-7**, p. 28, illustrate how the large numbers associated with economic significance studies were used by park and recreation advocates in efforts to raise the field's political profile and to imply that more government investment in parks and recreation is justified.

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Exhibit 2-6

Use of Economic Significance Data

A study of the "Economic Impact of Park and Recreation Agencies Across the State" undertaken by a well-known national consulting firm, surveyed the state's local park and recreation agencies. It concluded:

- 60,340 full-time equivalent direct and multiplier jobs are reported by park and recreation agencies.
- $3 billion in cumulative spending, earnings, and other related activity contributed to the statewide economy.

The title given to the study by the consultants is inappropriate and misleading. This is an economic significance analysis not an economic impact analysis. The state park and recreation association appropriately claimed in its literature, "Public parks and recreation is a $3 billion industry in the state." This met its public relations needs since its target audiences were unlikely to understand that despite the apparently large numbers, these agencies have no substantive economic impact on the state's economy because the taxes and user fees that support them are almost all provided by in-state residents and so are merely substitute expenditures.

Similarly, a study of the "Economic Impact of the Golf Course Industry in South Carolina concluded:

> The golf course industry provided to the state's economy 7,538 full-time jobs and $134,754,000 in salaries, wages and benefits. Projected total direct and indirect employment and income contributions of the golf course industry were 16,334 jobs and $379,825,000 in wages and salaries.

Again, despite the misleading title, this is an economic significance analysis not an economic impact analysis, since most of this income derives from residents within the state and is thus merely substitute expenditures.

Exhibit 2-7

The Economic Significance of Texas State Parks

Exhibit 1-10 described how economic impact studies were used to successfully reposition state parks in Texas as economic engines. The economic impact of each park on the county in which it was located was estimated. The implications of these data were discussed with the state legislators who represented those counties.

To increase statewide interest from the media and general public, as well as legislators, data from the individual studies were aggregated and extended to include three sources of expenditures not included in the economic impact analysis: (1) expenditures made by in-county residents, (2) those made outside the county by park visitors, and (3) expenditures made by casual visitors (visitors to a park who were primarily attracted to the county for reasons other than to visit the park). With the inclusion of these expenditures, the focus shifted from economic impact to economic significance. Statewide Texas multipliers, which were much higher than local county multipliers were then applied to these numbers (explained in Chapter 4). The results are shown in the following table.

Economic Significance of State Parks in Texas

	# of Visitors	Direct Expenditures ($ millions)	Impact on Sales ($ millions)	Impact on Texas Residents' Income ($ millions)	Number of Jobs Generated
In-County Visitors	741,467	$7,277,375	$13,690,888	$8,237,624	217.4
Casual Visitors	1,665,454	$111,886,650	$213,311,935	$123,076,153	3,253.0
Visitor's[7] expenditures inside and outside the county	6,517,298	$255,473,602	$495,284,524	$283,671,454	7,349.9
Park Employee's[7] Salaries		$37,167,992	$70,786,510	$41,080,162	1,108.0
Total	8,924,219	$411,805,619	$793,073,857	$456,065,393	11,928.3

The sole purpose for doing this was to generate large numbers that it was believed would attract wider attention. The results enabled state parks' advocates and lobbyists to position statearks as "a more than three quarter billion dollar industry in Texas that created almost 12,000 jobs." It was unambiguously and prominently stated that these were measures of *economic significance,* rather than of *economic impact*. However, this distinction is likely to have been understood by very few legislators, media personnel, or taxpayers, so the promulgation of these relatively meaningless, but large, numbers was politically effective.

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The dichotomy between the large numbers associated with economic significance and much smaller economic impact numbers is illustrated in **Exhibit 2-8**, p. 29. It reviews the results of an economic significance study of All Terrain Vehicles in Maine. It appropriately focuses on "economic activity" (Crompton, 2006). However, the commentary suggests that despite the high economic activity value, the economic impact on the state of Maine may be negative!

Exhibit 2-8

Would more access to Maine state lands have a positive economic impact on the state's economy?

A study of the economic contribution of ATV-related activities in Maine concluded: "We estimate $156 million of net spending took place in Maine during the 2003-2004 season to purchase, register, and operate ATVs. Approximately 5.9% of this spending comes from nonresident households." When multipliers were applied, "ATVs directly and indirectly contribute $200 million of economic activity to Maine's economy." This study also reported: "A large portion of this spending, however, involves the purchase of goods that are not manufactured in this state. For example, 62.6% ($97.6 million) of total ATV spending goes to purchase new ATVs, tow vehicles, and gasoline. None of these items are produced in Maine."

A political goal of this study probably was to encourage state government to invest in more ATV trails to encourage growth of this industry. However, given the small amount of out-of-state spending that occurs for ATVs and the large out-flow of funds for purchasing ATV equipment reported above, a case could be made that ATVs have a negative economic impact on the state. Thus, if the state were to close down all ATV trails or ban ATVs, money currently flowing out of the state would be likely to remain in it, and the state's economy would be healthier!

Too often, assumptions critical to the integrity of economic impact analyses (such as exclusion of local residents, time-switchers, and casuals) are ignored, blurred, or not made explicit by park and recreation agencies or the consultants they hire, so a study falsely masquerading as an economic impact study is, in fact, an economic significance study. The reason for doing this is to generate big, impressive sounding, economic numbers. For the most part, elected officials lack the economic literacy to recognize the distinction between the two types of study and are misled into believing they are synonymous.

A variety of apparent synonyms for economic impact is used that facilitate the incorporation of local residents, time-switchers, and casuals without the key nuanced differences being carefully articulated. Such synonyms may include: economic activity, total annual spending, gross economic impact, economic surge, gross economic output, gross economic value, total contribution to the economy, or economic significance. Non-economists are unlikely to differentiate the nuances and to falsely consider these other phrases as synonyms of *economic impact.* When their procedures are challenged by economists, consultants are likely to declare, "But we didn't measure economic impact, we measured economic significance (or whatever)."

To avoid ethical challenges and charges of misrepresentation, it should be explicitly, unambiguously, and prominently stated that such studies are not economic impact studies, but are significance analyses. For example, the author of a study on the economic significance of amateur sport and active recreation in Edmonton, at the beginning of his report, prominently stated:

> It is important to differentiate between the macroeconomic significance and the economic impact of an activity….A crucial distinction between an economic significance study and an economic impact study is that the former does not attempt to determine what would happen if the amateur sport and active recreation sector of the economy were to disappear altogether. Instead, the purpose is to calculate the "amateur sport and active recreation gross municipal product" within the city of Edmonton for a specified year. (Berrett, 2001, p. 6)

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The author's appropriate allusion is that if the sector he is measuring were to disappear, the impact on the city's economy may be minimal because people would spend their funds on substitute activities.

This chapter identified and discussed four principles central to the integrity of economic impact analysis: accurate participation numbers, exclusion of local residents, exclusion of time-switchers and casuals, and differentiating between economic impact and economic significance studies. There is one other principle that is frequently abused and that is the use of the multiplier concept discussed in Chapter 4.

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Chapter 3

Collecting Visitors' Expenditure Information

It is beyond the scope of this chapter to discuss issues relating to numbers of people who should be interviewed, how they should be selected, and whether they should be interviewed personally on-site or contacted by mail or phone after they return home. These issues are multifaceted. They are strongly influenced by the resources available to undertake an economic impact analysis, the level of accuracy desired, and the type of facility or event being measured.

Discussion in this chapter focuses on the suggested questionnaire for collecting information needed to calculate economic impact. An example of a complete questionnaire is shown in **Exhibit 3-2**, p. 36. The rationale behind each question is discussed in the next several pages. A major goal was that the shown. A major goal was that the questionnaire should be short. The shorter it is, the less time it takes respondents to complete, and the more likely it is that they will cooperate in the study. To achieve this goal, it was imperative that the questionnaire should contain only essential questions. The criterion used in developing it was, "What will be done with the information from this question?" Questions that may have produced "interesting information" were not included unless that information was essential for calculating economic impact. The rationale supporting each question on the questionnaire shown in **Exhibit 3-2** is explained.

1. What is the ZIP code at your home address?

This question is designed to differentiate between local and non-local respondents. In Chapter 2, it was pointed out that economic impact refers only to expenditures made by out-of-area visitors, so those who live locally must be screened out and eliminated from the study's calculations. If respondents report they are local residents, there is no point in them completing any more of the questionnaire because the information they provide will not be used.

However, if the response to question 1 indicates that a respondent group is comprised of local residents, this contact should not merely be disregarded. **The contact with them must be recorded even though they do not complete the remaining questions because this information is essential for calculating the proportion of visitors who are from out-of-area.** For example, if 1,000 individuals are sampled and 600 of them are local residents, then it is concluded that only 40% of visitors to the event came from out-of-town. If the total event attendance is 200,000, then this information suggests that 80,000 are from out-of-area. This is the attendance number that is of interest in economic impact studies (not the 200,000 figure), and the number to which results provided by the sample are extrapolated.

ZIP codes enable "the local area" to be configured in any way the study sponsor desires. However, it should be configured in a way that is likely to be meaningful to visitors so they can report whether their spending was within or outside the "local area." Local area may be defined by a city's boundaries, by a metropolitan area and its suburbs, by a county, or whatever. Indeed, ZIP codes enable the economic impact of an event or facility on each of these different catchment areas to be calculated if sponsors wish to do this because it is easy for the computer to aggregate ZIP codes into any desired configurations.

1. (Alternative) What is the name of your team? _____

Data at sports tournaments are collected by randomly selecting teams in the tournament and then surveying all (or as many as possible) of the players on the selected teams' squads. This procedure requires a participant's team name. It also requires knowing how many players are on the team. This is usually available from the tournament organizers who collect team names at the time of registration. For this reason, numbers on a team are not included on the questionnaire, but if organizers do not have

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that information then an additional question should be added to capture this number. ZIP code information need not be sought on the questionnaire because tournament organizers can identify which teams are local and which are from out-of-area.

2. ***Which of the following are you (circle one): athlete, spectator, coach, vendor, exhibitor, referee/umpire, media person, sponsor, other.***

In addition to participants at sports tournaments or visitors to special events or facilities, there may be additional economic impacts forthcoming from other groups such as those listed in question 2. If any of these groups are involved and their economic contributions are to be estimated, then each of them needs to be sampled because it is likely that different groups will report different expenditure amounts and patterns.

Exhibit 3-1 shows the importance of identifying different groups when expenditure data are collected. If groups were not identified so an average per person expenditure (estimate #1) across groups was estimated, the result would be substantially different from when a segmentation approach (estimate #2) was adopted.

Exhibit 3-1

Illustration of the Importance of Segmenting Groups

An economic impact study of the National Junior College Athletic Association's Women's Tennis National Championships reported that the average per day expenditures of spectators and athletes were $36.78 and $72.20, respectively, and that there were 117 spectators and 322 athletes at the event.

The average per day spending of the two groups could be calculated in two ways.

(1) Average the spending of the two groups and multiply by the aggregate number in the two groups:

$$\frac{\$36.78 + \$72.20}{2} \times 439 \text{ (i.e., } 117 + 322) = \mathbf{\$23{,}921} \text{ per day}$$

(2) Segment the two groups and calculate their expenditures independently.

(a) Spectators - $36.78 × 117 = $4,303

(b) Athletes - $72.20 × 322 = $23,435

Total: **$27,738** per day

In this case, the difference between the two approaches is 16%, illustrating the importance of using a segmentation approach (i.e., approach #2).

3. ***How many days will you be at this event? _____ days.***

4. ***How many nights will you be spending in the area?_____ nights.***

4(a). Will you be staying at (check one): ☐ motel/hotel ☐ with friends and relatives ☐ camping ☐ bed and breakfast ☐ other?

Obviously, if the event was scheduled for only one day, then these questions would be omitted. Responses to these questions enable both per day/night per person and per day/night per visitor group economic impact data to be calculated. The amounts and patterns of spending by day and overnight visitors are likely to be different and need to be reported separately.

Examples of the results of these calculations are given in Chapter 6. These data permit a community to compare the economic impacts of events that have different time frames to ascertain which types of events offer best return to the community for the resources it invests. The per day/night data also enable the results from events or facilities that are surveyed to be extrapolated easily to other similar events or facilities that may be of different duration and at which no surveying is undertaken.

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Some of the variation in expenditure averages across events and facilities is attributable to different mixes of lodging types. Visitors who stay at different types of accommodations have different spending patterns. Question 4(a) enables these to be identified.

5. ***How many people (including yourself) are in your immediate group? (This is the number of people for whom you typically pay the bills, e.g., your family or close friends) _____ people.***

This question is designed to direct respondents' thinking toward the immediate group which is the unit of analysis used in the next question that collects the financial information.

Knowledge of the group size is essential in special event contexts because total expenditures are calculated by multiplying the sample responses up to the total attendance. This is illustrated in the following calculation:

Total number of event visitors from out-of-town:	15,000
Average expenditure per respondent's immediate group:	$30
Average size of immediate group:	3
Total expenditures by out-of-town visitors to the event are:	15,000/3 x $30 = $150,000

This calculation could not be made without knowing the group size. Group size is not needed in studies involving team sports because number of players on a team is used to calculate each team's economic impact.

6. ***To better understand the economic impact of the (Name of Event/Facility), we are interested in finding out the approximate amount of money you and other visitors in your immediate group will spend, including travel to and from your home. We understand that this is a difficult question, but please do your best because your responses are very important to our efforts.*** **DURING THE COURSE OF YOUR VISIT, WHAT IS THE APPROXIMATE AMOUNT YOUR IMMEDIATE GROUP WILL SPEND IN EACH OF THE FOLLOWING CATEGORIES:**

TYPE OF EXPENDITURE	Amount spent in the (name of city) area	Amount spent outside the (name of city) area
A. Admission/Entry Fees		
B. Restaurants, Bars, Concessions, Night Clubs		
C. Groceries		
D. Retail Shopping (clothing, souvenirs, gifts, etc.)		
E. Lodging Expenses (hotel, motel, B&B, camping, etc.)		
F. Gas and Oil (auto, RV, boats)		
G. Private Auto Expenses (repairs, parking fees, etc.)		
H. Rental Car Expenses, Taxis		
I. Any Other Expenses *Please identify:*		

It would be inaccurate to capture only the expenditures of individual respondents because they may be paying for other people or, alternatively, others may be paying for them. The only way to avoid these error sources is to capture the expenditures of all members of the immediate group. Thus, the immediate group is emphasized in question 6.

