7 Economic impacts

7.1 Santa Fe National Forest Regional Economy

The Santa Fe National Forest is situated in the center of New Mexico, falling mainly within Rio Arriba, San Miguel, and Sandoval Counties, but also laying partly in Santa Fe, Mora, and Los Alamos Counties. Taos County is also included in the region, since a small part of the Pecos Wilderness is co-managed by the Santa Fe and Carson NFs. The relevance of Taos County is minute in terms of determining the economic contribution of the Santa Fe NF. This region contains several of the larger metropolitan areas in the state as well as Santa Fe and Los Alamos Counties, the two richest counties per capita in the state. Significant settlements in the region include the state capitol of Santa Fe, Los Alamos, which is home to Los Alamos National Laboratory and boasts the highest per capita income in New Mexico, and Rio Rancho, one of the fastest growing cities in the state, as well as Las Vegas, Española, and Taos. The economic contribution of the Santa Fe NF, composed largely of visitor spending, varies significantly by county, creating a complex picture.

The bulk of the regional economic activity occurs in Santa Fe, Los Alamos and Sandoval Counties account for 73 percent of the region's employment. However, most of the forest lies in other counties, with more than 30 percent of the forest contained by Rio Arriba County. Santa Fe and Los Alamos County contain only 15 and 2 percent respectively. This does not imply that the bulk of the forest impacts are felt in Rio Arriba County. The city of Santa Fe is adjacent to a portion of the Santa Fe NF and garners a significant amount of economic activity from various forest uses. Furthermore, the city of Santa Fe is largely dependent on the forest setting provided by the Santa Fe NF which creates the scenic beauty for which the city is famous for as a tourist destination. While a larger degree of logging or ranching activity may occur in counties such as Sandoval, San Miguel, or Rio Arriba, Santa Fe County is the primary benefactor of the visitor spending impacts.

The economy in the majority of New Mexico's counties can be characterized as rural and relatively poor. This characterization is certainly true for some areas that contain parts of the Gila or Cibola NF. In the Santa Fe NF there are areas, such as Mora County that are similarly poor. But overall, the region is comparatively wealthy. This wealth is centered in Santa Fe and Los Alamos County, the only two counties in New Mexico that have per capita incomes above the national average, but even the other counties in the assessment are fairly well off when compared with most New Mexico Counties. These trends are shown in **Table 7.1**.

Table 7.1: Total Employment and Income by County, 2003

	Employment (#)	Percent of Region	Per Capita Income ($)	Relative to US
Los Alamos	21,417	11%	49,581	1.57
Mora	2,016	1%	15,867	0.50
Rio Arriba	17,535	9%	20,720	0.66
Sandoval	33,451	18%	24,746	0.79
Santa Fe	84,070	44%	32,999	1.05
San Miguel	13,569	7%	19,708	0.63
Taos	17,267	9%	21,694	0.69
Santa Fe Region	189,325	100%	26,474	0.84
New Mexico	1,015,365	--	24,892	0.79
United States	167,488,500	--	31,484	1.00

Source: Bureau of Economic Analysis, 2003

The industrial composition of employment in each county from 1980 to 2000 is shown in **Table 7.2**. In general, the region, as with New Mexico and the United States, is characterized by an increase in the relative importance of the service sector in the overall economy. This is particularly true in Los Alamos, Santa Fe, and Taos, while other counties are less dependent on the retail and service sectors.

The Los Alamos economy, as the home of one of the largest military and science research centers in the country, is almost entirely composed of government, retail, and service sector jobs. These three sectors combined make up more than 90 percent of the county's employment. From 1980 to 2000, Los Alamos has been steadily gaining service sector jobs, while other sectors have remained relatively stable. This has lead to an increased reliance on services as a main employment provider. Though government still provides just over half of the county's jobs. Los Alamos is somewhat unique in its lack of farming and other "core" industry sectors such as construction and manufacturing. While the non-farm primary industry sectors have been growing over the last 20 years, it is only in minute amounts, and certainly much slower than the growth in services.

Mora County is by far the smallest county in the region, in terms of size as well as economy. It is fitting then that Mora County has experienced the largest changes in employment composition over the past 20 years from 1980 to 2000. In particular, while farm employment increased slightly, the relative size of the farm sector decreased by 9 percent from 1990 to 2000, while services increased 12 percent in the same period. The government sector as a whole also shows declining relative size. With only 1,767 jobs in 2000, these changes can represent a small number of employees, but the resulting percent changes in sector composition can be quite large.

In Rio Arriba County, strong growth primarily in the services sector, but also in retail trade, has buoyed employment levels significantly, though no sector shows decreases in employment. The relative size of services and retail trade has been increasing while the relative size of farm and government has been decreasing; but again, this is due more to the extraordinarily strong growth in services and retail trade rather than any decrease in farm or government.

Sandoval County contains part of the Albuquerque MSA and the state's fast-growing city Rio Rancho, as well as the town of Bernalillo, and a significant stretch of Interstate 25 between Albuquerque and Santa Fe. Much of the economic activity in the county is centered in its southeastern corner, and is directly involved with the Albuquerque MSA and travel to Santa Fe. As such, Sandoval County has the second largest economy in the Santa Fe NF region. As with the other counties, the largest employment sectors are retail, services, and government, but in Sandoval County there is also a substantial degree of manufacturing[1], construction, transportation, and utilities employment. The relative size of these sectors is larger in Sandoval County than in any other county in the Santa Fe NF region. Furthermore, in Sandoval County more than any county in New Mexico, the growth of the manufacturing and other primary industries has kept pace with growth in retail, services, and government. All of this suggests that Sandoval County receives a significant benefit from its close proximity to Albuquerque and Santa Fe. Finally, a large portion of Sandoval County is composed of several Native American pueblos, which effectively border the Santa Fe NF throughout much of the county.

[1] Manufacturing in Sandoval is dominated by Intel in Rio Rancho, which is why employment numbers are subject to non-disclosure.

Santa Fe County, which contains the state capitol of Santa Fe and the associated economic activity, has by far the largest employment in the Santa Fe NF region. It also contains one of the state's largest ski resorts, as well as a thriving tourist industry. Hence, it is no surprise that employment in Santa Fe County is nearly as consolidated in retail, services, and government as Los Alamos County. The exception to this is the larger portion of employment that the construction industry makes up in Santa Fe County. However, the relative compositions can be misleading. Santa Fe County has larger employment numbers in the primary industries than any of the other counties in the region except Sandoval. While the percent contribution of those sectors to total employment in Santa Fe is small, they are still larger in absolute terms than in the other counties. Thus, Santa Fe County is both the geographic and economic center of the region; even setting government aside it exerts great influence on the rest of the area. Over time the employment trends in Santa Fe have exhibited only small changes in the relative composition of the sectors, with services becoming a larger portion of the economy, but most sectors showing only small gains or losses in relative composition.
In contrast, San Miguel County is fairly small, and farm employment makes up a larger portion of overall employment there than in any other county in the region except Rio Arriba. As in other counties, retail, services, and government make up the lions share of employment, but the relative size of government has been decreasing over the years as growth in other sectors has been much faster. San Miguel also contains Las Vegas, the largest population center in New Mexico east of Santa Fe and Albuquerque and a significant location on Interstate 25 as visitors travel from the north to Santa Fe.

Taos County shares some of the traits of Colfax and Rio Arriba County. Like Santa Fe and Los Alamos County, the service sector in Taos County makes up a huge portion of employment. In 2000, the services made up 37 percent of the total employment in the county. This is consistent with Taos' heavily tourist based economy. Like Santa Fe, Taos County has also experienced strong, though not as disproportionately large, growth in services and retail trade. In addition to the drop in mining from 1980 to 1990, Taos County also experienced relative losses in state and local government and farming. This was mainly due to increases in services rather than any decrease in those sectors. From 1990 to 2000, there was not a substantial change in the sector composition of Taos County. The relative size of services grew slightly, as did construction and state and local government, while manufacturing, mining, and transportation and utilities fell slightly.

Table 7.2: Total Employment in Primary Sectors by County in 1980, 1990, and 2000

Los Alamos	1980	1990	2000	1980%	1990%	2000%	Change in % 1980-1990	Change in % 1990-2000
TOTAL	14,116	18,481	19,832	100%	100%	100%	0%	0%
Farm Employment	0	0	0	0%	0%	0%	0%	0%
Non-farm Employment	14,116	18,481	19,832	100%	100%	100%	0%	0%
Private Employment	5,342	8,093	9,706	38%	44%	49%	6%	5%
Agricultural services, forestry, and	28	54	(D)	0%	0%	(D)	0%	-
Mining	0	33	43	0%	0%	0%	0%	0%
Construction	278	279	297	2%	2%	1%	0%	0%
Manufacturing	64	128	151	0%	1%	1%	0%	0%
Transportation and utilities	74	112	(D)	1%	1%	(D)	0%	-
Wholesale trade	33	157	141	0%	1%	1%	1%	0%
Retail trade	1,146	1,430	1,332	8%	8%	7%	0%	-1%
Services	3,269	5,326	6,722	23%	29%	34%	6%	5%
Government and government	8,774	10,388	10,126	62%	56%	51%	-6%	-5%
Federal, civilian	417	178	193	3%	1%	1%	-2%	0%
Military	90	106	63	1%	1%	0%	0%	0%
State and local	8,267	10,104	9,870	59%	55%	50%	-4%	-5%
State government	7,354	9,001	(D)	52%	49%	(D)	-3%	-
Local government	913	1,103	(D)	6%	6%	(D)	0%	-

Mora	1980	1990	2000	1980%	1990%	2000%	Change in % 1980-1990	Change in % 1990-2000
TOTAL	1,061	1,120	1,767	100%	100%	100%	0%	0%
Farm Employment	407	429	515	38%	38%	29%	0%	-9%
Non-farm Employment	654	691	1,252	62%	62%	71%	0%	9%
Private Employment	324	380	853	31%	34%	48%	3%	14%
Agricultural services, forestry, and	(D)	35	76	(D)	3%	4%	-	1%
Mining	(L)	(D)	(L)	(L)	(D)	(L)	-	-
Construction	37	43	93	3%	4%	5%	0%	1%
Manufacturing	(D)	36	(D)	(D)	3%	(D)	-	-
Transportation and utilities	46	63	102	4%	6%	6%	1%	0%
Wholesale trade	12	(L)	(D)	1%	(L)	(D)	-	-
Retail trade	116	68	112	11%	6%	6%	-5%	0%
Services	86	120	405	8%	11%	23%	3%	12%
Government and government	330	311	399	31%	28%	23%	-3%	-5%
Federal, civilian	41	39	46	4%	3%	3%	0%	-1%
Military	19	22	17	2%	2%	1%	0%	-1%
State and local	270	250	336	25%	22%	19%	-3%	-3%
State government	68	56	58	6%	5%	3%	-1%	-2%
Local government	202	194	278	19%	17%	16%	-2%	-2%

Rio Arriba	1980	1990	2000	1980%	1990%	2000%	Change in % 1980-1990	Change in % 1990-2000
TOTAL	8,387	11,088	15,537	100%	100%	100%	0%	0%
Farm Employment	874	986	1,059	10%	9%	7%	-2%	-2%
Non-farm Employment	7,513	10,102	14,478	90%	91%	93%	2%	2%
Private Employment	4,252	6,526	9,821	51%	59%	63%	8%	4%
Agricultural services, forestry, and	116	114	192	1%	1%	1%	0%	0%
Mining	48	68	78	1%	1%	1%	0%	0%
Construction	464	677	953	6%	6%	6%	1%	0%
Manufacturing	256	507	648	3%	5%	4%	2%	0%
Transportation and utilities	346	518	528	4%	5%	3%	1%	-1%
Wholesale trade	117	199	209	1%	2%	1%	0%	0%
Retail trade	1,240	1,563	2,484	15%	14%	16%	-1%	2%
Services	1,377	2,532	4,153	16%	23%	27%	6%	4%
Government and government	3,261	3,576	4,657	39%	32%	30%	-7%	-2%
Federal, civilian	350	406	416	4%	4%	3%	-1%	-1%
Military	135	175	136	2%	2%	1%	0%	-1%
State and local	2,776	2,995	4,105	33%	27%	26%	-6%	-1%
State government	860	678	850	10%	6%	5%	-4%	-1%
Local government	1,916	2,317	3,255	23%	21%	21%	-2%	0%

Sandoval	1980	1990	2000	1980%	1990%	2000%	Change in % 1980-1990	Change in % 1990-2000
TOTAL	5,583	14,723	32,379	100%	100%	100%	0%	0%
Farm Employment	448	416	411	8%	3%	1%	-5%	-2%
Non-farm Employment	5,135	14,307	31,968	92%	97%	99%	5%	2%
Private Employment	3,851	12,052	26,710	69%	82%	82%	13%	1%
Agricultural services	141	230	308	3%	2%	1%	-1%	-1%
Mining	34	44	110	1%	0%	0%	0%	0%
Construction	596	1,063	2,531	11%	7%	8%	-3%	1%
Manufacturing	643	2,831	(D)	12%	19%	(D)	8%	-
Transportation and utilities	201	397	2,306	4%	3%	7%	-1%	4%
Wholesale trade	74	288	(D)	1%	2%	(D)	1%	-
Retail trade	698	2,835	5,368	13%	19%	17%	7%	-3%
Services	1,063	3,474	6,719	19%	24%	21%	5%	-3%
Government	1,284	2,255	5,258	23%	15%	16%	-8%	1%
Federal, civilian	212	389	347	4%	3%	1%	-1%	-2%
Military	159	323	298	3%	2%	1%	-1%	-1%
State and local	913	1,543	4,613	16%	10%	14%	-6%	4%
State government	130	106	206	2%	1%	1%	-2%	0%
Local government	783	1,437	4,407	14%	10%	14%	-4%	4%

Santa Fe	1980	1990	2000	1980%	1990%	2000%	Change in % 1980-1990	Change in % 1990-2000
TOTAL	37,471	58,881	81,875	100%	100%	100%	0%	0%
Farm Employment	365	368	462	1%	1%	1%	0%	0%
Non-farm Employment	37,106	58,513	81,413	99%	99%	99%	0%	0%
Private Employment	26,345	45,559	63,789	70%	77%	78%	7%	1%
Agricultural services	239	387	1145	1%	1%	1%	0%	1%
Mining	444	393	507	1%	1%	1%	-1%	0%
Construction	2471	4,275	5,514	7%	7%	7%	1%	-1%
Manufacturing	1528	2,587	2310	4%	4%	3%	0%	-
Transportation and utilities	1002	1176	1,485	3%	2%	2%	-1%	0%
Wholesale trade	577	1268	1596	2%	2%	2%	1%	-
Retail trade	6544	11,457	15,498	17%	19%	19%	2%	-1%
Services	10,869	19,747	28,836	29%	34%	35%	5%	2%
Government	10,761	12,954	17,624	29%	22%	22%	-7%	0%
Federal, civilian	1405	1523	1414	4%	3%	2%	-1%	-1%
Military	371	518	435	1%	1%	1%	0%	0%
State and local	8985	10,913	15,775	24%	19%	19%	-5%	1%
State government	6690	7628	9494	18%	13%	12%	-5%	-1%
Local government	2295	3,285	6,281	6%	6%	8%	-1%	2%

San Miguel	1980	1990	2000	1980%	1990%	2000%	Change in % 1980-1990	Change in % 1990-2000
TOTAL	7,727	9,932	12,281	100%	100%	100%	0%	0%
Farm Employment	627	737	849	8%	7%	7%	-1%	-1%
Non-farm Employment	7,100	9,195	11,432	92%	93%	93%	1%	1%
Private Employment	3,645	5,195	7,011	47%	52%	57%	5%	5%
Agricultural services	28	77	120	0%	1%	1%	0%	0%
Mining	15	11	41	0%	0%	0%	0%	0%
Construction	336	534	585	4%	5%	5%	1%	-1%
Manufacturing	104	302	188	1%	3%	2%	2%	-
Transportation and utilities	203	184	287	3%	2%	2%	-1%	0%
Wholesale trade	148	135	117	2%	1%	1%	-1%	-
Retail trade	1204	1,612	1,968	16%	16%	16%	1%	0%
Services	1,318	2,000	3,171	17%	20%	26%	3%	6%
Government	3,455	4,000	4,421	45%	40%	36%	-4%	-4%
Federal, civilian	202	179	177	3%	2%	1%	-1%	0%
Military	106	131	99	1%	1%	1%	0%	-1%
State and local	3147	3,690	4,145	41%	37%	34%	-4%	-3%
State government	2016	2390	2497	26%	24%	20%	-2%	-4%
Local government	1131	1,300	1,648	15%	13%	13%	-2%	0%

Taos	1980	1990	2000	1980%	1990%	2000%	Change in % 1980-1990	Change in % 1990-2000
TOTAL	8,351	11,434	15,918	100%	100%	100%	0%	0%
Farm Employment	432	472	494	5%	4%	3%	-1%	-1%
Non-farm Employment	7,919	10,962	15,424	95%	96%	97%	1%	1%
Private Employment	6,355	9,402	13,173	76%	82%	83%	6%	1%
Agricultural services, forestry, and	46	124	188	1%	1%	1%	1%	0%
Mining	737	362	271	9%	3%	2%	-6%	-1%
Construction	519	780	1,330	6%	7%	8%	1%	2%
Manufacturing	440	594	410	5%	5%	3%	0%	-3%
Transportation and utilities	207	333	363	2%	3%	2%	0%	-1%
Wholesale trade	86	218	226	1%	2%	1%	1%	0%
Retail trade	1,563	2,379	3,310	19%	21%	21%	2%	0%
Services	2,400	4,005	5,944	29%	35%	37%	6%	2%
Government and government	1,564	1,560	2,251	19%	14%	14%	-5%	0%
Federal, civilian	295	318	312	4%	3%	2%	-1%	-1%
Military	91	118	99	1%	1%	1%	0%	0%
State and local	1,178	1,124	1,840	14%	10%	12%	-4%	2%
State government	206	147	365	2%	1%	2%	-1%	1%
Local government	972	977	1,475	12%	9%	9%	-3%	1%

Notes: (D) Non-disclosure of confidential information, but included in totals, (L) Less than 10 jobs, and (N) Data not available for this year.
Source: Bureau of Economic Analysis

On the whole the Santa Fe NF is comprised of the large economy surrounding the city of Santa Fe, surrounded by a variety of urban and rural regions that are altogether more widely populated and active than in most other areas of New Mexico. While most of the forest itself lies in Rio Arriba and Sandoval County, the economic base of the region, and the greatest degree of recreational use, is centered on the city of Santa Fe. In all cases, the data indicate that the Santa Fe NF regional economy is composed of a large degree of government, retail, and service employment, and is not heavily dependent on primary industry uses of the forest such as logging, oil and gas extraction, and rock and mineral extraction. This is likely to be different on a sub-county level where small communities have formed around the use of forest resources for ranching or logging, but the observation for the region as a whole fits quite well.

To complete the picture, **Table 7.3** shows private employment by percent of occupation for each county and the region as a whole. The occupation data supports the data from previous tables, showing a large percent of jobs in management, sales and services occupations, with construction representing a substantial portion as well. Most notable in this case is that 50 percent of employment in Los Alamos County is professional, while the rest of the region has values closer to 20 percent. This is due to the unique nature of Los Alamos County as a scientific center as discussed above.

Table 7.3: Private Employment by Occupation for Region Counties in 2000

	Los Alamos County	Mora County	Rio Arriba County	Sandoval County	Santa Fe County	San Miguel County	Taos County	Santa Fe Region
Management and Professional	68%	28%	30%	36%	42%	34%	32%	39%
Professional and related	50%	19%	19%	23%	26%	23%	20%	25%
Education, training, and library	7%	8%	7%	5%	6%	9%	6%	6%
Healthcare practitioners and technical	5%	2%	2%	4%	4%	6%	3%	4%
Service	9%	22%	21%	15%	16%	22%	22%	17%
Sales and office	15%	18%	25%	28%	26%	25%	25%	25%
Farming, fishing, and forestry	0%	6%	2%	0%	0%	1%	1%	1%
Construction, extraction, and maintena	4%	17%	13%	10%	10%	11%	13%	10%
Production and transportation	3%	8%	9%	11%	6%	7%	7%	8%
Total Private Employment	**9,656**	**1,686**	**16,563**	**38,870**	**64,930**	**11,372**	**13,556**	**156,633**

Source: US Census 2000. Calculations by UNM-BBER.

Finally, **Table 7.4** shows the unemployment rates for each of the counties and the region as a whole from 1995 to 2004. The most striking trend in **Table 7.4** is the much higher unemployment rates of Mora County when compared with the other counties in the region. This trend is true to a lesser degree for Rio Arriba, Taos, and San Miguel County. However, Los Alamos, Santa Fe, and Sandoval County, as the region's more developed areas, had consistently lower unemployment rates than New Mexico as a whole.

Table 7.4 : Average Annual Unemployment Rate for Region Counties, 1995-2004

	1995	1996	1997	1998	1999	2000	2001	2002	2003	2004
Los Alamos	3.2	1.9	1.6	1.5	1.3	2.3	2	2	2.3	2.5
Mora	24.1	21.4	20.4	18.6	14.8	10.5	9.6	10.6	11.1	11.7
Rio Arriba	14	12.9	10.4	7.7	6.6	5.7	6	6.5	6.4	6.2
Sandoval	4.1	5	4	4.8	2.8	3.6	4.7	5.5	5.1	4.9
Santa Fe	4.7	4.7	3.7	2.9	2.4	3.2	3.3	3.7	3.9	3.9
San Miguel	9.6	11.8	9.9	6.8	5.8	5.5	5.9	6.2	6	6.3
Taos	15.8	14.5	13	9	10.2	6.3	6.4	6.4	7	6.4
Santa Fe Region	**10.8**	**10.3**	**9.0**	**7.3**	**6.3**	**5.3**	**5.4**	**5.8**	**6.0**	**6.0**
NM TOTAL	**6.4**	**7.4**	**7.1**	**6.3**	**6**	**5.2**	**4.8**	**5.2**	**5.8**	**5.9**

Source: Bureau of Labor Statistics, Local Area Unemployment Statistics (LAUS).

7.2 Methodology and Organization of Santa Fe National Forest Impact

In estimating the contribution of the Santa Fe NF to the regional economy, we consider both the operations of the USAD FS in the region as well as the various uses of forest related products. The IMPLAN software is used to determine total economic value of each activity and the operations of the USAD FS. IMPLAN uses county-level input-output (I-O) data to determine the extent to which these activities contribute to the local economy. In doing so, IMPLAN distinguishes between direct, indirect, and induced impacts, where:

> **Direct impacts** include the economic value generated by the activity itself, such as the value of cattle grazed on the Santa Fe NF land.
>
> **Indirect impacts** include the value generated by purchases to support that activity and the corresponding purchases to support those activities, in perpetuity. For example, indirect impacts would include the value of fencing purchased for ranching, the value of steel purchased to make the fencing, and so on.

> **Induced impacts** capture the value of economic activity generated from spending by employees that produce the direct and indirect goods. The ranch employees will purchase food, pay for electricity, etc…all of which generates additional value from the purchases, as well as sparking new rounds of indirect and induced value.

The IMPLAN region is the same region used throughout this report, consisting of all counties containing or bordering any of the Santa Fe NF districts. These counties include: Los Alamos, Mora, Rio Arriba, San Miguel, Sandoval, Santa Fe, and Taos County. This single region, containing the above seven counties, makes up the area considered as "local," and the results shown from IMPLAN are for this region of seven counties as a whole.

As discussed in **Chapter 5: Uses and Users**, the principal economic value generating activities related to the forest land itself include recreation and wildlife visits as well as smaller degrees of ranching, logging, and oil and gas extraction. Oil and gas production generates a fairly high economic value in the region, but the impacts of this activity on the local region are limited. For each activity, we estimate the direct impact, and use IMPLAN to estimate the total economic value by direct, indirect, and induced impacts. The USAD FS is unusual in that it does not directly produce a good or service, and so there is no easy measure of its direct economic value. Instead, we look at USAD FS expenditures, and salaries, and wages to estimate the first round of indirect and induced impacts of the USAD FS, and the corresponding economic activity generated by each. The indirect activity is captured by USAD FS expenditures, and the induced activity is captured by the disposable income of USAD FS employees. Of course, in examining the contribution of the USAD FS, we also consider direct employment by the USAD FS.

This analysis draws on a wide range of data and information sources. Data on the structure of the local economies and characteristics of the workforce come largely from the 2000 Decennial Census summary file 3 and the US Department of Labor Local Area Unemployment Statistics. The USAD FS provided data on the specific activities that occurred on the Forest. Specific sources included INFRA (grazing); NVUM (recreation and wildlife); and Region 3 Office (procurement, wages & salaries). The US Department of Agriculture National Agricultural Statistics Service (NASS) was the source of data on agricultural land values and cattle stocking rates. Oil and gas production values are from the ONGARD database provided by the Oil Conservation Division at the New Mexico Energy, Minerals and Natural Resources Department and the New Mexico Taxation and Revenue Department. Oil and gas prices are from GO-TECH at New Mexico Institute of Mining and Technology.

7.3 Direct Impact of the Santa Fe National Forest on the Local Economies

The principal economic activities on the Santa Fe NF include ranching, timber harvests, oil and gas extraction, recreation and wildlife visits, and the operation activities of the USAD FS. Some of these activities are quite large economically, though their benefit to the local region can vary substantially. For example, oil and gas extraction generates a significant value of output, the benefits of which for the most part do not accrue to the local region (this is discussed further below). Additionally, there are large impacts particularly due to ski visitors that are examined here as a subsection of visitor impacts.

To maintain consistency, data for 2004 was used wherever possible. However, if data for that year did not exist, or more recent data was more easily available, we used that instead, making sure to adjust values back to 2004. Data for USAD FS salaries and wages is from fiscal year 2005 adjusted to 2004 dollars. Data on grazing land is from 2002. Visitor estimations are derived from the 2003 NVUM survey. All other data is from 2004 unless noted.

The USAD FS provided data on cattle grazing from the INFRA database in terms of Animal Unit Months (AUMs), and we estimated the number of employees needed per AUM. Together these values provide an estimated number of employees needed to produce the 2002 AUMs. Using the IMPLAN value for output per employee, we derive a ranching output for grazing on the Santa Fe NF. This is the direct value of ranching on the Santa Fe NF land.

Similarly, timber harvesting data was derived from the TIMS database provided by the USAD FS. We use 2004 timber prices to derive the total value of timber cut, which measures the direct value of timber harvested in the Santa Fe NF in 2004.

For recreation and wildlife visitors, we use estimates of visitors from NVUM data, broken out into several categories based on locality (local or non-local), the type of trip (day, overnight on the forest, overnight off the forest), and the reason for the visit (recreation or wildlife). The USAD FS provided an average expenditure profile for each type of visitor, which estimates the direct economic value of visitor spending to the local economy.

Oil and gas production values come from the Oil Conservation Division of the New Mexico Energy, Minerals and Natural Resources Department. The data list production for 2004 and the geographic location of each well, so we were able to match well locations to find those wells located on the Santa Fe NF. Using 2004 oil and gas prices gives us a market value for the production on forest land.

Rock and mineral extraction data was provided by the USAD FS and the market value of the production was calculated using an average of prices from relevant surveyed New Mexico businesses.

Finally, for USAD FS operations, the FS provided data on salaries and wages for its Santa Fe NF employees and total spending with an associated expenditure profile for use in IMPLAN. Since the direct economic value associated with the USAD FS is unknown, we use expenditures to capture the first round indirect impacts and salaries and wages to capture the first round induced impacts. In both cases, the associated later round indirect and induced impacts are calculated by the IMPLAN model.

Table 7.5 is a summary of the output, employment and labor incomes directly associated with these activities.[2] These direct impacts are, in effect, 'what you see' – a measure of activities and their economic value as they actually occur on the Santa Fe NF. For example, there is the equivalent of approximately 19 full-time annual jobs harvesting lumber from the Santa Fe NF, and similarly 58 jobs in the ranching industry. In the case of the FS, employment is the number of employees directly employed by the FS in the Santa Fe NF, and labor income is the wages paid to those employees. Output for the FS is actually FS spending on operations, and does not include the costs of fighting wildfires, which is broken out separately. Finally, while mineral and rock extraction data is available, its permit value is only $50,829 and though the market value is likely

[2] Labor income is the sum of employee compensation and proprietor income.

to be quite a bit higher, it is still a fairly small impact and it is not included in the following tables or discussion.

Looking at this direct level of activity, we can see that the contribution of recreation and wildlife visitors is by far the largest source of impact from the Santa Fe NF. As a subsection of visitor impacts, the economic activity generated by ski visitors is more than a quarter of total visitor impacts, and by itself is larger than other activities generated by the forest. Forest Service operations are the second largest contributor, providing 336 jobs in the region and a large amount of labor income. Other direct activities are comparatively small.

Table 7.5: Direct Inputs of the Santa Fe National Forest, 2004 (000S OF 2002 $, except employment)

	Output	Employment	Labor Income
Ranching	2,630	58	175
Timber Harvesting	2,494	19	212
Oil & Gas	6,493	18	1,570
Visitors & Recreation	100,331	--	--
Skiers	27,552	--	--
Forest Service Operations[1]	13,880	336	9,979
Wildfire Suppression[1]	789	--	1,474

[1] Forest service operations output is actually the first round of indirect spending, while labor income is disposable employee income.

7.4 Economic Impacts and Multipliers

The direct activities associated with the Santa Fe NF shown in **Table 7.5** create indirect and induced impacts as businesses and workers make expenditures and purchases, and these funds cycle through the local economy. The sum of the direct, indirect, and induced expenditures constitutes the total impact that the Santa Fe NF has on the economies of the neighboring communities. These impacts, in terms of employment, income and total output, are summarized in **Table 7.6**. Economic multipliers are shown in **Table 7.7**. Economic multipliers, equal to the total impact divided by the direct impact, indicate the effectiveness of the industry in generating growth in the local economy.

In total, the Santa Fe NF contributes directly or indirectly an estimated 2,379 jobs and $69.2 million in income to the economies of the seven counties included in this study. This is equivalent to about 1.25 percent of the 189,325[3] jobs in the region in 2003. Visitor spending is by far the largest source of activity, contributing a total of 69.3 percent of the employment and 66 percent of the labor income impacts. The FS is the second largest contributor in terms of both employment and income, while ranching, and logging have smaller impacts.

There are three impacts shown in **Table 7.6** that warrant detailed discussion. Ski visitors, oil and gas extraction, and wildfire spending contain various complications that in general limit their usefulness as a measured impact. In the case of ski visitor spending as a sub-category of

[3] 2003 employment for the region as a whole from Table 7.1.

recreation and wildlife visitor spending, the level of spending is drawn from NVUM estimates of the proportion of visitors that are downhill skiers. This compensates for the unavailability of the number of ski visitors to the Santa Fe Ski Area. Hence, this value is just an approximation, and may vary substantially. Oil and gas extraction is problematic for different reasons. Though the data for the value of extracted oil and gas are reliable, the economics of oil and gas extraction suggest that little if any of the benefits from the extraction accrue to the Santa Fe NF region. In particular, revenues from sales are sure to leave the region, as extraction companies are rarely local. Furthermore, the extraction process uses very little labor, and often workers may be transported in and out of an area to maintain equipment, which does not add anything to the economic activity of the region except for what is spent there by employees during their stay. Hence, it is likely that the contribution from oil and gas shown in **Table 7.6** overstates the actual benefit to the region. There is one area that oil and gas extraction does benefit the region, and that is from local taxes, which typically support school districts and transportation projects. These impacts are discussed more thoroughly below. Finally, wildfire spending fluctuates widely in any given year. Beyond that, such impacts are difficult to measure because a large amount of the labor involved in wildfire suppression is brought in from outside the region. A similar process occurs in the purchase and use of equipment[4]. The only tangible impact that wildfire suppression has on the local region is derived from worker spending while in the region. In **Table 7.6** the values shown include all disposable income, and probably overstate the impacts of spending to some degree.