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It is noted in Chapter 4 that each category of expenditure has a different multiplier coefficient, so expenditures have to be identified by category. Experience has shown that nearly all out-of-area visitor expenditures associated with park and recreation events fall into the first eight categories shown in question 6. If there is no admission charge or entry fee, then category A should be omitted. If expenditures are assigned to category I, it is important to specify what they were for, so they are assigned to the correct industrial sector in the multiplier model. Generally, if visitors purchase durable, "big-ticket" items such as boats, recreational vehicles, televisions, or whatever, they are excluded from the analysis because these purchases are likely to be used on many trips other than being exclusively associated with a specific trip to a facility or event.

In sports tournaments, the entry fee category usually is omitted because it is often sent to the organizers in one payment on behalf of all team members. Hence, the amount is known and does not have to be ascertained from information provided by individual players. Also, each team's coach/captain should be asked if any of the team's local expenditures are being directly paid by sponsors (e.g., accommodation or meals). In such cases, these amounts should be added to the data collection from individual players' questionnaires and included in calculations of teams' total expenditures.

Question 6 requires respondents to give their expenditures both within the area of interest and outside that area. Economic impact studies are concerned only with the amount of money spent in the area of interest, so the information reported in the second column pertaining to expenditures outside the area is discarded. Even though it is not used, this information is requested because it causes respondents to think carefully about where they spent their money. If it were omitted, there would be a greater probability of respondents not reading the question carefully and incorrectly attributing all their trip expenditures to the host area.

Ideally, the headings on column one in this question would be defined by ZIP code, (viz, "Amount spent in the following ZIP codes: _____ "). This would ensure that the reported expenditures coincided with the selected configuration of the impacted area defined by ZIP codes. Unfortunately, most people, residents as well as visitors, are unlikely to know the boundaries of ZIP code areas so a surrogate descriptor has to be selected (usually the city or neighborhood name) that respondents will recognize.

The expenditures reported in question 6 can only be approximations because if respondents complete the questionnaire before they leave the event and the affected area, they have to estimate the additional expenditures they are likely to incur; and if they complete the questionnaire after the event and mail it back, then their recall memory may be faulty. This reinforces the realization that economic impact studies can only be guesstimates.

7. Would you have come to the (Name of City) area at this time even if this event had not been held? ☐ ***Yes*** ☐ ***No***

7a. If "Yes," did you stay longer in the (Name of City) area than you would have done if this event had not been held? ☐ **Yes** ☐ **No**

7b. If "Yes" (in 7a), how much longer? _____ **days**

Questions 7, 7a and 7b are designed to identify casuals. These questions are not likely to be relevant in the context of sports tournaments because spontaneous, casual participation in such events is not likely.

Those who answer "yes" to question 7 are classified as casuals and are omitted from the study, unless they also answer "yes" to question 7a. These individuals were already in the community, but they were attracted there by other factors. Their economic impact cannot be attributed to the event because it was not responsible for bringing them to the community, and if they had not attended it, then it is likely they would have spent their money somewhere else in the community. However, if the event causes them to stay in the jurisdiction for more days than they would have done if the event had not been held, then their

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incremental expenditures on those extra days should be included in the economic impact analysis. This information is captured in questions 7a and 7b.

8. Would you have come to (Name of City) in the next three months if you had not come at this time for this event? ☐ *Yes* ☐ *No*

Question 8 is designed to identify time-switchers. Those who respond "yes" changed the timing of an intended visit to the community to coincide with the event. They will be omitted from the analysis because their spending in the community cannot be attributed to the event because it would have occurred without the event, albeit at a different time of the year.

Experience has shown that the proportion of players at a sports tournament who planned to come to the community at another time is negligible. Thus, the questionnaire used in the economic impact studies of sports tournaments consists only of the first six questions and the latter three are omitted.

9. Circle the number that best describes how important this (facility/event) was in your decision to visit (Name of City) on this trip, where 0 indicates no influence and 10 indicates this (facility/event) is the main single reason for visiting (Name of City) on this trip.

0	1	2	3	4	5	6	7	8	9	10
↑					↑					↑
None: I would have come to the area anyway					**Half of my reason for coming to the area.**					**My only reason for coming to the area.**

The proportion of spending that is attributable to the facility or event is based on responses to this question. For example, if a respondent reports the facility/event had "0" influence on the decision to visit the community, then the economic impact would be zero. If he or she indicated a score of 6, then 60% of the spending in the community would be attributable to the event.

It is recognized that such estimates of proportionality are subjective and subject to errors. However, they are likely to be more accurate than the standard assumption that 100% of visitors' expenditures are attributable to the events. This process distinguishes between general economic impact from tourists to a community and the economic impacts attributable to a specific park and recreation event or facility.

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Exhibit 3-2

Economic Impact Questionnaire

1. What is the ZIP code at your home address? _____

> Alternative question 1 to be used in the context of a sports tournament.
> 1. What is the name of your team? _____

2. Which of the following are you (check one): ☐ athlete ☐ spectator ☐ coach ☐ vendor ☐ exhibitor ☐ referee/umpire ☐ media person ☐ sponsor ☐ other

3. How many days will you be at this event? _____ days

4. How many nights will you be spending in the area? _____ nights

   4a. Where will you be staying (check one): ☐ motel/hotel ☐ with friends and relatives ☐ camping ☐ bed and breakfast ☐ other

5. How many people (**including yourself**) are in your immediate group? (This is the number of people for whom you typically pay the bills, e.g., your family or close friends) _____ people.

6. To better understand the economic impact of the (Name of Event), we are interested in finding out the approximate amount of money you and other visitors in your immediate group will spend, including travel to and from your home. We understand that this is a difficult question, but please do your best because your responses are very important to our efforts. **DURING THE COURSE OF YOUR VISIT, WHAT IS THE APPROXIMATE AMOUNT YOUR IMMEDIATE GROUP WILL SPEND IN EACH OF THE FOLLOWING CATAGORIES:**

TYPE OF EXPENDITURE	Amount spent in the (name of city) area	Amount spent outside the (name of city) area
A. Admission/Entry Fees		
B. Restaurants, Bars, Concessions, Night Clubs		
C. Groceries		
D. Retail Shopping (clothing, souvenirs, gifts, etc.)		
E. Lodging Expenses (hotel, motel, B&B, camping, etc.)		
F. Gas and Oil (auto, RV, boats)		
G. Private Auto Expenses (repairs, parking fees, etc.)		
H. Rental Car Expenses, Taxis		
I. Any Other Expenses *Please identify:*		

Questions 7, 8, and 9 are not required for sports tournaments.

7. Would you have come to the (Name of City) area at this time even if this event had not been held? ☐ Yes ☐ No

   7a. If "Yes," did you stay longer in the (Name of City) area than you would have done if this event had not been held? ☐ Yes ☐ No

   7b. If "Yes" (in 7a), how much longer? _____ days

8. Would you have come to (Name of City) in the next three months if you had not come at this time for this event? ☐ Yes ☐ No

9. Circle the number below that best describes how important this (facility/event) was in your decision to visit (Name of City) on this trip, where 0 indicates it had no influence and you would have come to the area anyway and 10 indicates that this (facility/event) is the only reason for visiting (Name of City) on this trip.

0	1	2	3	4	5	6	7	8	9	10
↑					↑					↑
None: I would have come to the area anyway					Half of my reason for coming to the area.					My only reason for coming to the area.

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Chapter 4

Use and Abuse of Multipliers

There is widespread recognition among elected officials and park and recreation professionals that when visitors inject new money into a local community it spreads through its economy like ripples in a pool after a stone has been thrown into it. The concept of the new money being spent and respent, so its initial impact is multiplied, is easy to grasp. However, the operationalization of multipliers is complex and relatively few elected officials or park and recreation professionals have an understanding of the nuances and limitations of multipliers. This has resulted in gross abuses in their calculation, presentation, and interpretation.

Given the complexities associated with multipliers, the wisest course of action for park and recreation professionals is to focus their economic impact efforts on obtaining a good estimate of visitor spending or of direct effects and not attempt to use multipliers. This will remove the high probability that the multipliers applied to the spending data will be flawed. If multipliers are used, then park and recreation professionals could adopt one of two options. The preferred option is to seek out technical assistance from experts who understand the nuances of multipliers. If this is not possible, the following guidelines are for making "best guesstimates":

> To derive direct effect, multiply total visitor spending by .8. For sales multipliers, use 1.2 for small rural areas, 1.4 for larger rural areas, 1.5 for moderate size communities, and 1.7 for state or metro area analyses. To convert to full-time equivalent jobs and to income, national tourism average ratios for direct effects could be used (i.e., 20 jobs per $1 million in sales or 16 jobs per $1 million of visitor spending). The income ratio is approximately 35% relative to sales and 28% relative to spending. These ratios are averages. They will vary by sector, and job ratios are higher in rural areas and smaller in large metro regions (Stynes, 2010).

Notwithstanding this advice, for a variety of reasons there will be occasions when it will not be followed. Further, there will be times when elected officials and professionals will receive studies done by others who include multipliers that they will be required to evaluate. Hence, this chapter is intended to facilitate a better understanding of them.

The Multiplier Concept

The multiplier concept recognizes that when visitors to a facility or event spend money in a community, their initial direct expenditure stimulates economic activity and creates additional business turnover, personal income, employment, and government revenue in the host community. The concept is based on recognition that the industries that constitute an economy are interdependent. That is, each business will purchase goods and services produced by other establishments within the local economy. Thus, expenditures by visitors from outside the local economy will affect not only the business at which the initial expenditure is made, but also the suppliers of that business, the suppliers' suppliers, and so on.

Multipliers are derived from input-output tables that disaggregate an economy into industrial sectors and examine the flows of goods and services among them. The IMPLAN input-output model, which is perhaps the most widely used and is described later in this chapter, has 440 industrial sectors. In essence, an input-output model is an elaborate accounting system that keeps track of the transactions and flows of new money throughout an economy. The process enables a separate multiplier to be applied for each of the industrial sectors affected by the initial direct expenditure.

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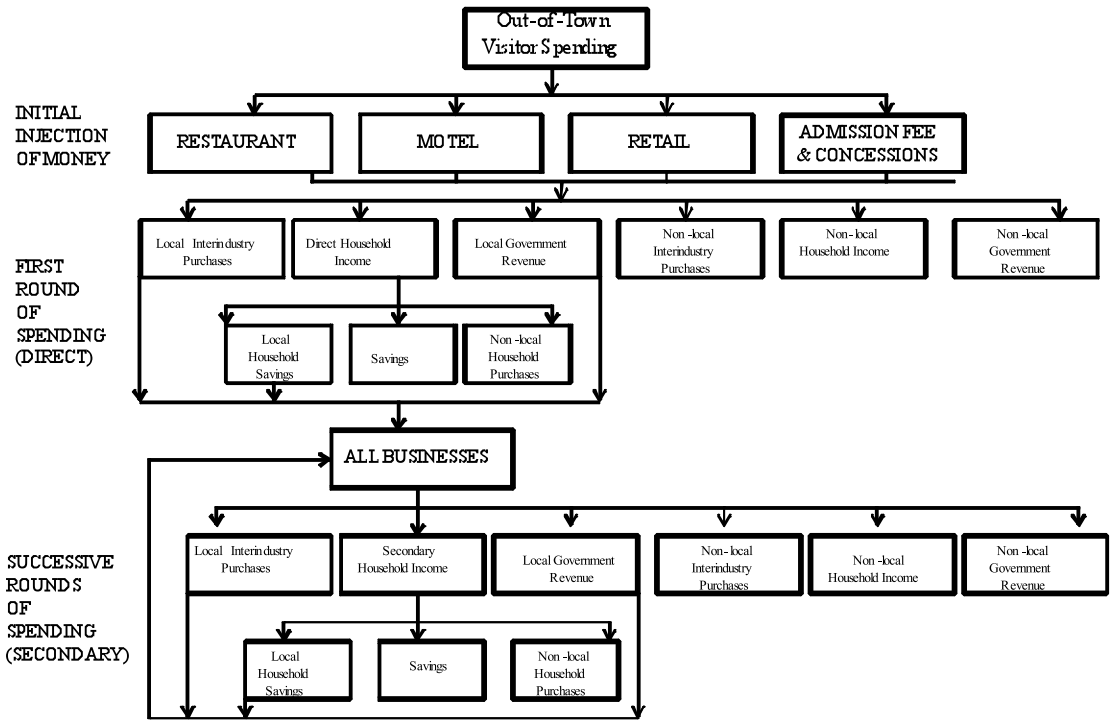
Exhibit 4-1

The Multiplier Effect of Visitor Spending at a Park and Recreation Event



The multiplier process is diagrammed in **Exhibit 4-1**. To illustrate the process, the exhibit assumes that visitors spend their money at four different types of establishments in a community. Their initial injection of money constitutes the direct economic impact on the community. Exhibit 4-1 shows six different ways in which each of the establishments receiving the initial funds could disburse the money it receives. They are:

1. To other private sector businesses in the same jurisdiction (local interindustry purchases) to restock inventories to provide for future sales; to maintain buildings, fittings, and equipment; to pay insurance premiums; and for a myriad of other purposes.
2. To employees or shareholders who reside within the community in the form of salaries and wages or dividends, which constitutes personal income to them (direct household income).
3. To local governments as sales taxes, property taxes, and license fees (local government revenue).
4. To private sector businesses located outside the local jurisdiction (non-local interindustry purchases).
5. To employees or stakeholders who reside outside the community in the form of salaries and wages or dividends which constitute personal income to them (non-local household income).
6. To non-local (e.g., state and federal) governments as sales taxes or taxes on profits.