Table 7.6: Direct, Indirect and Induced Impacts of the Santa Fe National Forest, 2004

TOTAL OUTPUT IMPACTS (000s of 2002 $)

	Direct	Indirect	Induced	Total
Ranching	2,630	1,835	244	4,709
Timber Harvesting	2,283	1,025	142	3,451
Oil & Gas Extraction	5,940	927	746	7,612
Visitors & Recreation	86,280	13,878	16,221	116,379
Skiers	25,438	4,154	4,940	34,532
Forest Service Operations	--	16,850	8,565	25,416
Wildfire Operations	--	970	990	1,960
Total	97,132	35,486	26,908	159,526

[4] Though this should be accounted for to some extent by the use of spending profiles that include wildfire spending and hence adjust for spending that occurs outside the region. These are forest wide profiles, and should be relatively accurate.

TOTAL EMPLOYMENT IMPACTS (#)

	Direct	Indirect	Induced	Total
Ranching	58	27	3	88
Timber Harvesting	17	8	2	27
Oil & Gas Extraction	17	7	9	32
Visitors & Recreation	1315	138	196	1649
Skiers	404	42	60	505
Forest Service Operations	336	130	101	567
Wildfire Operations	--	8	8	16
Total	1743	317	319	2379

TOTAL LABOR INCOME IMPACTS (000s of 2002 $)

	Direct	Indirect	Induced	Total
Ranching	175	417	81	674
Timber Harvesting	194	150	47	391
Oil & Gas Extraction	1,436	368	248	2,052
Visitors & Recreation	35,668	4,666	5,403	45,738
Skiers	10,890	1,397	1,646	13,933
Forest Service Operations	9,979	5,617	2,761	18,357
Wildfire Operations	1,474	321	201	1,996
Total	48,927	11,539	8,742	69,208

As discussed above, the gains from oil and gas extraction may be much smaller than the impacts in **Table 7.6** suggest. Though the oil and gas does come from forest land and is then sold off, it is unlikely that the benefits of that activity accrue to the local region. In the first place, only in the extremely rare case that a local extraction company is performing the extraction will some portion of profits remain in the local region. Secondly, equipment and other purchases to supply the extraction industry come almost exclusively from outside the local area, so indirect impacts are likely to be negligible. Finally, extraction is very capital intensive, requiring only a minimal amount of labor to maintain production levels. Even the 17 direct employees suggested by IMPLAN are probably much higher than the real value. However, the output impacts are acceptable, and can be relied on as an appropriate estimate of the contribution to output from oil and gas extraction within the Santa Fe NF. As stated above, the unique characteristics of the oil and gas extraction industry lead us to conclude that the economic activity generated directly from oil and gas is quite small.

Though there is unlikely to be any significant economic impact directly from the extraction of oil and gas, the local region does receive benefit in the form of state and local taxes and forest service tax disbursements for transportation and road costs. The Santa Fe NF oil and gas extraction occurs exclusively in the Cuba Ranger District in Rio Arriba County. Using 2005 tax rates, the estimated tax benefit to Rio Arriba is about $42 thousand (2004 $). In the region as a whole, the 2005 forest service disbursements amounted to more than $580 thousand in additional funds given to the region's county governments. In total these funds equal almost $600 thousand

in additional tax revenues for the Santa Fe NF region. There are of course indirect and induced impacts that occur as the county governments spend these revenues. Additionally, state taxes generate about $450 thousand in revenues from oil and gas extraction on the Santa Fe NF, but these funds are not tied to the Santa Fe NF region, so it is difficult to estimate their benefit to the region itself.

The economic multipliers shown in **Table 7.7** offer additional insights into the economic dynamics of the Santa Fe NF. Most of the multipliers fall in a range we would expect, but the multiplier for ranching income is rather high. This is due to the extremely low direct income generated per worker (only around $3,000) that is a result of low employee compensation and proprietor income in the base year data. Many of the other higher multipliers are an artifact of high output to employment ratios (in the case of oil and gas) or very low income to employment ratios (in the case of ranching and timber).

Table 7.7: Economic Multipliers for the Santa Fe National Forest, 2004

	Output	Employment	Income
Ranching	**1.79**	**1.51**	**3.85**
Timber Harvesting	**1.51**	**1.59**	**2.02**
Oil & Gas	**1.28**	**1.94**	**1.43**
Visitors & Recreation	**1.35**	**1.25**	**1.28**
Skiers	**1.36**	**1.25**	**1.28**
Forest Service Operations	**--**	**1.69**	**1.84**
Wildfire Suppression	**--**	**--**	**1.35**

7.5 Opportunities, Risks and Special Circumstances

Looking strictly at economic impacts, it is estimated that the Santa Fe NF contributes to about 1.25 percent of the regional economic activity in terms of employment. Compared to the other national forests, this value is relatively small. However, the distribution of forest land throughout the counties, and the differences in the size of the economy in each county suggest different degrees of reliance on the Santa Fe NF as a source of economic activity. In this case, the unmeasured aesthetic value of the forest in creating a scenic environment for the city of Santa Fe is probably quite large. As the major cultural and economic center, Santa Fe County receives the majority of visitor spending impacts, though smaller amounts are likely felt throughout the rest of the counties. In the counties with smaller economies and a generally poorer population, the dependence on the use of forest products is probably more acute. As mentioned earlier, the impacts of the Santa Fe NF on Taos County are probably negligible.

San Miguel and Mora County contain minor, though substantial, sections of the Santa Fe NF. These two counties, as the smaller and poorer economies of the region, likely rely more heavily on the benefits of the forest as a provider of primary products such as fuel wood and food, as well as land for ranching and logging. This is not to say that the populations of the other counties don’t also make significant use of the forest as a resource for these products, but rather that those areas have easier access to alternative heating methods and are generally wealthier and hence make less

use of the forest as a food source[5]. San Miguel may gain some benefit from visitors to the forest who are traveling through the county on their way to Santa Fe.

Sandoval County, as the intersection between Santa Fe and Albuquerque, has a relatively large economy, and most of its population is focused in that southeast quadrant of the County along Interstate 25. However, the presence of a number of Native American pueblos and their access to the forest suggest that a substantial number of Native Americans may make use of primary forest products. Sandoval itself probably sees little gain from visitor spending, except as they are passing through on the way between Santa Fe and Albuquerque.

Rio Arriba contains the largest portion of the forest of any of the region's counties, but its benefits are probably felt most strongly in terms of additional revenues from oil and gas extraction. Additionally, it is likely that a significant number of Rio Arriba residents make use of the forest as a source of fuel wood and food.

Santa Fe County is the most complicated. As the largest economy, the geographical center, and the prime tourist destination, Santa Fe County likely realizes a large majority of the benefits from visitor spending. The attraction of Santa Fe is extremely dependent on the beauty of its location, and hence the benefits of the forest extend far beyond the visitor spending impacts, probably playing a substantial role in the continued vitality of the service sector, Santa Fe's largest industry sector. Furthermore, it is likely that residents of Santa Fe County, especially those that live further away from the city of Santa Fe, make good use of primary forest products. The difference between these uses in Santa Fe County versus smaller counties such as Mora and San Miguel is that the inability to make use of primary forest products in Santa Fe County would affect a relatively small proportion of its population, while the same thing in Mora or San Miguel County could conceivably affect a significant portion of their population.

In addition to the strictly economic contributions discussed above and in section 7.4, there are several less strictly economic impacts that are nevertheless capable of causing a significant difference in the economic activity of the region. One particularly good example is the water retention and generation properties of the forest, but other factors such as the role the forest (and more appropriately the minerals underneath it) played in the initial founding of settlements are important. In arid southwest regions such as this, the presence of a river is crucial to enabling the survival of local populations. The economic implications of this are drastic, but how removing the Santa Fe NF would affect the local water table and consequently the current settlements is beyond the scope of this report. Suffice it to say that there are ecological impacts from the forest that leads to supporting economic activity in the region beyond the activities that have been measured here.

In examining forest planning and management issues, the region containing the Santa Fe NF consists of some of the wealthier counties in New Mexico as well as some of the poorer counties. The importance of primary forest products in these poorer regions is likely substantial, especially considering the presence of a number of Native American pueblos and reservations. Santa Fe serves as a large attractor, keeping a large portion of the visitor benefits within Santa Fe County.

[5] This again comes down to relative sizes. The larger population of Santa Fe County may mean that a greater number of people make use of the forest's primary products than in the smaller counties, but relatively, it is likely that a greater percentage of the population in Mora and San Miguel are dependent on the use of these products than in Santa Fe and Sandoval County.

Hence, Santa Fe sees the greatest benefit from the forest, though it makes up only a small portion of the economy of the region as a whole.

8 Community Relationships

This chapter describes the relationships between communities surrounding the Santa Fe NF, the Forest Service and other federal and state agencies. The Forest Service has an extensive history of working with local communities and other government agencies on various projects, ranging from economic development to forest health and sustainability. These partnerships are an indispensable method of managing operations and conducting business. They play a vital role in achieving goals that the FS might not meet alone. Data provided by the FS shows that over 200 community organizations and businesses partner with the FS on various projects throughout New Mexico. **Table 8.1** below lists the types of partners the FS worked with in 2005.

Table 8.1: Partnership Types for All New Mexico National Forests, 2005

Partner Type	Example	Number of Partnerships
Federal	US Fish and Wildlife	15
State Government	NM Youth Conservation Corps.	22
Local Government	Village of Questa	38
Tribal	Taos Pueblo	19
Non Governmental Org.	Mora County Livestock Assoc.	48
Private	Pecos Baldy Enterpises	36
Universities/ Public Schools	Western New Mexico University	28

Source: USDA Forest Service

The most common partners are non-governmental organizations, which are typically non profit organizations such as neighborhood associations and agricultural sustainability groups. State government agencies are also common partners, including Children, Youth and Families and the New Mexico State Land Office. These fruitful partnerships work to benefit both the forest land and the users.[6]

As one example, the NM Department of Game and Fish entered into a mutual agreement with the FS to help fund wildlife preservation projects on NM public lands through a program called the New Mexico Habitat Stamp Program (HSP). Since its statewide implementation in 1991, all trappers, anglers, and licensed hunters must buy a five dollar habitat stamp when purchasing a permit. The monies obtained from the stamp are used to fund wildlife and fishery habitat improvement projects.[7]

When asked to discuss relationships with other organizations, the Santa Fe NF staff described situations where collaborative relationships were tenuous at best. Mostly, the Santa Fe NF works with other government agencies, such as BLM and the State Land Office. The FS is able to accomplish much in these relationships, even if there is some conflict.

The more problematic relationships are between the FS and other community groups and non-profit organizations. FS officials describe these relationships as “reactive and not proactive.” Staff Described situations where the FS tried to proactively reach out to groups such as the Forest Guardians in hopes to establish collaborative relationships **before** policies that are perceived problematic are made, but it appears that these organizations are more interested in litigation than with actual corroboration.

[6] USDA Forest Service, Southwestern Regional Collaboration Newsletter, February 2006.
[7] USDA Forest Service, Santa Fe National Forest, http://www.fs.fed.us/r3/Santa Fe/press_releases/03-12-03_partnerships.htm (accessed April 12, 2006).

Considering the social and cultural history of northern New Mexico, it is not surprising that some communities do not want to cooperate with the FS. Within traditional communities, the FS is seen by some as representatives of the government that "stole" their land over one hundred years ago. This historical and cultural attachment of traditional users to the forest land has resulted in a sense of ownership among traditional users that proceeds and overrides the jurisdiction of the FS System. These traditional users rely on their own values and beliefs regarding access to and use of forest lands rather than following FS management plans and directives.[8] A study on the attitudes, values, and beliefs towards the FS illustrates that this issue still remains a barrier to relations between FS and traditional users.

8.1 Grants and Agreements

The Forest Service provided a list of 67 grants issued to various entities since 2000.[9] The total grants and agreements amount for the same time period is $12,029,607. Of this total amount, the FS contributed $6,686,567 in cash and in-kind contributions. The range of partner organizations is broad, including environmental advocacy groups, utility companies and citizen involvement organizations. Some of the larger grants and agreements amounts are with agencies such as Jemez Mountain School ($1,037,866), the City of Santa Fe ($1,500,000) and the Conservation Fund ($360,000). The full list provided by the FS can be found on **Table A.7** in the appendix.

8.2 Collaborative Forest Rehabilitation Program (CFRP)

One of the most significant ways the forest has been teaming up with communities is through the Collaborative Forest Rehabilitation Program (CFRP). The Community Forest Restoration Act of 2000 (Title VI, Public Law 106-393) established a cooperative forest restoration program in New Mexico. The program provides cost-share grants to stakeholders for forest restoration projects on public land that are designed through a collaborative process. Projects must address specific issues, such as wildfire threat reduction, ecosystem restoration, preservation of old and large trees, and increased utilization of small diameter wood products. The Act authorizes up to $5 million annually. State, local and tribal governments, educational institutions, landowners, conservation organizations and other interested public and private entities are all eligible to apply for funds.[10]

In New Mexico, about 13 projects were funded between 2001 and 2005; at least three were in the Santa Fe NF. An example of a funded CFRP project, the Inter Tribal Bosque Restoration Along the Rio Grande, is managed by the Pueblo of San Juan. As part of this project, the San Juan Pueblo and Santa Clara Pueblo will collaborate in a three year restoration project over 120 acres on the *bosque* along the Rio Grande on tribal land above and below Española. The goal is to remove fire-prone non-native trees from the *bosque* and replant native vegetation in an effort to restore ecosystem function, species composition and forest structure. This project is the first time any of the Rio Grande Pueblos have worked together on a forest restoration project.

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[8] J. C. Russell and P. A. Adams-Russell, Values, Attitudes and Beliefs Toward National Forest System Lands: The Santa Fe National Forest (Placerville, CA: USDA Forest Service, 2005).

[9] A list of G&A Incoming and Outgoing Funds was provided to BBER. BBER is unable to know if this list is exhaustive, but it appears to be the best data available.

Research examining attitudes and beliefs toward the Carson and Santa Fe NFs found that many local residents are satisfied with the CFRP as it is a successful way to mesh ecological values with local economic benefits.[11]

8.3 Volunteers

According to data collected from the USAD FS, the Santa Fe NF benefited from the work of about 476 volunteers between 2003 and 2005. **Table 8.2** outlines the age and gender composition of the Santa Fe NF volunteers over the past three years. In 2005, forty-one percent of volunteers were over 55 years of age, implying older people are more likely to have the time, willingness, and interest to donate their services to the NF. This is a change from the years 2004 and 2005 where seven percent and eighteen percent of volunteers were over 55, respectively. It is also interesting to note that 67 percent of the 2005 volunteers were female.

Table 8.2: Age and Gender of Santa Fe NF Volunteers, 2003-2005

	2005				2004				2003			
	< 18	18-54	55+	TOTAL	< 18	18-54	55+	TOTAL	< 18	18-54	55+	TOTAL
Male	1	52	39	92	0	71	7	78	1	106	30	137
Female	4	24	17	45	6	66	4	76	0	43	5	48
Total	5	76	56	137	6	137	11	154	1	149	35	185

Source: USDA Forest Service Volunteer Data (Human Resource Department)

The data also show that the total number of volunteers dropped consistently every year as reflected in both the number of volunteers and their accumulated hours. Curiously, as the **Table 8.3** shows, the value of the volunteer service was much lower in 2003 despite the highest number of volunteers. The value of volunteers is calculated based on their accumulated hours multiplied times their estimated government pay grade determined by the type of volunteer work performed. The larger volunteer base in Wildlife, Fish, & Rare Plants, Heritage Program, and Watershed & Air Management could explain the difference in the appraised value of volunteers between 2003 and the other years.

There is no doubt that volunteers comprise a major source of labor for the FS, allowing the agency to take on more projects than it ever could without such support. Volunteers perform a long list of tasks, including maintaining recreation sites and trails, litter pick up and wildlife restoration. In the Santa Fe NF, the most common volunteer activities involve recreation services. Volunteers provided more than $109,290 worth of labor in this resource category. The relationships between volunteers and the forest service not only benefit the NF, but the volunteers themselves are provided opportunities learn about maintaining and sustaining forest wildlife health.

The Forest Service estimates the appraised value of 7,705 volunteer hours at just over $111,000 in 2005, as shown in **Table 8.3**. In comparison, the Carson NF estimated the value of volunteers

[11] J. C. Russell and P. A. Adams-Russell, Values, Attitudes and Beliefs Toward National Forest System Lands: The Santa Fe National Forest (Placerville, CA: USDA Forest Service, 2005).

to be over $400,000 and the Cibola NF estimated over $400,000 for the same year. The data accounts for the "skill-level" of volunteers, adjusting appraised value to the Government Pay Grade scale. The "person years" column illustrates how many years worth of work was subsidized by the efforts of volunteers. Over the past three years, the FS has received the most benefit from volunteer efforts related to wildlife and recreation related activities, equivalent to over $109,000. Similarly, volunteers provided over $102,000 worth of work in the forest's heritage program.

Table 8.3: Volunteer Hours for the Santa Fe National Forest, 2003-2005

	2005			2004			2003		
Resource Category	Accum. Hours	Appraised Value (Dollars)**	Person Years*	Accum. Hours	Appraised Value (Dollars)**	Person Years*	Accum. Hours	Appraised Value (Dollars)**	Person Years*
Recreation	5139	$70,635.00	2.85	864	$8,908.00	0.48	14410	$29,747.00	8.01
Heritage Program	80	$1,004.00	0.04	6176	$100,640.00	3.43	0	$0.00	0.00
Wildlife, Fish & Rare Plants	610	$10,675.00	0.34	0	$0.00	0.00	0	$0.00	0.00
Range Management	80	$945.00	0.04	0	$0.00	0.00	48	$480.00	0.03
Forest Management	0	$0.00	0.00	0	$0.00	0.00	0	$0.00	0.00
Watershed & Air Mgt	16	$280.00	0.01	112	$1,155.00	0.06	0	$0.00	0.00
Protection	0	$0.00	0.00	0	$0.00	0.00	0	$0.00	0.00
Research	0	$0.00	0.00	396	$4,083.00	0.22	0	$0.00	0.00
Business & Finance	16	$189.00	0.01	440	$5,361.00	0.24	24	$240.00	0.01
Facilities Const (Off-Center)	0	$0.00	0.00	0	$0.00	0.00	0	$0.00	0.00
Facilities Const (On-Center)	0	$0.00	0.00	0	$0.00	0.00	0	$0.00	0.00
Other Facilities	0	$0.00	0.00	0	$0.00	0.00	0	$0.00	0.00
Other	1764	$27,347.00	0.98	896	$20,990.00	0.50	0	$0.00	0.00
TOTAL	7,705	$111,075	4.27	8884	$141,137.00	4.93	14,482	$30,467	8.05

Source: USDA Forest Service Volunteer Data (Human Resource Department)

Note: *"Accum Hours/1800 Hours" (Expressed in Years) and **"Accum Hours*Estimated Government Pay Grade"

8.4 Opportunities, Risks and Special Circumstances

The Santa Fe NF relies on local communities for critical resources, such as volunteers and collaborative relationships. It is through these arrangements that the forest is able to facilitate innovative projects aimed at improving forest health and reducing threats, such as fires and non-native species. Even though the FS actively tries to develop collaborative relationships with other organizations, other groups may be reluctant to step up because their function is more of a "watchdog" rather than a community partner.

The local communities can potentially provide a healthy supply of volunteers for the forest, especially near the city of Santa Fe. Generally speaking, however, recruiting volunteers may be difficult because northern New Mexico is a sparsely populated region of the state. It may be more fruitful to solicit organizations (forest advocates or social groups) for volunteers rather than seek them out as individuals.

As volunteers, people can experience personal benefits by working in the forest, such as learning about forest health, wildlife conservation and the value of forest maintenance. As such, it may be a reasonable venture to actively recruit younger volunteers with the goals of developing their enthusiasm about the forest and transferring forest-related knowledge and wisdom to the next generation. This may be especially valuable in areas where families' livelihood and culture are directly tied to the land.

Traditional users and long-term residents may be reluctant to work with the FS because they may perceive their attachment and “land ethic” to be beyond the bureaucratic entanglements of the FS. The FS, in this case, must convince skeptics that it is also committed to serving the land and honoring its cultural significance before the agency will be accepted as legitimate land managers.

Native American tribes and long-time ranchers hold a traditional wisdom about the land and its health, which can be a valuable resource for forest management. As people who have lived with the land and have depended on it for their livelihood, they feel they can tell when forest health is being compromised and can help predict possible outcomes of forest planning activities. The FS can use this knowledge as a resource for planning. Traditional users may be more willing to cooperate if they know their knowledge and information will be used in a meaningful way.

The relationships between the Forest Service, as an agency, and the local communities are crucial. Communities often look to the FS to make decisions regarding land use conflicts. Native American tribes can easily view the FS as both an advocate and also a threat, especially when it comes to protecting special areas. Consequently, environmentalists often influence FS decisions that are in opposition to the interests of local landowners. This mismatch of interests can create tension between the two groups. It would be beneficial to the FS to construct planning policies that reflect at least some concerns of each group.

9 Principal Findings, Challenges and Opportunities

"Success of the Forest Service in the 21st century will be measured by the Agency's ability to sustain the flow of social and economic benefits to the American people while also ensuring that the capacity of the nation's forests and grasslands to provide ecological benefits is undiminished."[12]

Initially started in 1905, the mission of the USDA Forest Service was to manage and allocate the resources of the National Forests. Today the mission is *"to sustain the health, diversity, and productivity of the Nation's forests and grasslands to meet the needs of present and future generations"*.

9.1 Economic Impacts of the Santa Fe NF

The Santa Fe NF directly and indirectly accounts for an estimated $160 million in output, $69 million in labor and 2,300 jobs, equal to about 1.3 percent of employment in the seven county assessment area. Visitor and recreational activities, including skiing, account for about 2 of 3 jobs and an equivalent share of labor income; FS operations and wildfire operations make up much of the remainder. Oil and gas extraction, ranching and timber harvesting together account for less than ten percent of the value of all economic activity on the Santa Fe NF, and a much lower share of employment and wages. This study does not measure the role of the Forest in creating markets for residential development, including second homebuyers and amenity migrants, but there is every reason to believe that this may account for one of the most significant impacts of the Forest on the regional economy.

In all likelihood, the trend toward a greater importance of recreation based activities and a corresponding decline in resource based activities will continue and even accelerate during the foreseeable future. The share of national income received by the top tiers of income earners has increased significantly over the past two decades, creating a pool of funds available for leisure spending and second home purchase. Further, the retirement of the 'baby boomers' will be reaching its apex over the next two decades, broadening the market for amenity rich residential development. The areas surrounding Santa Fe NF, particularly in the Espanola and Pecos RDs nearest the City of Santa Fe, are attractive locations for these populations and activities. On the flip side, economic strategies traditionally employed in the Santa Fe NF assessment area, typically combining ranching, *acequia* agriculture, wood collection and other communal land uses, appear to be less viable in the context of rising land values and declining prices for primary commodities. Consequently, many of these traditional users are party to the transformation of land use patterns, as ranches and agricultural lands are sold for residential and second home development.

9.2 Cultural and Socioeconomic Diversity and Conflicting Demands for Forest Management

Perhaps more than any other National Forest area in New Mexico, the Santa Fe NF is characterized by extreme socioeconomic and cultural diversity. The cities of Santa Fe and Los Alamos include some of the most affluent populations in the State, if not the nation. Communities such as Espanola, and even parts of Santa Fe, have very high levels of urban poverty. The

[12] USDA FS. (2006, October). *Four Threats: Questions and Answers*. Retrieved November 17, 2006, from http://www.fs.fed.us/projects/four-threats/questions-answers.shtml

assessment area includes no fewer than 11 Native American pueblos, and a number of Hispano land grant communities. Far from static, this socioeconomic and cultural mix is undergoing continuous change. No doubt, this remarkable diversity mix is central to the area's attraction, but it also makes the challenges of resource management that much greater.

Each of these groups approach the Forest with very different sets of values, needs and expectations regarding resource management; the more affluent populations, particularly the most recent arrivals, view the Forest as recreational resource, offering amenities to individual households and business opportunities to the local economy. Environmental groups sometimes align with these interests, strongly favoring policies that benefit wildlife and wilderness. Hispanic land grant communities see the Forest as an extractive resource that supports traditional subsistence economies. Economically marginal urban communities view the land as offering supplemental income, whether in timber harvesting, rock extraction or occasionally grazing. Native American populations share many of these economic needs, but also see the Forest land in historical cultural and religious context.

In this context, the Forest Service functions as an arbitrator of land use conflicts. Too often, however, the Forest Service is perceived by the various groups as lacking impartiality, favoring the interests of one group or another. For instance, the FS is often seen by traditional groups as favoring the powerful interests of environmentalists and the affluent, who are typically better organized and more conversant in the administrative language of the Federal bureaucracy. Conversely, many within the affluent communities argue that the FS tries to avoid controversy by compromising with what are seen as unsustainable practices of traditional communities. Beyond these very general divisions, the role of the FS is further complicated on a local basis, where it is required to make decisions with very immediate consequences.

Balancing these myriad and often incompatible demands is arguably the greatest challenge facing the Santa Fe NF staff. There is no perfect solution but language must be part of the equation. The FS would establish a more credible position as arbiter and land manager by clearly stating its policies and rationale in language that is consistent and equally accessible to all groups. Too often, administrators use highly technical language for the purposes of clarity, but the result can be interpreted as favoring one or another group.

9.3 Managing Forest Access

Access to Santa Fe NF is uneven and complex, stressing FS resources. Many of these problems are due to the long and complex relationship between local communities and the land that now forms the Santa Fe NF. For instance, many communities have developed unique ways of accessing the Forest, but because of the complexity of land tenure and even the lack of clear legal documentation the FS now finds it difficult to ensure rights-of-way to the public at large. Similarly, because of the long history of Forest use, Santa Fe NF has excessive number of access points, including forest roads, making it difficult to regulate access to areas that require protection. More recently, the growing use of off-highway-vehicles (OHVs) has created an estimated 1,000 miles of user created roads in the Santa Fe NF, again allowing access to areas that require protection. Common and significant changes in Federal policy regulating Forest access, such as roadless area policy, likewise complicate the job of local FS officials.

Underlying the questions of access are broader questions of Forest use. Once access is established, the capacity of FS officials to regulate use is compromised. Conversely, by making clear decisions regarding use FS officials can address questions of access, limiting access to areas that require protection and facilitating access (by land conveyances, right of way agreements, road improvements and so on) to areas that best meet demands for use.

9.4 Land Development and Ecological Management

The Santa Fe NF faces a number of challenges to Forest health – risk of catastrophic fire, bark beetle, and invasive species are among the most pressing. To be sure, drought and decades of fire suppression have contributed to these problems, but as in many parts of the U.S. the rapid rate of land development along Forest boundaries has exacerbated these threats. Land development has long been an issue along the edges of Santa Fe and Los Alamos, but has more recently emerged as a problem in more remote areas in the Pecos and Jemez RDs. Because of remote locations, the costs and complexity of managing ecological hazards are increased.

Although land development is pronounced along the boundaries of the Santa Fe NF, the problem is attenuated by the relatively low levels of private landownership in the Forest. Only about 8 percent of land within the boundaries of Santa Fe NF is privately owned, and in most cases private land is in relatively large parcels. By contrast, nearly one-quarter of Cibola NF land is privately-managed, often in small parcels. Further, land use patterns on publicly and privately-held land in the Santa Fe NF vary only slightly, in sharp contrast to other Forests in New Mexico, The pattern of landownership Santa Fe NF and similarities in patterns of land use offer officials an opportunity to implement sound ecological management policies, with minimal interference and the possibility of significantly effecting tendencies in adjacent lands.

9.5 Community Partnerships

Faced with federal mandates and declining resources, the FS is turning increasingly to community partnerships and collaboration as a way of achieving its goals. During recent years, there has been a lull in such activities at Santa Fe NF. The number and diversity of community partnerships is less than what might be expected compared to other NFs in New Mexico, especially considering the relative access of the Forest to large populations. Further, the number of volunteers has declined during recent years, particularly among younger populations.

The value of such programs goes well beyond the direct labor-saving benefits, as they serve as valuable mechanism to educate various groups about the decision-making process that FS engages in, while building a sense of ownership in the community. In particular, Santa Fe NF managers should continue to pursue opportunities to develop similar programs and relationships with traditional land users, including Hispanos and Native Americans. Failing to develop such programs poses the risk of further alienating traditional groups, as they may perceive the strength of partnerships with environmental, urban and business groups as further evidence of bias in forest policy. To this end, one possible strategy may be to involve traditional communities in decision making in the area of sustainable forest management practice. This may help to bring together long established and newly expanding communities in a common effort while at the same time passing along local knowledge about sustainable land management.

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Appendices

Table A.1: Population of Places in Assessment Area, 2000

Santa Fe Places	1980	1990	2000	% Change 80-90	% Change 90-00
Agua Fria CDP	.	3,717	2,051	NA	-44.8
Alcalde CDP	.	308	377	NA	22.4
Algodones CDP	.	.	688	NA	NA
Angel Fire village	.	93	1,048	NA	1026.9
Bernalillo town	3,012	5,960	6,611	97.9	10.9
Canada de los Alamos CDP	.	.	358	NA	NA
Cedar Grove CDP	.	.	599	NA	NA
Chama village	1,090	1,048	1,199	-3.9	14.4
Chamisal CDP	.	272	301	NA	10.7
Chimayo CDP	1,993	2,789	2,924	39.9	4.8
Chupadero CDP	.	.	318	NA	NA
Cochiti CDP	.	434	507	NA	16.8
Corrales village	2,791	5,453	7,334	95.4	34.5
Cuartelez CDP	.	.	452	NA	NA
Cuba village	609	760	590	24.8	-22.4
Cundiyo CDP	.	.	95	NA	NA
Cuyamungue CDP	.	329	421	NA	28.0
Dulce CDP	1,648	2,438	2,623	47.9	7.6
Edgewood town	.	.	1,893	NA	NA
Eldorado at Santa Fe CDP	.	2,260	5,799	NA	156.6
El Rancho CDP	.	.	817	NA	NA
El Valle de Arroyo Seco CDP	.	.	1,149	NA	NA
Espanola city	6,803	8,389	9,688	23.3	15.5
Galisteo CDP	.	.	265	NA	NA
Glorieta CDP	.	.	859	NA	NA
Jaconita CDP	.	375	343	NA	-8.5
Jemez Pueblo CDP	1,503	1,301	1,953	-13.4	50.1
Jemez Springs village	316	413	375	30.7	-9.2
La Cienega CDP	.	1,066	3,007	NA	182.1
La Jara CDP	.	.	209	NA	NA
Lamy CDP	.	.	137	NA	NA
La Puebla CDP	.	.	1,296	NA	NA
Las Vegas city	14,322	14,753	14,565	3.0	-1.3
Los Alamos CDP	11,039	11,455	11,909	3.8	4.0
Los Cerrillos CDP	.	.	229	NA	NA
Madrid CDP	.	.	149	NA	NA
Mosquero village	197	164	120	-16.8	-26.8
Nambe CDP	1,017	1,246	.	22.5	NA
Pecos village	885	1,012	1,441	14.4	42.4
Pena Blanca CDP	.	300	661	NA	120.3
Penasco CDP	.	648	572	NA	-11.7
Picuris Pueblo CDP	.	.	86	NA	NA
Placitas CDP	.	1,611	3,452	NA	114.3
Pojoaque CDP	.	1,037	1,261	NA	21.6
Ponderosa CDP	.	.	310	NA	NA
Pueblo of Sandia Village CDP	.	.	344	NA	NA

Table A.1 Cont'd: Population of Places in Assessment Area, 2000

Questa village	1,202	1,707	1,864	42.0	9.2
Ranchos de Taos CDP	1,411	1,779	2,390	26.1	34.3
Red River town	332	387	484	16.6	25.1
Regina CDP	.	.	99	NA	NA
Rio Chiquito CDP	.	.	103	NA	NA
Rio en Medio CDP	.	.	131	NA	NA
Rio Lucio CDP	.	.	379	NA	NA
Rio Rancho city	.	.	51,765	NA	NA
San Felipe Pueblo CDP	1,465	1,557	2,080	6.3	33.6
San Ildefonso Pueblo CDP	.	447	458	NA	2.5
San Juan CDP	.	465	592	NA	27.3
Santa Ana Pueblo CDP	.	476	479	NA	0.6
Santa Clara Pueblo CDP	.	1,156	980	NA	-15.2
Santa Cruz CDP	.	2,504	.	NA	NA
Santa Fe city	48,953	55,859	62,203	14.1	11.4
Santo Domingo Pueblo CDP	2,082	2,866	2,550	37.7	-11.0
San Ysidro village	199	233	238	17.1	2.1
Sombrillo CDP	.	.	493	NA	NA
Taos town	3,369	4,065	4,700	20.7	15.6
Taos Pueblo CDP	.	1,187	1,264	NA	6.5
Taos Ski Valley village	.	.	56	NA	NA
Tesuque CDP	1,014	1,490	909	46.9	-39.0
Torreon CDP (Sandoval County)	.	.	297	NA	NA
Vadito CDP	.	283	242	NA	-14.5
Wagon Mound village	416	319	369	-23.3	15.7
White Rock CDP	6,560	6,192	6,045	-5.6	-2.4
Zia Pueblo CDP	.	637	646	NA	1.4
TOTAL SANTA FE PLACES	**114,228**	**153,240**	**233,201**	34.2	52.2

Source: US Census Bureau, Decennial Census, 1980, 1990, 2000. Calculations by UNM-BBER.