The latter three categories of spending illustrate that the host city is part of a larger economy. As a result, some money leaks out of the community's economic system to pay taxes to, or buy goods and services from, entities outside the community. Only those dollars remaining within the host community after leakage has taken place constitute an economic gain to the community. The amount of the initial expenditures that remains in the jurisdiction from local interindustry purchases, direct household income, and local government revenue is subsequently spent in one of the six ways previously listed and thereby sets in motion a further chain of economic activity.

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Because local government revenue from taxes and fees is likely to be immediately expended back into the local economy for services the local government provides, this money is considered to remain a source of local stimulus. However, in the case of non-local interindustry purchases, non-local household income, and non-local government leakages (Exhibit 4-1), the direct revenue leaks out of the city and does not contribute any stimulus to the jurisdiction's economy.

Also, some of the direct household income received by local residents may not be spent in the local economy. Rather, some of it may be saved, in which case it contributes nothing further to local economic stimulus (Exhibit 4-1). As far as the community is concerned, saving the household income received is similar to spending it outside the community. The effect is the same in that the economic stimulus potential is lost. Exhibit 4-1 also shows potential leakage from some household income being spent outside the local jurisdiction on non-local household purchases.

Some of the leakage shown in Exhibit 4-1 may not, in fact, be lost to the community. For example, it is possible that employees who reside outside the jurisdiction may spend some of their money within its boundaries, especially if the community is a major retail center for the area. This return of leaked funds is not shown in Exhibit 4-1 for two reasons. First, it is likely to be relatively small in many cases; second, it was concluded that including it in the figure would complicate rather than expedite communication of the multiplier principle.

One of the unknowns is the time it takes for new money to be spent and respent as it circulates through an economy. Does it take a year for the full impact to be realized, or less, or does it take many years (Power, 1988)? Certainly, there is likely to be a time lag before the full impact of new spending is complete and it may have relatively little impact in the short term.

A key feature in people's understanding of the multiplier that is often overlooked is the potential for substantial leakage at each cycle of the multiplier as proportions of the new money go to pay salaries or taxes or to buy goods and services from people or entities located outside the city. Only those dollars remaining in the host community after leakage has taken place constitute the net economic gain.

Constituent Elements of a Multiplier

The three constituent elements of a multiplier are direct effects, indirect effects, and induced effects. It was noted above that visitors' initial expenditures are likely to go through numerous rounds as they seep through the economy, with portions of them leaking out each round until they decline to a negligible amount. These subsequent rounds of economic activity reflecting spending by local interindustry purchases and local government revenues are termed *indirect* impacts.

The proportion of household income that is spent locally on goods and services is termed an *induced* impact, which is defined as the increase in economic activity generated by local consumption due to increases in employee compensation, proprietary income, and other property income. The *indirect* and *induced* effects together are frequently called *secondary impacts*. In summary, the three elements that contribute to the total impact of a given initial injection of expenditures from out-of-town visitors are:

> *Direct Effects:* Direct effects are the first round effects of visitor spending, that is, how much the restaurateurs, hoteliers, and others who received the initial dollars spend on goods and services with other industries in the local economy and pay employees, self-employed individuals, and shareholders who live in the jurisdiction. It is important to note that there is a difference between direct effects and visitors' initial spending. Multiplier models appropriately recognize that spending includes cost of goods sold so they measure direct effects by subtracting the cost of goods sold from visitor spending. Only about 80% of tourism spending in the local area is typically captured by the local economy as direct sales. The other 20% goes to cover the cost of goods sold at retail that are not made locally. This notion of "capture rate" is discussed later in this chapter.

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Indirect Effects: Indirect effects are the ripple effects of additional rounds of recirculating the direct effects dollars by local businesses and local governments.

Induced Effects: Induced effects are the other ripple effects generated by the direct and indirect effects, caused by employees of impacted businesses spending some of their salaries and wages in other businesses in the city.

Sometimes critics in a community argue that the only beneficiaries of visitor spending in a community are businesses and their employees who are the direct recipients of that spending. Indirect expenditures expand this to other businesses that trade with the initial business recipients, while induced income effects are "the tide which raises all boats." These effects disseminate the "new money" widely throughout the community.

Exhibit 4-2

Average Multiplier Coefficients Across Six Visitor-Related Sectors in a Texas City of 90,000 population[a]

Sales			Personal Income			Jobs		
Direct	Direct + Indirect	Direct+ Indirect+ Induced	Direct	Direct + Indirect+	Direct+ Indirect+ Induced	Direct	Direct+ Indirect	Direct+ Indirect+ Induced
.80	1.06	1.24	.29	.37	.58	18.71	22.36	31.07

[a] The direct effects were estimated to be 80% of total visitor spending.

The three different effects are illustrated in **Exhibit 4-2**. For example, the middle column of this exhibit shows that each dollar spent in this city generated 29 cents in direct personal income, another 8 cents in indirect personal income, and an additional 21 cents in induced income.

Operationalization of the Multiplier

The term "multiplier" should more accurately be termed a "multiplier coefficient." A sales multiplier coefficient is calculated by the following formula:

$$\frac{\text{Direct sales + Indirect sales + Induced sales}}{\text{Direct sales}}$$

Interpolating the numbers from Exhibit 4-2 to the formula indicates that the sales multiplier is 1.55.

$$\frac{1.24}{.80} = 1.55$$

Thus, every $1 of visitor spending, or 80 cents of direct effects, would generate $1.55 in sales in the economy.

Similarly, a personal income multiplier would use the following formula:

$$\frac{\text{Direct income + Indirect income + Induced income}}{\text{Direct sales}}$$

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Interpolating the numbers from Exhibit 4-2 to the formula indicates that the total personal income coefficient is .72

$$\frac{.29 + .08 + .21 = .58}{.80} = .72$$

The personal income coefficient indicates that for every 80 cents of direct effects or $1 of total spending injected by visitors into the economy of this city, 72 cents of personal income accrues to residents in the form of employee wages and salaries and proprietary income.

Sometimes studies replace the "direct effects of visitor expenditures" denominator with "direct effects on income." If very high multipliers are reported, for example an income multiplier higher than 1, then it is probably because this type of ratio formula has been used. Over three decades ago, one of the pioneers of economic impact analysis in this field advocated "general abandonment of this approach and consequent removal of the confusion which it creates. It is difficult to envisage how or why such an inappropriate approach has gained such wide usage. It has no basis in economic theory and it provides misleading policy prescription" (Archer, 1984).

One reason it is used by some, even though it is confusing, is because it results in some multipliers, especially personal income multipliers, being larger numbers. For example, if the personal income data from Exhibit 4-2 are interpolated using "direct effect on income" as the formula's denominator, then the multiplier is shown to be 2.48 instead of .72. This could mischievously be interpreted to mean that for every $1 of visitor expenditure (80 cents of direct effects), $2.48 in income is generated. This is inaccurate. It really means that $1.48 in secondary income is generated for every $1 of direct income.

Capture Rates

When visitors purchase retail goods, their total expenditures typically are considered to be new money injected into the economy and, thus, they are entered into a multiplier model. However, if the goods were manufactured outside the community, their cost immediately leaks out of the local economy. Multipliers generally should be multiplied by direct effects which excludes the costs of sales, rather than by total visitor spending. Consider the following example:

> Suppose a visitor purchases a camera for $100 and the retail margin is 30% or $30. If it is assumed that the wholesaler, shipper, and manufacturer all reside outside the local area, the final demand change in the local region is only $30, not $100. A sales multiplier of 1.5 leads to a sales output of $45 not $150. If an income multiplier of, say, .6 is applied, the impact on residents' income is $18 not $60. (Stynes, 2001)

Including all retail spending rather than only retail margins accruing to local firms and failing to omit the cost of goods that are not made locally greatly exaggerates the economic impact: "Rarely will the gasoline that visitors purchase be locally refined and, except for local arts and crafts and agricultural products, the souvenirs that visitors buy are imported from outside the region" (Stynes, 2001).

Margins are associated with all commodities that are sold at the retail level and IMPLAN (which is perhaps the most widely used multiplier model) does have an option that can be specified by the researcher to identify these margins. However, this is rarely used either out of ignorance or because clients want high sales output numbers to legitimize their position. The margin issue does not apply to services that are produced by a business at the time they are purchased because there is no out-of-area cost involved. In the case of, for example, hotels or restaurants, margins are not likely to be a critical issue (except for food purchased outside the area) since most of the purchase price reflects purchase of a service rather than a commodity.

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It has been suggested as a rule of thumb that tourists' total expenditures should be multiplied by about .8 to account for the leakage of manufacturing-related activity for purchases of goods at retail that are not locally made (Stynes, 2010). This rule was adopted earlier in the chapter to calculate the multipliers based on the data in Exhibit 4-2. A more detailed illustration of the impact of capture rates is provided in **Exhibit 4-3**.

Exhibit 4-3

An Illustration of the Impact of Capture Rates[a]

Table A: Visitor Spending

Spending Category/Sector	Total Spending
Hotel	1,150,000
Restaurant	1,200,000
Amusements	500,000
Groceries	350,000
Gas	500,000
Souvenirs	600,000
Total	4,300,000

Table A shows the visitor spending data collected at a hypothetical special event. These visitors assigned their total spending of $4.3 million into six categories.

Table B: Impacts of Spending on the Local Economy

	Direct Effects			Total Effects		
Sector	**Direct Sales**	**Jobs**	**Income**	**Sales**	**Jobs**	**Income**
Hotel	1,150,000	26.6	381,170	1,798,183	32.5	594,875
Restaurant	1,200,000	26.0	373,948	1,796,193	31.4	554,921
Amusements	500,000	9.1	155,272	770,454	11.6	246,077
Grocery Stores	70,000	1.3	29,844	112,328	1.7	44,198
Gas Stations	75,000	1.0	23,331	110,174	1.3	35,292
Souvenirs	300,000	5.4	126,866	483,920	7.1	189,324
Total	**3,295,000**	**69.4**	**1,090,431**	**5,071,252**	**86.6**	**1,664,687**
Average capture rate	77%	– capture rate is total direct sales divided by total spending (3,295,000 ÷ 4,300,000)				

In column 2 of Table B, the visitor spending data are modified to reflect the capture rate in the retail sectors of groceries, gas, and souvenirs. No modifications are included for the hotel, restaurant, and amusement sectors because they are services that do not include significant cost of sales.

For example, 80% of groceries sales value reflects cost of sales for goods that have been imported from outside the local economy. Thus, only 20% ($70, 000) of the total visitor expenditures of $350,000 is captured in the local economy. The local economy capture ratios for gas and general retail are 15% and 50%, respectively. The average capture rate across all six categories is 78%. These modified visitor spending amounts are entered into the multiplier model to show both the direct effects (columns 2-4) and total effects (columns 5-7).

[a] This illustration was developed and provided by Daniel J. Stynes.

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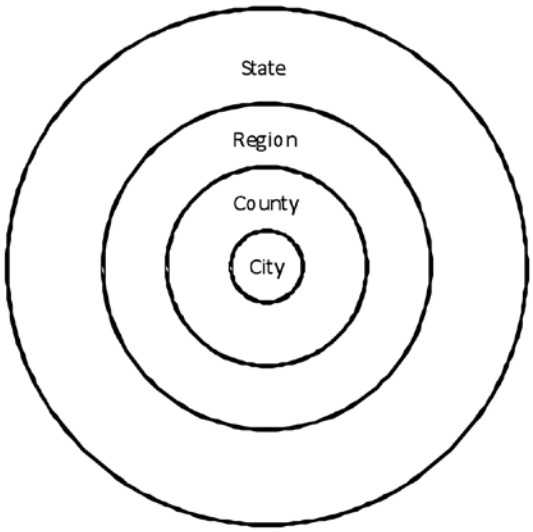
The Influence of a Community's Size and Business Structure on Multipliers

The magnitude of a multiplier is likely to be substantially influenced by the structure of the host community. Structure refers to the degree that businesses, where visitors spend their money, engage in trade with other businesses within the impact area of interest, rather than with enterprises outside the defined geographical area. Communities near major trading centers where the trading centers are located outside the local economy have smaller multipliers due to leakage than do similar communities that contain their own major trading centers.

As a general rule, a smaller community tends not to have the business interdependencies within an economy that facilitate retention of monies spent during the first round of expenditures. Hence, much of the expenditure would be respent outside the local region leading to a relatively low local economic multiplier. Conventional wisdom posits that the larger the defined area's economic base, the smaller the leakage that is likely to occur and the larger is likely to be the value added from the original expenditures.

Exhibit 4-4

Size of Multiplieris Likely to Reflect Size of Geographic Area



In **Exhibit 4-4**, the multiplier for the city is likely to be smaller than that for the county, which will probably be smaller than that for the region, which in turn will be smaller than the multiplier for a statewide economy.

The magnitude of economic impact is strongly influenced by two factors that tend to be countervailing forces: the extent of leakage and the number of non-residents participating. Leakage is likely to be smaller, and hence the multiplier larger, as size of the geographical area increases. However, as geographical area size increases, the proportion of visitors who come from outside an area is likely to decrease. A *small city* event is likely to attract a large proportion of its visitors (say 90%) from outside its boundaries, but it will have large leakage and a small income multiplier (say .2). In contrast, if the economic impact of that event on the *state's* economy is measured, then it is likely that the proportion of visitors attracted to it from outside the state is low (say 5%), but leakage will be small yielding a higher income multiplier (say .8).

Visiting vendors to an event may provide competition with local businesses and generate leakage. The notion of leakage makes it possible for a special event to result in a negative economic impact on a

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community if most of the attractions associated with it come from outside the community. Consider the following scenarios:

- A park and recreation department organizes an event for which the central attraction is a carnival and most visitors are locals. The carnival owners and workers may spend some of their revenues on local supplies and labor, but the leakage of money out of the local economy will likely be significant as the carnival moves on. Thus, the carnival draws money from community residents that would otherwise have been spent locally and spends it elsewhere. (Tyrrell and Johnston, 2001)
- Assume a major local event is held on a particular Sunday and as a result the individual chooses to purchase brunch from event vendors—money that subsequently leaves the region. The expenditure would have occurred regardless of the event. However, as a direct result of the event, an expenditure that would typically be directed to local firms is now directed to firms located out of the region. Accordingly, this represents sales revenues lost to the local region as a direct result of the event. (Power, 1988)

Exhibit 4-5

Personal Income Multiplier Coefficients in Three Cities of Different Sizes

	College Station (90,000)	Des Moines (200,000)	San Antonio (936,000)
Restaurants, Bars, Nightclubs	.55	.78	1.26
Admission Fees	.62	.81	1.07
Groceries	.52	.71	1.08
Retail Shopping	.63	.94	1.12
Lodging Expenses	.51	.71	1.05
Automobile Gas and Oil	.44	.62	.69
Airfares, Rental Cars, Taxis	.38	.49	.81

Exhibit 4-5 reports the income multiplier coefficients used to estimate the economic impact of special events held in three cities: College Station, Texas (population 90,000); Des Moines, Iowa (200,000); and San Antonio, Texas (936,000). This exhibit illustrates two points.

First, as the size of the cities increase, the multipliers become larger. Larger communities are more likely to have greater interdependencies among businesses so there is less leakage out of their economies.

Second, the coefficients are different for each category of expenditure that is listed. For example, in College Station, a $1 expenditure by visitors in retail shopping yielded 63 cents in personal income to residents, while $1 spent on commercial transportation yielded 38 cents in personal income. This is because most expenditures on commercial transportation (primarily airfares and to a lesser extent rental cars) are paid directly to companies based outside the community whose operating personnel and suppliers also are primarily from outside the community. In contrast, most personnel and service suppliers to retail stores come from inside the city, so they are more extensively linked to other elements of the local economy[1].

[1] N.B. it should not be assumed that the industry sectors with the highest multiplier coefficients contribute most to the local economy, because high volume of expenditures in a sector may compensate for a relatively low multiplier. Sectors with high multiplier values in which there are low levels of spending may not be as valuable as sectors with low multiplier values that have high levels of spending.

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Interpreting Sales and Income Multipliers

Three different types of economic impact measures are commonly reported: sales, personal income, and employment. A **sales or output measure** reports the direct, indirect, and induced effect of an extra unit of visitor spending on economic activity within a host community. It relates visitor expenditure to the increase in business turnover that it creates. Sales output is a rather esoteric measure with very limited practical value. It may be of some interest to economists interested in researching industry interdependencies or to business proprietors interested in sales impacts, but it does not offer insights that are useful for guiding policy decisions of local elected officials.

The **personal income measure** of economic impact reports the direct, indirect, and induced effect of an extra unit of visitor spending on the changes that result in level of personal income in the host community. In contrast to the sales output indicator, the income measure has substantial practical implications for stakeholders because it enables them to relate the economic benefits received by residents to the costs they invested. The income coefficient reports the income per dollar of direct sales that accrues to residents and it includes employee compensation and proprietor income. Exhibit 1-1 and Exhibit 1-2 showed that the ratio of the economic benefits residents receive in return for costs they invested in an event, tournament, or facility, provides the fundamental rationale for undertaking economic impact analysis.

Exhibit 4-2 reported the sales output, personal income, and employment (jobs) multipliers for a selected city. The formula that used these data earlier in this chapter to calculate sales and income multipliers illustrated that the values of **sales** indicators are substantially higher than those of **personal income** measures. For example, the formulas indicated that on average, each $1 expenditure by visitors (80 cents in direct effects) will generate 72 cents in personal income for residents of the city, but business activity in the city is likely to rise by $1.55. If analysts do not clearly define which economic impact measure is being discussed, then there is a danger that inaccurate, exaggerated, spurious inferences will be drawn from the data.

In an analysis of a park and recreation agency special event, sports tournament, or facility, sales measures of economic impact are not of interest to local residents. The point of interest is the impact of visitors' expenditures on residents' personal incomes. Most government officials and taxpayers are likely to be interested only in knowing how much extra income residents will receive from the injection of funds from visitors. Their interest in value of sales per se is likely to be small because it does not directly impact residents' standard of living. Further, the use of sales indicators may give a false impression of the true impacts of visitor spending because the highest effects on personal income are not necessarily generated from the highest increase in sales, and the income effect may not be uniform across income classes.

The conceptual model shown in Exhibit 1-1, which illustrates the rationale for economic impact studies, specifies that their purpose is to compare how much money residents invest in a park and recreation event or facility, with how much income they receive from it. The notion of sales transactions does not appear anywhere in the model and, from the perspective of residents and elected officials, it is irrelevant to the analysis.

Nevertheless, because sales measures of economic impact are generally two or three times larger than personal income indicators, sponsors of economic impact studies invariably report economic impact in terms of sales outputs rather than personal income. The higher numbers appear to better justify the public investment that is being advocated, but they are meaningless for this purpose and mislead rather than inform those charged with using this information to guide public policy. The use of sales rather than income multipliers, probably means that inaccurate, exaggerated, spurious inferences will be drawn from the data, as most stakeholders are uninformed as to the differences between sales and personal income measures.

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Interpreting Employment Multipliers

An **employment** multiplier coefficient measures the direct, indirect, and induced effect of an extra unit of visitor spending on employment in the host community. Employment multipliers are expressed in terms of number of jobs per million dollars in direct sales. Exhibit 4-2 showed the average employment coefficients across six industries. It indicates that for every $1 million in direct sales in those six industries by visitors from outside the area, 31 jobs would be created: approximately 19 direct jobs, 3 indirect jobs (22·36-18·71), and 9 induced jobs (31·07-22·36).

There are three important caveats regarding the estimates of employment that should be noted. First, estimates include both full-time and part-time jobs, and do not distinguish between them. The employment measurement does not identify the number of hours worked in each job or the proportion of jobs that are full- and part-time. However, it seems reasonable to posit that local businesses are unlikely to hire additional full-time employees in response to additional demands created by a tournament or event because the extra business demands will last only for a few days. In these situations, the number of employees is not likely to increase. Rather, it is the number of hours that existing employees work that will increase. Existing employees may be requested to work overtime or released from other duties to accommodate this temporary peak demand. At best, only a few very short-term additional employees may be hired. It is improbable that 31 jobs will be created in city A if an extra $1 million expenditure attributable to an event is forthcoming (Exhibit 4-2). The few jobs that do emerge will probably be short-term and part-time jobs. However, decision makers easily may be misled into assuming these are full-time positions.

Second, the employment estimates assume that all existing employees are fully occupied, so an increase in external visitor spending will require an increase in level of employment within the jurisdiction. In the context of the hotel's front desk, for example, the employment estimator assumes that the existing staff would be unable to handle additional guests checking in for overnight stays associated with a tournament. However, in many cases, they are sufficiently underemployed to do this, so additional staff would not be needed. In these situations, the employment coefficient is exaggerated. Further, it has been noted that even after businesses have fully used their existing capacity:

> Expansion is likely to depend on the businesses' longer-term expectation about whether the additional spending is temporary or permanent. In either case, the additional hiring may be delayed for a significant time. This will slow each cycle of expansion and possibly stretch the total expansion out over a lengthy period. (Power, 1988)

A third potentially misleading corollary of employment estimates is that they imply all new jobs will be filled by residents from within the community. However, it is possible that some proportion of them will be filled by commuters from outside the community. In these cases, it is inappropriate to conclude that all the jobs benefit the community's residents.

The first and second caveats suggest that the employment multiplier coefficient is an inappropriate output measure for reporting the economic impact of short-term events such as festivals and sports tournaments. It becomes appropriate only when the focus is on park and recreation facilities, such as parks, golf courses, zoos, and so forth, where a consistent flow of visitors from outside the area to the facility suggests that full-time jobs are likely to be created.

Using and Interpreting IMPLAN

Until approximately a decade ago, estimating the multiplier effect of visitor expenditures in a community was a laborious, complex, and expensive task. Trained economists had to be hired to construct an input-output model to examine relationships within the local economy both between businesses, and between businesses and final consumers. This required the collection of large amounts of data from local industries. The only practical recourse for most agencies wanting to incorporate an indicator of the multiplier effect was to use an arbitrary coefficient that purported to be "conventional wisdom." Such

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"guesstimates" had no empirical basis and often were unreasonably high because they were promulgated by advocates of the facility or event.

In the past decade, this situation has changed. There are now several models available that can produce local input-output relationships. The most widely used of these are RIMS II, REMI, and IMPLAN. Of these, IMPLAN is probably the most widely used at the community level.

There are two components to the IMPLAN system, the software and the databases. The software performs the calculations and the databases, updated annually, provide all the information needed to create the IMPLAN input-output models. They provide information from 440 different industrial sectors, closely following the North American Industry Classification System and accounting conventions used by the U.S. Bureau of Economic Analysis.

The databases incorporate comprehensive data for the entire United States. They are available in standard form at the county, state, and national level and can also be customized and made available at the ZIP-code level. An input-output model can be defined for a section of a city, a single city, a single county, several counties, a state, a group of states, or the entire United States. However, the use of ZIP codes to define a study area smaller than a county is likely to lead to some overstatement of the induced effects because it is derived by a proportional reduction of a larger county database. This assumes that employees live within the ZIP code area in the same proportions as in the larger database. The smaller the area, the less likely this is true, which causes the induced effects to be overstated leading most economists to advise against defining local areas below the county level.

To run a local economic analysis, both the statewide and local county input-output models and databases are needed. The current cost of purchasing these (they are typically under $1,000) can be found at www.IMPLAN.com. An individual trained in the use of IMPLAN can produce the economic impact measures in a few hours once the expenditure data have been entered into the model.

An Illustration of the Implications of Abusing the Fundamental Principles of Economic Impact Analysis and Multipliers

The magnitude of distortion that occurs when the principles of economic impact analysis and multipliers are abused was vividly illustrated to the author when he reported to a city's park and recreation board the results of an economic impact study of a festival incorporating more than 60 events during a three-week period in a large city. This study estimated the economic impact on residents' incomes to be approximately $16 million. The data that were reported are shown in **Exhibit 4-6**, p. 48, (Crompton and McKay, 1994).

At the conclusion of the presentation, some board members quickly challenged the results arguing that they were much too low. They observed that two weeks previously, the city council had heard a similar presentation from the convention and visitors bureau relating to a professional rodeo event the city hosted annually. The council members were informed that the economic impact of the three-day professional rodeo event was almost $30 million. The conundrum confronting the park and recreation board was posed in the following terms:

> How can we possibly accept that this festival lasting for 3 weeks and embracing more than 60 events had a smaller economic impact than a 3-day rodeo? The city council provides a substantially larger budget to the park and recreation department to stage the festival than they allocate to the convention and visitors bureau to host the professional rodeo event. When they compare the festival data, which have been presented to us, with those from the rodeo, there is a real possibility that the festival budget will be cut, because the festival costs much more to stage and its economic impact on the city is barely half that of the rodeo. (Crompton and McKay, 1994)

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Exhibit 4-6

Economic Impact on Personal Income of Visitors to a Festival

Items	Personal Income	Number of Jobs Created*
Restaurants, Bars, Nightclubs	5,088,151	328
Admission Fees	874,005	67
Groceries	753,562	28
Retail Shopping	3,012,571	193
Lodging Expenses	4,449,879	256
Automobile Gas and Oil	502,541	25
Rental Cars, Taxis	1,319,433	54
Other Expenses	139,305	9
TOTAL	**16,139,447**	**960**

*This figure refers to both full-time and part-time jobs. It assumes the local economy is operating at full capacity and that there is no slack to absorb additional demand created by these events.

When a copy of the rodeo economic impact study was reviewed by the author, it was found that it abused four central principles. The study included local residents, included time-switchers and casuals, used sales output as the measure of economic impact, and implied full-time jobs resulted from the visitors' expenditures. The author's response in his subsequent presentation to the city council was to replicate the presentation made to the park and recreation board, but then to extend it by referring to the rodeo study and showing the results if those erroneous assumptions were applied to the festival.

The data in **Exhibit 4-7**, p. 49, include time-switchers and casuals and sales multipliers. Respondents were asked questions that showed 27% of non-local participants were time-switchers who would have visited the city if the festival had not been held, but the festival influenced their decision to come at that time. Another 43% were casuals who would have come to the city at that time, irrespective of the event. They went to the festival because it was an attractive entertainment option while they were in the community. By inappropriately including those individuals in the analysis and by focusing attention on sales rather than personal income multipliers, the "economic impact" was claimed to be $125 million (as compared to $16 million in Exhibit 4-6).

Exhibit 4-8, p. 49, is the most egregious exaggeration of "economic impact" because it inappropriately includes local residents in the analysis; it prominently displays economic activity in terms of value of sales; it includes time-switchers and casuals; and it displays total jobs created, failing to note (as in the original rodeo study) that they are a combination of part-time and full-time jobs and that they are unlikely to be sustained because the festival will not provide a consistent flow of visitors throughout the year. Indeed, the results in Exhibit 4-8 are a measure of the festival's economic significance *not* of its economic impact (Chapter 2).