Table A.2 Net Migration for the Santa Fe National Forest Counties, 1990 and 2000

	SAN MIGUEL COUNTY				SANTA FE COUNTY			
	1990	2000	Percent of Total 1990	Percent of Total 2000	1990	2000	Percent of Total 1990	Percent of Total 2000
TOTAL	23,671	28,186	100%	100%	91,923	121,557	100%	100%
Same House	14,346	17,812	61%	63%	47,309	64,899	51%	53%
Different House	9,325	10,374	39%	37%	44,614	56,658	49%	47%
in the United States	9,029	9,961	38%	35%	43,296	51,510	47%	42%
Same County	4,652	5,379	20%	19%	21,015	26,104	23%	21%
Different County	4,377	4,582	18%	16%	22,281	25,406	24%	21%
Same State	2,215	2,636	9%	9%	7,747	8,453	8%	7%
Different State	2,162	1,946	9%	7%	14,534	16,953	16%	14%
Northeast	108	192	0%	1%	2,172	2,500	2%	2%
Midwest	266	143	1%	1%	1,778	2,689	2%	2%
South	702	594	3%	2%	4,710	4,791	5%	4%
West	1,086	1,017	5%	4%	5,874	6,973	6%	6%
Puerto Rico	0	0	0%	0%	0	30	0%	0%
Elsewhere	296	413	1%	1%	1,318	5,118	1%	4%

	RIO ARRIBA COUNTY				SANDOVAL COUNTY			
	1990	2000	Percent of Total 1990	Percent of Total 2000	1990	2000	Percent of Total 1990	Percent of Total 2000
TOTAL	31,229	38,419	100%	100%	57,103	83,382	100%	100%
Same House	20,770	27,410	67%	71%	29,383	47,166	51%	57%
Different House	10,459	11,009	33%	29%	27,720	36,216	49%	43%
in the United States	10,337	10,487	33%	27%	27,202	35,258	48%	42%
Same County	6,768	5,500	22%	14%	6,269	9,710	11%	12%
Different County	3,569	4,987	11%	13%	20,933	25,548	37%	31%
Same State	2,096	3,015	7%	8%	11,842	13,325	21%	16%
Different State	1,473	1,972	5%	5%	9,091	12,223	16%	15%
Northeast	107	139	0%	0%	1,312	1,607	2%	2%
Midwest	168	204	1%	1%	1,762	2,054	3%	2%
South	347	493	1%	1%	2,167	3,392	4%	4%
West	851	1,136	3%	3%	3,850	5,170	7%	6%
Puerto Rico	0	8	0%	0%	0	14	0%	0%
Elsewhere	122	514	0%	1%	518	944	1%	1%

	LOS ALAMOS COUNTY				MORA COUNTY			
	1990	2000	Percent of Total 1990	Percent of Total 2000	1990	2000	Percent of Total 1990	Percent of Total 2000
TOTAL	16,999	17,275	100%	100%	3,988	4,857	100%	100%
Same House	9,293	10,300	55%	60%	2,750	3,364	69%	69%
Different House	7,706	6,975	45%	40%	1,238	1,493	31%	31%
in the United States	7,435	6,590	44%	38%	1,238	1,470	31%	30%
Same County	3,340	3,037	20%	18%	606	482	15%	10%
Different County	4,095	3,553	24%	21%	632	988	16%	20%
Same State	1,343	1,034	8%	6%	387	601	10%	12%
Different State	2,752	2,519	16%	15%	245	387	6%	8%
Northeast	240	257	1%	1%	12	5	0%	0%
Midwest	418	486	2%	3%	21	29	1%	1%
South	1,084	813	6%	5%	107	105	3%	2%
West	1,010	963	6%	6%	105	248	3%	5%
Puerto Rico	0	0	0%	0%	0	0	0%	0%
Elsewhere	271	385	2%	2%	0	23	0%	0%

	TAOS COUNTY				TOTAL SANTA FE COUNTIES			
	1990	2000	Percent of Total 1990	Percent of Total 2000	1990	2000	Percent of Total 1990	Percent of Total 2000
TOTAL	21,328	28,347	100%	100%	246,241	322,023	100%	100%
Same House	13,113	18,249	55%	65%	136,964	189,200	56%	59%
Different House	8,215	10,098	35%	36%	109,277	132,823	44%	41%
in the United States	8,058	9,706	34%	34%	106,595	124,982	43%	39%
Same County	4,951	4,668	21%	17%	47,601	54,880	19%	17%
Different County	3,107	5,038	13%	18%	58,994	70,102	24%	22%
Same State	1,087	1,402	5%	5%	26,717	30,466	11%	9%
Different State	2,020	3,636	9%	13%	32,277	39,636	13%	12%
Northeast	174	362	1%	1%	4,125	5,062	2%	2%
Midwest	132	331	1%	1%	4,545	5,936	2%	2%
South	618	981	3%	3%	9,735	11,169	4%	3%
West	1,096	1,962	5%	7%	13,872	17,469	6%	5%
Puerto Rico	10	12	0%	0%	10	64	0%	0%
Elsewhere	147	380	1%	1%	2,672	7,777	1%	2%

Source: US Census Bureau, Decennial Census, 1990 and 2000. Calculations by UNM BBER.

Table A.3 Designated Trails on Santa Fe NF

Trail Name	Trail Type	Seg. Length
Coyote District		
Canada Gonzales	Standard/Terra Trail	3
Canones Cr National	Standard/Terra Trail	9
Cecilia	Standard/Terra Trail	3
Chavez Springs	Standard/Terra Trail	2
Chihuahuenos	Standard/Terra Trail	7
Continental Divide	Standard/Terra Trail	1
Continental Divide	Standard/Terra Trail	2
Continental Divide	Standard/Terra Trail	2
Continental Divide	Standard/Terra Trail	2
Continental Divide	Standard/Terra Trail	0
Continental Divide	Standard/Terra Trail	4
Continental Divide	Standard/Terra Trail	7
Continental Divide	Standard/Terra Trail	6
Continental Divide	Standard/Terra Trail	6
Continental Divide	Standard/Terra Trail	13
Corralitos	Standard/Terra Trail	3
Coyote Admin	Standard/Terra Trail	1
Coyote Canyon	Standard/Terra Trail	5
Dry Lake	Standard/Terra Trail	3
Encino	Standard/Terra Trail	5
Gallina Bench	Standard/Terra Trail	2
Hart Canyon	Standard/Terra Trail	1
Jarosa Canyon	Standard/Terra Trail	3
Maestas	Standard/Terra Trail	3
Mesa Del Medio	Standard/Terra Trail	7
Mogote	Standard/Terra Trail	1
Ojitos Canyon	Standard/Terra Trail	8
Pelones	Standard/Terra Trail	3
Penas Negras	Standard/Terra Trail	3
Piedra Lumbre	Standard/Terra Trail	1
Pinabetal	Standard/Terra Trail	2
Polvadera Creek	Standard/Terra Trail	2
Potrero	Standard/Terra Trail	4
Puerco Canyon	Standard/Terra Trail	5
Questa Navajo	Standard/Terra Trail	2
Rincon Spring	Standard/Terra Trail	2
Rio Capulin	Standard/Terra Trail	7
Rio Capulin (Cdt)	Standard/Terra Trail	6
Rio Gallina	Standard/Terra Trail	4
Rio Puerco	Standard/Terra Trail	6
Rito De Las Sillas	Standard/Terra Trail	5
San Jose	Standard/Terra Trail	4
Tsi'Pin	Standard/Terra Trail	1
Upper Gallina	Standard/Terra Trail	3
Vega Redonda	Standard/Terra Trail	2
West Tank	Standard/Terra Trail	2

Trail Name	Trail Type	Seg. Length
Cuba District		
Anastacio	Standard/Terra Trail	3
Continental Divide	Standard/Terra Trail	0
Continental Divide	Standard/Terra Trail	1
Continental Divide	Standard/Terra Trail	1
Continental Divide	Standard/Terra Trail	2
Continental Divide	Standard/Terra Trail	3
Continental Divide	Standard/Terra Trail	4
Continental Divide	Standard/Terra Trail	4
Continental Divide	Standard/Terra Trail	4
Damian	Standard/Terra Trail	2
Los Pinos	Standard/Terra Trail	5
Lucero	Standard/Terra Trail	4
Nogales	Standard/Terra Trail	1
Palomas	Standard/Terra Trail	4
Penas Negras	Standard/Terra Trail	4
Penas Negras	Standard/Terra Trail	1
Penas Negras	Standard/Terra Trail	1
Perchas	Standard/Terra Trail	2
Rattlesnake	Standard/Terra Trail	1
Rio Capulin (Cdt)	Standard/Terra Trail	0
San Jose	Standard/Terra Trail	1
San Pedro	Standard/Terra Trail	3
Vacas	Standard/Terra Trail	10
Vacas	Standard/Terra Trail	1
Jemez District		
Alamo	Standard/Terra Trail	3
Alamo Spring Trail	Standard/Terra Trail	1
Bearhead Peak	Standard/Terra Trail	1
Bearhead Ridge	Standard/Terra Trail	7
Big Spring Peak	Standard/Terra Trail	1
Bland Frijoles	Standard/Terra Trail	1
Boundary Peak	Standard/Terra Trail	1
Capulin	Standard/Terra Trail	2
East Fork	Standard/Terra Trail	10
Medio Dia	Standard/Terra Trail	5
Peralta Canyon	Standard/Terra Trail	8
Peralta Ridge	Standard/Terra Trail	4
Quemazon	Standard/Terra Trail	3
Rio Cebolla	Standard/Terra Trail	1
St. Peter'S Dome	Standard/Terra Trail	6
Turkey Spring	Standard/Terra Trail	2

Trail Name	Trail Type	Seg. Length
Pecos-Las Vegas		
Agua Fria	Standard/Terra Trail	14
Arroyo Hondo	Standard/Terra Trail	3
Beattys Baldy	Standard/Terra Trail	2
Beaver Creek	Standard/Terra Trail	5
Blue Bell	Standard/Terra Trail	0
Bob Grounds	Standard/Terra Trail	4
Bordo Del Medio	Standard/Terra Trail	6
Burro Basin	Standard/Terra Trail	5
Carraton Canyon Ski	Standard/Terra Trail	2
Cave Creek	Standard/Terra Trail	3
Chaves	Standard/Terra Trail	4
Chimayosos	Standard/Terra Trail	3
Dockwiller	Standard/Terra Trail	8
East Baldy	Standard/Terra Trail	1
Gascon	Standard/Terra Trail	5
Gascon	Standard/Terra Trail	7
Glorieta Baldy	Standard/Terra Trail	5
Harvey	Standard/Terra Trail	9
Hermits Peak	Standard/Terra Trail	10
Hollinger	Standard/Terra Trail	2
Horseshoe	Standard/Terra Trail	2
Horsethief	Standard/Terra Trail	2
Jacks Creek	Standard/Terra Trail	15
Lake Johnson	Standard/Terra Trail	2
Lark Spur	Standard/Terra Trail	3
Las Dispensas	Standard/Terra Trail	4
Lone Pine	Standard/Terra Trail	2
Lost Lake	Standard/Terra Trail	2
Middle Fork	Standard/Terra Trail	6
Mora Flats	Standard/Terra Trail	2
Mora Flats	Standard/Terra Trail	7
Nawa Ka	Standard/Terra Trail	3
North Fork	Standard/Terra Trail	3
Otto	Standard/Terra Trail	1
Pecos Baldy Lake	Standard/Terra Trail	10
Pecos Baldy Lake	Standard/Terra Trail	0
Pecos Falls	Standard/Terra Trail	11
Pecos River	Standard/Terra Trail	2
Pecos Santa Barbara	Standard/Terra Trail	7
Porvenir Divide	Standard/Terra Trail	13
Rio Mora Loop	Standard/Terra Trail	22
Rio Valdez	Standard/Terra Trail	8
Rito Perro	Standard/Terra Trail	1
Santiago Lake	Standard/Terra Trail	2
Santillanes	Standard/Terra Trail	3
Sebadillosos	Standard/Terra Trail	2
Spirit Lake	Standard/Terra Trail	3
Stewart Lake	Standard/Terra Trail	1

Trail Name	Trail Type	Seg. Length
Tecolote Loop	Standard/Terra Trail	9
Valle Medio	Standard/Terra Trail	2
Winsor National Rec	Standard/Terra Trail	6
Winsor Ridge	Standard/Terra Trail	6
Espanola District		
Agua Condida	Standard/Terra Trail	2
Agua Piedra	Standard/Terra Trail	3
Agua Piedra	Standard/Terra Trail	3
Agua Sarca	Standard/Terra Trail	6
Agua Sarca	Standard/Terra Trail	2
Alamitos	Standard/Terra Trail	1
Apache	Standard/Terra Trail	10
Aspen Loop	Standard/Terra Trail	2
Aspen Ranch Loop	Standard/Terra Trail	3
Aspen Ranch Shortcu	Standard/Terra Trail	1
Atalaya	Standard/Terra Trail	3
Bancos Loop	Standard/Terra Trail	13
Barranca	Standard/Terra Trail	6
Bear Wallow	Standard/Terra Trail	1
Bear Wallow	Snow Trail	1
Black Canyon	Standard/Terra Trail	2
Borrego	Standard/Terra Trail	12
Borrego	Snow Trail	12
Caballo	Standard/Terra Trail	6
Caballo	Standard/Terra Trail	1
Caballo	Standard/Terra Trail	6
Caballo	Standard/Terra Trail	1
Cabra Loop	Standard/Terra Trail	3
Cabra Loop	Standard/Terra Trail	3
Capulin	Standard/Terra Trail	11
Chamisa	Standard/Terra Trail	3
Cienega Redonda	Standard/Terra Trail	2
Cienega Redonda	Standard/Terra Trail	2
Cuesta Colorada	Standard/Terra Trail	1
Dome	Standard/Terra Trail	5
East Aspen Ranch Sh	Standard/Terra Trail	0
Espinosa	Standard/Terra Trail	8
Frijoles Canyon	Standard/Terra Trail	9
Guaje Canyon	Standard/Terra Trail	6
Guaje Canyon	Standard/Terra Trail	5
Guaje Canyon	Standard/Terra Trail	6
Guaje Canyon	Standard/Terra Trail	5
Guaje Ridge	Standard/Terra Trail	5
Guaje Ridge	Standard/Terra Trail	5
Hard Atalaya	Standard/Terra Trail	2
Highline	Standard/Terra Trail	6
Horsethief	Standard/Terra Trail	1
Joe Vigil	Standard/Terra Trail	3
Juan	Standard/Terra Trail	2