This illustration demonstrates the wide range of numbers that purport to measure economic impact that may be presented to stakeholders from the same set of primary data. If a press conference was held in city X to report the festival's economic impact, the organizers could, at one extreme, announce that the sales output from economic activity associated with the festival was more than $321 million and that it generated 8,258 jobs implying they were full-time permanent positions (Exhibit 4-8). At the other extreme, they could announce that the economic impact of the festival on personal income was approximately $16 million and that while the analysis showed it generated 960 part-time or full-time jobs, there were some

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Exhibit 4-7

The Spurious Measures of "Economic Impact" That Resulted When Time-Switchers and Casuals Were Included and Sales Multipliers Used

Items	Total Sales	Personal Income	Number of Jobs Created*
Restaurants, Bars, Nightclubs	37,859,887	16,737,554	1,078
Admission Fees	7,837,688	2,875,055	222
Groceries	4,555,057	2,478,865	91
Retail Shopping	23,545,491	9,909,880	635
Lodging Expenses	35,124,109	14,637,961	843
Automobile Gas and Oil	4,744,930	1,653,118	84
Rental Cars, Taxis	10,710,664	4,340,311	179
Other Expenses	1,088,768	458,243	29
TOTAL	**125,466,594**	**53,090,987**	**3,161**

*This figure refers to both full-time and part-time jobs. It assumes the local economy is operating at full capacity and that there is no slack to absorb additional demand created by these events.

Exhibit 4-8

The Spurious Measure of "Economic Impact" That Resulted When Local Residents, Time-Switchers, and Casuals Were Included and Sales Multipliers Used

Items	Total Sales	Personal Income	Number of Jobs Created*
Restaurants, Bars, Nightclubs	109,196,634	48,238,234	3,110
Admission Fees	38,691,412	14,200,095	1,095
Groceries	20,163,133	10,987,611	402
Retail Shopping	66,934,134	28,159,101	1,805
Lodging Expenses	47,872,258	19,922,456	1,148
Automobile Gas and Oil	14,727,339	5,123,586	259
Rental Cars, Taxis	22,146,640	9,126,217	370
Other Expenses	1,874,950	1,076,825	69
TOTAL	**321,606,500**	**136,834,125**	**8,258**

*This figure refers to both full-time and part-time jobs. It assumes the local economy is operating at full capacity and that there is no slack to absorb additional demand created by these events.

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assumptions which make it likely that this number is optimistic (Exhibit 4-6).

The media, general public, city council, and other relevant publics are unlikely to be aware of the underlying assumptions, subtleties, and potential error sources associated with economic impact studies. The lack of sophistication and the apparent objectivity conveyed by the numbers make it tempting for advocates to act unethically.

Clearly, there is an ethical conundrum. Acting ethically when others do not, could critically damage the event's standing. If the correct $16 million figure for city X is presented, the festival's economic contribution is likely to appear relatively insignificant compared to other events that announce the equivalent of the $321 million figure as their estimated economic impact. The relatively small impact of the festival is likely to translate into commensurately less political and resource support for it from decision makers, and perhaps, ultimately, even withdrawal of appropriations for it. Acting ethically when others do not could critically damage the festival's standing.

Alternatively, some may rationalize that it is equitable to use the same set of measures to compare the economic contributions of events, even though the results of all of them are grossly misleading. If such a position is accepted, then abuses incorporated into one economic impact analysis become contagious. When precedent has been established in one study, others are likely to feel compelled to knowingly perpetuate the abuse by incorporating the misleading procedures into their own analyses. If they fail to do so, then the economic impact attributed to their event or facility is perceived to be lower than that reported by others and thus less worthy of public investment.

To resolve this ethical conundrum, it is recommended that all three measures—personal income, sales, and jobs—be reported so like measures can be compared to like, but that the limitations of the sales and jobs measures be emphasized. **Exhibit 4-9** offers a suggested general template.

Exhibit 4-9

A Suggested Template for Discussing Economic Impact Multipliers

There is frequently confusion and misunderstanding in interpreting multipliers. It has become commonplace for tourism, economic development, and other agencies to report economic impact in terms of sales generated. In our view, this is of no value to elected officials or residents. It is used because it generates the highest economic impact number; but residents have no interest in sales generated, they are primarily interested in how it impacts them in terms of personal income.

The jobs' economic impact data often are similarly mischievously interpreted. For example, consider a jobs multiplier associated with a particular event which indicates that as a result of the event (say) 5.7 jobs were generated. This outcome, however, is improbable. Local businesses are unlikely to hire additional full-time employees in response to additional demands created by a short-term event because the extra business demand will last only for a few days. In these situations, the number of employees is not likely to increase. Rather, it is the number of hours that existing employees work that is likely to increase. Existing employees are likely to be requested to work overtime or to be released from other duties to accommodate this temporary peak demand. At best, only a few short-term additional employees may be hired for the duration of the event. Hence, it is improbable that anything like 5.7 jobs will be created.

This figure of 5.7 is further misleading because in calculating it, the input-output model assumes (1) there was no spare capacity to absorb the extra services and products purchased with this inflow of new funds, and (2) that no out-of-town residents took any new jobs that did emerge. In fact, the existing staff at hotels, restaurants, retail establishments, and so forth is likely to have spare capacity to handle these visitors. If they do not, then it is likely that managers will reorganize shift schedules or pay overtime.

The most useful economic impact indicator is that which measures the event's contribution to the personal incomes of residents. Indeed, it was demonstrated in Exhibit 1-1 that this is the primary rationale for undertaking economic impact studies. However, personal income is rarely used because it is generally about three times smaller than the sales impact. Nevertheless, it is the indicator that is likely to be most meaningful to residents and to elected officials for informing their policy decisions.

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Chapter 5

Consideration of Costs

The numbers emerging from an economic impact study represent only the gross economic benefits associated with an event. Too often, only positive economic benefits associated with visitors are reported, and costs of negative impacts borne by a community are not considered. If there is an increase in economic impact in a local economy, it is probable that there also will be an increase in costs associated with it. It has been suggested that "ignoring these costs is roughly equivalent to a certified public accountant omitting a balance sheet's liabilities and then touting the success of the company" (LaFaive, 2009).

Community stakeholders are likely to be more concerned with net, rather than gross, economic benefits. This involves identifying the costs associated with an event and deducting their economic value from the positive economic impacts shown by an analysis. Clearly, if costs exceed the benefits then, even if there is a relatively high gross economic impact, the event may not be a good investment for the community.

Incorporating costs into a study changes it from an economic impact analysis to a benefit-cost analysis. In the author's view, decision makers should be attempting to use benefit-cost analysis when evaluating alternative investments, despite the difficulties associated with deriving accurate costs. Four types of costs should be considered: (1) event costs, (2) infrastructure costs, (3) displacement costs, and (4) opportunity costs. Each is discussed in this chapter.

Event Costs

Most elected officials are unaware of the magnitude of investments needed to support a major event. The costs are likely to be substantial and in many cases, park and recreation departments are expected to meet those costs from revenue streams associated with the event.

Exhibit 5-1, p. 53, shows an agency's budget for hosting a Fast Pitch Softball National Tournament. The event attracted 160 teams, who spent more than $2 million in the community during the six days of the tournament. This large economic impact means that there is considerable competition among communities to host such events. The bid fees to the organizing associations who sanction the championships are substantial, as are the costs of hosting the event. Exhibit 5-1 shows the city's total investment was close to $300,000. It also shows the revenue streams that raised over $180,000. The net investment by the city was $118,000, and it yielded more than $2 million in direct economic impact to the community.

Infrastructure Costs

Infrastructure costs may be both on-site and off-site. On-site costs include the cost of additional equipment or supplies, the cost of additional labor contracted by an agency to assist with an event, and cost of the time invested in the project by the agency's existing employees. In Exhibit 5-1 for example, the costs incurred by the city parks and recreation department in hosting a softball tournament were tracked, recorded, and included in the analysis, so the economic impact net of on-site infrastructure costs could be presented.

When large numbers of visitors are attracted to a community, they are likely to create extra demands on its services and inflict social costs on community residents. Off-site infrastructure costs borne by a community may include such elements as traffic congestion, road accidents, vandalism, police and fire protection, environmental degradation, garbage collection, increased prices to local residents in retail and restaurant establishments, increased costs to other businesses seeking new workers if there is a shortage of labor supply, loss of access, and disruption of residents' lifestyles.

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Exhibit 5-1
USA/ASA 16UA Girl's Fast Pitch National Tournament Budget

TOURNAMENT EXPENSES			
Products		**Services**	
Label machine - bracket boards	$236.93	Technical computer assistance	$500.00
Label tape - bracket boards	$159.92	Band - Opening Ceremonies	$2,000.00
Laminate - signs and information	$324.00	Meal for band	$51.41
Water hoses - food tent	$137.88	DJ - Opening Ceremonies	$350.00
Tablecloths - food tent	$137.79	Sound system - Opening Ceremonies	$800.00
Pens and markers - check in	$12.60	Air Jump Inc - bounce houses	$1,497.50
Tables/Water/Batteries - check in	$573.36	Banquet managers meeting	$11,820.84
Containers for PA system	$23.88	Catering BBQ - Opening Ceremonies	$28,500.00
Cone cups/Amplifiers/Microphones	$1,057.37	Concession services - Opening Ceremonies	$2,500.00
Cup holders for dugout water coolers	$403.69	Water & Sausage - Opening Ceremonies	$295.28
Ice chest for score keepers' water	$139.93	BVSUA - foor for umpires	$1,500.00
Ice chest for gate workers' water	$99.96	BVSUA - game fees	$28,950.00
Envelopes - team packets	$16.58	BVSUA - game fees additional	$9,360.00
Envelopes/Paper clips/Binders/Printing	$668.91	BVSUA - mileage for umpire travel	$4,500.00
Glue dots & adhesive putty - signs team check in	$25.21	Score keepers & announcers	$10,476.00
Mason jars - pool draw at managers' meeting	$13.99	Lodging for umpires - Econolodge	$21,347.50
Cleaning supplies - facility cleanup	$39.17	**Sub total**	**$124,448.53**
Sunscreen - for workers	$8.97	**ASA Assessment Fees & Reps**	
Label tape - bracket boards	$30.91	ASA Rep, Umpire UIC, Assistant UICs	$2,400.00
Tab dividers/Hole punch/Stapler/Etc.	$122.89	Bid Deposit	$1,000.00
Wristbands - tournament passes	$1,825.00	ASA Assessment Fees (Advance)	$20,000.00
Wristbands - daily passes	$55.40	**ASA Assessment Fees (Final)**	**$43,000.00**
Wristbands - daily passes	$67.30	**ASA District 30 Assessment Fees**	**$4,000.00**
Wristbands - Opening Ceremonies	$1,093.00	**Sub total**	**$70,400.00**
Decorations - Opening Ceremonies	$2,000.00	**Staff / Workers**	
40 x 40 tent - eating area	$1,105.00	**Tournament Prep Workers - Athletics**	
30 x 30 tent - service line	$665.00	**Full time**	**$462.16**
Assorted chips - Opening Ceremonies meal	$1,346.40	**Part time seasonal**	**$21,469.17**
Misc snacks - Opening Ceremonies workers	$67.75	**Overtime**	**$26,560.09**
Signs - Opening Ceremonies	$1,413.35	**FICA, etc.**	**$6,122.92**
Binders - team packets & college roster books	$329.34	**Opening Ceremonies concert workers**	**$761.95**
Binders - team packets & college roster books	$918.16	**Field maintenance crew**	**$8,556.72**
Padfolios - gift to team managers & umpires	$1,768.00	**Sub total**	**$63,933.01**
Carabiner fan - gift to players	$3,090.00		
Mini bats - pool draw & umpire gift	$1,260.00	**TOURNAMENT REVENUE**	
Texas magnets - bracket draw	$387.00	**Entry Fees (160 teams at $350)**	**$56,000.00**
Tournament staff shirts - polos	$1,955.00	**Gate Fees**	**$103,169.00**
Check in staff shirts - polos	$1,320.00	**Souvenir Sales %**	**$21,080.94**
Maintenance staff work shirts	$1,717.50	**Programs**	**$1,237.00**
Softballs - tournament play	$1,541.70	**Total Revenue**	**$181,486.94**
Programs	$8,763.00		
Block ice - dugout water coolers	$689.50		
Trophies - individual and team	$1,588.77		
Powerade - umpires and staff	$940.40		
Quench sports drink - umpires and staff	$95.76	**Grand Total Cost**	**$299,351.25**
Lunch - at Opening Ceremonies	$303.52	**Total Tournament Revenue**	**$181,486.94**
Water - Opening Ceremonies	$29.92	**Profit/Loss**	**$(117,864.31)**

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Translating some of these impacts into economic values is relatively easy (for example, costs of extra police or fire protection and off-site clean-up costs), but in other cases it is difficult, which is one reason why these costs are usually ignored. If some of these costs cannot be translated into economic values, they should at least be described, qualitatively assessed, and included in a presentation to a legislative body to be considered in an evaluation of an event's net benefits. An alternative approach is to monitor the level of residents' tolerance for these off-site costs during the event, and a questionnaire instrument for this purpose has been developed (Ap and Crompton, 1998).

Displacement Costs

There is some likelihood that visitors from outside a community who are attracted by a park and recreation agency event or facility may displace other visitors who otherwise would have come to the community but did not, either because they could not obtain accommodations or because they were not prepared to mingle with crowds attracted by the event.

Data for economic impact studies are collected by surveying visitors who are in the area for the event. Each visitor then is regarded as a source of new economic impact. However, if each visitor merely replaces another potential visitor who stayed away from the community because of the congestion associated with the event, then there is no new economic impact:

> What the survey technique cannot identify and sample are those not in the area who, but for the event, would have been. If the foxes held their convention in the hen house, this survey technique would attribute positive impacts to the foxes and never notice that all the hens were gone. (Porter, 1999)

While the scale of a park and recreation event would obviously be much smaller, the displacement cost principle was illustrated by events at the Atlanta Olympic Games described in **Exhibit 5-2** (Ratnatunga and Muthaly, 2000).

Exhibit 5-2

Illustration of the Displacement Cost Principle

"To the surprise of all, the masses never came. Further, those that came did not spend the money expected of them. The tour buses sat empty and the area's attractions remained relatively unseen. The Olympic consumer proved a very different marketing customer from the ordinary tourist or business traveler: an unpredictable hybrid—sports mad, tight-fisted, and uninterested in traditional tourist attractions. It has been estimated that on average, spectators at the Atlanta Games spent just $15 a day after accommodation and transport. Normal business travelers, by comparison, would spend $350 a day and ordinary tourists about $100 a day on a similar basis."

Olympic guests had no interest in eating out, visiting attractions, or retail shopping because they spent so much time getting to venues and sitting through events that by the end of the day, they wanted to relax in front of the television. Consequently, they spent much less than regular visitors to Atlanta, whom they displaced.

Opportunity Costs

Opportunity costs are the benefits that would be forthcoming if the public resources committed to a park and recreation project were (1) redirected to other public services or (2) retained by the taxpayer. Government investment in park and recreation projects and programs will have an economic impact, but the key question is, compared to what? Does government spending on parks and recreation stimulate the economy more than other kinds of investment? Almost 30 years ago, one of the pioneers of using economic impact studies observed the following:

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> Any attempt to measure the benefits from particular economic activities requires some assessment of the real cost to society of devoting resources to that activity and a comparison with the benefits to be obtained from the allocation of these resources to other activities. (Archer, 1977)

Conceptually, for an investment of public money to be justified, it must meet the criterion of *highest and best use.* That is, it should yield a return to residents that is at least equal to that which could be obtained from other ventures in which the government entity could invest. The issue of opportunity costs is the fundamental social issue associated with government investment in parks and recreation. The key question is not whether an investment in parks and recreation is likely to have a positive economic impact. Rather, it is whether more benefits would be generated from any number of alternative government or private sector expenditures. A positive economic impact does not mean that a park and recreation project or program should be supported because the opportunity cost associated with this investment may be unacceptably high.

Exhibit 1-1 showed that money used to create park and recreation facilities and events has been contributed by community residents in the form of taxes. This represents an opportunity cost because residents are likely to have spent those funds in the community if the government had not taken them. In essence, the government may be perceived as spending it for them, so the net gain to the community is zero.

Every dollar that local governments spend in an economy must first be taxed or borrowed. Hence, the money is merely redistributed from one group of people to another:

> Removing water from one end of a swimming pool and pouring it in the other end will not raise the overall water level—no matter how large the bucket. Similarly, redistributing dollars from one part of the economy to another will not expand the economy, no matter how much is transferred. (Riedl, 2010)

It is tempting to believe park and recreation investment creates new income and jobs because economic impact studies report these benefits. What such studies do not report, however, is the income and jobs that would have been created elsewhere in the community with those same dollars if they had not been used for this purpose.

It may be argued that when residents are taxed to support an event or facility, the negative multiplier effect of taxing residents is likely to offset any positive multiplier:

> Everybody who pays a dollar in taxes to support the facility must reduce his or her spending. The diminished spending goes round and round, just like the positive multiplier effect. The studies supporting [park and recreation] projects never mention that counter effect assuming that the cost of capital is free. (Keaton, 1999)

In a glossy brochure publicizing the results of the economic impact of park and recreation agencies in Illinois, a prominent headline proclaims, “73 cents of every dollar spent by park and recreation agencies stays in Illinois” (Illinois Association of Park Districts, 2005). This could be interpreted to mean that if the residents of Illinois who were obligated to provide the taxes that are used to fund public park and recreation agencies had been permitted to keep that money and spend it themselves, and if more than 73% of their spending occurred within the state, then Illinois residents would be economically stronger if there were no park and recreation agencies!

The emphasis placed on multipliers in economic impact analysis may lead the unwary to suppose that there is some unique property conferred on income and employment generation resulting from events or facilities that is not shared by other sectors of the economy. The inclusion of opportunity cost in an analysis recognizes that this is not the case. “It is the comparative size of the multiplier that is important, not simply the fact that a multiplier exists” (Hughes, 1982). This commentator goes on to note that the empirical literature indicates a visitor expenditures multiplier “at best probably reflects an average value added compared with other sectors. References to the multiplier as a significant advantage need to be seen in this context.”

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Another dimension of opportunity cost relates to the distributional consequences of a public investment:

> Who benefits and who pays should be a standard part of any impact analysis…The "big number" buries all of the assumptions and doesn't identify the winners and losers; thus, "Everybody Wins." In most cases, the winners are those who already have political or economic clout and the losers don't know the difference. (Stynes, 2006)

A typical economic impact analysis will conclude that a project will generate (w) dollars of sales, (x) dollars of personal income, (y) jobs, and (z) taxation revenue to government entities. The input-output models and the economic procedures involved in the study are likely to be complex for lay people to understand and evaluate, and ostensibly they appear to have scientific merit. Thus, the frequent claim "that the best scientific model available shows that (x) dollars of income and (y) jobs will be generated by a project" helps to carry the day. However, this conclusion may be erroneous because it has ignored costs of the project and, thus, is based on an incomplete analysis.

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Chapter 6

Principles Illustrated in Results from a Selection of Park and Recreation Economic Impact Studies

During the past decade, the author's research teams have undertaken numerous economic impact studies at (1) sports tournaments, (2) special events, (3) recreation facilities, and (4) park facilities. This chapter reviews findings from a selection of studies in each of those four areas.

The intent is to identify patterns in these results that illustrate generalizable principles. Researchers will be quick to point out that the per person expenditures reported in these studies are likely to differ from those obtained in studies undertaken at similar events or facilities elsewhere, because most of the studies reported here were done in Texas; limited resources meant that often non-probability samples had to be used; and the contexts of each event and facility were different:

> Unique factors include the geographic proximity of the participating teams to the host site, novelty of the destination for spectators and participants, the size of the sport venue, the location of the sport venue, the location of the sport venue to the business district, the level of supporting infrastructure in the host community, changes in the format of the event (e.g., amount of rest between matches), and time between qualifying tournaments and the championship tournament. The shorter the time, the less opportunity for sport tourists to plan their trip. The amount of positive or negative media attention, promotional budget, weather, and accessibility also play a factor in the economic impact outcomes. (Delpy and Li, 1998).

Notwithstanding these reservations, in contexts and communities where managers have no empirical data but are required by stakeholders to provide estimates of visitors' expenditures and economic impact, or need such estimates to help reposition their agency, the results from these case studies suggest useful parameters for providing "intelligent guesses."

Beyond the basic utility of providing data for intelligent guesses of visitor expenditures, there are patterns in these results that offer guidance to park and recreation managers on economic impact issues.

Sports Tournaments

Exhibit 6-1, p. 58, reports the expenditures of participants in 14 sports tournaments held in College Station, Texas. The following points emerged:

1. In all cases, the data were collected on-site in personal interviews. However, for junior events, the participants' parents/coaches were interviewed rather than the athletes because they were responsible for making the expenditures.
2. The proportion of participants who were from the local area was less than 5% in every tournament and in some it was zero.
3. Economic impact is likely to be a function of both number of non-local participants *and* length of stay. Thus, the largest expenditures in Exhibit 6-1 were at events 11 and 6 where the modal lengths of stay were 6 and 4 nights, respectively.
4. If an overnight stay is not required, then the economic impact on the community is likely small. Some participants in some of the events in Exhibit 6-1 elected to commute and their spending was much lower. This accounts for the big difference between per day and per night expenditures,

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Exhibit 6-1
Expenditures at 14 Sports Tournaments

Event Name	Number of Teams	Number of Participants	Overnight Stay (mode)	Number of Non-Local Participants	Number of Non-Local Participants Surveyed	Per Day Per Non-Local Participant Expenditure		Per Night Per Non-Local Participant Expenditure		Total Expenditures Per Non-Local Participant		Total Expenditures of All Non-Local Participants in the Local Area	
						Mean	Median	Mean	Median	Mean	Median	Mean	Median
1. American Junior Golf Tournament	–	132	3	132	27	$209.36	$200.00	$267.17	$245.00	$1,002.25	$900.00	$132,297.00	$118,800.00
2. Brazos Valley Senior Games	–	410	1	313	51	$59.56	$40.00	$171.89	$144.50	$110.86	$85.00	$34,699.18	$26,605.00
3. Lone Star Softball Budweiser Adult Softball Tournament	275	4125	1	3741	397	$85.46	$67.50	$173.53	$135.63	$181.31	$136.25	$678,280.71	$509,711.25
4. Brazos Valley Tennis Association Junior Tournament	–	677	1	677	80	$132.30	$106.25	$373.20	$322.50	$270.75	$222.50	$183,297.75	$150,632.50
5. Great American Basketball Shootout	112	1344	2	1344	114	$109.91	$105.93	$182.03	$167.50	$326.44	$312.50	$438,735.36	$420,000.00
6. Texas Grand Slam Tennis	–	850	4	850	149	$143.69	$141.43	$190.58	$188.33	$783.44	$755.00	$665,924.00	$641,750.00
7. ASA Women's 18 and Under "B" State Softball Tournament	9	123	2	123	49	$84.96	$76.67	$130.18	$118.75	$222.80	$217.50	$27,404.40	$26,752.50
8. FSN 7on7 Football Championship	32	640	1	640	87	$90.24	$92.50	$193.87	$190.00	$180.48	$185.00	$115,507.20	$118,400.00
9. ASA Men's State Softball Tournament	38	570	2	534	128	$108.42	$106.34	$189.74	$187.23	$271.01	$264.89	$144,719.34	$141,451.26
10. 2009 AGS TAGS LC Championship	–	987	2	976	186	$106.04	$101.67	$159.05	$152.50	$318.11	$305.00	$310,475.36	$297,680.00
11. USA/ASA Girls 18 and Under Softball National Championship	133	1810	6	1810	689	$160.85	N/A	$187.66	N/A	$1,125.97	N/A	$2,038,005.70	N/A
12. NJCAA Women's Tennis National Championships	43	322	5	222	105	$72.20	N/A	N/A	N/A	$433.18	N/A	$139,487.00	N/A
13. Regional High School Tennis Championships	30	171	2	171	97	$47.71	N/A	N/A	N/A	$245.57	N/A	$41,993.00	N/A
14. Triathalon Dash	–	482	1	94	51	$157.88	N/A	N/A	N/A	$157.88	N/A	$14,641.00	N/A
Total	672	12643	N/A	11627	2210	N/A		N/A	N/A	N/A	N/A	N/A	N/A
Averages	N/A	N/A	2.36	N/A		$112.04	$103.83	$201.72	$185.19	$402.15	$338.36	$354,676.21	$245,178.25
											Sum of 2009 events:		**2,451,782.51**

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for example in events 2 and 3. It also illustrates the importance of independently estimating the economic impact of each different type of participant rather than an overall average. This point was illustrated in Exhibit 3-1.

The importance of an overnight stay exemplifies the retailing principle that the longer people remain in the area, the more they are likely to spend. Increasing visitors' average length of stay is the most efficient way to increase the economic impact of an event on the community. Host agencies should vigorously promote attractions that may persuade participants to stay additional days in the local area.

5. Both mean and median expenditures were calculated. Generally, the median is preferred, especially in small samples, because a few extreme values can distort the mean.

Special Events

Exhibit 6-2, p. 60, reports the economic impact from 16 special events organized by park and recreation agencies. The Pro Golf Tournament (#1), Minor League Baseball Games (#6), and Grand Prix Motor Race (#10) are categorized as special events rather than sports tournaments because in these cases the dominant economic impact came from spectators to the events rather than the participants.

In Chapter 4, it was advised, "Given the complexities associated with multipliers, the wisest course of action for park and recreational professionals is probably to focus their economic impact efforts on obtaining a good estimate of visitor spending and not attempting to use multipliers." This advice was followed in the sports tournaments listed in Exhibit 6-1 and in many of the special events studies the author's team completed. However, there are occasions when clients insist on multipliers being included. The studies in Exhibit 6-2 were selected because multipliers were reluctantly provided in those cases, using the IMPLAN software described in Chapter 4. These results are used to illustrate and reaffirm points made about multipliers in Chapter 4.