Trail Name	Trail Type	Seg. Length
Lemitas	Standard/Terra Trail	5
Los Alamos Canyon	Standard/Terra Trail	2
Lower Nambe	Standard/Terra Trail	2
Madera	Standard/Terra Trail	3
Mitchell	Standard/Terra Trail	3
Mitchell	Standard/Terra Trail	1
Mitchell	Standard/Terra Trail	3
Mitchell	Standard/Terra Trail	1
Nambe Lake	Standard/Terra Trail	1
Neblina'S	Standard/Terra Trail	2
Norski	Standard/Terra Trail	2
Norski	Snow Trail	2
Ojitos Polvadera	Standard/Terra Trail	3
Pachuela West	Standard/Terra Trail	2
Pajarito	Standard/Terra Trail	3
Pajarito	Standard/Terra Trail	3
Pajarito Canyon	Standard/Terra Trail	4
Pajarito Canyon	Standard/Terra Trail	4
Palacio	Standard/Terra Trail	5
Palo Quemador	Standard/Terra Trail	5
Polvadera Creek	Standard/Terra Trail	2
Po-Shu-Oinge'	Standard/Terra Trail	3
Puerco Espin	Standard/Terra Trail	4
Ranchos	Standard/Terra Trail	2
Rechuelos	Standard/Terra Trail	5
Redondo Peak	Standard/Terra Trail	4
Rendija	Standard/Terra Trail	1
Rio En Medio	Standard/Terra Trail	7
Rio Medio	Standard/Terra Trail	10
Rio Moleno	Standard/Terra Trail	7
Rio Nambe	Standard/Terra Trail	8
Rio Nambe	Standard/Terra Trail	1
Rio Quemado	Standard/Terra Trail	11
Rio Quemado	Snow Trail	11
Rito 'Quemado	Standard/Terra Trail	3
Rito 'Quemado	Standard/Terra Trail	0
San Lorenzo	Standard/Terra Trail	2
Scout	Standard/Terra Trail	6
Seco	Standard/Terra Trail	2
Sierra Mosca	Standard/Terra Trail	12
Sierra Mosca	Standard/Terra Trail	3
Sky Line	Standard/Terra Trail	5
Sky Line	Snow Trail	5
Soda Springs	Standard/Terra Trail	3
St. John'S	Standard/Terra Trail	2
Tesuque Creek	Standard/Terra Trail	2
Trailriders	Standard/Terra Trail	1
Upper Nambe	Standard/Terra Trail	1
Upper Nambe	Snow Trail	1

Trail Name	Trail Type	Seg. Length
Valle	Standard/Terra Trail	3
Vallecitos	Standard/Terra Trail	6
Vallecitos Creek	Standard/Terra Trail	0
Vallecitos Creek	Standard/Terra Trail	1
Vegas Capulin	Standard/Terra Trail	6
Viejo	Standard/Terra Trail	3
Vigil Lake	Standard/Terra Trail	1
Water Canyon	Standard/Terra Trail	2
Water Canyon	Standard/Terra Trail	2
Winsor National Rec	Standard/Terra Trail	2
Winsor National Rec	Standard/Terra Trail	11

Table A.4: Capital Outlays for Counties in Assessment Area

Counties	Road	Terminus	Year	Amount	Description
Rio Arriba	LOCAL	Espanola Railroad Museum	2007	$532,000	Miscellaneous Construction
Rio Arriba	LOCAL	Lindrith Rds	2006	$25,000	Road Improvements
Rio Arriba	LOCAL	Canones Creek Bridge	2006	$20,000	Bridge Rehabilitation
Rio Arriba	LOCAL	JCT US 64 / J8 South Pedestrian Facilities	2009	$585,000	Pedestrian Facilities
Rio Arriba	LOCAL	JCT US 64 South in Dulce	2011	$325,000	Miscellaneous Construction
Rio Arriba	LOCAL	Transit Mix Road NM 584 to Lowdermilk Lane	2006	$614,667	Road Improvements
Rio Arriba	390035	County Road 35	2006	$5,000	Road Improvements
Rio Arriba	390036	County Road 36	2006	$5,000	Road Improvements
Rio Arriba	LOCAL	Guardrail Installation	2006	$77,000	Guardrail, Safety
Rio Arriba	390073	County Roads 69 and 73	2006	$50,000	Road Improvements
Rio Arriba	390089	County Road 89A	2006	$55,000	Road Improvements
Rio Arriba	390107	County Rds 107 / 108 in La Mesilla	2006	$10,000	Road Improvements
Rio Arriba	390107	County Rds 144, 107, 108, 44, and 4	2006	$100,000	Road Improvements
Rio Arriba	390108	Commission District 2 Roads	2006	$25,000	Road Improvements
Rio Arriba	390162	Guardrail Installation	2006	$27,000	Guardrail, Safety
Rio Arriba	FL5345	Various Espanola Streets`	2006	$50,000	Road Improvements
Rio Arriba	FL5349	Onate St. Bridge	2007	$1,622,000	Bridge Replacement
Rio Arriba	FL5349	Onate St. Bridge	2008	$1,654,000	Bridge Replacement
Rio Arriba	FL5349	Espanola Main St. (Paseo De Onate)	2006	$5,400,000	Pavement Rehabilitation
Rio Arriba	FL5349	Paseo de Onate / NM-30	2006	$75,000	PE and R-O-W
Rio Arriba	NM0017	NM 17 / US 64 / 84	2006	$200,000	Lighting -Safety
Rio Arriba	NM0068	JCT 84/285 to JCT NM 291	2006	$750,000	Signalization
Rio Arriba	NM0068	Fairview Lane North 3 Miles	2007	$3,000,000	Reconstruction
Rio Arriba	NM0068	R-O-W Fencing	2006	$300,000	Fencing
Rio Arriba	NM0068	JCT NM 74 to Velarde	2007	$5,200,000	Reconstruction
Rio Arriba	NM0068	Velarde to Pilar	2010	$5,300,000	3R & Reconstruction
Rio Arriba	NM0068	Velarde to the Horseshoe Curve	2006	$250,000	Professional Services
Rio Arriba	NM0074	JCT NM 68 to JCT Old NM 74	2010	$750,000	Pedestrian Facilities
Rio Arriba	NM0076	1.1 Miles east of JCT NM0503 - East	2007	$6,000,000	Reconstruction
Rio Arriba	NM0096	R-O-W Fencing	2006	$175,000	Fencing
Rio Arriba	NM0537	Deer Crossing Beacons	2006	$150,000	Safety
Rio Arriba	NM0584	Fairview Lane Drainage Improvements	2006	$1,000,000	Drainage Improvements
Rio Arriba	US0064	San Juan / Rio Arriba C/L to JCT US 84	2008	$8,000,000	Pavement Rehabilitation
Rio Arriba	US0064	San Juan / Rio Arriba C/L to JCT US 84	2009	$2,000,000	Bridge Replacement
Rio Arriba	US0064	San Juan / Rio Arriba C/L to JCT US 84	2007	$5,300,000	Pavement Rehabilitation
Rio Arriba	US0064	San Juan / Rio Arriba C/L to JCT US 84	2009	$750,000	Bridge Replacement
Rio Arriba	US0064	San Juan / Rio Arriba C/L to JCT US 84	2009	$7,700,000	Pavement Rehabilitation
Rio Arriba	US0064	San Juan / Rio Arriba C/L to JCT US 84	2006	$3,000,000	Bridge Replacement
Rio Arriba	US0064	San Juan / Rio Arriba C/L to JCT US 84	2006	$7,000,000	Pavement Rehabilitation
Rio Arriba	US0064	San Juan / Rio Arriba C/L to JCT US 84	2006	$390,000	Right-of-Way Acquisition
Rio Arriba	US0064	San Juan / Rio Arriba C/L to JCT US 84	2006	$10,000,000	Reconstruction
Rio Arriba	US0064	Forest Boundary E of US0084 - East	2006	$7,500,000	Pavement Rehabilitation
Rio Arriba	US0084	Intersection with Paseo de Onate	2006	$5,400,000	Pavement Rehabilitation
Rio Arriba	US0084	Intersection with Paseo de Onate	2006	$800,000	Intersection Improvements
Rio Arriba	US0084	JCT NM0096	2007	$2,000,000	Overlay

Table A.4 Cont'd: Capital Outlays for Counties in Assessment Area

Counties	Road	Terminus	Year	Amount	Description
Rio Arriba	US0084	Echo Ampitheatre to Cebolla	2009	$8,000,000	3R & Reconstruction
Rio Arriba	US0084	MP 249 to MP 254 Tierra Amarilla South	2007	$6,000,000	3R & Reconstruction
Rio Arriba	US0084	US0550 Warranty Work in District 5	2006	$100,000	Field Supplies
Rio Arriba	US0550	US0550 Warranty Work in District 5	2006	$1,400,000	Contract Maintenance
Sandoval	LOCAL	Regina Roads	2006	$40,000	Road Improvements
Sandoval	LOCAL	Vincente Road	2006	$140,000	Miscellaneous Construction
Sandoval	LOCAL	Navajo Route. N7048 Bridge Across Canados	2006	$310,000	Bridge Rehabilitation
Sandoval	NM0004	JCT US0550 - North	2006	$1,435,557	Preliminary Engineering
Sandoval	NM0004	JCT US0550 - North	2006	$500,000	Preliminary Engineering
Sandoval	NM0004	Bridges in Jemez Springs	2008	$1,500,000	Bridge Replacement
Sandoval	NM0004	Bridges in Jemez Springs	2009	$500,000	Bridge Replacement
Sandoval	NM0004	Jemez Mountain Scenic Byway	2006	$20,000	Sidewalks/Bikeways
Sandoval	NM0004	Jemez Mountain Scenic Byway	2006	$200,000	Sidewalks/Bikeways
Sandoval	NM0004	Jemez Mountain Scenic Byway	2006	$100,000	Sidewalks/Bikeways
Sandoval	NM0004	Jemez Mountain Scenic Byway	2007	$150,000	Sidewalks/Bikeways
Sandoval	NM0096	Rockfall Mitigation	2006	$16,000	Rockfall Mitigation
Sandoval	NM0126	Intersection US-550 / NM 126 - East	2006	$500,000	Overlay
Sandoval	NM0126	Intersection US-550 / NM 126 - East	2006	$186,151	Safety
Sandoval	NM0126	Rockfall Mitigation	2006	$421,000	Rockfall Mitigation
Sandoval	NM0126	Fenton Lake to the Fish Hatchery Road	2006	$150,000	Construction Engineering
Sandoval	NM0197	JCT US 550 West for 1.2 Miles	2009	$1,200,000	Bridge Replacement
Sandoval	NM0197	JCT US 550 West for 1.2 Miles	2009	$100,000	Intersection Improvements
Sandoval	NM0197	JCT US 550 West for 1.2 Miles	2009	$1,500,000	Overlay
Sandoval	NM0290	1.5 Miles East of JCT NM4	2010	$1,200,000	Bridge Replacement
San Miguel	LOCAL	El Cerrito Rd	2006	$75,000	Road Improvements
San Miguel	LOCAL	Cinder Rd	2006	$25,000	Road Improvements
San Miguel	LOCAL	El Llano Rd	2006	$50,000	Road Improvements
San Miguel	LOCAL	Las Dispensas Rd	2006	$40,000	Road Improvements
San Miguel	LOCAL	Camp Luna Vista de Vegas Rd	2006	$70,000	Road Improvements
San Miguel	LOCAL	La Joya Del Padre Rd	2006	$50,000	Road Improvements
San Miguel	LOCAL	Tyson Rd in Rowe	2006	$50,000	Road Improvements
San Miguel	LOCAL	Conchas Roads	2006	$50,000	Road Improvements
San Miguel	LOCAL	Ribera Bridge	2006	$50,000	Bridge Construction
San Miguel	LOCAL	Luna Drive	2006	$50,000	Road Improvements
San Miguel	LOCAL	Legion Drive From Calle El Dorado St. to Old I	2006	$201,777	Road Improvements
San Miguel	LOCAL	Pedestrian Bridge at United World College	2007	$550,000	Miscellaneous Construction
San Miguel	47B026	County Rd B-36	2006	$20,000	Road Improvements
San Miguel	47B29A	County Rd B-29	2006	$50,000	Road Improvements
San Miguel	47B31A	County Rd B-31 A	2006	$50,000	Road Improvements
San Miguel	47B47A	County Rds	2006	$30,000	Road Improvements
San Miguel	FR2135	Pecos River Bridge # 1818, Telcote Creek Bri	2010	$2,000,000	Bridge Replacement
San Miguel	I25	Santa Fe/San Miguel C/L - North Various I25 (	2008	$1,000,000	Bridge Deck Replacement
San Miguel	I25	Santa Fe/San Miguel C/L - North Various I25 (	2009	$1,000,000	Bridge Deck Replacement
San Miguel	I25	Rowe I/C Bridges #'s 6451 & 6452	2007	$2,000,000	Bridge Rehabilitation
San Miguel	I25	Las Vegas South Interchange	2007	$2,200,000	Bridge Rehabilitation
San Miguel	I25	Las Vegas to Watrous	2006	$4,000,000	Pavement Preservation
San Miguel	I25	Rumble Strips	2006	$116,000	Rumble Strips
San Miguel	L00015	Grand Avenue in Las Vegas	2009	$5,000,000	Reconstruction
San Miguel	NM0003	JCT Old NM 484 - North	2006	$4,000,000	Reconstruction
San Miguel	NM0063	NM 63 Project	2006	$2,000,000	Overlay
San Miguel	NM0065	North of NM 329	2008	$250,000	Pedestrian Facilities
San Miguel	NM0094	JCT NM 518 - NW	2009	$2,000,000	Pavement Rehabilitation
San Miguel	NM0104	University and I25 Interchange	2009	$335,000	Landscaping
San Miguel	NM0104	Conchas Arroyo, Pino Creek, and Lamanga C	2007	$2,000,000	Bridge Rehabilitation
San Miguel	NM0329	New Mexico Avenue/Grand Avenue	2009	$500,000	Miscellaneous Construction
San Miguel	NM0419	Canadian River Bridge, 20.3 Miles North of of	2007	$1,000,000	Bridge Rehabilitation
San Miguel	NM0518	NM 518 From Mills Avenue to Legion Dr.	2008	$350,000	Pedestrian Facilities

Table A.4 Cont'd: Capital Outlays for Counties in Assessment Area

Counties	Road	Terminus	Year	Amount	Description
San Miguel	US0084	South of Romeroville	2006	$7,592,000	Reconstruction
San Miguel	US0084	Guadalupe County Line - North	2007	$1,000,000	Pavement Preservation
San Miguel	US0084	11.5 Miles south of I25 Interchange North	2007	$1,500,000	Pavement Preservation
Santa Fe	VAR	Santa Fe Railyard Bikeways and Walkways	2006	$992,000	Bicycle Lanes/Trails
Santa Fe	490055	County Road 55	2006	$140,000	Road Improvements
Santa Fe	490066	Aqua Fria / San Isidro Crossing	2006	$50,000	Road Improvements
Santa Fe	490072	Tano Road	2006	$50,000	Paving
Santa Fe	490084	County Road 84	2006	$100,000	Low-Water Crossings
Santa Fe	490084	County Road 84	2006	$66,272	Low-Water Crossings
Santa Fe	490098	Bike and Pedestrian Facilities	2010	$750,000	Pedestrian Facilities
Santa Fe	49P003	South Meadows Road	2006	$20,000	Road Improvements
Santa Fe	49P015	North Estrella Road	2006	$50,000	Road Improvements
Santa Fe	I25	I-25 Corridor Study/ Traffic Analysis	2006	$250,000	Study
Santa Fe	I25	I-25 Corridor Study/ Traffic Analysis	2006	$250,000	Study
Santa Fe	I25	St. Francis Interchange	2010	$7,500,000	Interchange Rehabilitation
Santa Fe	I25	Valencia Overpass	2011	$1,700,000	Bridge Replacement
Santa Fe	I40	Edgewood Interchange Landscaping	2011	$350,000	Landscaping
Santa Fe	NM0030	NM0502 to Espanola	2006	$500,000	Preliminary Engineering
Santa Fe	NM0030	NM0502 to Espanola	2008	$4,500,000	Four-Lane Construction
Santa Fe	NM0030	NM0502 to Espanola	2008	$4,000,000	Four-Lane Construction
Santa Fe	NM0041	Galesteo to South to Clark Hill	2008	$5,500,000	3R & Reconstruction
Santa Fe	NM0041	San Cristobal Arroyo	2009	$1,654,000	Bridge Replacement
Santa Fe	NM0041	Galesteo River	2006	$1,600,000	Bridge Replacement
Santa Fe	NM0291	Espanola Relief Route	2006	$100,000	Study
Santa Fe	NM0333	Intersection With NM0344	2006	$2,910,000	Intersection Improvements
Santa Fe	NM0333	Intersection With NM0344	2006	$110,000	Signalization
Santa Fe	NM0344	.4 Mile North of I-40 Interchange North	2006	$5,000,000	Four-Lane Construction
Santa Fe	NM0344	Dinkle Road to Venus Road	2011	$1,100,000	Four-Lane Construction
Santa Fe	NM0344	Dinkle Road to Venus Road	2011	$3,400,000	Four-Lane Construction
Santa Fe	NM0502	Rock Slide Prevention on NM0502 (MP 5 to M	2006	$610,000	Safety
Santa Fe	NM0599	NM 599 Corridor / Safety Study	2006	$500,000	Study
Santa Fe	US0084	ADA Sidewalk Upgrades	2006	$500,000	Pedestrian Facilities
Santa Fe	US0084	Guadalupe Overpass	2010	$1,671,000	Bridge Replacement
Santa Fe	US0084	Pojoaque to Espanola	2006	$4,000,000	Road Improvements
Santa Fe	US0084	Pojoaque to Espanola	2006	$19,000,000	Reconstruction
Santa Fe	US0084	Pojoaque to Espanola	2006	$20,000,000	Reconstruction
Santa Fe	US0084	Pojoaque to Espanola	2006	$3,000,000	Road Improvements

Table A.5: Designated Recreational Sites on Santa Fe NF

Site Name	Site Type	Operational Status	ROS Class
Coyote District			
Rio Puerco	Campground	Open	Roaded Natural
Rio Chama	Campground	Open	Roaded Natural
Big Eddy Take-Out	Boating Site	Open	Roaded Natural
Resumidero	Campground	Open	Roaded Natural
Chavez Canyon Boater Access	Boating Site	Open	Roaded Natural
Coyote Canyon	Picnic Site	Open	Roaded Natural
Ojitos	Trailhead	Open	Roaded Natural
Tsi'Pin	Interpretive Site (Minor)	Open	Roaded Natural
Rio Chama	Group Campground	Open	Roaded Natural
Tea Kettle Rock	Interpretive Site (Minor)	Open	Roaded Natural
Skull Bridge Boating Access	Boating Site	Open	Roaded Natural
Cuba District			
Clear Creek	Campground	Open	Roaded Natural
Rio De Las Vacas	Campground	Open	Roaded Natural
Nogales Cliff House	Interpretive Site (Minor)	Open	Roaded Natural
Rattlesnake Ridge	Interpretive Site (Minor)	Open	Roaded Natural
Clear Creek	Picnic Site	Closed	Roaded Natural
Clear Creek	Group Campground	Closed	Roaded Natural
San Gregorio	Trailhead	Open	Roaded Natural
Los Pinos	Trailhead	Open	Roaded Natural
Las Palomas	Cua Trailhead	Open	Roaded Natural
Jemez District			
Paliza (Old)	Campground	Closed	Roaded Natural
Paliza Group (Old)	Group Campground	Closed	Roaded Natural
Rincon (Old)	Fishing Site	Closed	Roaded Natural
Battleship Rock (Old)	Picnic Site	Closed	Roaded Natural
Dark Canyon (Old)	Fishing Site	Closed	Roaded Natural
San Antonio	Campground	Open	Roaded Natural
Seven Springs	Picnic Site	Open	Roaded Natural
La Cueva	Picnic Site	Open	Roaded Natural
Redondo	Campground	Open	Roaded Natural
Jemez Falls	Campground	Open	Roaded Natural
Las Conchas (Old)	Campground	Closed	Roaded Natural
Horseshoe Springs	Group Campground	Closed	
East Fork	Trailhead	Open	Roaded Natural
La Junta	Fishing Site	Open	Roaded Natural
San Diego	Fishing Site	Open	Roaded Natural
Las Casitas	Fishing Site	Open	Roaded Natural
River'S Bend	Fishing Site	Open	Roaded Natural
Vista Linda	Campground	Open	Roaded Natural
Spanish Queen	Picnic Site	Open	Roaded Natural
The Bluffs	Fishing Site	Open	Roaded Natural
Horseshoe Springs	Recreation Residence	Open	Roaded Natural
Spence Hot Springs	Cua Trailhead	Open	Roaded Natural
Jemez Falls	Trailhead	Open	Roaded Natural
Nra Gateway	Information Site	Open	Roaded Natural
San Diego Overlook	Observation Site	Open	Roaded Natural
Battleship Rock (Old)	Trailhead	Closed	Roaded Natural
Las Conchas	Trailhead	Open	Roaded Natural
Jemez Falls	Group Picnic Site	Open	Roaded Natural
Battleship Rock Trailhead (New)	Trailhead	Open	Roaded Natural
Battleship Rock Picnic Area (New)	Picnic Site	Open	Roaded Natural
Dark Canyon (New)	Fishing Site	Open	Roaded Natural
Las Conchas (New)	Fishing Site	Open	Rural
Rincon (New)	Fishing Site	Open	Roaded Natural
Paliza Family (New)	Campground	Closed	Roaded Natural
Paliza Group (New)	Group Campground	Closed	Roaded Natural

Table A.5 Cont'd: Designated Recreational Sites on Santa Fe NF

Pecos-Las Vegas District			
Baker Flat	Picnic Site	Open	Roaded Natural
Big Pine	Picnic Site	Open	Roaded Natural
Ev Long	Campground	Open	Roaded Natural
Oak Flats	Picnic Site	Open	Roaded Natural
El Porvenir	Campground	Open	Roaded Natural
Cow Creek	Campground	Closed	Roaded Natural
Gallinas Trailhead	Cua Trailhead	Open	Roaded Natural
Dalton	Picnic Site	Open	Roaded Natural
Field Tract	Campground	Open	Roaded Natural
Windy Bridge	Picnic Site	Open	Roaded Natural
Holy Ghost	Campground	Open	Roaded Natural
Cowles	Campground	Open	Roaded Natural
Iron Gate	Campground	Open	Roaded Natural
Panchuela	Picnic Site	Open	Roaded Natural
Winsor Creek	Trailhead	Open	Roaded Natural
Jacks Creek	Campground	Open	Roaded Natural
Glorieta	Picnic Site	Open	Roaded Natural
Gallinas	Recreation Residence	Open	
Holy Ghost	Recreation Residence	Open	
Winsor	Recreation Residence	Open	
Lower Grass Mountain	Recreation Residence	Open	
Upper Grass Mountain	Recreation Residence	Open	
Cowles	Recreation Residence	Open	
Johnson Mesa	Cua Camping Area	Open	Roaded Natural
Links Tract	Campground	Open	Roaded Natural
Holy Ghost	Group Campground	Open	Roaded Natural
Cowles Ponds	Fishing Site	Open	Roaded Natural
Dalton Fishing Access	Fishing Site	Open	Roaded Natural
Panchuela	Trailhead	Open	Roaded Natural
Iron Gate	Trailhead	Open	Roaded Natural
Jacks Creek	Group Campground	Open	Roaded Natural
Jacks Creek	Trailhead	Open	Roaded Natural
Jacks Creek	Horse Camp	Open	Roaded Natural
Cowles	Trailhead	Open	Roaded Natural
Holy Ghost	Trailhead	Open	Roaded Natural
Espanola District			
Aspen Basin	Campground	Open	Roaded Natural
Aspen Vista	Picnic Site	Open	Rural
Big Tesuque	Campground	Open	Roaded Natural
Black Canyon	Campground	Closed	Roaded Natural
Borrego Mesa	Cua Camping Area	Open	Roaded Natural
Little Tesuque	Picnic Site	Open	Roaded Natural
Los Alamos Reservoir (Old)	Fishing Site	Closed	Roaded Natural
Vista Grande Overlook	Observation Site	Open	Roaded Natural
Chamisa	Trailhead	Open	Roaded Natural
Borrego	Cua Trailhead	Open	Roaded Natural
Winsor	Trailhead	Open	Roaded Natural
Atalaya- Lower	Trailhead	Open	Roaded Natural
Poshuouinge	Interpretive Site (Minor)	Open	Roaded Natural
Santa Fe Ski Area	Ski Area Alpine	Closed	Urban
Black Canyon Th (Old)	Trailhead	Closed	Rural
Atalaya - Upper	Cua Trailhead	Open	Semi-Primitive Motorized
Los Alamos Reservoir (Disposed)	Fishing Site	Closed	Roaded Natural
Norski Trailhead	Cua Trailhead	Open	Roaded Natural
Black Canyon Th (New)	Trailhead	Closed	Roaded Natural
Black Canyon (New)Cg	Campground	Closed	Rural

Table A.6: Hunting Regulations on Santa Fe NF

Big Game

Species	License/Permit Type	Hunt Dates	Special Arms	Units	Permits
Deer	Private Land	10/28-11/1; 11/4-11/8	Any Legal Sporting Arm	Unit 46	Unlimited
Deer	Private Land	9/1-9/22	Bows Only	Unit 46	Unlimited
Deer	Private Land	9/23-9/29	Muzzleloader and Bows	Unit 46	Unlimited
Deer	Public Draw	Varies per unit 10/28-11/8	Any Legal Sporting Arm	Units 42, 44, 48, 51, 53	Units range 75-300
Deer	Public Draw	9/1-9/22 & 1/1/2007-1/15/2007	Bows Only	Units 4, 5A, 6A, 6C, 8, 9	Units range 30-220
Deer	Public Draw	9/1-9/22	Bows Only	Units 42, 44, 48, 51, 53	Units ange 20-100
Deer	Public Draw	9/23-9/29	Muzzleloaders	Units 4, 6, 8, 42, 44	Units range 10-100
Deer	Public Draw	9/23-9/29	Restricted Muzzleloaders	Unit 9	10
Elk	Public Draw	Varies per unit 9/2-9/13	Bows Only	Valles Caldera National Preserve	12 or 17
Elk	Public Draw	9/16-9/20	Muzzleloaders	Valles Caldera National Preserve	16
Elk	Public Draw	Varies per unit 9/30-11/20	Any Legal Sporting Arm	Valles Caldera National Preserve	Units range 8-30
Elk	Public Draw	10/21-10/23	Mobility Impaired	Valles Caldera National Preserve	30
Elk	Private Land	Varies per unit 9/30-12/31; 1/1/2007-1/31/2007	Any Legal Sporting Arm	Units 4, 5A, 5B, 6A, 6C, 9, 42, 44, 46, 48, 51, 53	n/a
Elk	Private Land	Varies per unit 9/1-9/24	Bows Only	Units 5A, 5B, 6A, 6C, 9, 42, 44, 53	n/a
Elk	Private Land	Varies per unit 9/30-12/31	Muzzleloaders	Units 6A, 6C, 9, 44, 53	n/a
Elk	Private Land	11/4-11/8	Mobility Impaired	Unit 9	n/a
Elk	Public Draw	Varies per unit 9/30-12/6	Any Legal Sporting Arm	Units 4, 5, 9, 44, 48, 51, 53	Units range 5-250
Elk	Public Draw	9/1-9/22	Bows Only	Units 5A, 5B, 6A, 6C, 9, 44, 48, 51, 53	Units range 5-395
Elk	Public Draw	Varies per unit 9/30-11/15	Muzzleloaders	Units 6A, 6C, 9, 44, 53	Units range 5-300
Elk	Public Draw	Varies per unit 9/30-11/8	Mobility Impaired	Units 9, 51	30
Antelope	Public Draw	8/26-8/28, 9/16-9/17	Any Legal Sporting Arm	Units 42, 43, 44-49, 53	300
Antelope	Public Draw	Varies per unit 8/12-8/23	Bows Only	Units 42-49	100 or 200
Antelope	Public Draw	8/19-8/22	Muzzleloaders	Unit 52	175
Antelope	Public Draw	8/5-8/7	Mobility Impaired	Units 42-49	25 or 45
Bighorn Sheep	Public Draw	Varies per unit 8/26-9/18	Restricted	Units 44, 53	2 or 8
Bear	OTC	Varies per unit 8/16-11/15	Bows Only or Any legal	Units 4, 8, 9, 42, 44, 46, 48, 51, 53	Unitl harvest is reached
Bear	Public Draw for WMA	8/1-8/31	Restricted	Unit 4	10
Turkey	Public Draw	11/11-11/19	Restricted	Unit 4	5
Cougar	OTC	10/1-3/31	Restricted	Units 4, 6, 8, 9, 42-44, 46, 48, 51, 53	Until harvest is reached
Cougar	Public Draw for WMA	Varies per unit 10/1-3/31	Restricted	Units 4, 9	Varies 5-unlimited
Furbearers	OTC	Varies per furbearer from 4/1/05-3/31/06	Dogs, firearms, bows, traps/s	Not well-specified; certain areas closed	n/a

Small Game/Waterfowl

Species	License/Permit Type	Hunt Dates	Special Arms	Units/Counties/Zones	Permits
Quail	OTC	11/15-2/15	Any Legal Sporting Arm	Statewide	n/a
Quail	OTC	9/1-10/30	Any Legal Sporting Arm	North Zone	n/a
Dove	OTC	Varied 9/1-12/30	Any Legal Sporting Arm	Statewide	n/a
Band-Tailed Pig	OTC	9/1-12/16	Any Legal Sporting Arm	Statewide (except Southwest)	n/a
Grouse & Squirr	OTC	9/1-10/31	Any Legal Sporting Arm	GS-1	n/a
Sandhill Crane	OTC	11/5-11/6	Any Legal Sporting Arm	Estancia Valley Hunt (Santa Fe County)	n/a
Pheasant	OTC	12/8-12/11	Any Legal Sporting Arm	Statewide (except Valencia County)	n/a
Duck/American	OTC	10/8-1/11	Any Legal Sporting Arm	Central Flyway North Zone	n/a
Common Snipe	OTC	10/8-1/22	Any Legal Sporting Arm	Central Flyway	n/a
Moorhen	OTC	10/8-1/22	Any Legal Sporting Arm	Central Flyway	n/a
Sora/Virginia Ra	OTC	9/17-1/1	Any Legal Sporting Arm	Central Flyway	n/a
Light Goose	OTC	10/17-1/31	Any Legal Sporting Arm	Central Flyway	n/a
Dark Goose	OTC	10/17-1/31	Any Legal Sporting Arm	Central Flyway	n/a
Pintail/Canvasb	OTC	10/8-11/15	Any Legal Sporting Arm	Central Flyway North Zone	n/a

Source: New Mexico Department of Game and Fish,
Big Game & Trapper Rules & Information 2006-2007 License Year and *2005-2006 Small Game & Waterfowl Rules & Information*.
http://www.wildlife.state.nm.us/recreation/hunting/index.htmaccessed May 31, 2006.