The data in Exhibit 6-2 suggest the following:

1. It was noted in Chapter 4 that if multipliers are used, then the most appropriate of them is the personal income multiplier that estimates economic impact in terms of increases in personal income. Notwithstanding this axiom, most organizations report economic impact in terms of value of sales transactions because this generates a much higher number. This point is illustrated in Exhibit 6-2 where the dollar impacts of sales transactions shown in column 12 are typically around three times higher than the personal income measures listed in column 13.
2. The sales transaction multiplier outputs (column 12) are likely to be substantially smaller than those shown because the IMPLAN output selected includes all retail spending rather than only the retail margins accruing to local firms (i.e., the sales multipliers do not include "capture rates").
3. The jobs estimates in column 14 are likely to be optimistic because they assume the local economy is operating at full capacity and that there is no slack to absorb additional demand created by these short-term events. Further, these estimates embrace both full-time and part-time jobs, and many are likely to misinterpret them as referring only to full-time jobs.
4. Large numbers of participants and spectators do not necessarily equate to a large economic impact. For example, the Street Rod Run and the 4th of July Celebration (numbers 12 and 9 in Exhibit 6-2, respectively) attracted 1,409 (96 + 1313) and 55,000 (48,605 + 2,398+ 3,997) people, respectively. However, the economic impact of the Street Rod Run was substantially greater than that accruing from the 4th of July Celebration. This is explained by the celebration being only a one-day event and most of its participants were local residents, while the Street Rod Run event lasted for three days and most participants were from out-of-town.
5. The importance of ascertaining the proportion of visitors who are time-switchers and casuals is clearly demonstrated in columns 6 and 7. In seven of the 16 studies, time-switchers and casuals

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Exhibit 6-2
The Economic Impact of 16 Festival and Spectator Events

1	2	3	4	5	6	7	8	9	10	11	12	13	14
City	Event Name	Duration (# of Days)	Participants/ Spectators from Inside the City		Casuals/Time Switchers		Participants/ Spectators from Outside the City[a]		Total Expenditure[b]	Average Per Out-of-Town Visitors Per Day Expenditures	Economic Impact		
			#	%	#	%	#	%			Sales	Personal Income	Jobs[c]
1	Pro Golf Tournament	3	140,167	30.2	72,500	15.6	251,333	54.2	29,523,070	117	65,856,795	22,389,187	1,232.0
2	Arts Festival	1	1,765	35.3	1,588	31.8	1,647	32.9	156,664	95	336,976	113,172	6.0
3	Culinary Festival	2	9,638	27.5	11,486	32.8	13,876	39.7	540,658	39	1,175,350	397,707	21.6
4	Annual Arts Festival	3	414,000	82.8	40,952	8.2	45,048	9.0	462,428	10	1,037,867	357,237	22.5
5	Rusty Relics Car Show	1	46	6.2	–	–	699	93.8	6,562	9	12,500	3,894	0.3
6	Two Minor League Baseball Games	1 day each	6,735	39.9	5,438	32.2	4,722	27.9	25,225	5	54,184	17,818	1.3
7	Yes Festival	2	3,442	56.5	560	9.2	2,090	34.3	56,650	27	111,616	36,643	2.6
8	River Festival	4	135,135	13.5	369,574	37.0	495,291	49.5	5,781,136	12	14,698,137	4,442,505	326.0
9	4th of July Celebration	1	48,605	88.4	2,398	4.3	3,997	7.3	34,420	9	74,793	25,474	1.5
10	Grand Prix Motor Race	3	72,425	85.2	4,899	5.8	7,676	9.0	172,764	23	382,446	129,902	7.8
11	Nubian Jam Heritage Celebration	1	2,041	40.8	877	17.5	2,082	41.7	32,356	16	64,715	19,678	1.4
12	Bluebonnet Street Rod Run	3	96	6.8	–	–	1,313	93.2	55,233	42	104,333	31,980	2.4
13	Winterfest	1	18,008	31.0	23,283	40.0	17,157	29.0	600,150	35	826,975	342,517	19.3
14	Springfest	4	22,906	22.0	51,048	50.0	27,887	28.0	1,422,321	51	1,964,234	819,367	45.5
15	Sunfest	3	25,991	14.0	100,077	56.0	53,180	30.0	2,450,614	46	3,390,194	1,391,712	76.7
16	Independence Park Holiday	1	76,652	57.0	24,418	18.1	33,512	24.9	335,463	10	549,124	194,142	8.3

[a]. This figure consists of the number of out-of-town visitors whose primary purpose of visit was to attend the event (Out-of-Towners), and the number of out-of-town visitors whose primary reason for their visit was not to attend the event but extended their stay because of it (Extended Stayers).

[b]. This figure consists of the expenditures by out-of-town visitors and extended stayers.

[c]. This figure refers to both full-time and part-time jobs. It assumes the local economy is operating at full capacity and there is no slack to absorb additional demand created by these events.

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represented 32% or more of all visitors. If the questionnaire had asked only for their home address or ZIP code and, therefore, failed to differentiate them from out-of-town visitors who were attracted specifically by the event, then there would have been a substantial overestimation of the economic impact attributed to those events.

6. Reasonably accurate measures of economic impact depend on reasonably accurate counts of visitors to the events because the impact estimates are derived by extrapolating from a sample to a total visitation count. In sports tournaments where teams or individuals have to register with the organizers, an accurate count is usually available. Similarly, at gated spectator or festival events that charge admission, accurate counts are available from ticket sales and/or turnstile counts. However, many festivals are not gated and do not charge admission. In these cases, attendance counts are frequently organizers' guesstimates

   If these guesstimates are inaccurate, then the economic impacts will be inaccurate. For example, if the River Festival attendance (#8 in Exhibit 6-2) was actually 200,000 rather than the estimate of 1 million provided by the festival organizers, (135,135 + 369,574 + 495,291) then the total expenditure would be $1.15 million rather than $5.78 million! Accuracy in sampling, data collection, and analysis is of little use if the total attendance counts are inaccurate.

7. If an overnight stay is not required, then the economic impact on the community is likely to be relatively small. The per capita expenditures at single-day events by out-of-town visitors were $95, $9, $5, $9, $16, $35, and $10 (column 11). The Arts Festival was atypical because emphasis was on selling art rather than only viewing it, and the $95 amount reflects that retailing dimension. Similarly, the one day for Winterfest is misleading since it was an evening/night event, so many elected to stay the night after traveling to it, explaining the $35 per capita expenditure.

8. The extraordinary economic impact generated in a local community by a mega-event (as opposed to a typical community festival) is demonstrated by the first event listed in Exhibit 6-2. This golf tournament was a stop on the men's professional tour. The very high total expenditure (column 10) not only reflects people staying multiple nights in the community and a large proportion of visitors from out-of-town, but also that the visitors are relatively affluent. The almost $30 million estimate in Exhibit 6-2, is limited to the expenditures of spectators and does not include those by the players, officials, and their entourages; the extensive number of media representatives; and the hospitality expenditures of major companies or sponsorships. Nevertheless, the $30 million dwarfs the out-of-town expenditures at more typical community festivals that average around $100,000 (excluding the River Festival with its dubious attendance estimate).

Recreation Facilities

Most recreation facilities are intended to be used by local residents, so they do not usually attract many outside visitors. This means they are unlikely to attract new money to the community and have any economic impact, unless they are hosting a sports tournament or special event. **Exhibit 6-3**, p. 62, reports results from recreation facilities that were identified as being possible exceptions and having potential to attract a wider clientele. Two of them were zoos, two were relatively high-end golf courses, and one was a horse activity center.

It may be more appropriate to classify these five facilities as public attractions rather than public recreation facilities. Four of the five were located in a large metropolitan area with a population of approximately 700,000. Zoo #1 was atypical in this respect since it was located in a community of 100,000. Its smaller size explains why a much larger proportion of its visitors were from outside the community.

The horse activity facility was a major regional equestrian center that included indoor and outdoor arenas; more than 100 rental stalls for boarding horses, as well as another 60 stalls for its own horses that were rented or used for riding lessons; a cross-country eventing course; horse trails; and an RV campground.

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Exhibit 6-3
Economic Impact of Five Recreation Facilities

Facility	Total Participants	Local Residents		Casuals/Time Switchers		Non-Local Participants		Per Person, Per day Expenditures by Non-Local Participants	Total Expenditures by Non-Local Participants
		#	%	#	%	#	%		
Golf Course # 1	12,980	8,502	65.5%	1,194	9.2%	3,284	25.3%	$54.42	$178,715
Golf Course # 2	16,697	8,515	51.0%	2,054	12.3%	4,458	26.7%	$70.25	$313,174
Zoo # 1	574,296	94,184	16.4%	87,944	15.3%	392,167	68.3%	$12.67	$4,968,756
Zoo # 2	220,028	122,336	55.6%	42,905	19.5%	54,787	24.9%	$12.48	$696,709
Horse Activity Center	25,856	17,091	66.1%	16,030	62.0%	7,162	27.7%	$162.92	$1,166,833

The following points emerge from the results in Exhibit 6-3.

1. At both zoos, almost all visitors were day visitors without an overnight stay so the per participant expenditures, which are very similar, were relatively low. Nevertheless, the relatively large number of out-of-town visitors resulted in relatively high economic impacts in both cases.
2. The cost of green fees, cart rentals, and so forth, at golf courses resulted in relatively high per person expenditures, even though using them does not require an overnight stay.
3. Involvement with horses is invariably expensive so equestrian facilities usually cater to a high-end clientele. The presence of an RV campsite at the facility meant that many visitors stayed for multiple days. This, together with the cost of boarding horses, renting them, and riding lessons, resulted in the high per person expenditures and relatively large economic impact.

Park Facilities

Exhibit 6-4, p. 63 & p. 64, reports the per person, per day expenditure of non-local visitors to 79 Texas State Parks. Non-local was defined as visitors who resided outside the county in which the park was located. The data in Exhibit 6-4 suggest the following:

1. There is a wide range among the parks in per person, per day expenditures. The expenditures tend to escalate from the lowest amounts associated with parks without any capacity for overnight stays; through those with cabin or camping facilities; through those with lodges (e.g., Indian Lodge); through historic homes that host overnight guests (e.g., Landmark Inn, Fulton Mansion, Magoffin House); to those located in urban or resort areas with hotel/motel accommodations and multiple other attractions (e.g., Benson-Rio Grande, Admiral Nimitz Museum, San Jacinto/Battleship Texas, Sea Rim).
2. Even those with low per person, per day expenditures can have a substantial impact on local economics if they attract large numbers of non-local visitors. For example, Brazos Bend State Park with a low $4.19 per person, per day expenditure, generated an economic impact of $1.33 million for its county in direct expenditures.
3. The data again illustrate the importance of excluding casuals and time-switchers from the analysis. Park visitation may be only one component of a multipurpose trip and is often not the major reason that motivated the trip. For example, the Admiral Nimitz Museum is located in the resort city of Fredericksburg in the Texas Hill Country, and 44% of visitors to the museum classified themselves as casuals or time-switchers. If they had not been excluded, then the direct expenditure would have ballooned from $1.97 million to an inaccurate $3.61 million.

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Exhibit 6-4
Non-local Per Person Expenditures at 79 State Parks

Park	Total # of Visitors	Locals		Casuals/Time Switchers		Non-Local Visitors		Non-Local Per Person, Per Day Expenditures	Total Annual Expenditures of Non-Local Visitors
		#	%	#	%	#	%		
Abilene	34,091	5,492	16.11%	7,765	22.78%	20,833	61.11%	$8.91	$185,625
Admiral Nimitz	76,739	2,291	2.99%	33,788	44.03%	40,660	52.99%	$48.50	$1,972,020
Balmorhea	62,003	785	1.27%	33,094	53.38%	28,124	45.36%	$8.69	$244,395
Bastrop	233,452	26,196	11.22%	39,294	16.83%	167,962	71.95%	$7.60	$1,276,512
Bentsen-Rio Grande	45,296	17,735	39.15%	9,347	20.63%	18,214	40.21%	$45.88	$835,670
Blanco	92,192	–	0.00%	3,179	3.45%	89,013	96.55%	$3.08	$274,160
Bonham	60,886	2,449	4.02%	4,199	6.90%	54,238	89.08%	$8.31	$450,714
Brazos Bend	426,414	65,046	15.25%	43,364	10.17%	318,004	74.58%	$4.19	$1,332,435
Caddo Lake	76,015	1,102	1.45%	12,669	16.67%	62,244	81.88%	$14.47	$900,673
Caprock Canyon	125,691	3,541	2.82%	14,162	11.27%	107,988	85.92%	$5.51	$595,014
Casa Navarro	2,139	–	0.00%	823	38.46%	1,316	61.54%	$29.91	$39,371
Cedar Hill	257,815	4,092	1.59%	36,831	14.29%	216,892	84.13%	$13.60	$2,949,731
Choke Canyon—Callihum	68,134	–	0.00%	10,220	15.00%	57,914	85.00%	$13.62	$788,787
Cleburne	115,178	21,350	18.54%	4,495	3.90%	89,333	77.56%	$7.08	$632,479
Copper Breaks	22,233	362	1.63%	7,049	31.71%	14,822	66.67%	$15.25	$226,036
Daingerfield	56,236	1,103	1.96%	5,513	9.80%	49,620	88.24%	$15.75	$781,515
Davis Mountains	82,733	–	0.00%	–	0.00%	82,733	100%	$15.37	$1,271,606
Dinosaur Valley	163,663	580	0.35%	26,697	16.31%	136,386	83.33%	$10.18	$1,388,408
Eisenhower	82,764	3,762	4.55%	13,167	15.91%	65,835	79.55%	$7.70	$506,930
Enchanted Rock	96,767	346	0.36%	21,427	22.14%	74,994	77.50%	$26.99	$2,024,100
Fairfield Lake	111,962	–	0.00%	27,991	25.00%	83,972	75.00%	$3.11	$261,151
Fort Boggy	38,265	6,378	16.67%	19,133	50.00%	12,755	33.33%	$6.11	$77,933
Fort Parker	96,386	4,968	5.15%	17,886	18.56%	73,532	76.29%	$7.01	$515,456
Fort Richardson	40,439	1,064	2.63%	2,128	5.26%	37,246	92.11%	$8.74	$325,534
Fulton Mansion	15,427	315	2.04%	4,408	28.57%	10,704	69.39%	$43.83	$469,176
Galveston Island	247,485	6,804	2.75%	34,019	13.75%	206,663	83.51%	$18.32	$3,786,061
Garner	249,927	–	0.00%	–	0.00%	249,927	100%	$8.96	$2,239,346
Goliad	81,468	3,216	3.95%	31,086	38.16%	47,166	57.89%	$13.72	$647,113
Goose Island	379,591	9,373	2.47%	18,745	4.94%	351,473	92.59%	$14.93	$5,247,494
Guadalupe River	121,707	6,085	5.00%	3,651	3.00%	111,970	92.00%	$10.95	$1,226,076
Hill Country	17,157	–	0.00%	1,536	8.96%	15,621	91.04%	$12.75	$199,162
Hueco Tanks	29,650	5,067	17.09%	7,319	24.68%	17,265	58.23%	$6.59	$113,773
Huntsville	143,262	6,195	4.32%	16,262	11.35%	120,805	84.32%	$6.00	$724,828
Indian Lodge	69,117	–	0.00%	20,735	30.00%	48,382	70.00%	$52.94	$2,561,338
Inks Lake	169,483	5,296	3.13%	23,834	14.06%	140,353	82.81%	$8.32	$1,167,738
Lake Arrowhead	35,218	224	0.63%	14,423	40.95%	20,572	58.41%	$10.69	$219,912
Lake Bob Sandlin	73,088	1,433	1.96%	7,165	9.80%	64,489	88.24%	$15.75	$1,015,708
Lake Brownwood	56,870	–	0.00%	2,708	4.76%	54,162	95.24%	$9.56	$517,788
Lake Casa Blanca	221,989	118,280	53.28%	62,568	28.19%	41,141	18.53%	$8.69	$357,514
Lake Colorado City	41,186	1,373	3.33%	13,729	33.33%	26,084	63.33%	$3.89	$101,469
Lake Corpus Christi	185,821	3,680	1.98%	29,437	15.84%	152,704	82.18%	$25.75	$3,932,138

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Exhibit 6-4: Non-local Per Person Expenditures at 79 State Parks—Continued

Lake Livingston	175,293	746	0.43%	8,205	4.68%	166,342	94.89%	$20.61	$3,428,306
Lake Mineral Wells	108,186	10,111	9.35%	12,133	11.21%	85,942	79.44%	$6.81	$585,266
Lake Somerville—Birch Creek	214,985	9,297	4.32%	24,404	11.35%	181,285	84.32%	$9.43	$1,709,514
Lake Somerville—Nails Creek	48,745	2,108	4.32%	5,533	11.35%	41,104	84.32%	$8.54	$351,027
Lake Tawakoni	94,511	6,616	7.00%	12,286	13.00%	75,609	80.00%	$6.74	$509,603
Lake Whitney	120,792	–	0.00%	13,521	11.19%	107,271	88.81%	$9.86	$1,057,687
Lake Texana	30,687	360	1.17%	6,785	22.11%	23,542	76.72%	$13.94	$328,177
Landmark Inn	8,059	–	0.00%	3,100	38.46%	4,959	61.54%	$29.91	$148,335
Lost Maples	95,923	–	0.00%	8,590	8.96%	87,333	91.04%	$12.75	$1,113,494
Lockhart	150,454	40,838	27.14%	6,448	4.29%	103,168	68.57%	$2.30	$237,287
Magoffin Home	4,208	1,119	26.60%	1,477	35.11%	1,612	38.30%	$166.07	$267,634
Martin Creek Lake	52,642	1,032	1.96%	5,161	9.80%	46,449	88.24%	$15.75	$731,569
Martin Dies, Jr.	106,589	8,778	8.24%	31,350	29.41%	66,461	62.35%	$8.16	$542,325
McKinney Falls	171,854	–	0.00%	24,947	14.52%	146,907	85.48%	$8.50	$1,248,713
Meridian	60,408	2,983	4.94%	8,204	13.58%	49,221	81.48%	$9.23	$454,313
Monahans Sandhills	43,157	–	0.00%	–	0.00%	43,157	100.00%	$15.37	$663,323
Mother Neff	36,779	994	2.70%	10,437	28.38%	25,348	68.92%	$9.94	$251,956
Mustang Island	226,119	10,063	4.45%	104,180	46.07%	111,876	49.48%	$9.76	$1,091,906
Palmetto	68,319	1,571	2.30%	6,282	9.20%	60,466	88.51%	$6.43	$388,798
Palo Duro Canyon	282,554	4,485	1.59%	40,365	14.29%	237,704	84.13%	$26.84	$6,379,980
Pedernales Falls	118,673	–	0.00%	14,128	11.90%	104,545	88.10%	$8.67	$906,407
Possum Kingdom	60,187	506	0.84%	5,058	8.40%	54,623	90.76%	$5.15	$281,311
Purtis Creek	42,934	1,881	4.38%	2,656	6.19%	38,397	89.43%	$8.53	$327,528
Ray Roberts Lake—Isle du Bois	165,079	37,518	22.73%	22,511	13.64%	105,050	63.64%	$17.52	$1,840,481
Ray Roberts Lake—Johnson	83,156	11,694	14.06%	4,158	5.00%	67,304	80.94%	$10.62	$714,773
Rusk-Palestine	78,618	–	0.00%	11,942	15.19%	66,676	84.81%	$12.25	$816,781
San Angelo	36,697	1,648	4.49%	28,010	76.33%	7,040	19.18%	$21.67	$152,553
San Jacinto—Battleship Texas	432,837	182,988	42.28%	116,127	26.83%	133,722	30.89%	$37.88	$5,065,389
Sea Rim	53,364	3,335	6.25%	12,507	23.44%	37,522	70.31%	$33.50	$1,256,972
Seminole Canyon	54,294	1,508	2.78%	6,033	11.11%	46,753	86.11%	$22.92	$1,071,583
South Llano River	50,395	530	1.05%	3,713	7.37%	46,151	91.58%	$5.91	$272,754
Stephen F. Austin	44,224	93	0.21%	7,973	18.03%	36,158	81.76%	$10.72	$387,614
Texas State Railroad	45,527	792	1.74%	7,522	16.52%	37,213	81.74%	$15.21	$566,015
Tyler	259,498	22,443	8.65%	175,336	67.57%	61,718	23.78%	$9.95	$614,099
Varner-Hogg	68,124	6,889	10.11%	15,309	22.47%	45,926	67.42%	$1.40	$64,297
Village Creek	50,454	4,004	7.94%	13,615	26.98%	32,835	65.08%	$8.47	$278,114
Washington on the Brazos	108,767	1,726	1.59%	15,538	14.29%	91,502	84.13%	$14.76	$1,350,575
Wyler Aerial Tramway	18,642	9,745	52.27%	6,355	34.09%	2,542	13.64%	$6.95	$17,668

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Development of an Annual Economic Impact Report

Exhibits 1-3 and 1-4 gave an example of an annual economic impact report for an athletics park that hosted many sports tournaments. The exhibits demonstrated both the park's contribution to the community's economy and the length of the payback period on the investment (13 years). **Exhibit 6-5**, p. 66, shows how an annual economic impact report of multiple events at different facilities in a community can be compiled. This can be done by undertaking economic impact studies at a relatively small number of events or facilities, and then extrapolating these results to similar events or facilities in the community that were not surveyed. If resources do not permit any economic impact studies to be done in some years, then empirical data from studies used in previous years can be used.

An example of such a balance sheet is shown in Exhibit 6-5, which estimates the economic impact of special events on a city. The estimate was derived by extrapolating results from 3 special events in this city that were surveyed to an additional 10 events that were sponsored by the city during the year but at which no data were collected. The ratios of visitors from inside the city, casuals/time-switchers, and visitors from outside the city were similar at all of the 3 surveyed events. This suggested that it was reasonable to extrapolate them to the other events. The average ratios of the 3 surveyed events were 85.5, 6.1, and 8.4 for the local residents, casuals/time-switchers, and out-of-town visitors, respectively.

Attendance estimates for the 10 non-surveyed events were available. The per capita spending by out-of-town visitors at the 3 surveyed events was $10.26, $8.61, and $22.50, yielding an average of $13.79. This number was used to calculate the total expenditure at the non-surveyed events. For example, the $18,623 total expenditure at Winter Fest was derived by $13.79 × 1,350.

Arraying the economic return from special events in this way also offers managers and stakeholders guidelines as to which should receive priority in promotional efforts. For example, in Exhibit 6-2, the spending of visitors to the Grand Prix was $23.00 per visitor, compared to $10.00 and $9.00 for the Annual Arts Festival and July 4th Celebration, respectively. This suggests that the most efficient strategy for the city to increase its return on investment may be to focus on out-of-town visitors to the Grand Prix, rather than on the other two events.

There are many legitimate reasons for sponsoring festivals and special events beyond their contribution to economic development. However, *if* economic development is the prime consideration, then these analyses offer a basis for prioritizing which events are most viable. If the agency's cost of organizing an event is considered along with the community infrastructure, displacement, and opportunity costs discussed in Chapter 5 is compared with the relatively small impact on personal income, it suggests that the viability of some of the sponsored events shown in Exhibit 6-5 may be challengeable.

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Exhibit 6-5
A City's Annual Economic Impact Report for Special Events

Event Name	Duration (# of Days)	# of Visitors	Participants[a]/ Spectators from inside the City		Casuals/Time Switchers		Participants/ Spectators from Outside the City		Total[b] Expenditure	Economic Impact		
			#	%	#	%	#	%		Sales	Personal Income	Jobs[c]
Annual Arts Festival	3	500,000	414,000	82.8%	40,952	8.2%	45,048	9%	462,428	1,037,867	357,237	22.5
4th of July Gala Celebration	1	55,000	48,605	88.4%	2,398	4.4%	3,997	7.30%	34,420	74,793	25,474	1.5
Grand Prix Motor Race	3	85,000	72,425	85.2%	4,899	5.8%	7,676	9%	172,764	382,446	129,902	7.8
WinterFest	2	16,000	13,674	85.5%	976	6.1%	1,350	8.40%	18,623	28,724	11,025	0.6
Three Fires Pow Wow	2	25,000	21,365	85.5%	1,525	6.10	2,110	8.40%	29,107	44,894	17,231	0.9
African-American Festival	3	15,000	12,819	85.5%	915	6.1%	1,266	8.40%	17,464	26,936	10,339	0.5
Jazz & Blues Festival	2	10,000	8,546	85.5%	610	6.1%	844	8.40%	11,643	17,958	6,893	0.4
Italian Festival	3	30,000	25,638	85.5%	1,830	6.1%	2,532	8.40%	34,929	53,874	20,678	1.1
Polish Harvest Festival	3	15,000	12,819	85.50	915	6.1%	1,266	8.40%	17,464	26,936	10,339	0.5
German Festival	3	10,000	8,546	85.5%	610	6.1%	844	8.40%	11,643	17,958	6,893	0.4
Celebration of the Grand	2	350,000	299,110	85.5%	21,350	6.1%	29,540	8.40%	407,504	628,529	241,239	12.7
Hispanic Festival	3	70,000	59,822	85.5%	4,270	6.1%	5,908	8.40%	81,501	125,706	48,248	2.5
Mexican Festival	3	100,000	85,460	85.5%	6,100	6.1%	8,440	8.40%	116,430	179,580	68,926	3.6
Total	–	1,281,000	1,082,829		87,350		110,821		1,415,920	2,646,201	954,424	55

[a]. *This figure consists of the number of out-of-town visitors whose primary purpose of visit was to attend the event (Out-of-Towners), and the number of visitors whose primary reason for their visit was not to attend the event but extended their stay because of it (Extended Stayers).*

[b]. *This figure consists of the expenditures by out-of-town visitors and extended stayers.*

[c]. *This figure refers to both full-time and part-time jobs. It assumes the local economy is operating at full capacity and that there is no slack to absorb additional demand created by these events.*

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Measuring the Economic Impact of Park and Recreation Services

BIOGRAPHICAL PROFILE

John L. Crompton

Distinguished Professor of Recreation, Park and Tourism Sciences

Regents Professor

Texas A&M University

John L. Crompton holds the rank of Distinguished Professor of Recreation, Park and Tourism Sciences and is a Regents Professor at Texas A&M University. He received his basic training in England. His undergraduate work was in physical education and geography at Loughborough College. After teaching high school for a year, he attended the University of Illinois where he completed a M.S. degree in Recreation and Park Administration in 1968. In 1970, he was awarded another M.S. degree from Loughborough University of Technology majoring in Business Administration.

In 1970, he joined Loughborough Recreation Planning Consultants as their first full-time employee. When he left as managing director in 1974, LRPC had developed into the largest consulting firm in the United Kingdom specializing in recreation and tourism, with a full-time staff of twenty-five which was supplemented by a number of part-time associate consultants.

In 1974, Dr. Crompton came to Texas A&M University. He received his doctorate in Recreation Resources Development in 1977. For some years he taught graduate and undergraduate courses in both the Department of Recreation and Parks and the Department of Marketing at Texas A&M University, but he now teaches exclusively in the Department of Recreation, Park and Tourism Sciences.

Dr. Crompton's primary interests are in the areas of marketing and financing public leisure and tourism services. He is author or co-author of 16 books and a substantial number of articles which have been published in the recreation, tourism, sport and marketing fields. He is the most published scholar in the history of both the parks and recreation, and the tourism fields.

Dr. Crompton has conducted many hundreds of workshops on Marketing and/or Financing of Leisure Services. He has lectured or conducted workshops in a number of foreign countries and has delivered keynote addresses at the World Leisure Congress and at Annual National Park and Recreation Conferences in Australia, Canada, Great Britain, Japan, New Zealand, South Africa, and the United States.

He is a past recipient of the National Park Foundation's Cornelius Amory Pugsley award for outstanding national contributions to parks and conservation; the National Recreation and Park Association's (NRPA) Distinguished Professional Award; the NRPA National Literary Award; the NRPA Roosevelt Award for outstanding research; the Distinguished Colleague and the Distinguished Teaching Awards of the Society of Park and Recreation Educators; and the Travel and Tourism Research Association's Travel Research Award.

At Texas A&M, he is Cintron University Professor for Excellence in Undergraduate Teaching. He has received the Bush Excellence Award for Public Service (presented personally by President H. W. Bush); the Vice-Chancellor's Award for Excellence in Graduate Teaching; the Texas Agricultural Experiment Station's Faculty Fellow and Senior Faculty Fellow Awards for exceptional research contributions; the University Distinguished Achievement Award for Research and the University Distinguished Achievement Award for Teaching.

He was a member of the NRPA's Board of Trustees for nine years; and is a past president of four professional bodies: The Texas Recreation and Parks Society; the American Academy of Park and Recreation Administration; the Society of Park and Recreation Educators and the Academy of Leisure Sciences. He is a Board member of the National Recreation Foundation.

In 2006, the city of College Station named a new 16 acre neighborhood park, John Crompton Park. In 2007 he was elected to a 1-year term on the College Station City Council. In 2008 he was re-elected to a 3 year term and in 2010/11 was the city's Mayor Pro Tem. The city's population is 95,000, the annual budget is $262 million; and there are approximately 900 full-time employees. The council members and mayor are all elected city wide.

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