Table A.7: Grants and Agreements on Santa Fe NF

Grant & Agreement Number	Cooperator Cash Contibution	Cooperator Other Contribution	Cooperator Total Contribution	FS Cash Contribution	FS Other Contribution	FS Total Contribution	Total G&A Amount
00-IA-11031000-026	$40,000.00	$0.00	$40,000.00	$0.00	$0.00	$0.00	$40,000.00
	Cooperator/ Contributors:	U S D I, BUREAU OF LAND MANAGEMENT					
01-DG-11031000-054	$613,866.00	$24,000.00	$637,866.00	$400,000.00	$0.00	$400,000.00	$1,037,866.00
	Cooperator/ Contributors:	JEMEZ MOUNTAIN SCHOOL, JEMEZ MOUNTAIN SCHOOLS					
01-IA-11031000-011	$0.00	$0.00	$0.00	$5,069.08	$0.00	$5,069.08	$5,069.08
	Cooperator/ Contributors:	BUREAU OF LAND MGMT, U S D I, BUREAU OF LAND MANAGEMENT					
01-MU-11031000-060	$0.00	$0.00	$0.00	$0.00	$0.00	$0.00	$0.00
	Cooperator/ Contributors:	SANTA FE, CITY OF					
02-CO-11031000-018	$642,664.00	$0.00	$642,664.00	$0.00	$0.00	$0.00	$642,664.00
	Cooperator/ Contributors:	SANTA FE, CITY OF					
02-CO-11031000-020	$213,876.00	$0.00	$213,876.00	$0.00	$0.00	$0.00	$213,876.00
	Cooperator/ Contributors:	SANTA FE COUNTY					
02-CO-11031000-021	$236,390.00	$0.00	$236,390.00	$0.00	$0.00	$0.00	$236,390.00
	Cooperator/ Contributors:	LAS CAMPANAS LIMITED PARTNERSHIP					
02-CO-11031000-044	$78,000.00	$0.00	$78,000.00	$0.00	$27,400.00	$27,400.00	$105,400.00
	Cooperator/ Contributors:	NEW MEXICO DEPARTMENT OF TRANSPORTATION					
02-DG-11031000-001	$94,654.00	$0.00	$94,654.00	$341,375.00	$0.00	$341,375.00	$436,029.00
	Cooperator/ Contributors:	THE UNIVERSITY OF ARIZONA, UNIVERSITY OF ARIZONA					
02-DG-11031000-002	$0.00	$83,040.00	$83,040.00	$344,271.00	$0.00	$344,271.00	$427,311.00
	Cooperator/ Contributors:	PUEBLO OF JEMEZ					
03-CO-11031000-021	$72,894.00	$0.00	$72,894.00	$0.00	$0.00	$0.00	$72,894.00
	Cooperator/ Contributors:	STATE OF NEW MEXICO, ENVIRONMENT DEPARTMENT					
03-CO-11031000-043	$125,686.53	$0.00	$125,686.53	$0.00	$0.00	$0.00	$125,686.53
	Cooperator/ Contributors:	NEW MEXICO DEPARTMENT OF GAME & FISH					
03-DG-11031000-008	$0.00	$90,000.00	$90,000.00	$359,979.00	$0.00	$359,979.00	$449,979.00
	Cooperator/ Contributors:	PUEBLO OF SAN JUAN					
03-DG-11031000-011	$0.00	$75,000.00	$75,000.00	$309,712.00	$0.00	$309,712.00	$384,712.00
	Cooperator/ Contributors:	AMERICAN FOREST PRODUCTS, AMERICAN METAL WORKS					
03-DG-11031000-012	$0.00	$182,724.00	$182,724.00	$344,652.00	$0.00	$344,652.00	$527,376.00
	Cooperator/ Contributors:	PUEBLO OF SANTA CLARA					
03-DG-11031000-034	$0.00	$72,000.00	$72,000.00	$270,247.60	$0.00	$270,247.60	$342,247.60
	Cooperator/ Contributors:	PUEBLO OF TESUQUE					
03-DG-11031000-035	$0.00	$89,140.00	$89,140.00	$356,563.00	$0.00	$356,563.00	$445,703.00
	Cooperator/ Contributors:	EL GRECO, EL GRECO C/O MAX CORDOVA					
03-DG-11031000-036	$0.00	$91,186.00	$91,186.00	$358,696.00	$0.00	$358,696.00	$449,882.00
	Cooperator/ Contributors:	THE NATURE CONSERVANCY, THE NATURE CONSERVNCY					
03-DG-11031000-037	$0.00	$90,000.00	$90,000.00	$245,286.19	$0.00	$245,286.19	$335,286.19
	Cooperator/ Contributors:	PUEBLO OF POJOAQUE					
03-DG-11031000-038	$0.00	$90,000.00	$90,000.00	$267,840.75	$0.00	$267,840.75	$357,840.75
	Cooperator/ Contributors:	PUEBLO OF ILDEFONSO					
03-IA-11031000-009	$0.00	$0.00	$0.00	$0.00	$0.00	$0.00	$0.00
	Cooperator/ Contributors:	VALLES CALDERA TRUST					
03-PA-11031000-003	$0.00	$0.00	$0.00	$0.00	$0.00	$0.00	$0.00
	Cooperator/ Contributors:	SANTA FE, CITY OF					
04-CO-11031000-001	$1,500,000.00	$0.00	$1,500,000.00	$0.00	$0.00	$0.00	$1,500,000.00
	Cooperator/ Contributors:	LOS ALAMOS COUNTY FIRE DEPARTMENT					
04-CO-11031000-024	$0.00	$0.00	$0.00	$0.00	$0.00	$0.00	$0.00
	Cooperator/ Contributors:	LOS ALAMOS COUNTY					
04-DG-11031000-031	$71,760.00	$0.00	$71,760.00	$349,269.00	$0.00	$349,269.00	$421,029.00
	Cooperator/ Contributors:	TIERRA Y MONTES S&W CONSER, TIERRA Y MONTES SOIL & WATER CONSERVATION DISTRICT					
04-DG-11031000-032	$90,000.00	$0.00	$90,000.00	$360,000.00	$0.00	$360,000.00	$450,000.00
	Cooperator/ Contributors:	THE CONSERVATION FUND					
04-DG-11031000-033	$90,000.00	$0.00	$90,000.00	$360,000.00	$0.00	$360,000.00	$450,000.00
	Cooperator/ Contributors:	COUNTY OF SANTA FE, SANTA FE COUNTY FIRE DEPARTMENT					
04-DG-11031000-034	$46,329.00	$0.00	$46,329.00	$184,538.00	$0.00	$184,538.00	$230,867.00
	Cooperator/ Contributors:	EARTH WORKS INSTITUTE, EARTHWORKS INSTITUTE					
04-DG-11031000-035	$89,506.00	$0.00	$89,506.00	$358,663.00	$0.00	$358,663.00	$448,169.00
	Cooperator/ Contributors:	PUEBLO OF JEMEZ, WALATOWA WOODLANDS INITIAT					
04-IA-11031000-006	$15,000.00	$8,000.00	$23,000.00	$0.00	$0.00	$0.00	$23,000.00
	Cooperator/ Contributors:	U S D O T, FEDERAL HIGHWAY ADMINISTRATION					

Table A.7 Cont'd: Grants and Agreements on Santa Fe NF

Grant & Agreement Number	Cooperator Cash Contibution	Cooperator Other Contribution	Cooperator Total Contribution	FS Cash Contribution	FS Other Contribution	FS Total Contribution	Total G&A Amount
04-MU-11031000-008	$0.00	$0.00	$0.00	$0.00	$0.00	$0.00	$0.00
	Cooperator/ Contributors:	DEPARTMENT OF THE ARMY, U.S. ARMY CORPS OF ENGINEERS, PUEBLO DE COCHITI, U S D I, BUREAU OF LAND MANAGEMENT					
04-PA-11031000-011	$0.00	$0.00	$0.00	$0.00	$0.00	$0.00	$0.00
	Cooperator/ Contributors:	NEW MEXICO ENERGY, MINERALS, & NATURAL RESOURCES DEPARTMENT					
04-PA-11031000-014	$0.00	$0.00	$0.00	$0.00	$0.00	$0.00	$0.00
	Cooperator/ Contributors:	ROCKY MOUNTAIN YOUTH CORPS					
04-PA-11031000-037	$158,170.00	$0.00	$158,170.00	$0.00	$0.00	$0.00	$158,170.00
	Cooperator/ Contributors:	NEW MEXICO ENVIRONMENT DEPARTMENT					
05-CO-11031000-001	$85,460.00	$0.00	$85,460.00	$0.00	$0.00	$0.00	$85,460.00
	Cooperator/ Contributors:	NEW MEXICO DEPARTMENT OF GAME & FISH					
05-CO-11031000-041	$0.00	$0.00	$0.00	$0.00	$0.00	$0.00	$0.00
	Cooperator/ Contributors:	ROCKY MOUNTAIN ELK FOUNDATION					
05-CO-11031000-042	$0.00	$0.00	$0.00	$0.00	$0.00	$0.00	$0.00
	Cooperator/ Contributors:	NEW MEXICO DEPT. GAME & FISH					
05-CO-11031000-043	$0.00	$0.00	$0.00	$0.00	$0.00	$0.00	$0.00
	Cooperator/ Contributors:	NEW MEXICO ENVIRONMENT DEPARTMENT					
05-CS-11031000-012	$0.00	$0.00	$0.00	$131,000.00	$0.00	$131,000.00	$131,000.00
	Cooperator/ Contributors:	TREE NEW MEXICO, TREE NEW MEXICO INC					
05-CS-11031000-016	$0.00	$0.00	$0.00	$0.00	$0.00	$0.00	$0.00
	Cooperator/ Contributors:	NEW MEXICO DEPARTMENT OF TRANSPORTATION					
05-DG-11031000-045	$90,000.00	$0.00	$90,000.00	$359,957.00	$0.00	$359,957.00	$449,957.00
	Cooperator/ Contributors:	PUEBLO OF SAN JUAN					
05-DG-11031000-046	$0.00	$0.00	$0.00	$187,863.00	$0.00	$187,863.00	$187,863.00
	Cooperator/ Contributors:	NEW MEXICO RECYCLING COALITION					
05-DG-11031000-047	$0.00	$0.00	$0.00	$360,000.00	$0.00	$360,000.00	$360,000.00
	Cooperator/ Contributors:	JEMEZ MOUNTAIN SCHOOLS					
05-IA-11031000-006	$0.00	$0.00	$0.00	$16,000.00	$0.00	$16,000.00	$16,000.00
	Cooperator/ Contributors:	BUREAU OF LAND MGMT, U S D I, BUREAU OF LAND MANAGEMENT					
05-IA-11031000-018	$0.00	$0.00	$0.00	$10,012.00	$0.00	$10,012.00	$10,012.00
	Cooperator/ Contributors:	FEDSOURCE					
05-IA-11031000-019	$0.00	$0.00	$0.00	$224,000.00	$0.00	$224,000.00	$224,000.00
	Cooperator/ Contributors:	BUREAU OF LAND MANAGEMENT					
05-IA-11031000-022	$5,125.00	$0.00	$5,125.00	$0.00	$0.00	$0.00	$5,125.00
	Cooperator/ Contributors:	VALLES CALDERA TRUST					
05-IA-11031000-026	$10,000.00	$0.00	$10,000.00	$0.00	$0.00	$0.00	$10,000.00
	Cooperator/ Contributors:	VALLES CALDERA TRUST					
05-IA-11031000-028	$1,406.00	$0.00	$1,406.00	$0.00	$0.00	$0.00	$1,406.00
	Cooperator/ Contributors:	VALLES CALDERA TRUST					
05-IA-11031000-030	$30,750.00	$0.00	$30,750.00	$0.00	$0.00	$0.00	$30,750.00
	Cooperator/ Contributors:	VALLES CALDERA TRUST					
05-IA-11031000-031	$15,375.72	$0.00	$15,375.72	$0.00	$0.00	$0.00	$15,375.72
	Cooperator/ Contributors:	VALLES CALDERA TRUST					
05-IA-11031000-032	$11,037.36	$0.00	$11,037.36	$0.00	$0.00	$0.00	$11,037.36
	Cooperator/ Contributors:	VALLES CALDERA TRUST					
05-IA-11031000-049	$0.00	$0.00	$0.00	$0.00	$0.00	$0.00	$0.00
	Cooperator/ Contributors:	USDI					
05-LE-11031000-007	$0.00	$0.00	$0.00	$1,471.32	$0.00	$1,471.32	$1,471.32
	Cooperator/ Contributors:	RIO ARRIBA COUNTY, RIO ARRIBA COUNTY SHERIFF'S DEPARTMENT					
05-LE-11031000-009	$0.00	$0.00	$0.00	$0.00	$0.00	$0.00	$0.00
	Cooperator/ Contributors:	NEW MEXICO STATE POLICE, NM STATE FORESTRY DIV					
05-MU-11031000-011	$0.00	$0.00	$0.00	$0.00	$0.00	$0.00	$0.00
	Cooperator/ Contributors:	TREE NEW MEXICO					
05-PA-11031000-017	$0.00	$0.00	$0.00	$6,397.00	$0.00	$6,397.00	$6,397.00
	Cooperator/ Contributors:	STUDENT CONSERVATION ASSOCIATION, THE STUDENT CONSERVATION ASSOCIATION, INC. (SCA)					
05-PA-11031000-040	$0.00	$0.00	$0.00	$18,990.00	$0.00	$18,990.00	$18,990.00
	Cooperator/ Contributors:	STUDENT CONSERVATION ASSOCIATION, INC.					
06-CO-11031000-014	$0.00	$0.00	$0.00	$0.00	$0.00	$0.00	$0.00
	Cooperator/ Contributors:	NEW MEXICO DEPARTMENT OF TRANSPORTATION					
06-IA-11031000-001	$0.00	$0.00	$0.00	$0.00	$0.00	$0.00	$0.00
	Cooperator/ Contributors:	VALLES CALDERA TRUST					

Table A.7 Cont'd: Grants and Agreements on Santa Fe NF

Grant & Agreement Number	Cooperator Cash Contibution	Cooperator Other Contribution	Cooperator Total Contribution	FS Cash Contribution	FS Other Contribution	FS Total Contribution	Total G&A Amount
06-IA-11031000-005	$0.00	$0.00	$0.00	$0.00	$0.00	$0.00	$0.00
	Cooperator/ Contributors:	VALLES CALDERA TRUST					
06-IA-11031000-006	$0.00	$0.00	$0.00	$30,000.00	$0.00	$30,000.00	$30,000.00
	Cooperator/ Contributors:	NATIONAL PARK SERVICE					
06-LE-11031000-018	$0.00	$0.00	$0.00	$4,000.00	$0.00	$4,000.00	$4,000.00
	Cooperator/ Contributors:	NEW MEXICO STATE POLICE					
06-PA-11031000-003	$0.00	$0.00	$0.00	$80,000.00	$0.00	$80,000.00	$80,000.00
	Cooperator/ Contributors:	THE QUIVERA COALITION					
06-PA-11031000-012	$0.00	$0.00	$0.00	$6,658.00	$0.00	$6,658.00	$6,658.00
	Cooperator/ Contributors:	STUDENT CONSERVATION ASSOCIATION, INC.					
06-PA-11031000-013	$0.00	$0.00	$0.00	$6,658.00	$0.00	$6,658.00	$6,658.00
	Cooperator/ Contributors:	STUDENT CONSERVATION ASSOCIATION					
01-IA-11031006-026	$20,000.00	$0.00	$20,000.00	$0.00	$0.00	$0.00	$20,000.00
	Cooperator/ Contributors:	DEPARTMENT OF ENERGY					
Grand Totals:	**$4,447,949.61**	**$895,090.00**	**$5,343,039.61**	**$6,659,167.94**	**$27,400.00**	**$6,686,567.94**	**$12,029,607.55**

G&A Count: 67